A Reference Grammar of Korean

A Complete Guide to the Grammar
and History of the Korean Language

韓國語文法總監
한국어문법총람

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KOREAN STRUCTURE

0.0. Introduction.

A Reference Grammar of Korean is a description of the language spoken in both north and south Korea in the second half of the 20th century. This material is given historical perspective by a description of the structure of the language of the Hankul texts of the second half of the fifteenth century and somewhat later, here called Middle Korean (MK); occasional reference is made to still earlier forms of the language, for which we have only very limited materials in the form of Chinese characters used for their sound value (i.e. as phonograms) or inferences that are made from systematic irregularities in the grammar of the earliest Hankul texts. Attention is paid also to dialect variation reported for the modern language and earlier speech. The core of the modern material reflects the pronunciation and usage of speakers who were born in Seoul before 1950, but that has been updated by observations of the speech habits of younger speakers, both in Seoul and elsewhere. In addition to direct elicitation, tape recordings, and written materials, VCR tapes of quite recent Seoul TV programs have provided authentic data of the contemporary usages referred to in various sections of the book. The sentences are presented in a Romanized form which can be readily converted to a Hankul representation, but they are intended to write spoken language, and do not always coincide with the prescribed spellings. The reader should be aware that Romanized forms such as **pat.e** and **iss.ey yo** are not mistakes, but represent the relaxed pronunciation of the Seoul speakers who have provided or checked them, though the speakers would indeed themselves write the words with the usually seen spellings "pat.a" and "iss.e yo", following the pronunciations heard in other areas and increasingly among younger speakers in Seoul.

Although a good deal is said about the history of sounds and forms, this work does not address questions of prehistory or genetic relationships. When references are made to Japanese, Chinese, or English data the intention is usually to show how the Korean counterparts are similar or different, or to add perspective on the meaning.

0.1. Background and acknowledgments.

This book has been put together over a period of more than forty years. The first version was written in 1960 under the Program in Uralic and Altaic Languages of the American Council of Learned Societies with support from the U.S. Office of Education. That version was later made available for a time through Bell-Howell. Meanwhile, after a trip to Korea in 1960, I set to work making many revisions and additions, resulting in the 1963 version, which I had hoped to turn into publishable form in fairly short order. The project was set aside, however, because of other priorities: publication of the Korean-English Dictionary and of the textbook Beginning Korean. Then I became deeply involved in writing A Reference Grammar of Japanese, which occupied my time and thoughts for eight years. In doing the research for that book I came to realize the inadequacies of the work I had done on Korean, especially in view of new ideas on Korean syntax which had appeared. Despite that, I decided to circulate photocopies of the 1963 version to a few colleagues for their comments and to use in Yale University seminars in the structure of the Korean language. As a result of similar seminars in the history of Korean, I came to feel the necessity of including materials from earlier centuries which provide perspective on the modern language, and that is what led to the dual nature of the book you see, for it attempts to set the synchronic description into its historical background, which often sheds revealing light on vexing problems.

While many of the example sentences are taken from published texts, most of the modern examples were elicited from Korean colleagues and informants, who were generous with their time and knowledge. I am particularly grateful to Sung-Un Chang (Cang Sengen) and Young-Sook Chang Lee ([ˈYi] Cang Yengswuk) who provided perception and insight, as well as many of the best examples; the late scholar Yang Ha Lee (ˈYi Yangha) was helpful during his collaboration with Sung-Un Chang and me while we were compiling our Korean-English Dictionary. In connection with another project I was able to elicit examples from Sek Yen [Kim] Cho ([Co] Kim Sek.yen) which were useful for this book. I have built upon earlier linguistic work published by Fred Lukoff and Elinor Clarke Horne, and I have freely incorporated material from their books. I have culled good examples from teaching materials

prepared by Edward W. Wagner and the excellent textbooks of the Myongdo Language Institute prepared by A.V. Vandesande and colleagues. I have also used to advantage materials found in works by linguists in Korea, both the south and the north. In 1961 I enjoyed some excellent discussions with, among others, Woong Huh (He Wung), Hie-seung Lee (¹Yi Huysung), Nam Tuk Lee (¹Yi Namtek), Sung Ny(e)ong Lee (¹Yi Swungnyeng), Chang-Hai Park (Pak Changhay), and Bong Nam Park (Pak Pongnam), whose textbook for the Foreign Service Institute was helpful. I am grateful to Fred Lukoff for introducing me to MaengSung Lee (¹Yi Mayngseng), whose assistance in checking delicate points of syntax was of great value. I learned much from my students, not only at Yale but at the University of Washington and at the University of Hawaii, many of whom have become eminent scholars and teachers. In particular, I have been much helped by the stimulating ideas through the years of S. Robert Ramsey and, more recently, J. Ross King; both have been excellent critics who shaped my thinking in many ways. Seungja Choi (Choy Sungca) and Sun-Hee Kim (Kim Senhuy) have provided excellent observations and examples. The final manuscript was read by Choi, King, and Ramsey, who suggested many corrections and improvements, most of which I was able to include. I began this final revision of the work in 1989, while on a sabbatical term at the Center for Korean Studies of the University of Hawaii, where both Dong-Jae Lee (¹Yi Tongcay) and Ho-min Sohn (Son Homin) gave generous consultation and assistance. I am grateful to them and also to other members of the Center and of the Department of East Asian Languages and the Department of Linguistics for the various facilities they provided. Byron Bender, Robert Hsu, G.B. Mathias, Albert Schütz, and J.M. Unger helped make that half year both productive and pleasant. A great many other scholars of the past and the present, including the late Hyon-Pai Choi (Choy Hyenpay), contributed to the ideas in this book through their published writings and private discussions, and their names will be found throughout the book and in the bibliography. I would be remiss not to mention my indebtedness for information on the modern language to Suk-Jin Chang (Cang Sekcin), Choy Hak.kun, Min-Soo Kim (Kim Minswu), Young-Key Kim-Renaud (Kim Yengki), Kim Thaykyun, Ko Yengkun, Ki-Shim Nam (Nam Kisim), Seok-Choong Song [Song Sekcwung], In-Seok Yang (¹Yang Insek), Joe Jung-No Ree (¹Yi Cenglo), Ki-dong Lee (¹Yi Kitong), and many others mentioned in the following pages. For information on the older language I appreciate the fine work of Huh Woong (He Wung), Wan-jin Kim (Kim Wancin), Kim Minswu, Gwang U Nam (Nam Kwangwu), Kōno Rokurō, Ki-Moon Lee (¹Yi Kimun), and Sung Ny(e)ong Lee (¹Yi Swungnyeng), among others, and I hold ever deepening respect for the prodigious achievements of the late Chang-Ton Yu (¹Yu Changton).

In citing personal names here and in the bibliography I have tried to include the Romanized form preferred by the person, when that is known to me, accompanied by a consistent version in the Yale Romanization. When information on personal preference was not available to me, I cite only the Yale version. To insure consistency, the Yale form is generally used in references within the book.

The preparation of the camera-ready copy of this book was much facilitated by the technical expertise and wisdom of my colleague and mentor Rufus S. Hendon, who has been helpful at every step of the way. His willingness to create and share software to answer my needs is deeply appreciated, as is his patient guidance through difficult problems, where his advice has been unfailingly sound.

0.2. The structure of the book.

A Reference Grammar of Korean is divided into two parts. Part I is a systematic survey of the structure, in which we examine problems of orthography and grammar, set up a system of parts of speech, analyze the constituents of sentences, and explore systematic relationships between sentences.

Part II is a grammatical lexicon, an alphabetically arranged list of particles, endings, affixes, auxiliary verbs, and other grammatically interesting elements, along with certain additional words (including ordinary nouns and verbs) to which quick reference may help clarify the other words listed. This part is not a substitute for a dictionary, since it does not contain most of the "content" words of the lexicon. It was my intention to make the list so complete that the user would find sufficient information about each element of a sentence, other than the meaning of nouns and verb stems, to figure out the grammar of any sentence and be able to translate it accurately.

The various appendix lists are intended to help the user find the meaning or shape of terms not easily located elsewhere, as well as other information that is relatively inaccessible in other sources.

0.3. Orientation.

This book is not trying to prove a theory about the nature of language. I do not maintain that the structure of a language is either discoverable or describable in one and only one "correct", or even uniquely "best", way. The criteria for judging a description vary with the purpose for which it is intended. For a reference grammar the most important criterion is balanced completeness. As much useful information as possible must be given in a form that makes it readily accessible to the user. The information that is most often, or most sorely, needed should be the easiest to get at. Lists are not to be scorned; formulas are not to be worshipped. Economy of statement is a technical criterion relevant to the accessibility of the information; elegance of statement is a psychological criterion relevant to the impact of the information.

Just what information is useful and for whom? The foreigner who is decoding (making out the meaning of) messages spoken or written in Korean is concerned, first of all, with the CONSTITUENCY of sentences. Given a sentence, he wants to know what are its pieces and how do they fit together. He needs to be able to take the sentence apart, to "parse" it. The foreigner who is encoding (making up) messages in Korean is interested in the MANIPULATION of sentences. Given known sentences, what new but related sentences can he say that will be understood and accepted by Koreans? Up to the sentence level our presentation is in terms of item and arrangement: the items are morphemes (words or parts of words), and the arrangement is stated in terms of immediate constituents (IC's) or, in a few cases, unordered strings. Beyond the sentence level, the presentation is in terms of item and process: the items are certain types of simplex sentences, and the processes are CONVERSIONS that turn these into more complex structures.

0.4. Grammatical terms.

You may find the terminology unfamiliar and irksome. If so, think of the categories in terms of concrete representations. Should you not feel comfortable referring to a common form of the verb as the "gerund", take that just to mean "the -ko form" of that verb − or, if you prefer, "the hako form". The grammatical categories of Korean are numerous, diverse, and complexly represented. They cannot easily be put into a frame of reference based on the descriptions of other languages. But in practice it is convenient to choose terms that are somewhat familiar, supplemented when necessary by new terms made up by analogy, with the clear understanding that NO DIRECT CORRESPONDENCE is intended with the categories of other languages that are given similar names.

The set of names found in this book has grown out of terms used in earlier books; many of them stem from Elinor Clark Horne and our teacher Bernard Bloch. One that has troubled many people is "infinitive" for the -e ending. Regardless of the merits of the word itself, the name has become so widespread in discussions of the grammar of Japanese (where it refers to the -i form, sometimes called "continuative stem") that it has surely become the standard. For what is here called the "summative" I earlier applied Horne's term "nominative", but that is better used in reference to the case-marking function of the particle ··· i / ka, and so I have abandoned its use for any other purpose. The word "substantive" is sometimes used as a general term for "noun", but here it is narrowed in definition to one of the endings (-um) that make the verb into a form that is used like a noun; other such forms are the summative -ki and the "derived noun" -i. For the -key ending I have changed the earlier term "adverbial" to "adverbative" so that "adverbial" can be used to discuss syntactic phenomena only. I adopt Wagner's term "purposive" to refer to the -ule ending, but what he calls the "expository" is here called the "sequential" (the -uni ending), and what he called the "effective" is called the "projective" (the -tolok ending), so that the term "effective" can designate an aspect marker of Middle Korean (-'kᵉa- or -'ᵉa-). In speaking of sentence styles I continue to use "authoritative" to refer to verb forms ending in -o/-so (etc.), as a synonym for "semiformal", Wagner's term, which characterizes the style in a broader way.

0.5. Citations.

Examples taken from modern written materials are not always attributed to the source, since they have frequently been edited as the result of elicitation. Examples from earlier texts are cited by date, text, and page. Two lists of these texts are appended: one arranged chronologically, the other alphabetically. Some of the dates are questionable; I have done my best to make practical decisions on the basis of the bibliographical materials available to me, and to add question marks when they seem appropriate. The intention is to give a specific date whenever possible.

The translations of the text sentences are mostly my own, sometimes made in consultation with others. I believe they are adequate to convey the meanings of the grammatical structures, but I have made only a limited effort to check the translation of philosophical concepts involved in Buddhism or references to ancient China. Chinese names, whether modern or ancient, are given in the now standard Pīnyīn Romanization. References to Middle Chinese forms of the 7th century follow the notations used for similar purposes in Martin 1987 and represent rough approximations to the pronunciation of northern China in the 7th century, along the lines of the phonemic analysis in Martin 1953.

Modern Korean forms are printed in boldface; forms of earlier Korean are printed in italics. The handling of vowel distinctions is slightly different in the Romanization as used to represent the pre-modern spellings and that used for the modern language. In citing pre-1933 spellings which retain obsolete features (such as the low back vowel *o* that mostly became a- and -u- in Seoul) the notation writes *wu* and *wo* for all cases of the back rounded vowels, *u* and *o* for all cases of the back unrounded. This "expansive" notation is shown in the italic font used for the Middle Korean forms. Forms from Ceycwu island, which retains the low back vowel (pronouncing it as rounded but distinct from *wo*), are cited in the same way. Unless otherwise specified, an italicized word is to be taken as Middle Korean. When a Chinese character in a Middle Korean text is accompanied by a Hankul syllable to show the prescribed readings, that syllable is printed in small italic capitals. When the character fails to carry a notation of the reading (as in 1481 Twusi) we get the reading from the prescriptions in 1447 Tongkwuk cengwun and put brackets around the word; if the reading is unavailable in Tongkwuk, we infer it from other sources and put an asterisk before the string of small capitals used to represent the syllable.

The quotation marks around forms cited from pre-Hankul sources are intended to remind us that the phonograms are interpreted faute de mieux in terms of their mid-15th century Hankul values; the semantograms (characters used for their meanings) are given as small-capital English words. The Yale Romanization is used for Japanese words, which are underlined. Sanskrit and Chinese words are not typographically differentiated from English, but the diacritic marks usually make them obvious.

Examples were chosen purely to illustrate structural patterns, and I have made no effort to alter ideological, religious, or sexist content that may seem quaint or even offensive. Notice that the term "vulgar" as used here does not mean obscene; rather, it refers to quite colloquial forms, including slang, that are generally avoided in writing and in less relaxed speech.

References to North Korean data are mostly taken from Cosen mal sacen (NKd) and Cosen-e munqpep (CM). As Kim Minswu 1985 points out, there were three distinct periods of prescriptive standardization in North Korea, referred to by the names of the authoritative publications: 1945-54 (the Thongil-an period), 1954-66 (the Chelqcaq-pep period) and 1966- (the Kyupem-cip period). In 1954, after using the unified spelling system that dates from the 1933 Thongil-an, North Korea published Cosen chelqcaq-pep, which introduced a number of changes, such as using the apostrophe for the **sai phyo** that is here Romanized as ···q (§1.5). Some of the changes were abandoned, in whole or in part, with publication of the 1966 Cosen mal kyupem cip, which made efforts to create a normalized "munhwa-e" (cultural language) that incorporated a few dialect or outdated elements (Kim Minswu 1985:129), including iya yo for the polite copula that is treated as **iey yo** in modern Seoul. And the 1966 rules prescribed the artificial pronunciation of /l/ (as a flap r) rather than /n/ for the initial of words here Romanized as [1]n··· which come from Chinese l··, including [1]i(···) and [1]y···, where the initial is elided in the south and was at one time pronounced with n··· in the north. (See §1.6.)

0.6. Romanization.

There are a number of systems for writing Korean words in Romanized form, depending on the purposes for doing so. The popular McCune-Reischauer Romanization, which received official sanction from the Ministry of Education in 1988, tries to approximate the way a Korean word sounds to the American ear, disregarding its internal structure and history. It is generally preferred in citing Korean names and in casually mentioning Korean words in English context. The Yale Romanization, like the various systems of Hankul spelling, takes account of more than just the sound. The two given names **Pok.nam** and **Pongnam** are both written "Pongnam" in the McCune-Reischauer system, but they are kept distinct both in Hankul and in the Yale Romanization. The two surnames **Yang** and **¹Yang** are spelled with the Hankul equivalents of "Yang" and "Lyang" in North Korea, but both are written "Yang" in South Korea and in the McCune-Reischauer Romanization. Four names can be shown as different by the Yale Romanization (**Yang Pok.nam, Yang Pongnam, ¹Yang Pok.nam, ¹Yang Pongnam** — and four more if there are people named **Pok.lam** and **Pong.lam**) but will all be treated alike by the McCune-Reischauer spelling "Yang Pongnam" (or "Yang Bongnam" if the space is ignored). Numerous problems of detail have to be handled arbitrarily in each system of spelling, whether it be Hankul or Romanization. The forms cited for the modern language in this book are not merely mechanical transliterations of Hankul spellings in one or another orthographic standard, but offer additional information about the background of the forms, including phonological details often ignored in Hankul. Koreans may be particularly irritated by the generous sprinkling of "···q" to mark certain reinforcements that go unmarked in the usual Hankul spellings. In particular, notations reflecting what is sometimes called "n-epenthesis" (see §1.5), such as mõsq ip.e and anq ip.e or mõsq yel.e and anq yel.e, may strike the eye as unnecessary nuisances, since the phenomenon they represent is not immediately apparent to the naive ear. The current trend in Hankul orthography (especially for words with Chinese components such as **munqpep** 'grammar') is to ignore most of the cases of reinforcement, including many of those which come from the Middle Korean adnominal particle *s*. Perhaps it would be more congenial if we made the notation smaller or subscript (mõs$_q$ ip.e, an$_q$ ip.e) or used a flimsier symbol, such as the apostrophe, here unavailable because it is needed for other purposes. But we will retain the full notation and invite readers to ignore it when that seems appropriate, as this book often does in alphabetizing lists.

0.7. Arbitrary conventions.

The notational devices and the decisions on punctuation, capitalization, and word division will strike you at times as needlessly fussy or cranky, and of less interest to the student than they are to the technical linguist. Feel free to simplify, modify, and adapt the notations to your own needs. I have attempted to present the material in a manner intended to be maximally useful, one that can be readily converted to that of other systems which retain less information. Decisions on the use of hyphens, apostrophes, and spaces may seem arbitrary in particular cases, as when we write "na-ka-, na-o-, na-su-" and "ka-po-" (but "wă po-"); they are intended to make it easier to identify the phrases. The apostrophe shows where a sound or a string of sounds is omitted in an abbreviation, as in **kanta 'yss.ta < kanta (ko) hayss.ta** 'said (that) he was going'.

Sentences of Romanized Korean, like those of English, begin with capitalized letters, as do names. But both the citation and the translation of the Middle Korean and Ceycwu examples begin uncapitalized. In the italic notations, *W* and *G* represent the voiced fricatives [β] and [γ]. (We have chosen not to use lowercase *v* and *g*, in part because of fear that they would be susceptible to misinterpretation, though these letters would be consistent with our use of *z* for the voiced sibilant.) The capital letters "C" and "V" are used in formulas to mean "(any) consonant" and "(any) vowel"; in other contexts "v" or "V" represents "verb (stem/form)". For both varieties of the Yale Romanization we use the conventional digraph "ng" to represent the velar nasal, rather than the single symbol provided by the phonetic notation [ŋ]. Specifically phonetic notations are usually put between brackets. Specifically phonemic notations are in boldface or italic between slashes, as in "/ng/ and /ng/ are pronounced as the velar nasal [ŋ]". Brackets are also used to demarcate ellipted words, or parts of

words, and elisions of a phoneme or a string of phonemes. When the slash is between two words or letters, it has the usual meaning of "or (optionally)". Material within parentheses may be either enlargements or optional replacements; the context should make the intention clear.

When a Korean citation is within an English sentence, the gloss (translation) is set off with single quotation marks, as in "The word **koki** 'meat', for example, ... ", but the marks are omitted for the glosses of examples not embedded in such context, since the demarcations are obvious.

The macron is used to mark long vowels in modern words like **tōn** 'money', **nwūn** 'snow', **ūmsik** 'food', **sīl** 'thread', **sĕm** 'island', and **păm** 'chestnut', though the distinction of long and short vowels has been largely lost by younger Seoul speakers. The dots in the Middle Korean words represent the distinctive pitch of the following syllable (one dot for high, two dots for low rise), and unmarked syllables are treated as low, provided the text is one that normally marked the accent. The position of the dots is kept just where it is in the original text, so that *swon* 'guest' + *˙i* [nominative particle] is written *swo˙n i* (1445 [1]Yong 28) and pronounced *swoⁿⁱ*. The spaces and hyphens correspond to nothing overt in the spellings or pronunciations; they are there just to help your eye identify words and parts of words. MK nouns that appear in an environment where a basic final --*h* after a vowel or a resonant is suppressed (and not shown by the Hankul) are Romanized as --*V[h]*, --*l[h]*, --*n[h]*. But for the other syllable-excess nouns (§4.2) no indication is given of the basic shape before the reduction: the shapes are written according to the spellings in the texts, which most often indicate the syllables heard rather than the underlying forms.

1.0. Letters.

Korean words can be spelled out with foreign letters of various kinds, including the familiar Roman letters used in this book, or with letters created in Korea by King Seycong and promulgated in 1445. Words of Chinese origin are often written with Chinese characters either alone, without letters to represent the pronunciation, or added in parentheses to identify a word difficult to understand from the sound alone. In modern south Korea it is a matter of controversy whether the continued use of Chinese characters should be encouraged or discouraged.

1.1. Hankul symbols.

Koreans usually write in an alphabet known as Hankul. As a result, the word Hankul is also used to mean 'Korean language, especially as written' and 'Korean letters = literature'. In the system of writing there are symbols to represent each of the phonemes of Korean. The term "Hankul" was first used by Cwu Sikyeng in 1910; earlier the symbols were called ĕnmun. It is possible to use the system as we use Roman letters, writing horizontally across the line letter by letter: that is called **kalo-ssuki** 'horizontal writing'. But usually the symbols are joined into written syllables, which often but not always correspond to spoken syllables. The written syllables are made up of an "initial" consonant (including zero) + a vowel nucleus or "medial", consisting of a vowel or a semivowel (y or w) + a vowel, written as a unit. The vowel is sometimes followed by a "final" consonant or two-consonant cluster that is called by the Korean grammarians **pat.chim** 'pedestal'. The syllables are written as blocks (called "logotypes" by 1893 Scott) designed to resemble the shape and spacing of Chinese characters, which are still often used to write, or to clarify, Chinese words in the midst of native Korean words. The initial is written at the top, the nucleus either on the right (those containing **a** or **e** or **i**) or below (those containing **u** or **wu** or **o**). A final **pat.chim** is placed below everything − and slightly to the right, if it is but a single consonant. The shapes of the symbols are altered a bit when they appear in different positions. For example, before **a** the **k** swoops back to the left 가 **ka**, but astride the **o** it has a straighter fall 고 **ko**, and the final k is longer, flatter, and straighter: 막 **mak**.

Since there are a limited number of Hankul symbols, representing the basic phonemes of Korean, we can substitute our Roman letters for the Hankul letters with no loss of information. If we are consistent, the Roman transcription can be automatically converted into the Hankul version and vice versa. There are several ways in which Korean can be Romanized, and each scheme involves certain difficulties and special rules. The system used in this book takes time to get used to, because it is

designed to be typographically simple by avoiding "odd" letters, such as ŏ (= e) and ŭ (= u). But once you are familiar with the system, it is very easy to use; you will find it more flexible than other systems of putting Korean into Roman letters. With this system anything written in Hankul can be typed out on an ordinary English typewriter or computer keyboard with no special tricks.

How many different syllables does Korean have? For the modern language, computer codes allow about 2,500 Hankul syllables to be differentiated. Using all conceivable sequences, including many that do not occur in any word, [1]Yu Huy (1824 Enmun-ci 18) came up with the staggering number of 10,250 possible syllables. And Kim Hyenglyong (1985:31) found a total of 11,172 different orthographic (= morphophonemic) syllables. His study (31-2) found the total number of different two-syllable strings (morphophonemic dissyllables) to be 31,759,684, of these types (V includes yV):

Type	Example	Strings
1. V-V	oi	441
2. V-VC	a.yang	11,907
3. V-CV	oli	7,938
4. V-CVC	yūceng	214,326
5. CV-V	kyŏ.yey	7,938
6. CV-CV	cwuchey	142,884
7. CV-VC	kyŏyang	214,326
8. CV-CVC	pītan	3,857,868
9. VC-V	Yenge	11,907
10. VC-CV	ak.ki	214,326
11. VC-VC	ek.yang	321,489
12. VC-CVC	wūntong	5,186,802
13. CVC-V	kak.o	214,326
14. CVC-CV	sokto	3,857,868
15. CVC-VC	cengqyel	5,186,802
16. CVC-CVC	hyek.myeng	12,308,536

1.2. Hankul spelling.

Koreans, like speakers of English, have spelling problems. Although the Hankul system of writing is very simple, it is not easy to devise a consistent system for spelling out the words of the language. That is because the structure of Korean is somewhat complicated, in that words and parts of words often change the way they sound depending on the words around them. The Korean writer has a choice: he can use the Hankul symbols (or their Roman equivalents) to write phrases EXACTLY AS THEY SOUND, or he can write individual words and parts of words ALWAYS THE SAME WAY regardless of changes in sound. The first method, known as a PHONEMIC orthography, has the advantage that even a foreigner beginning his study of Korean can read sentences without learning a lot of special rules; and he can write down everything he hears − provided he hears accurately − without worrying about what words the phrases contain. But the disadvantage to the reader who already knows the language is obvious: the same word appears sometimes in one shape, sometimes in another. For that reason, native speakers of Korean naturally prefer some sort of MORPHOPHONEMIC orthography, as linguists call the second kind of spelling. Morphophonemic spelling tells the reader a lot about the grammar of the phrase he is reading, since it tries to spell each word (or part of a word) always in the same basic shape, with the expectation that the reader will be able to apply a set of rules that will automatically produce the particular phonemic shape needed to pronounce the phrase. We do something similar in English when we write our plural ending as "s" both after "cat", where it is pronounced as an s, and after "dog", where it is pronounced as a z.

The difficulties that arise in using a morphophonemic orthography are of three kinds:

(1) How far should we go in analyzing words into parts? How can we be sure we have the "same" word-part (= morpheme or string of morphemes) in different words? To what extent should we allow our knowledge, or someone's knowledge, of the history of the words to influence the decision?

(2) When there are several spoken variants for a word, should we try to settle on one as the "standard" form and ignore the others when we write? Perhaps we can let two or more forms coexist as MODEL AND SHORTENING, as with the English forms "do not" and "don't"; or as LITERARY AND COLLOQUIAL, like English "unto" and "to"; or as DIALECT AND STANDARD, like English "dreamt" and "dreamed", "dove" and "dived".

(3) What specific spelling devices should we use to handle certain tricky problems, such as reinforcement (the **sai sios** or **-q** phenomena, §1.5) or the complications of initial l and n which lead to the use of the superscript letters [1] and [n] in the Yale Romanization (§1.6)?

Koreans have contended with these problems for many years, and there have been several attempts to prescribe consistent and comprehensive spelling systems. Two spelling systems have come to enjoy wide use in the years since the end of World War II. One is the official system of South Korea (the Republic of Korea), sometimes called the **Thŏngil-an** or Unified System; the other is that of North Korea (the Democratic People's Republic of Korea or DPRK). The two systems are almost identical in the way they treat problems of the first and second types; they differ in their approach to problems of the third type. Since each system has some advantages, and both are widely used and sanctioned, the spellings of this book are designed to convert into either system automatically. Both systems have undergone several minor revisions and the usages reflected in this book may be modified in future revisions of the systems.

1.3. Yale Romanization.

In the system of Yale Romanization used in this book, the dot or period is used within a word for several purposes, some more important than others:

(1) The dot is used to indicate the "zero" (vowel) beginning of a syllable or other ambiguous situations when the preceding Hankul syllable ends in a **pat.chim** (final) consonant: **mek.e, mek.ko, mek.hinta**. Of course, when the boundary is shown by a space or a hyphen, the dot is unnecessary: **Puk Han** 'North Korea', **kak-kak** "each separately".

(2) The dot is also used to distinguish **e.yV** from **eyV**, **ay.V** from **ayV**, **u.yV** from **uyV**, and **o.yV** from **oyV**. We use the digraphs **ey, ay, uy,** and **oy** as UNITS except when a dot intervenes. The dot is omitted, however, when the y follows yo because there is no string *yoy, so there is no possibility of misinterpreting the syllable division in a word like **kyŏyuk** 'education'. In a word like **mu.yek** 'trade' the dot is just a reminder, because in modern Korean uy does not occur after a labial. In a word like **kup.wu** 'classmate', the dot is not strictly necessary, since the syllable /pwu/ is simplified to the spelling pu (modern Korean lacks the unrounded syllable */pu/), but I retain the dot for clarity.

(3) A third use of the dot is to remind the reader of the automatic morphophonemic rules (sound changes) between two consonants: ···th.t··· is pronounced ···tt···, ···ch.s··· is pronounced ···ss···, etc.; ···p.m··· is pronounced ···mm···, ···n.l··· is pronounced ···ll···; in verb forms ···n.t··· is pronounced as if ···ntt···, ···n.k··· as if ···nkk···, ···n.c··· as if ···ncc···, ···n.s··· as if ···nss···. If we were not trying to follow the Hankul spelling systems, which ignore all three kinds of sound changes, we would spell the verb forms ···mqt···, ···nqk···, ···nqc···, ···nqs···, etc.

In the third use, the dot can be omitted with no loss of essential information about Hankul spelling or even (given knowledge in the last case that the word is a verb form) the ultimate pronunciation, and that is what we do in using the Romanization in English contexts, such as the Bibliography. In the first two uses the dot is essential to recover all the word-structure information contained in the Hankul spelling; in the second use it is required as a result of choosing digraphs to write some of the vowels.

In later sections the sound system of Korean is discussed in terms of the Romanization, and the several digraphs are treated as single units. The consonants are represented by **p t c k s, pp tt cc kk ss, ph th ch kh h, m n ng l**; the vowel nuclei are represented by **i ey ay u e a wu** (abbreviated to **u** after a labial) **o oy, yey yay ye ya yu** (an abbreviation of **ywu**) **yo, wi wey way we wa**. In addition the letter **q** is used as a special morphophonemic symbol to show reinforcement (see §1.5), and superscript [1]··· and [n]··· show differences between the spelling systems of the two Koreas (see §1.6). In this book

the length of a long vowel, ignored in the usual Hankul spelling, is shown by a macron (a line above the vowel); see §2.7.2.

1.4. Transliteration rules.

Here are the complete rules for transcribing Hankul into the Yale Romanization, with the exception of the problems of [1]⋯, [n]⋯, and ⋯q, which are covered in the following sections. The Romanization uses 16 of the usual 26 Roman letters, plus the digraph ng, final ⋯q, and initial superscript [1]⋯ and [n]⋯. You will occasionally find other superscripts used to show divergences between the spellings of the two Koreas: [s] in iss.[s]o and iss.[s]up.nita; [h] in an[h]ay (see §2.8); [y] in ph[y]ey and m[y]ey (see §4.3). In the table of rules the word "space" means "space, hyphen, or other punctuation", C means consonant, 0 means initial zero (the syllable starts with a vowel, y, or w).

CONSONANTS

Hankul	Initial	Example	Final	Examples
ㄱ	k	kikwu	k(.) + m n l	sik.mo (or sikmo)
				kyek.nyen (or kyeknyen)
				tok.lip (or toklip)
			k. + k h 0	sik.kwu, kak.ha, mek.e
			k	yak, siktang, [1]yukpun, mekca,
				[1]yuksip, patak, ...
ㅋ	kh	khal	kh + space	puekh
			kh(.) + C	puekh.teyki (or puekhteyki)
			kh. + 0	puekh.an (but better written
				as two words)
ㄲ	kk	kkay	kk + space	pakk
			kk + 0 k (kh)	kkakk.un, kkakk.ko
			kk(.)	kkakk.ta (or kkakkta),
				kkakk.nun (or kkakknun)
ㅂ	p	papo	p(.) + m n l	ip.mun (or ipmun)
				ip.nap (or ipnap)
				sip.lyuk (or siplyuk)
			p. + p h 0	kup.po, ip.hak, ip.e
			p	ip, ipta, ipko, ipsang, ipcang, ...
ㅍ	ph	pha	ph + space	iph
			ph(.) + C	aph.cang (or aphcang)
			ph. + 0	aph.aph-i
ㅃ	pp	ppye	–	–
ㄷ	t	titinta	t + space	kot
			t. + t h 0	tat.ta
				tat.hinta
				tat.un
			t(.)	tat.chinta (or tatchinta),
				tat.ko (or tatko),
				tat.nun (or tatnun), ...
ㅌ	th	thal	th + space	path
			th. + 0	puth.e
			th(.) + C	puth.ta (or puthta),
				puth.ci (or puthci),
				puth.nun (or puthnun), ...

Hankul	Initial	Example	Final	Examples
ㄸ	tt	ttal	–	–
ㅅ	c	cal	c + space	nac
			c. + c h 0	mac.ci
				mac.hinta
				mac.un
			c(.)	mac.ta (or macta),
				mac.chwunta (or macchwunta),
				mac.nun (or macnun)
ㅊ	ch	cha	ch + space	kkoch
			ch(.) + 0	coch.a
			ch(.)	coch.ko (or cochko), coch.ci (or cochci),
				coch.nun (or cochnun)
ㅉ	cc	ccanta	–	–
ㅅ	s	san	s + space	os
			s. + s 0	wūs.^{s}up.nita
				wus.e
			s(.)	wūs.ko (or wūsko), wūs.ci (or wūsci),
				wūs.nun (or wūsnun)
ㅆ	ss	ssal	ss. + s 0	iss.^{s}o
				iss.e
			ss(.)	iss.ta (or issta), iss.ko (or issko),
				iss.nun (or issnun)
ㅎ	h	hay	h. + 0	noh.a
			h(.)	noh.ko (or nohko), noh.ci (or nohci),
				noh.nun (or nohnun)
ㅁ	m	mal	m. + 0	sim.e
			m(.) + 1	chim.lyak (or chimlyak)
			m	nam, simpang, sīmnun, chāmko
			(But CF §8.1.1	sīm.ko, sīm.ta, sīm.ci.)
ㄴ	n	nal	n. + 0	sin.e
			n(.) + 1	Sin.la (or Sinla), Cen.la (or Cenla)
			n	an, sinnun, sinmun, cīnpo,
				^{n}yento, ^{n}yenkam, mence, ...
			(But CF §8.1.1	sin.ko, sin.ta, sin.ci.)
ㄹ	l	latio	l. + 0	sil.ep
			l(.) + n	il.nyen (or ilnyen)
			l	kil, silkwa, silqswu, mullon,
				ppalli, kolmu, kīlta, ...
ㅇ	(ZERO)	al, yen,	ng(.) + 1	seng.lip (or senglip)
		wenca	ng	pang, tong-an, congi,
				cwungang, thōngil
ㄺ	–		lk. + k h 0	ilk.ko, ilk.hinta, ilk.e
			lk(.)	ilk.nun (or ilknun), malk.ta (or malkta),
				pulk.ci (or pulkci), ...

Hankul	Initial	Example	Final	Examples
ㄼ	–		lp. + p h 0	nelp.e, nelp.hinta
			lp(.)	nelp.ko (or nelpko), nelp.ci (or nelpci), nelp.ni (or nelpni)
ㄿ	–		lph. + 0	ulph.e
			lph(.)	ulph.ko (or ulphko), ulph.nun (or ulphnun), ...
ㄻ	–		lm. + m 0	talm.un
			lm(.)	tālm.nun (or tālmnun)
			(But CF §8.1.1	tālm.ko, tālm.ta, tālm.ci.)
ㄾ	–		lth. + 0	halth.e, halth.un
			lth(.)	halth.ko (or halthko), halth.nun (or halthnun)
ㅀ	–		lh. + 0	ilh.e, ilh.un
			lh(.)	ilh.ko (or ilhko), ilh.nun (or ilhnun), ...
ㄽ	–		ls + space	kols, tols, ols
ㅄ	–		ps + space	kaps
			ps. + s 0	ēps.[s]up.nita
				ēps.e
			ps(.)	ēps.ta (or ēpsta), ēps.nun (or ēpsnun), ...
ㄵ	–		nc. + c 0	anc.ci
				anc.e
			nc(.)	anc.ko (or ancko), anc.nun (or ancnun), ...
ㄶ	–		nh. + 0	mānh.i
			nh(.)	mānh.ta (or mānhta), mānh.ni (or mānhni)

MEDIALS

Hankul	Romanized	Examples
ㅣ	i	pi, īs.ta, oi
ㅟ	wi	twī, chwuwi, wiseng
ㅢ	uy	uyca, cwuuy, ūyuy, huyta
ㅜ	u after p ph pp m	pul, phul, pun, mun
	wu elsewhere	wuli, hwū, nwun, twūl, kkwum
ㅠ	.yu after a e o (u)	ye.yu, ca.yu, sō.yu
	yu elsewhere	yuli, kyul, hyung, wuyu
ㅡ	u	un, kum, khuta; papputa (§1.7)
ㅓ	e	emeni, khe (yo), pappe, tewuk
ㅞ	we	wenca, kwen, il-wel
ㅕ	.ye after a e o (u)	ca.yen, he.yeng, mo.ye
	ye elsewhere	yek, [n]yen, [1]yen.ay, kyewul
ㅔ	ey	ney, cēy-il, kakey, pheyn
ㅖ	.yey after a e o (u)	a.yey, no.yey = no[1]yey, ku.yey
	yey elsewhere	yēysan, [1]yēypay, kyēysita
ㅞ	.wey after a e o u	[rare]
	wey elsewhere	wēynq il, kwēy
ㅗ	o	oi, hao, mom, tōn, os, kōpta
ㅛ	.yo after a e o (u wu)	hwā.yo(il), he.yong, sō.yong
	yo elsewhere	yōkwu, yōngpi, iyo, phyo

Hankul	Romanized	Examples
ㅚ	oy	ōykwuk, kkoy, sīoy, poynta
ㅏ	a	ama, koa, tong-an, hāyan
ㅘ	wa	wā (se), pwā, towa, cwāsek
ㅑ	.ya after a e o (u)	a.ya, se.yang, co.yak
	ya elsewhere	yācwung, kyawus, iya
ㅐ	ay	ayki, kkay, hāyan, sensayng
ㅒ	.yay after a e o (u wu)	hā.yay, hē.yay, ppō.yay, ppū.yay
	yay elsewhere	yayki (= iyaki)
ㅙ	way	way, kkway, insway, twāyci

The Hankul symbol for **we** can be written ㅞ, but ㅚ is preferred.

1.5. Reinforcement (-*q*).

The rules for the treatment of what we call "reinforcement" are somewhat complicated. Roughly speaking, the linguistic facts are as follows. When certain words or parts of words are attached to others that begin with **p t c k** or **s**, that consonant is doubled to **pp, tt, cc, kk, ss**. When they are attached to certain other elements that begin with "zero" (a vowel) or **h**, the vowel or **h** is preceded by **t**; when they are attached to certain elements that begin with **m** or **n**, those onsets are preceded by syllable-final **n**; when they are attached to certain elements that begin with **y** or **i**, the pronunciation is /···ny···/ or /···ni···/ after a consonant and /···nny···/ or /···nni···/ after a vowel, but ···lq y··· and ···lq i··· are realized as /···lly···/ and /···lli···/. Reinforcement of ···n i··· → ···nq i··· /···nni···/ and ···n y··· → -nq y··· /···nny···/, sometimes called "n-epenthesis" (not to be confused with the nasal epenthesis of §2.10.4) is so pervasive that it passes largely unnoticed: **musunq iwus** 'what neighbor', **ōnq yātang** 'the entire opposition party', **sinq yětang** 'a new party in power', **sinhonq** [1]**yehayng** 'honeymoon trip'. But such reinforcement does NOT occur before the noun **i** 'person; fact / act; ... ', the particle **iya / ya**, the particle (**iyo) / yo**, or the copula stem **i-**. The peculiarities of the phoneme string /yey/ (§4.3) are reflected in the pronunciations /sillēysan/ for **silq yēysan** 'real budget', /kallēycengita/ for **kalq yēyceng ita**, and /musunnēyki/ for **musunq yēyki** (← yāyki < iyaki) 'what talk'. As a result of vowel raising **tōnq** (iyaki > yāyki >) yēyki → /tōnneyki/ 'money talk' may sound just like **tōnq** (nāyki >) nēyki 'gambling'. When the juncture after the accusative particle is dropped, **os ul (l) ip.e** 'wears a garment' is usually said as /osulipe/ with a flap [r] but you may sometimes instead hear /osullipe/. When the particle itself drops, **os [ul] ip.e**, you usually hear /onnipe/ = **osq ip.e** rather than /otipe/ = **os ip.e** with [d]. When the particle gets dropped in **mun (ul) yel.e** 'opens the door' the phrase is usually said as **munq yel.e**, pronounced /munnyele/ and not **mu-nye-le**. There are a few lexical exceptions to the n-epenthesis rule, notably [1]**yuk-i** [yugi] rather than (?)[1]**yukq-i** [yungni] 'six-two; sixty-two', familiar in the term [1]**yuk-i-o** '6-25' (= ~ **sāpyen / tōng.lan** 'the North Korean invasion of June 25th, 1950') which is pronounced /yukio/ or contracted to /yukyo/. We list seven types of examples:

(1) Native Korean sequences (usually compounds of noun + noun) in which the first element ends in a vowel.

(2) Native Korean compounds in which the first element ends in a consonant.

(3) Chinese loanwords (originally, in Chinese, compounds − usually of two syllables) in which the first element ends in a vowel.

(4) Chinese loanwords in which the first element ends in a sonant (**m n ng l**).

(5) Chinese loanwords in which the first element ends in **l** and the second begins with **t, c,** or **s**. If both elements are bound, the reinforcement is obligatory; if one element is free, the reinforcement is usual but there are exceptions.

(6) Korean verb forms consisting of a stem that ends in a nasal **n** or **m** (from a linguistic point of view also those that end in **nc, lm, lp, lph, lth,** and for some speakers **lk**) plus an attached ending that begins with **t, c, l,** or **s**. Before **s** the reductions of final **nh** and **lh** can be added.

(7) A sequence of the prospective modifier (**-ul**) followed by a noun that begins with **p, t, c, k,** or **s**.

Spellings in both the North and the South ignore the reinforcement that occurs automatically in Type 5 (Chinese loanwords with l + s, l + t, l + c). In the Yale Romanization we prefer to write **lqs**, **lqt**, and **lqc** for these words since in the non-Chinese words there are contrasts with unreinforced **ls**, **lt**, and **lc**. Moreover, it is not always easy to know that a particular word is of Chinese origin.

Both of the Hankul spelling systems also ignore the reinforcement that occurs automatically in Type 6 (verb forms), and indeed there are dialects which do not reinforce these forms (see §8.2.1). Instead of here writing **-q**, as one might prefer, the Yale Romanization uses a dot as a reminder notation: ···**m.t**···, ···**n.c**···, ...

Type 7 is ignored by the South Korean spelling but sometimes indicated in the north, and it was often written in early Hankul texts with a "glottal stop" symbol corresponding to the **-q** with which we mark it. (The symbol is like the Hankul **h** but without the short stroke at the top: ㆆ)

Types 3 and 4 (the other Chinese loanwords) are treated the same as Types 1 and 2 (the Korean words) by the North Korean system, but in practice there is variation, perhaps owing to an indecision over whether to admit some of the reinforced forms as "standard". The NK dictionary (NKd) often omits the apostrophe in the entry spelling for words of these types, and gives the pronunciation separately: "sāken [kken]", "sānpo [ppo]". Yet for other entries both the apostrophe and the separate pronunciation are given: "ka'pep [ppep]", "mun'ca [cca]". The South Korean system, too, sometimes treats Types 3 and 4 as if they were 1 and 2 respectively, but many people are inconsistent or forgetful and ignore the reinforcement in the Chinese loanwords. [1]Yi Ungpayk (458) advises us to write the postvocalic "-s" for Type 3 only when there is a minimal contrast with another word that does not have the reinforcement: **kaqpep** 'addition', **kapep** [lit] 'family tradition'; **seqca** [obsolescent?] 'letter (epistle; character)', **sēca** 'illegitimate child'; [1]**īqkwa** 'science', **ī-kwa** 'lesson two'; **hōq-swu** 'number of households', **hoswu** 'lake'; **choqcem** 'focal point', **cho-cem** 'vinegar shop' (? − not found in dictionaries); **yoqcem** 'main point', **yo-cem** 'mattress shop' (? − not found in dictionaries).

For Types 1 and 2, the earlier North Korean rule is very simple: at the end of the prior element add an apostrophe, called **sai phyo** 'between-mark' and looking much like the left side of the Hankul letter ㅅ. The Yale Romanization uses a similar device: add **q** at the end of the prior element. (We prefer to avoid the apostrophe because it is useful for other purposes, such as showing abbreviations.) In the South Korean system a final **s** is added to the prior syllable when it ends in a vowel (Type 1), and the reinforcement is ignored when the prior syllable ends in a consonant (Type 2), except that as the later element the morpheme **i** 'tooth' is spelled **ni** = /···(n) ni/ (2). At one time, following the practice of the early texts, the ···**s**··· was written as a separate syllable all by itself and called **sai sios** 'in-between s'; at that time (the early 1930s) it was used for both Type 1 and Type 2.

The following table shows examples of all seven types with the different treatments, together with the pronunciation and the phonemic shape as transcribed in Yale Romanization symbols, but the reduction of syllable-excess at the end of nouns is not shown. Space and hyphen are retained from the notation on the left and do not necessarily reflect the practice for the particular phrase in either the south or the north, since compounds and short phrases are usually written without a break in both parts of the country.

TABLE OF REINFORCEMENT TYPES

	Romanization	South Korea	North Korea	Pronunciation
1.	twīq path	twis path	twi' path	/twīppath/
	payq nolay	pays nolay	pay' nolay	/paynnolay/
	peykayq īs	peykays is	peykay' is	/peykaynnis/
	ku-kkaciq īl	ku-kkacis il	ku-kkacis' il	/kukkacinnīl/
2.	wiq iq-mom	wis is-mom	[*wi' i'-mom]	/winnimmom/[1]
	mulq kyel	mul kyel	mul' kyel	/mulkkyel/
	kangq ka	kang ka	kang' ka	/kangkka/
	cip(q) īl	cip il	cip(') il	/cipīl, cimnīl/

	petulq iph	petul iph	petul' iph	/petulliph/
	kas yang(thay)	kas yang(thay)	kas' yang(thay)	/kannyang(thay)/
	mulq yak	mul yak	mul' yak	/mullyak/
	kethq iph	keth iph	keth' iph	/kenniph/
	yĕysq iyaki	yĕys iyaki	yeys' iyaki	/yēynniyaki/
	kethq yakta	keth yakta	kath' yakta	/kennyaktta/
	kyelmakq yem[2]	kyelmak yem	kyelmak' yem	/kyelmangnyem/
	sŏngkosq (n)i	songkos ni	songkos' i	/sŏngkonni/
	tesq (n)i	tes ni	tes' i	/tenni/
	okq-(n)i	ok-ni	ok'-i	/ongni/
	petq-(n)i	pet-ni	pet'-i	/penni/
	ppetulengq (n)i	ppetuleng ni	ppetuleng' i	/ppetulengni/
3.	kaqpep	kaspep	ka'pep	/kappep/
	sāqken	sasken	sa(')ken, saken	/sākken/
4.	munqca[3]	munca	mun'ca	/muncca/
	sānqpo	sanpo	san'po, sanpo	/sāmppo/[4]
	inqki	inki	in'ki, inki	/ingkki/[5]
5.	cengqyel	cengyel	cengyel	/cengnyel/
	kyelqsan	kyelsan	kyelsan	/kyelssan/
	kyelqtan	kyeltan	kyeltan	/kyelttan/
6.	kyelqceng	kyelceng	kyelceng	/kyelcceng/
	sīm.ta, sīm.ko	simta, simko	simta, simko	/sīmtta/, /sīmkko/
7.	cĕlm.ta, cĕlm.ko	celmta, celmko	celmta, celmko	/cĕmtta/, /cĕmkko/
	halq kes	hal kes	hal' kes, hal kes	/halkkes/

See also §4.2 (end); silh(q)-cung in Part II.

[1] ← /winninmom/; CF CM 1:99. For all uses of the morpheme meaning 'up' NK standardizes **wu**; the adnoun (or prefix) should be **wuq** but they have standardized it as **wus**, the spelling that is used in the south for those phrases that have preserved the older vowel nucleus. See §5.3. This word is not carried by NKd.

[2] Though the parts are Chinese, this second-degree compound is here treated as if Korean.

[3] = **kulqca** 'letters, written characters'.

[4] ← /sānppo/

[5] ← /inkki/

For reasons not clearly understood a fair number of Chinese loanmorphs show a marked tendency to induce reinforcement as the final member of a compound: -(q)kwa 'course' or 'section', -(q)kwen 'chit' or 'sphere' or 'privilege', -(q)ken 'case, matter' (CF sāqken, coqken, ānqken), -(q)ka 'price' (CF tāyqka, yūqka, [1]yūqka, [1]yemqka), -(q)kwi 'couplet' (CF ĕqkwi, [1]yenqkwi), -(q)ki 'feeling' (CF yūnq-ki), -(q)kyek 'standing, rule, grammatical case' (CF cwuq-kyek, inqkyek), -(q)ca 'written character', -(q)cem 'point', -(q)cang 'document', -(q)cŏy 'crime', -(q)cūng 'illness', -(q)pyēng 'illness', -(q)pep 'law, rule', -(q)po 'step' (sānqpo); -(q)swū 'number' (CF chiq-swu 'size, measure' ≠ chi-swu 'number of inches'); ... . See also -(q)seng '-ness' and cek '-ic' in Part II. The syntactic relationship of the two morphemes in Chinese is irrelevant to the reinforcement: silqkwen can mean either 'real power' or 'lose power'; the verbal noun sānqpo 'stroll' comes from a Chinese verb-object phrase ('scatter one's steps').

For certain phrases we find vacillation in whether to reinforce or not: i kkoch ilum /ikkotilum/ 'the name of this flower' and ku ūmsik ilum /kuūmsikilum/ 'the name of that food' (both M 1:1:390) are more commonly said as i kkochq ilum /ikkonnilum/ and ku ūmsikq ilum /kuūmsingnilum/. Similarly san kkochq ilum 'names of mountain flowers', sothq ilum 'names of pots', (yang)kokq ilum 'names of songs', [1]yekaykq ilum 'passenger names'. Yet tāyhak ilum /tāyhakilum/ is preferred

to **tāyhakq ilum** /tāyhangnilum/ 'college name'. (On ···q y··· and ···q i··· see §4.4.) The word for 'carsick(ness)' is usually said as **chaq melmi** /chammelmi/ but dictionaries ignore the reinforcement; similarly ignored is the usual reinforcement of **chiq sōl** 'tooth brush' and **chiq-swu** 'measure'. Certain phrases, however, are always reinforced: **tankolq tapang** 'a favorite teashop', **tankolq son nim** 'a regular customer' (M 1:1:390); **petulq kaci = petu' namuq kaci** 'a willow(tree) branch' (the apostrophe marks an elision); ··· . The phrase **chinkwu(q) cip** 'a friend's house' can rime with **iwus cip** 'neighboring house' but **wuli cip** 'our house' is never *wuliq cip. And others are never reinforced: **tōl path** 'a field of stones' (not *tōlq path). NKd indicates reinforcement in **chongka** 'gun mount' but no other source confirms that, so it may be a mistake. NKd lacks an indication of reinforcement for **cwungqcung** 'grave illness' and **kyengqcung** 'light illness' (as found in LHS and in Kim Minswu and Hong Wungsen), and no dictionary indicates reinforcement in **hwā(ˀq)cung** 'a flareup of anger'.

1.6. Initial l and n.

Words beginning with a morpheme which has a basic and/or historical shape that begins with l are pronounced with an initial n. Such words are written in South Korea with an initial n but in North Korea they are written with an initial l; in this book we write ^{1}n··· for these words. But before i and y neither n nor l is pronounced. The South Koreans follow the pronunciation and begin the word y··· or i···, but the North Koreans write ly··· and li··· or ny··· and ni··· depending on the basic and/or historical shape of the morpheme; and here we write ^{1}y··· and ^{1}i··· or ^{n}y··· and ^{n}i···, with a few cases of "(n)" owing to the inconsistencies found in spelling practices. The following examples show the differences:

	Romanization	South Korea	North Korea	Pronunciation	Meaning
1.	^{n}yenkam	yenkam	nyenkam	/yenkam/	'yearbook'
	^{n}ik.myeng	ikmyeng	nikmyeng	/ingmyeng/	'anonymity'
	^{n}itho	itho	nitho	/itho/	'mud'
2.	^{1}yēnsup	yensup	lyensup	/yēnsup/	'drill (study)'
	^{1}yēy	yey	lyey	/yēy/	'ceremony'
3.	^{1}īhay	ihay	lihay	/īhay/	'understanding'
	^{1}nonmun	nonmun	lonmun	/nonmun/	'treatise'
	^{1}naywel	naywel	laywel	/naywel/	'next month'

The family name ^{1}Yi, in English variously spelled Lee, Li, Yi, Ree, Ri, Rhee, ··· , is particularly troublesome. In South Korea it is spelled I and in North Korea Li. The Yale Romanization should be ^{1}I but that looks awkward, so we make an arbitrary exception and write ^{1}Yi, preserving a resemblance to the form that is familiar from references to the "Yi dynasty". (The phoneme /i/ can be deemed to carry a nondistinctive initial y- which we ignore except for this name.) The pronunciation is i, but ni is (or was) used by northerners, though the Phyengyang authorities have promoted saying /li/ with an initial flap, like that used in recent foreign loanwords. For them, history has reversed itself: /li/ → /ni/ → /i/ → /li/. Even in South Korea 'Miss ^{1}Yi' is always Misu Li [ri] and never *Misu ^{1}Yi [i]. Other proper names beginning with ^{1}··· (such as ^{1}Im, ^{1}Yang, and even ^{1}No) may be given reading pronunciations with the flap, and these could become the spoken norm for that part of the country. The authenticity of the pronunciation ni is quite clear from attestations such as 1881 Ridel 20, who has that version both in Hankul and in his transcription, and (23) writes "Ni ryengkam" for 'the venerable ^{1}Yi'. 1887 Scott writes "ni···" for the etymological ni··· in a fair number of words, and also has a few examples that go back to li···, such as ninsoyk (123) < linsoyk 'avaricious'; he writes ryemnye 'fear' in one place (127) yet nyemnye 'anxiety' in another (176). At the same time, he says (149n) "Though spelt rika it is read ika" with reference to ^{1}i ka 'profit' [nominative] (CF 166). The pronunciation of li as ni is reported in the first part of the sixteenth century: the surname ^{1}Yī < ¨LI is attested as ¨ni in ?1517- Pak 1:3a and ni¨chyen 'profit money' < ¨LI-CHYEN occurs in the same work (1:34a) and also in ?1517- ^{1}No 1:13a, though in the latter the word appears again (2:60a) as li¨chyen with the l intact. The word nyenskon (1527 Cahoy 1:8a=14b) 'lotus root' was lexicalized from the phrase LYEN S KON 'root of the lotus'.

All of the words involved in this section are of Chinese origin. Other words that were spelled with ny··· and ni··· in Middle Korean are now written y··· and i···, as pronounced, but when the nasal persists in compounds the spelling in South Korea follows that pronunciation: sŏngkosq (n)i 'cuspid' is written as "songkos ni" in the south but "songkos' i" in the north (without our generous spaces, of course). There are inconsistencies in the decisions, as exemplified by the SK treatment of certain words in group 2, for when the nasal is pronounced in (n)i 'tooth' it is favored by an attention neglected in the case of iph 'leaf', ĭl 'work, event', and iyaki 'tale'.

The word for 'glass' is historically lyuli, but North Korea spells it yuli (as we expect of South Korea). That means that the phrase /sayngnyuli/ 'stained glass' must be treated as saykq yuli, not sayk ¹yuli or sayk-lyuli. A similar case: ssang-pongq yaktay /ssangpongnyakttay/ 'Bactrian camel', historically lyaktay.

The following words begin with an etymological l··· but are written phonemically with n··· in North Korea as well as South Korea: nasa 'screw, spiral' (CF ¹nasa 'woolen cloth'), naphal 'trumpet', nok 'rust' (CF ¹nok 'stipend'), nampho(-tung) 'lamp', no 'oar', nwu 'loft, pavilion', nwūki 'dampness', nwū-nwū-i 'frequently'. CF Mkk 1960:3:25. The morpheme ¹yen is spelled lyen by North Koreans in ¹yenq-ie 'consecutively' but yen in yen-kephe = yen-kephu 'successively' and in yen-hay and yenpang 'continuously' (a point missed by KEd). CF Mkk 1960:4:23.

The word /silyĕn/ 'disappointment in love' is etymologically sil-lyen; it is spelled sil.yen in the south and sillyen in the north, so we will write it sil¹yen. A similar case is sal¹yuk 'massacre', pronounced /sallyuk/. We would expect to write no¹yey for /no(.y)ey/ 'slave' (CF hālyey 'male slave') but the spelling in both north and south is no.yey. The word ŏlyu 'mistake' (< ŏ-lyu) has a common variant pronunciation without the l and that is standardized in NKd with the spelling ŏ.yu.

An epenthetic (intrusive) -l- is found before /y/ in a few compounds: cĕylyem < cĕy-yem 'manufacturing salt', holyem < ho-yem 'Chinese rough salt'; phʸĕylyem < phyĕy-yem 'pneumonia' (spelled phyeylyem in the south but pheyyem in the north so we will write it phʸĕy¹yem), thŏylyem < thŏy-yem 'pouring hot broth over rice or noodles a little at a time to heat them up' – and perhaps (yang-)hwalyo 'carpet' and pōlyo 'large fancy cushion', if these are properly derived from yo 'mattress' < zywoh < *nhyok, a Chinese import that underwent early naturalization.

In a few words an etymological n is commonly pronounced as /l/: tāylo < tāy-nō 'great anger', hūylo < hūy-nŏ 'joy and anger', ĕlwul < ĕ-nwul 'inarticulate', yālyo < yā-nyo 'annoyance, interruption'.

A small group of morphemes have the basic shapes lyul and lyel. These morphemes follow a special pronunciation rule. After a vowel or n, the l unexpectedly drops. (The l actually surfaces only after some consonant other than n, including l itself, and then it takes the reflex /n/ so that we would have no idea these morphemes begin with a basic l rather than n without additional information from the history or from dialect pronunciations.) The alternation is ignored in the northern spelling but phonemically noted in the south, so we mark it in our Romanization with -¹y···. Examples will be found in §4.8. When these morphemes are attached to a morpheme that ends with n we insert a dot (cīn.¹yel 'exhibition', cĕn.¹yul 'trembling') to remind us of the morpheme boundary in the SK spelling ("cīn.yel", "cĕn.yul") as contrasted with the NK spelling ("cīn.lyel" = /cīnyel/, "cĕn.lyul" = /cĕnyul/). When the preceding morpheme ends with i, wu, yu, or a digraph of vowel + y, there is no need for the dot to mark the boundary, so we write pī¹yel '(being) nasty', pī¹yul 'ratio', swū¹yel 'numerical progression', kyu¹yul 'rules'. But after the other vowels, the SK spelling requires us to insert a dot to prevent interpreting the string of vowel + y as a digraph: to.¹yel 'lining up' (NK "tolyel", SK "to.yel"), phā.¹yel 'explosion' (NK "phālyel", SK "phā.yel"). KEd was inconsistent in not writing the dot for those cases. On problems of spelling and interpreting words containing the morpheme lyō 'fee', see the entry in Part II. See also §4.4.

In the non-Chinese vocabulary the initial nasal of words beginning nye or ni was eventually dropped, so that today 'tooth' is pronounced i in both the north and the south. It is difficult to assign

this change to a particular time. It may have set in first for verb stems: we find *yey-* in ?1660 Kyeychwuk and (with raised vowel) *i-* in 1876 Kakok for what was earlier ¨*nyey-* and still earlier °*nye-* and °*ni-* 'go'. In Middle Korean the prevalent form for 'put in' was *nyeh-* > dialect **yeh-**, but a dispalatalized *neh-* is attested in 1466 Kup (SEE p.47). Modern **ic-** 'forget' for earlier *nic-* is attested in the middle of the 18th century and perhaps as early as 1660. There may have been dialect doublets with **ny···** competing with **y···** and dispalatalized as **n···** from fairly early; the ancestor of modern **yeki-** 'regard (as)', first so attested in ?1800 Hancwung, was *nye˙ki-* in 1481 Samkang and Twusi, but the dispalatalized version *ne˙ki-* was prevalent from 1449 (Kok) right on down (including 1481 Twusi). The adjective *nyeth-* 'shallow' is spelled *yeth-* in ?1517¯ Pak-cho and later, and *yath-* in 1608 Twuchang cip.yo. On the other hand, there is but a single example of *nel-* (in 1763 Haytong) for ¨*yel-* the ancestor of modern **yē-l-** 'open', and there are no reports of an initial nasal in modern dialects, so that the one example is suspect. In most words that began with *ni··* there is no evidence that the *n* dropped until quite late: *nik-* > **ik-** 'ripen', ¨*niz-* > **ī(s)-** 'continue', *nilk-* > **ilk-** 'read', ˙*ni* > **i** 'tooth' or 'flea', ˙*niph* > **iph** 'leaf', *ni˙mah* > **ima** 'forehead', ¨*nimca[h]* > **īmca** 'owner', *nil˙kwup* / *nil˙kwop* > **ilkop** 'seven', ... For many of these words, some of the northern dialects have retained the nasal: Kim Thaykyun cites **ni** 'tooth' and 'flea', **niph** 'leaf', **nilkop** 'seven', **nīmca** 'owner', **nilk-** 'read', **nip(-hi)-** '(cause to) wear', **nī(s)-** 'continue', **nyeth-**/**nyath-** 'shallow'. The earliest texts had both ¨*nil-* 'arise' and ¨*il-* 'come into being'; could they have once been etymologically the same? The only modern words pronounced with initial **ny···** seem to be **nyesek** 'rascal (of a man/boy)' and **nyen** 'bitch (of a woman)', of somewhat obscure etymology but both probably involving the Chinese morpheme **nye** 'woman'. The modern **yeph** '(be)side' was *nyeph* in 1617 Sin-sok (¹Yel 3:24) and just *nyep* in earlier texts (*nye˙p u[˙]lwo* 1459 Wel 2:36a, *nye˙p i˙la* 1459 Wel 2:17b), but dispalatalized *nep.hu.lwo* appears in ?1775 Han-Cheng 204d. It should be kept in mind that Korean also has words beginning **i···** and **y···** which have never had variant versions with a nasal initial, such as **ip** < ˙*ip* 'mouth', **isul** < *i˙sul* 'dew', **ilang** < *i˙lang* 'paddy ridge', **ili** < ˙*ilhi* 'wolf', **iki-** < *i˙ki-*/*i˙kuy-* 'win', **ilh-** < *ilh-* 'lose'; **yewi-** < *ye˙wuy-* 'get thin', **yetelp** < *ye˙tulp* 'eight', **yeses** < *ye˙sus* 'six'. These words have not been reported with a nasal initial in dialects, with the exception of Hoylyeng **nyessay** 'six days' (Kim Thaykyun 1986:380a), and that form is surprising, if correct, in view of MK *ye˙ssway* (1462 ¹Nung 6:17a) and *ye˙sway* (*s pa˙m oy* 1481 Twusi 10:4a). But nasal versions are reported for the modern words (**yēyki** < **yāyki** <) **iyaki** 'story, tale', which was first attested in 1775 as *niyaki*, and **ieng** '(roofing) thatch', first attested in the 1730 text of Chengkwu yengen as *niyeng*. (Also reported in 20th-century materials: **nikki** for **ikki** < *isk* 'moss', **nisak** for **isak** < *isak* 'ear of grain' and **nyemul** for **yemul** < *ye˙mulq* 'to open'; see King 1991b:6.) The nasal dispalatalization in the north and the palatal denasalization in the south is part of a more general process of reducing initial strings of apical (dental or alveolar) + palatal, as described in §4.4.

In Hamkyeng the Chinese morphemes that begin with a basic **y···** or **i···** (and **uy**, which merges with /i/ even initially in these dialects) are often treated if they were from **ny···** or **ni···** when attached to a Chinese morpheme that ends in a consonant, even if both morphemes are bound. (Choy Iceng 1960.) We can note these pronunciations with the morphophonemic **···q**:

Standard	Hamkyeng	Pronounced	Meaning
mok.yoil	**mokq.yoil**	/mongnyoil/	'Thursday'
sap.ip	**sapq.ip**	/samnip/	'insertion'
cen.ya	**cenq.ya**	/cennya/	'the night before'
tham.yok	**thamq.yok**	/thamnyok/	'greed'
cung.ye	**cungq.ye**	/cungnye/	'donation'
cel.yak	**celq.yak**	/cellyak/	'economizing'

Such pronunciations are not new. 1889 Imbault-Huart 66 has *sik.nyem* for **sik.yem** 'salt', which must have been pronounced /singnyem/ = **sikq.yem**.

1.7. Hankul spelling of *u* after labials.

The back unrounded high vowel u does not occur after a labial (**p ph pp m**). When expected, it is replaced by the rounded vowel **wu**. That is why the Yale Romanization writes **wu** as just **u** after a labial. Our notation of **pu** can be regarded as a convenient abbreviation of **pwu**. But that is true only when we are speaking of modern Korean. Until sometime after 1700 Korean distinguished labial-onset syllables with the unrounded vowel from their counterparts with the rounded vowel, so that when we cite forms from that period (or specific Hankul spellings from even later) we must distinguish **pu** from **pwu** and **mul** from **mwul**, just as we keep distinct the zero-onset syllables that begin with **u** and **wu**. The present-day Hankul spelling systems usually write **wu** after a labial within a morpheme (**mun** is written **m + wu + n**, **pun** is **p + wu + n**, **phun** is **ph + wu + n**, and **ppun** is **pp + wu + n**), but choose between basic **wu** and **u** after the zero onset of a morpheme occurring after an element that ends in a labial: **kem.un** ⋯ ' ⋯ that is black' and **kum-un** 'gold and silver', but **kam.wu** 'a welcome rain'. We know whether to write **wu** or **u** by recalling other words that contain the same morphemes in environments where the two vowels are distinguished: **cak.un** ⋯ ' ⋯ that is small' and **un** 'silver', but **wūsan** 'umbrella'.

There are exceptions. Stems that end in the high back vowel after a labial are given the Hankul equivalent of our Romanized abbreviation [w]u, so that the second syllable of **kippu-** 'be happy' is spelled **pp + u** even though it is pronounced with a rounded vowel, and the second syllable of **kophu-** 'be empty, hungry' is spelled **ph + u**. Morphophonemically, the spelled "u" behaves like any other case of **u**, in that it drops when the infinitive ending is attached: **kippe, kopha**. We also see **u** sometimes in derived forms: **kwucepun hata** 'is untidy' may be spelled with Hankul **p + u + n**, reflecting its derivation from **kwucep (sulepta) + -un**. But lexical derivations of that sort are largely ignored under the current spelling standards of both parts of Korea, where the word is written with **p + wu + n**, as it sounds. The spelling with **u** is used in **kumum (nal)** 'last day of the month' because **kumum** is an etymological variant of **kem.um** 'being black' (i.e. 'dark of the moon'); compare **polum** 'middle day of the month', an etymological variant of **polk- + -um = palk.um** 'being bright'. And Hankul regularly spells **u** for the "inserted vowel" used to help pronounce certain final consonants and clusters in foreign words, so that the second syllable of **Aphulikha** 'Africa' is written **ph + u** rather than **ph + wu**.

Despite the Hankul spelling, **na ppun** 'only me' and **nappun** ⋯ 'bad' sound the same, and the three expressions **ku mun** 'that door', **kum un** 'as for gold', and **kum-un** 'gold and silver' are homonyms. The lips are rounded (and usually protruded) throughout the last syllable of each of these phrases.

1.8. Word division and internal punctuation.

As in English and many other languages, people vary considerably when deciding questions of spacing and punctuation. One word or two words? Hyphenate or run together? Until the 20th century Hankul texts were commonly written with no space between words, as is the traditional practice in Chinese and Japanese. The modern use of word spaces began with Toklip sinmun 1 (1896) and was continued by Cwu Sikyeng (1907 "Kwuk.e wa kwuk.mun uy phil.yo"). A similar usage in Japan, found in hiragana newspapers of the Meiji period and in elementary textbooks from 1884, never took hold. (There are examples of word spacing in manuscripts of 1272 left by Shinran.) The Korean decision to use spacing may have been independent, or it may have been influenced by the orthographies of European languages. In 1897 [1]Yi Pongmun (Kwukmun cengli) marked the ends of words by putting little circles below and slightly to the right in the vertical line of Hankul.

In writing Korean the most common practice is to run together things that are spoken together in phrases, especially noun + particle (+ particle) and verb + particle (+ particle). People disagree on whether to write sequences such as adnoun (prenoun) + noun and noun + noun (+ noun + ⋯) as separate words. Writers like to attach very short elements, especially those of one syllable, to longer elements that are contiguous to them. That fact, combined with hazy notions of grammar to begin with,

accounts for the writing of particles together with the preceding noun or verb. Considerable indecision prevails in treating noun compounds, numeral + counter, adverb + verb, and those verb compounds in which the prior element is in a "free" form, carrying an ending, such as the infinitive, rather than just the stem alone. If the form becomes very long, people are apt to break it with a space; if the whole sequence is relatively short, it will likely be run together. A sequence of verb modifier + noun poses a problem, for the modifier is always the head of the prior construction, which can be quite long, but in pronunciation a pause is more likely to come before rather than after the modifier. Unmarked object + verb are often run together, especially if the object is short and the expression common, like **pap mek-** 'eat food'.

To a certain extent, spacing decisions reflect the degrees of potential pause between various constructions, and we can summarize that in a table of linkage (juncture in the rough sense of the word), from openmost to tightest, with examples:

1. Topic (noun + un / nun) + verb	ayki nun mek.e; pap un mek.e
2. Subject (noun + i / ka) + verb	ayki ka mek.e
3. Indirect object (noun + **hanthey** or **eykey**) + verb	ayki hanthey cwue
4. Object (noun + ul / lul) + verb	pap ul mek.e
5. Unmarked subject + verb	ayki mek.e
6. Unmarked indirect object + verb	ayki cwue
7. Unmarked object + verb	(pipimq) pap mek.e
8. Adverb + verb	mãnh.i mek.e; cal mek.e; mõs mek.e
9. Noun + noun	hak.kyo sensayng; kkoch path
10. Adnoun + noun	ku sãlam, ku ay
11. Adnoun + quasi-free noun	ku kes
12. Modifier + noun	kulen sãlam; halq sãlam
13. Modifier + quasi-free noun	kulen kes; halq kes
14. Numeral + noun	twū son
15. Numeral + counter	twū mali
16. Verb (infinitive/gerund) + aux verb	mek.e twue; mek.ko siph.ta
17. Noun + copula	pap ita
18. Quasi-free noun + copula	⋯ kes ita
19. Noun + particle	ayki nun; pap ul; cip i
20. Verb + particle	mek.e yo; mek.e to; mek.ko nun
21. Particle + particle (+ particle)	⋯ ey se; ⋯ ey se to
22. Verb stem + ending	mek-e; khu-n; kitali-ci; ka-syess.ess.keyss.� up.nikka

This list does not, of course, exhaust the possibilities. Places in the table should probably be found for other constructions. Where real anxiety arises, for the native speaker and the linguist alike, is in conflicting combinations of linkage constructions, as in **Haksayng hanthey phyěnci sse cwulq kes iey yo** '(He) will probably write the letter for the student', which has the following constituency:

Haksayng	hanthey	phyěnci	sse	cwulq	kes	iey	yo
NOUN	PARTICLE	NOUN	VERB	AUX	NOUN	STEM+ENDING	PARTICLE

nominal – adnominal   adverbial – verbal
  adverbial —————— verbal
    adnominal ———————————— nominal
      nominal ———————————— copula (inf)
        verbal ————————————————— particle
          (adverbial) sentence
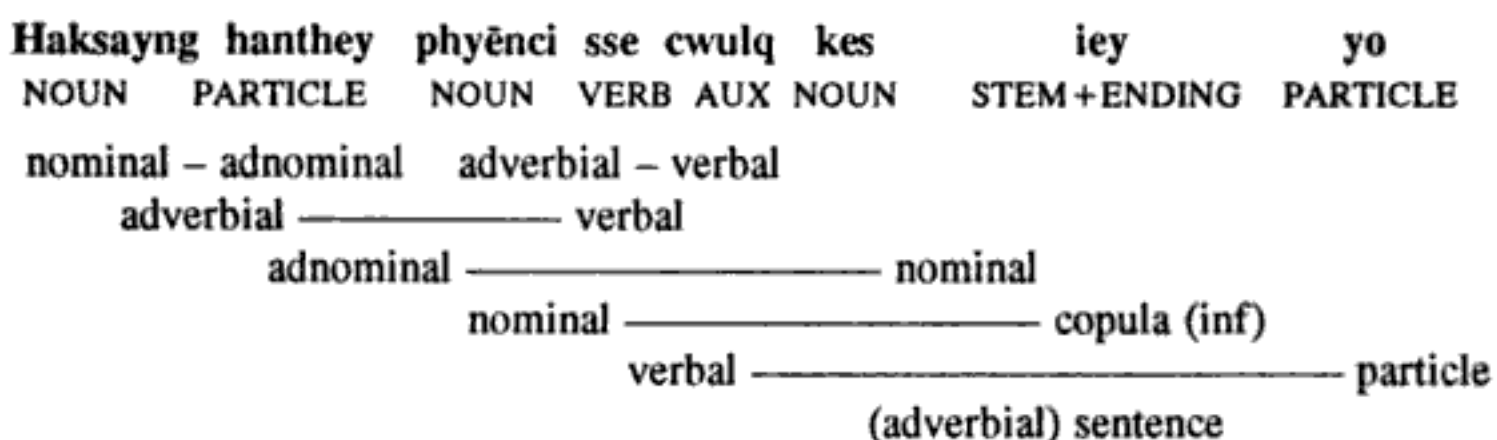
But the phonological bonds, the words most likely to run together in pronunciation, would be in the following order of closeknitness: (1) **iey yo**; (2) **haksayng hanthey**; (3) **kes iey**; (4) **sse cwul**; (5) **cwulq kes**; (6) **phyĕnci sse**. This means that if we were to make only one pause it would likely be **Haksayng hanthey | phyĕnci sse cwulq kes iey yo**, if we made two pauses it would be **Haksayng hanthey | phyĕnci | sse cwulq kes iey yo**, and if we should make a third pause (unnatural for this sentence) it would be **Haksayng hanthey | phyĕnci | sse cwul | kes iey yo**. If we were to make four pauses (still more unnatural) the sentence would be **Haksayng hanthey | phyĕnci | sse | cwul | kes iey yo**. Any further pauses, as in taking the next step **kes | iey yo** and the final steps **emeni | hanthey** and **ie(y) | yo**, would be artificial.

From this example it is easy to see the all too frequent conflict between the phonological bondage, or closeknitness of pronunciation, and the immediate constituency, or closeness of grammatical ties. Similar problems in English are exemplified by such expressions as "the highest scoring team", "sharp bladed", "three hundred and first", "your nearest store".

In Hankul texts prepared under my supervision, such as the examples in KEd, we have been liberal in word division. For types 1 through 16 above, either space or hyphen is used (hyphen for some of the very frequent or very short combinations of types 7 through 16); for types 17 through 21 a dot is inserted to set a particle off from the preceding word to which it is attached; and only examples of type 22 are regularly spelled with no internal punctuation. Some such rules, perhaps, could eventually be incorporated into normal Hankul writing, at least in school textbooks, where it is important to reduce ambiguity to a minimum. (Notice the unusually generous word division in the North Korean journal Mkk 1961:4:37-40.) Quite a few homophonous phrases can be distinguished by inserting a pause or "open juncture":

/hŏysaey( )nakanta/ = **hŏysa ey na-kanta** 'goes off to the office'
/hŏysaeyna( )kanta/ = **hŏysa ey 'na kanta** 'goes off to the office or the like'

/na( )kakiceney/ = **na kaki cen ey** 'before I go'
/nakakiceney/ = **na-kaki cen ey** 'before going out'

/wuliyekwaney( )kaca/ = **wuli ¹yekwan ey kaca** 'let's go to our inn'
/wuli yekwaneykaca/ = **wuli ¹yekwan ey kaca** 'let's go to an inn'
/wuli yekwaneyka ca/ = **wuli ¹yekwan ey ka ca** 'let's go to an inn to sleep'

/kuchaykina omyen( )cŏkheytta/ = **ku chayk ina omyen cŏh.keyss.ta** 'I hope that the book comes, or something'
/kuchayki naomyen( )cŏkheytta/ = **ku chayk i na-omyen cŏh.keyss.ta** 'I hope the book comes out'

The following two expressions will both translate as 'the rice tastes good' yet they represent different constructions:

/pap masi( )cŏtha/ = **pap (un) mas i cŏh.ta** ('rice − its taste is good')
/pammasi( )cŏtha/ = **pap (uy) mas i cŏh.ta** ('the rice taste is good')

In the examples of this book a hyphen is used in the Romanization as an unobtrusive way to show the first layer of internal structure of some of the words. In the citation of separate forms, the hyphen sometimes shows the direction of attachment: **-e** must have a stem in front and **mek-** must have an ending attached, as in the word **mek.e** 'eats'.

1.9. External punctuation.

Koreans borrow English and Japanese punctuation freely. The standard practices accord, more or less, with the current American usage. Parentheses, commas, and quotation marks are seen more frequently than semicolons or colons. Sentences usually end with a period, but question marks and exclamation points are also frequent, though their usage is not consistent. Korean questions are typically marked by something specific in the sentence, such as the final postmodifier **ya** in ⋯ **(ha)nun**

ya, usually spelled as an unanalyzed ending ⋯ **(ha)nunya**, and the interrogative ending **-(su)p.nikka** in ⋯ **hap.nikka**. For questions so marked there is no need for a question mark, though many writers put one in, anyway. When the interrogation is otherwise unmarked in speech, a rising intonation indicates a question, and such questions are appropriately written with a question mark: **Kim sensayng? Pap mek.e?** If the question mark is reserved to mark only those questions that have a rising intonation, we can write the distinction that is heard with indeterminates, i.e. words that have both interrogative and indefinite meanings: **Nwu ka wass.ey yo.** 'Who is here?'

Nwu ka wass.ey yo? 'Is someone here?'

Koreans now ordinarily write both these sentences with a question mark, just as at one time they would have written them with a period (or no punctuation); the spoken distinction is lost in the writing.

In this book the question mark is used only for sentences with rising intonation. The period is used at the end of statements and questions with falling intonation, but it is usually omitted when the sentence is cited as an example with the English translation immediately following. See §2.8 for other intonations that might be marked.

In some cases, the grammatical analysis used in this book is more detailed than that reflected in the Hankul spelling systems. As a result, there are some word divisions that produce spellings at variance with the prescriptions of Korean grammarians, such as **-un ya** for Hankul **-unya**, **-um ulo** for Hankul **-umulo**, **-um ey** for Hankul **-umay**. The grammatical lexicon of Part II carries most of the usual Hankul forms with cross references to the spellings I prefer: **-unya** → **-un ya**.

In one or two other cases I have chosen to regularize forms that differ from those favored by the Korean grammarians. I prefer the colloquial **-e** as the shape for the infinitive after stems ending in ⋯**aC-** (**tat.e**) rather than the literary / dialect version **-a** favored by the grammarians, though I realize many younger speakers are tending to model their speech after the spelling. I prefer the colloquial **hay** as the infinitive of **ha-** rather than the literary **ha.ye** favored by grammarians. But the literary forms are discussed and cross-referenced. Another difference of opinion, more controversial: I do not recognize the validity of a distinction between **-te-** and **-tu-** in certain retrospective endings, and accordingly I treat all cases of **-te-** as literary or dialect variants of **-tu-**.

1.10. Alphabetization.

In the alphabetization employed in Part II, all superscript letters ([1]⋯ [n]⋯ [s]⋯ [h]⋯ [y]⋯) are ignored except where entries are otherwise identically spelled, and the same is true for ⋯q. The other letters have their usual English order **a c e g h i k l m n o p s t u w y** and the digraphs (**kk, ng, wu, ey,** ⋯) are alphabetized by their component letters, as if the words were English. Vowel length is ignored except for words that are otherwise spelled identically: the word with the short vowel comes first.

What about the alphabetization of words written in Hankul? There are several different orders in widespread use, and the student may feel that each dictionary maker is plaguing him with new whims. In general, the schemes fall into two types. The first is most widely used in South Korea, with three variations on what to do with the geminates; the second type is official in North Korea.

> (1) k (kk) n t (tt) l m p (pp) s (ss) ⋯/ng c (cc) ch kh th ph h
>
> a ay ya yay e ey ye yey o wa way oy wu we wey wi yu u uy i
>
> (1a) Ignore double consonants except where entries are otherwise the same.
>
> (1b) Ignore INITIAL double consonants except where entries are otherwise
> the same, but keep a difference for final double consonants analogous
> to that of the singlets:
>
> k kk ks, n ns, l lk lm lp ls lth lph lh, p ps, s ss
>
> (1c) Recognize double consonants both initially and finally; make separate
> places for the initial geminates (as in parentheses above), and keep
> the final geminates in the order shown in (1b).
>
> (2) n t l m p s -ng c ch kh th ph h kk tt pp ss cc ⋯
>
> a ya e ye o yo wu yu u i ay yay ey yey oy wi uy wa we way wey

In the latter system the circle symbol is treated in the consonant order (after s) only when final in a syllable and pronounced ···ng. When initial it is treated as a carrier for the vowels, and all the vowel-initial words come at the end of the dictionary. In the South Korean system the symbol is usually treated as the same, for alphabetizing, whether it is final or initial. (In the 15th century two slightly different symbols were used and in certain instances the velar nasal **ng** could begin a syllable.) The North Korean **sai phyo** (···'), like our Romanized ···q, is ignored except when alphabetizing words that are otherwise spelled identically. In the south the written **sai sios** is usually treated just the same as an etymologically final **s**.

The names of the Hankul letters referring to vowels are simply the vowels themselves. The names of the consonants are two-syllable nouns that echo the consonant at the beginning and the end: **ki(y)ek, niun, tikut** = /tikus/, **liul** = /iul/ or /niul/, **sios, iung, ciuc** = /cius/, **chiuch** = /chius/, **khiukh** = /khiuk/, **thiuth** = /thius/, **phiuph** = /phiup/, and **hiuh** = /hius/. These are the traditional names (CF Cen Cayho 1961). In North Korea the traditional names for **k, t,** and **s** have been normalized to **kiuk, tiut,** and **sius,** so as to fit better with the others. The geminate letters are named with **ssang** ··· 'pair(ed), double': **ssang ki(y)ek / kiuk, ssang tikut / tiut, ssang sios / sius, ssang ciuc**. There are no special names for consonant clusters at the end of an orthographic syllable: ···**lk** is called **liul kiyek pat.chim**. The traditional names for the first few letters come from the examples of the sounds in initial and final position given by Choy Seycin in the introduction to his 1527 Hwunmong cahoy, a dictionary of Chinese characters, and that accounts for the anomalous "ki-yek", "ti-kut", and "si-os": the latter two terms end with the non-Chinese words for 'end' (→ modern **kkuth**) and 'clothes', for there were no Chinese syllables ending in -t (Middle Chinese -t → Middle Korean -*lq*). The symbol representing the velar nasal was exemplified as **i-ung**, showing that it was not be pronounced at the beginning of a syllable, and a different symbol (the circle without a tick at the top) was used for zero. But that was written only at the beginning of a syllable in the readings of the dictionary, for the zero final used by the earliest texts to end the vowel-final syllables was omitted, as had become customary. The modern system uses the tick-topped circle, reshaped as a kind of teardrop, for both the zero initial and the nasal-velar final. (The tick is often omitted and the teardrop flattened to a circle or an oval.) Choy Seycin recognized that the letters *kh, th, ph, c, ch, z* [the triangle △], zero [the circle], and *h* (which he put in that order) were not heard as such at the end of a syllable and he cited examples only in initial position, using the high front vowel: *khi, thi, phi, ci, chi, [z]i, i, hi*. There was no syllable for *khi* among the traditional Chinese readings, so he used the word for 'winnow' as a "non-Chinese" word, though it may well be taken from a Chinese reading outside the mainstream of borrowings. The terms **khiukh, thiuth, phiuph, ciuc, chiuch,** and **hiuh** seem to be modern neologisms, and North Korea uses **khu, thu, phu, cu, chu,** and **hu.** The very earliest way to speak of each Hankul symbol was probably to pronounce it, with the minimal vowel *u* supplied if needed. That is indicated by the statements in 1451 Hwunmin cengum enhay of the type *K nun* 'as for K', in which the focus particle appears in its postvocalic shape. Variant names for some of the letters turn up in 1881 Ridel (xviii): *miwom* for **mium**, *piwop* for **piup**, *cyas* for **ciuc**, and *ihwoyng* for **iung**, which Ramstedt (1939:3) gives as *ihong* = **ihung**; the version in 1874 Putsillo is the equivalent of *ihoyng*, while 1874 P'yankov called the symbol *ihyang*. Ridel's Romanization indicates that **liul** was to be pronounced with an initial [r], but 1874 P'yankov gave the name of the letter as the equivalent of *liur* with a final Russian [r] followed by the "hard mark". 1883 Scott has the equivalent of *tikkut* for **tikut** and of *ngiung* for **iung**.

There are also names for the obsolete symbols of Middle Korean. The term **iung** is used to refer to the zero initial (the circle O), and the symbol for the velar nasal Ò is called **yĕysq iung** 'ancient iung'. The triangle △ that represents MK *z* is called **pān sios** 'half s' or **samkak hyeng** 'triangle'; the symbol for W ᅗ (p with a little circle below) is called **kapyewun piup** 'light p' and the variant with m instead of p (ᅟ) is called **kapyewun mium** 'light m'; the symbol for *q* ō , intended to represent a glottal stop, is called **yelin hiuh** (= /hius/) 'incomplete h'. A double zero oo, called **ssangq iung** was used in writing a few forms with *yGy* and *yGi* from causative and passive verbs made with the formative -*Gi*-, to make sure they were not taken as *yy* and *y.i* (= /yyi/). Attested: ˝*hoy ˙Gi*- 'cause to

do' in the forms ˝hoy˙Gye (1451 Hwun-en 3) and ˝hoyGywo˙m ol (1462 ¹Nung 6:87b); moy˙Gi- 'get tied' in the forms moy˙Gywon (1462 ¹Nung 1:43b, 55b), moy˙Gi˙no.n i ˙˙la (1447 Sek 13:9b), moy˙Gywu˙m i (1447 Sek 6:29a), moy˙yGwom ˙kwa (1462 ¹Nung 6:28b) and moy˙Gywo˙m ol (1459 Wel 18:52a), moy˙Gye (1459 Wel se:3b), elk-moy˙Gi˙ta (1447 Sek 13:9b); muy˙Gi- 'get hated' in the forms muy˙Gin (?1468⁻ Mong 19b) and, according to LCT, muy˙Gywon ([1467→]1517 Sapep 5b) — but that is ˝muy˝ywon in the version printed by Kwangmun-kak in 1979 (is this the 1543 edition?). This was a clever extension of the device for writing MK G indirectly by not adding y˗˗ after ˗˗y or ˗˗i. The other device was failing to link a preceding l or z with a following syllable y˗˗ or certain common cases of i(˗˗). Geminate hh, called ssang hiuh ㆅ, was used to write the voiced-h initial in the prescribed readings of Chinese words and in representing the verb stem °hhye-, an intensive form of °hye- 'pull, drag'.

The letters that are joined to form a Korean syllable are sometimes found isolated, as when ki(y)ek, niun, tikut, ... are used to mark items in a list, like English "A.", "B.", "C.", ... As isolated symbols the letters are called ttan ⋯ 'separate ⋯' or 'free-standing ⋯'. In Middle Korean texts several of the isolated letters are used for special purposes. The genitive particle s was often attached to the preceding or following syllable, but it also appears as the sai sios ㅅ between two Hankul syllables or, more often, after a Chinese character or its Hankul pronunciation. In addition to s itself, assimilated variants were sometimes written as isolated letters: ttan pān sios 'free-standing z' △ is found in [˝HHWUW] z ˙nal (1445 ¹Yong 26) 'later days', ttan kiyek 'free-standing k' ㄱ shows up in NGWANG k ˝swon-˙toy (1447 Sek 24:6a) 'to the king', and ttan niun 'free-standing n' ㄴ appears in ˝WUY n ˝nim-˙kum (1586 Sohak 6:40a) 'the king of Wèi'. In 1451 Hwun-en a free-standing W (ttan kapyewun piup) ㅱ was written for the genitive after Chinese words that were given prescribed pronunciations with a hypothetical final consonant to represent the labial semivowel of the Middle Chinese versions. The single bar that represents y in the digraphs of modern Korean was the glide of diphthongs (ey, ay, oy, uy) in Middle Korean, and it appears isolated as ttan i ㅣ to write the nominative particle ˙i after a Chinese character or its prescribed pronunciation in Hankul when that ends in a vowel, causing the MK particle to lose its syllabicity and shrink to the glide y. The same reduction took place for forms of the copula ˙i˗˗ : ˙THAY-˝CO ˙yn ˙kwo˙t ol (1447 Sek 24:52a) ' ... that he was the prince', CIN-ZYE ˙yn cyen˙cho ˙y˙la (1465 Wen 1:1:1:47a) ' ... is the reason it is true'; nim-kum kwa [SSIN-˝HHA] ˙yl s oy (1632 Twusi-cwung 6:32a) 'it being a matter of king and court ... '. But when the Chinese character was pronounced with a final i or y the glide on the reduced forms was unpronounceable, so that the copula stem was totally lost, leaving the modifier forms as 'n and 'l(q), written with ttan niun ㄴ and ttan liul ㄹ, as in ku CIN-˙SSILQ s TI 'n ˙t ye (1464 Kumkang 87b) 'is that the true wisdom?' and hon ˝THYEY 'l ˙s ila (1482 Nam 1:39a) 'they are a single body'. Yet in the same situation, despite the unpronounceability of ˗˗I y or ˗˗Y y, the nominative particle was often written with ttan i anyway: ˝LI y ˙NGWOK ˙kwa ˝twolkhwa [= ˝twolh kwa] ˙oy tal˙Gwo.m i ˝ep.swu˙toy (1475 Nay se:3a) 'reason does not have the differences of jade and stone'; ku ˝CCWOY y ˙stwo tye ˙y ˙sye ne˙mu.l i ˙˙la (1463 Pep 4:83a) such sin is greater than that; ZYE-LOY y ˙cukcay SSIN-˙LUK ˝nay˙sya (1463 Pep 6:97a) 'the tathāgata at once displayed his supernatural power and ... '.

2.0. Sounds.

The sounds of Korean are described in terms of phonemes and components (§2.1), followed by a more detailed discussion of the phonetic articulations and the acoustic impressions they impart (§2.2-4). Syllable structure and intersyllabic strings (§2.5-6) are restricted by various assimilations and incompatibilities that have arisen through the years. A variety of sequence variants (§2.7) are found, as well as conflicting judgments on the standardization of competing variants (§2.8). The principal intonation patterns are summarized in §2.9.

2.1. Phonemes and components.

For the variety of Korean speech that we take as our point of departure, the phonemes and their components are as shown below.

Simple vowel nuclei

| | FRONT | | BACK | |
	ROUNDED	UNROUNDED	ROUNDED	UNROUNDED
HIGH	—	i	u	wu
MID	oy	ey	e	o
LOW	—	ay	a	—

Complex nuclei

wi	—		—	—	—	yu
wey	yey		we	ye	—	yo
way	yay		wa	ya	—	—

Consonants

	Lax	Reinforced	Aspirate	Nasal	Liquid
Labial stop	p	pp	ph	m	
Dental stop	t	tt	th	n	l
Alveolar affricate	c	cc	ch		
Velar stop	k	kk	kh	ng	
Spirant	s	ss	h		

2.2. Vowel descriptions.

The vowel chart displays a nearly maximal system. In standard Seoul speech **oy** (mid front rounded vowel) is not distinguished from the diphthong **wey**, and there is no need for the front rounded category at all. The distinction between (pyĕng i) tōycinta (= tōcinta) '(the illness) worsens' and (ce sălam i) twĕycinta (< twie cinta) '(he) drops dead' is orthographic for Seoul speakers; many pronounce the first syllable of twāyci 'ta 'it's a pig' the same way, as /twey/. Moreover, in rapid speech the w will often drop, leaving /tey/ as the first syllable of all three phrases. There are very few words with **wey** or **way**, for that matter, and they are often confused in spelling with the many words that contain **oy**. Examples are **kwĕy** 'box, case', **kwĕyto** 'railroad track', **kkweyk** 'with a shout' (= kkwayk), **kkwĕynta** 'strings, puts through', **weyn** 'why, what'; **way** 'why', **waykhong** 'peanuts', **kkway** 'extremely', **insway** 'printing', **yukhway hata** 'is delightful', and a few others.

Some linguists would move **wi** from the group of complex nuclei into the high rounded category of simple vowels, since many speakers tend to pronounce **wi** as a long monophthong [ü] rather than the more common diphthong [üi], coming from an earlier *wuy* [uị]. For most speakers, the phoneme /w/ is represented by simple lip rounding, with the tongue position largely determined by the following vowel: **wi** [üi], **wey** [ǫe], **way** [ʒe], **we** [ǫë], **wa** [ǫa]. The phoneme /y/ is usually high [ị] regardless of the following vowel. Some speakers of the Kyengki area have a full range of rounded front vowels, monophthongizing **wi** [ü], **oy** (and probably **wey**?) [ö:], and **way** [ɔ̈:] alike, at least when these are historically long.

The vowel **e** has two markedly different allophones in Seoul speech: higher [ĕ] when long, and lower [ĕ] (= IPA inverted-v) when short. Many southern speakers give the vowel a slight internal rounding, as if scooping the back of the tongue with a spoon, when it is at the end of a syllable and especially before a pause. In Seoul speech there is a strong trend toward a rounded but unprotruded [ɔ]. Other vowels are less noticeably different when long or short, but in general the long HIGH and MID vowels tend to be higher than the short ones, and the long LOW vowels (if anything) somewhat lower than the short ones.

In the noninitial syllables of Seoul colloquial speech, wu is widely substituted for short **o** after a consonant, and (much less often) the syllable **yo** gets pronounced as **yu**, though I believe that is not true of consonant + **yo**. In very common words, especially endings and particles such as **-ko** and **to**, the Seoul colloquial forms (**-kwu** and **twu**) can be regarded as standard relaxed speech. But when **wu** is used for **o** in initial syllables it is considered substandard; **twūn** for **tōn** 'money' sounds vulgar. There are situations where that sort of speech can be effective: **Nwūngtam ici!** 'It's a joke = I'm joking!' (< ¹**nōngtam**). The substitution of **wu** for [w]o can take place for each word independently: **Cōh.ko mālkwu yo, Cōh.kwu mālkwu yo**, and even **Cōh.ko mālkwu yu** and **Cōh.kwu mālkwu yu**, as well as **Cōh.kwu mālko yo** and (?) **Cōh.ko mālko yu**.

A similar raising of the back mid vowel **e** to **u** and the front mid vowel **ey** to **i** is also heard in noninitial syllables, and less commonly even in initial position. You may hear **ūps.ta** (and, for some reason, even **wūps.ta**) instead of **ēps.ta**, **cukta** for **cēkta**, **-usi yo** for **-usey yo**, etc. There are speakers who raise **a** to **e** in variant versions of certain words: ··· **henthey** for ··· **hanthey** 'to', **mulle** for **mōlla** 'dunno', etc. (CF the remarks on **-tun/-ten** in Part II.) Some raised vowels are considered standard. But **eti** 'where' probably comes directly from MK *e˙tuy* rather than from **e[nu] tey** 'what place'.

Throughout much of southern Korea the vowel **ay** is distinguished from **ey** poorly, if at all. In Seoul speech the distinction is seldom maintained in noninitial position, though speakers are aware of it. The two expressions **sēy kay** 'three things' and **sēykyey** 'world' are usually pronounced identically as /seykey/. One young Seoul linguist says of this pair of words "I can make the distinction, but I don't". (The name of a Honolulu restaurant /phainpeylli/ sounds like "Pine Belly", but it turns out to be "Pine Valley"!) Some of the homonymy that results makes it harder to identify morphemes: the string /ettekhey/ may represent either **etteh.key** or **etteh.k' 'ay** (contraction of **etteh.key hay**); and /ēpsseyyo/ may be intended either as **ēps.e(y) yo** 'lacks it' or **ēpsay yo** 'does away with it'. With further raising of /ey/ to /i/ the expressions **elin i** 'young one' and **elin ay** 'young child' converge. In the areas where **ay** and **ey** have merged, confusion is avoided in various ways. To keep **nay kes** 'mine' distinct from **ney kes** 'yours', for example, Taykwu speakers use **na kes** and **ne kes**. Other word pairs that might be expected to cause difficulty, such as **kāy** 'dog' and **kēy** 'crab' are kept distinct by raising the mid vowel; in Taykwu 'dog' is **kēy** and 'crab' is **kī**. And among younger Seoul speakers one hears "**ney kes − ni kes**" = **nay kes − ney kes** 'mine − yours'; raised vowels are also heard in **ni ka** = **ney ka** 'you' and even **ci ka** = **cey ka** 'I [formal]'. Back formations (hyperurbanisms) are sometimes heard from southerners who merge **ey** and **ay**, as when **cāy-il** is said for **cēy-il** 'number one'; one speaker (recorded on KBC 27:6) said **selmayng** = **selmeyng** < **selmyeng** 'explanation'.

The dialect of Kimhay, on the southern coast, has a minimal system of vowel distinctions. There are six vowel phonemes:

	FRONT (UNROUNDED)	BACK UNROUNDED	BACK ROUNDED
HIGH	i	u/e	wu
LOW	ey	a	o

The quality of the **u/e** vowel varies from high to high-mid (depending on what is around it), as does the mid to low-mid quality of **ey** and **o**. The Kimhay vowel **ey** is cognate with standard (written) Korean **ey, ay, oy, way**, and **wey**; the vowel **i** is cognate with both **i** and **wi** in the standard written language.

The dialect of Ceycwu island (LSN 1978) retains certain features of earlier Korean that were lost in other dialects, notably the vowel traditionally called **alay a** (= *a˙lay o*), which the Ceycwu speakers pronounce as a lower back rounded vowel ("open o"), though the Middle Korean equivalent functioned as a low back unrounded vowel with the closed o (= *wo*) as its rounded counterpart. As in other dialects the earlier diphthongs represented by our spellings *ey* and *ay* are monophthongized as front unrounded vowels, *uy* has merged with *i*, and the usual pronunciation of *wuy* is *i* after a consonant

but after a vowel or pause it is a front rounded vowel, like some versions of standard **wi** (which comes from earlier *wuy*), though the more common Seoul pronunciation is a front rounded glide followed by an unrounded high vowel, rather like the sound in French "huis" or "lui" rather than that of French "oui" (English "we") or "Louis". As in many southern dialects, the distinction of historic *ay* (and *oy*) from *ey* is maintained poorly, if at all, though transcriptions may lead you to think otherwise. The unrounded vowels *u* and *e* are kept apart, and *e* is pronounced as a shwa [ə], rather than the currently popular Seoul pronunciation as a low back rounded vowel [ɔ], the value of which is preempted in Ceycwu by the old vowel *o* which in other dialects has merged with a in initial syllables and u in other syllables, with further assimilations in particular phonetic environments. Ceycwu retains a syllable *yo* which was merged with *ye* or *ya* in the central dialect of the early Hankul texts, though provision was made for the syllable (by a "double low dot") in the scheme of the letters.

The old diphthongs now monophthongized in most dialects are still heard as diphthongs in various parts of Hwanghay (Kim Yengpay 1984:297), where the pronunciation faithfully follows our spellings of **sāy** 'bird', **kāy** 'dog', **key** 'crab', **oy** 'cucumber', and **ōy-** 'memorize'. The 1898 Tayshin dictionary has good examples of ai and ay for the diphthongs, including nwukwuy for 'who' (← nwukwu i) and **sorai** for 'sound (etc.)' = NK solay(ki) < MK *swoˈloy* (> Seoul soli).

Most speakers devoice (= whisper) high-vowel nuclei (i wi u uy yu wu) in an environment with **h** or **s** (or consonant + h or s) on one flank and a simple obstruent (p t c k s h) on the other: **puchica, khuta, chwupta, sik.kwu, huksayk. kupsa, swita, swipta, swipsita, huyta**. Some speakers devoice the mid and low vowels in the same environment: **haksayng, saykssi, thokki, thepthephata**. But if there is only one vowel in the phrase it is usually voiced: **sip, huk, swuch; hak, thek**.

2.3. The pseudo-vowel *uy*.

The spelling **uy** is preserved from an earlier stage of the language, when **ey** and **ay** were diphthongs and **wi** was pronounced **wuy** [uǐ]. At that time **uy** was pronounced [ïǐ], but with the monophthongization of the other diphthongs **uy**, too, was monophthongized to /u(:)/ or /i(:)/, depending on the dialect. In Seoul the traditional pronunciation of the monophthong is **u** at the beginning of a word and **i** in noninitial position. But when it is initial in a word, some people attempt a reading pronunciation of the diphthong and say **ui** (in two syllables); that pronunciation has been rapidly spreading among younger speakers, partly as a result of schooling. In the traditional Seoul versions, the word **ūykyen** 'opinion' is pronounced **ūkyen** and the word **cwūuy** 'attention' (which has for its last syllable the same Chinese morpheme 'one's will' that is the first syllable of **ūykyen**) is pronounced **cwūi**. In an obvious compound noun like **Sin-Uycwu**, name of the city of "New Uycwu", two versions are heard: **sinicwu**, treating the sequence as one word, and **sinucwu**, treating it as two words (but with no overt juncture separating the two). But **mu-uymi** 'meaningless' is usually pronounced **muimi** though **ūymi** 'meaning' is **ūmi**; **mu-** 'lacking' is bound and functions as a prefix, whereas **sin(-)** 'new' is quasi-free and can function as an adnoun. (There are no reports of the pronunciation *mu-umi > [mu:mi] and it has probably never existed.) The odd-looking word **ūyuy** 'meaning' is pronounced **ūi**.

The spelling **uy**, like the spelling **oy**, is left over from a period when Korean had phonetic diphthongs. The diphthongs *ay* and *ey* began to get monophthongized as front vowels from the late 1700s, but *(w)oy*, *wuy*, and *uy* seem to have persisted into the 19th century, at least. Present-day Korean has reduced the back rounded vowel of the older *wuy* to the semivowel **w** and lengthened the palatal glide **y** into the high front vowel **i** to yield **wi**, but some speakers use a front rounded monophthong [ü] at least in certain environments. A similar front rounded monophthong [ö] is used for older *woy* > **oy** by some speakers (in some environments) but the general pronunciation reduces *wo* to **w** and fronts the vowel to **ey**, so that the syllable merges with the articulation of **wey**, which was separate from **(w)oy** earlier. And there are speakers who, at least sometimes, treat **(w)oy** as **way**, in Seoul as well as (Kim Yengpay 1984:67) in Phyengan. In Phyengan *wuy* developed into **wi** but at the end of a polysyllable it often dropped the ‑‑y to become **wu** (ibid): **Tang-nakwu = Tang-nakwi** 'donkey' (< *laˈkwuy*), **ppey-takwu = ppye-takwi** 'bone'; **pakhwu = pakhwi** 'wheel' (< *pakhwᵁoy*

< *pa῾hwoy*), **pawu** = **pawi** 'rock' (< *pawuy* < *pa῾hwoy*). There is no monophthong articulation that could replace the diphthong **uy** without merging it with either **u** or **i**, and many dialects have followed the expected course of pronouncing it as **i**. But in Seoul the word-initial **uy** has resisted that development and monophthongized to **u**, instead. It is possible that in the word-initial position the diphthong version **uy** has simply persisted for some Seoul speakers, as certain linguists would prefer, but I believe it is a back formation based on the spelling, as I have said. There are bits of evidence for the traditional Seoul treatment as early as the end of the nineteenth century, when Tayshin in his 1898 Korean-Russian dictionary wrote the equivalent of /usimi/ for **uysim** 'doubt' (with the accretion of the suffix **-i** that is widely attested in North Korea), though he wrote /uisik/ for **uysik** 'clothes'. The Phyengan development for *uy* is **i** but the particle is either **ey** (as in Seoul) or **u** (as in Cincwu, Mkk 1960:3:31). An early doublet: *i῾ki-* (1445 ¹Yong, 1449 Kok) = *i῾kuy-* (1447 Sek etc.) 'win'.

2.4. Consonant descriptions.

The lax obstruents are weakly articulated; in initial position they are released with a slight puff of local breath (in contrast with the heavy breathing of the aspirates) but are less tense than their English counterparts: [b̥῾] for **p**⋯. Between typically voiced sounds (vowels or semivowels, nasals, the liquid), the lax consonants are lightly voiced in rapid speech, as [a:nda] for **ānta** 'knows'. Lax consonants do not occur after other lax consonants; our spellings **pk**, **ks**, etc., automatically represent the phoneme strings /pkk/, /kss/, etc. (see §2.6). The lax consonants **p t k** occur in syllable-final position and there they are unvoiced and unreleased [b̥᾿ d̥᾿ g̊᾿]. 1881 Ridel was quite hesitant about the voiced allophones of the lax consonants: "sometimes ⋯ but not ordinarily" voiced.

The aspirated consonants are begun with a lax articulation (contrary to some descriptions), frequently velarized, and followed with heavy aspiration that is often accompanied by velar friction: [bʰa] or [bˣa]. The aspirated obstruents are never voiced. The phoneme /h/ is frequently "voiced" (murmured) or dropped between voiced sounds. It is more commonly glottal than velar, but a velar variant occurs, as well as a velarized glottal. Initial **hw**, and especially **hwu**, is often pronounced as a bilabial fricative [F] by many speakers. Ridel (1881:xv) transcribed the aspirates as "hk hp ht tch", and Underwood (1914) used "hk hp ht" but "ch" (writing the lax **c** as "j"). This follows the traditional Romanization of Burmese and has certain virtues in handling morphophonemic problems of Korean (see Martin 1982); Starchevskiy (1890) also wrote the aspiration before the consonant (King 1991a). Roth (1936:6) refers to a system like Ridel's as the "French transcription" (with "tj" for the simple /c/ and the geminates "kk pp ss ttj") and he refers to a somewhat similar system except for "htsch" (with "tsch" for the simple /c/ and the geminates "gg dd bb ss dsch") as the "German transcription".

The reinforced consonants are pronounced with great muscular tension, both locally and through the entire vocal tract. The laryngeal tension continues on into the vowel, which can be described as "laryngealized" (somewhat gargled), and the effect of the release is a clearcut popping similar to that of glottalized consonants but with no separately heard glottal release, so that they sound unlike the glottalized consonants of certain languages native to North America. The tense unaspirated stops of French are somewhat similar to these sounds. The reinforced consonants are never voiced.

The aspirated and reinforced consonants occur only as syllable onsets, but the syllable itself need not be word-initial. When they are internal in the phrase there is no distinction between strings like **appha** and **apha**, or **apppa** and **appa**. In rapid speech only the latter occurs, and we take that to be the phonemic norm; in slow speech the stop is anticipated with closure of the preceding open syllable. These two tempo-controlled articulations, which I call compressed and conflated, are variants regardless of the constituency of the phrases in which they occur. The morpheme boundaries may be **a-pha**, **aph-a**, or **ap-pha** (in basic form also **ap-ha** or **ah-pa**), but the compression and conflation will take place automatically for each, as the tempo changes, giving two phonetic realizations for each phoneme string /apha/ and /appa/, regardless of their meaning, if any. (See Martin 1982 and 1986, where mention is made of similar variation in English words like "upper" and "cookie"; also §2.10.6.)

The nasals are fully voiced, and at the end of a syllable somewhat long. Initial **m**, especially before **(w)u** and **o**, often has an oral release [mᵇ] or even [ᵐb]. Initial **n**, especially before **i** or **e** (as in

ney 'yes'), sometimes has a similar oral release [nᵈ] or [ⁿd]. (CF Lukoff 1954:4, 11; Martin ?1991: n14.) Ramstedt (1939:14) cites NK dialect forms "ⁿdui ⁿlui; duin luin" for 'four' (nēys), perhaps a variant of the [doy] reported by 1900 Matveev (King 1988b:309) and [noi] in 1898 Tayshin; compare the Hamkyeng form cited by Kim Thaykyun as nei. The velar nasal ng does not occur at the beginning of a word, or after pause, but it can occur as the onset of a noninitial syllable as a result of the consonant "liaison" described in §2.5. In the strings ···ngi and ···ngy··· the velar nasal is fronted and weakened, often disappearing into a nasal y [ị̄], or vanishing completely as in the northern dialect of 1902 Azbuka (and sporadically even in Seoul); King (1988:301-2) reports the phenomenon in 1898 Tayshin, with the nasal vowel remaining, and 1900 Matveev, with no nasality written.

The liquid /l/ occurs after pause only in recent loanwords, and at the beginning of a word only in recent loanwords or in words that do not occur at the beginning of a phrase, such as particles. Internally, /l/ occurs both as a syllable onset and as a coda. When the liquid is syllable-initial, and not preceded by another l, the tongue tip is quickly flapped against the very front of the alveolar ridge, so that the articulation sounds like the single-tap Spanish r or (rather) the somewhat more liquid Japanese r. At the end of a syllable, the l is unreleased and the tongue curls up around and beyond the point where it would have been released, producing a sound that English speakers hear as [l]. The string /ll/, syllable-final l + syllable-initial l, sounds like a long l to a speaker of English, but without the velarization that colors the "dark l" of many English speakers. But Lukoff 1954:40-2 seems to feel that /ll/ is phonetically short like /n/ rather than long like /nn/ [n:n], and some native linguists have expressed a similar feeling. Perhaps that perception (or misperception) is due to the existence of an initial [n···] but no initial [l···], for /l···/ is realized as the flap allophone [r]. Yet at the same time Lukoff (1954:9-10) describes the articulation of /l/ after /l/ as a "pre-flapped [l]" which he writes as [ᵈl]. Often the Korean l (and even more often the ll) is somewhat palatalized, especially before i or y; that is, the center of the tongue is humped at the same time that the tip of the tongue is making the primary articulation. There have been various reports that the flap allophone is used by northern dialects in place of the lateral used in the south before pause or a consonant, e.g. Ramstedt (1939:11) says the allophone of the liquid before a consonant is [l] in South Korea but [r] in North Korea. And there is evidence for that in Russian transcriptions from the 1800s and early 1900s; the Cyrillic spellings of 1902 Azbuka have [r] for the liquid in -lC- clusters. King 1987 says that the North Hamkyeng dialect preserved in the USSR has [r] word-final and before obstruents. He tells me that such speakers pronounce ···ll··· as a short lateral, in contrast with [r] for the simple ···l···. In the expression il.il liphothe 'daily/everyday reporter' you can hear a sequence of lateral + flap [iril( )ri···] but that probably represents a juncture; with totally suppressed juncture the pronunciation is [irilli···].

In rapid speech, owing to the consonant "liaison", the strings mh, nh, ngh, and lh often occur as syllable-initial clusters, instead of as a syllable-final consonant + the onset h-. Here the h is "voiced" (murmured) and pronounced as a breathy release of the somewhat shortened nasal or liquid, which has its "r"-like sound, as noted by Ridel (1881:xiv). More common is a variant version which drops the h completely; see §2.7.3.

The distinction between the two sibilants s and ss is often difficult to hear, and many Koreans, especially in the south, appear to lack the distinction in their local speech. Though minimal pairs can be found, the functional load of the distinction seems to be fairly low, especially in noninitial position. To an American ear, the best description might be this: s is something LESS than what you expect of an "s", and ss is something MORE. There is a fuzzy "lisp"-like quality to the lax s. If you hear a clearcut "s", it is probably the reinforced ss. If you hear an "s" that you can't make up your mind about, an "s" that seems to have something missing, it is probably the lax s. In the Seoul speech of some, the lax s before i and wi is regularly palatalized [ʑʻᵧi] or even palatal [ʑʻi], and that helps distinguish si from ssi. But in the speech of others, the ss is also palatalized before i and wi, so that palatalization is not so reliable a guide as the lag, after the plain s, in voicing the vowel, a lag that is indicated in our phonetic transcription by the inverted apostrophe used to symbolize lightly aspirated release.

The affricates are palatalized throughout the south, and the stop that begins the affricate is sometimes a palatal stop, which identifies the phoneme more perceptibly than the sibilant release,

especially the reinforced **cc**, which tends to suppress the sibilant along with any hint of aspiration. For many Seoul speakers the palatalization is weak or absent before back unrounded vowels, and in the north the nonpalatalized affricate is frequently heard before all the vowels. Figulla 1935:103 says /c/ before /a e o wu/ is the dental affricate [ts], elsewhere (i.e. before /i ey ay wi wey way oy/) the palatal affricate. After a vowel and before a back vowel, the voiced version of the nonpalatalized affricate is sometimes weakened to just [z]. Good examples of that can be heard from a female speaker on the tapes accompanying KBC (Pak Pongnam 1969): ize = **ic.e** 'forgot', ezey = **ecey** 'yesterday', kuzekkey = **kucekkey** 'day before yesterday', sazen = **sacen** 'dictionary', paykhwazem = **payk.hwa-cem** 'department store'; ui(d)za = **uyca** 'chair', mo(d)za = **moca** 'hat'. Despite the description implied in several treatises, it is quite rare to hear [z] in any modern dialect as an allophone of /s/; when [z] or [ᵈz] is heard, it almost always represents /c/. But there is evidence for a [z] allophone of /s/ in earlier Hamkyeng speech, as heard by Putsillo, Matveev, and Tayshin. And Lukoff (1954:8) says of /s/ "After /m, n, ng/ and before a vowel, it may have a weak and sometimes slightly voiced variant [z]." On [z] see also §2.11.4. Ridel, who only hesitantly admitted voiced versions of **p t k**, flatly states (1881:xvii) that there was no [z].

2.5. Syllable structure and consonant liaison.

The Korean syllable is a phonetic entity that is automatically predictable in terms of a string of phonemes: it consists of an initial (the onset), a medial (the vowel or diphthong), and a final (the coda). The onset can be zero or **p pp ph t tt th k kk kh c cc ch s ss h m n -ng (-)l; -mh, -nh, -ngh, -lh**. The final can be zero or **p t k m n ng l**. The Korean writing system, and our transcription, has other finals in its "orthographic" syllables, but those are basic forms subject to reduction in the spoken syllables. Modern Hankul uses the same symbol for initial "zero" and final ···**ng**, though distinctive symbols were once used; the final zero is left unmarked, though it was marked in some of the earliest Hankul texts.

Not all possible combinations of initial, medial, and final occur. Medials beginning with **y** (**yey yay ye ya yu yo**) do not occur after **s ss c ch cc t th tt** except as contractions from **i** + vowel (**iey iay ie ia iwu io**) − see §3.5.(9), or in a few recent loanwords such as **syassu** (also **syaccu** and **syechu**) 'shirt' for which the less Japanese-sounding **sassu** is also heard. The vowel **u** does not occur after a labial (**p ph pp m**) and that is why we can abbreviate the vowel **wu** to **u** after a labial, so that our "**pu**" = **p** + **wu**, "**phu**" = **ph** + **wu**, "**ppu**" = **pp** + **wu**. In a similar way our "**yu**" = **y** + **wu** since there is no **y** + **u**. Medials that begin with **w** (**wi wey way we wa**) do not occur after a labial except as abbreviations of **wu** or **o** + vowel (**wui wuey wuay wue wua oa**), as in **mwe(s)** < **mue(s)** 'what'.

Whenever possible, a syllable shuns the "zero" initial. Korean syllables like to begin with a consonant. When a syllable with the zero initial is appended to a syllable with a final consonant, that consonant shifts over to become the onset of the second syllable: **pap** + **i** is pronounced **pa-pi**, **pang** + **ey** is pronounced **pa-ngey**, **pal** + **ul** is pronounced **pa-lul** and sounds just the same as **pa** + **lul**. When the second syllable begins with **h**, the result is what we would expect from our transcription: ···**p** + **h**··· → ···**ph**··· etc. In rapid speech we even find ···**m** (···**n** ···**ng** ···**l**) + **h**··· → ···**mh**··· (etc.), though the **h** frequently drops in this position. When the first syllable ends in **p**, **t**, or **k** and the second syllable begins with the same consonant, the first syllable loses its final and the initial of the second syllable doubles: ···**p** + **p**··· → ···**pp**···, etc. (For the fact that ···**p** + **k**··· → ···**pkk**···, ···**t** + **k**··· → ···**kk**···, ···**t** + **s**··· → ···**ss**···, etc., see the following section.)

How many distinct syllables does Korean have? It is difficult to answer this question precisely. Suppose we figure that the initials (including zero and **l-**) are 20 (+ 5 in spoken syllables like **-ngi**, **-mha**, etc. = 25), that the medials are 20 (omitting **uy** because of its limited distribution and doubtful status as a phoneme), and that the finals (including zero) are 8. Then we have a minimum (20x20x8=) 3,200 and a maximum of (25x20x8=) 4,000. From these figures we would perhaps want to subtract the syllables that do not occur in spoken words, but many such syllables will in fact turn up in Hankul

spellings, for one reason or another, and in addition Hankul has a number of orthographic syllables with additional basic finals (such as **ph th kk ps ls** etc.) and some unusual syllables like **sya cye chyess**, etc. There are undoubtedly some accidental gaps that do not occur in normal words. Perhaps we are safe in saying that Korean has between three and four thousand different syllables, some of which are fairly rare, and many of which are limited to certain sections of the vocabulary, such as Chinese loanwords, inflected forms, and mimetic words (onomatopes).

2.6. Cluster restrictions.

When two syllables occur in uninterrupted sequence, fewer strings of consonants are found than we expect. The occurring strings are shown in the following table. The line across the top shows the end of the prior syllable; the column at the left shows the beginning of the following syllable. At a point of intersection, an expected string is shown in lowercase boldface. An automatic replacement of a morphophonemically expected sequence is shown in boldface italic. The notion of "expected" is with respect to the analysis underlying the Romanization: when a syllable ending in -p is attached to one beginning with -p, the string that results is syllable-initial **pp**-, pronounced as the onset of the second syllable but optionally picking up a parasitic final -p (not the original -p) when the articulatory process is slowed down. Syllable boundaries are assumed to be automatically determined at a given tempo. The zero onset and coda are noted with the symbol "0".

	-p	-t	-k	-m	-n	-ng	-l	-0
p-	**pp**	***pp***	***kpp***	**mp**	***mp***	**ngp**	**lp**	**p**
ph-	***ph***	***ph***	**kph**	**mph**	***mph***	**ngph**	**lph**	**ph**
pp-	***pp***	***pp***	**kpp**	**mpp**	***mpp***	**ngpp**	**lpp**	**pp**
t-	***ptt***	***tt***	***ktt***	**mt**	**nt**	**ngt**	**lt**	**t**
th-	**pth**	***th***	**kth**	**mth**	**nth**	**ngth**	**lth**	**th**
tt-	**ptt**	**tt**	**ktt**	**mtt**	**ntt**	**ngtt**	**ltt**	**tt**
s-	***pss***	***ss***	***kss***	**ms**	**ns**	**ngs**	**ls**	**s**
ss-	**pss**	**ss**	**kss**	**mss**	**nss**	**ngss**	**lss**	**ss**
c-	***pcc***	***cc***	***kcc***	**mc**	**nc**	**ngc**	**lc**	**c**
ch-	**pch**	***ch***	**kch**	**mch**	**nch**	**ngch**	**lch**	**ch**
cc-	**pcc**	**cc**	**kcc**	**mcc**	**ncc**	**ngcc**	**lcc**	**cc**
k-	***pkk***	***kk***	**kk**	**mk**	***ngk***	**ngk**	**lk**	**k**
kh-	**pkh**	***kh***	***kh***	**mkh**	***ngkh***	**ngkh**	**lkh**	**kh**
kk-	**pkk**	***kk***	***kk***	**mkk**	***ngkk***	**ngkk**	**lkk**	**kk**
h-	**ph**	**th**	**kh**	**mh**	**nh**	**ngh**	**lh**	**h**
m-	***mm***	**nm**	**ngm**	**mm**	***mm***	**ngm**	**lm**	**m**
n-	***mn***	**nn**	**ngn**	**mn**	**nn**	**ngn**	***ll***	**n**
l-	**mn**	**(nn)**	**ngn**	**mn**	***ll***	***ngn***	**ll**	**l**
0-								

This table can be regarded as a kind of filter, through which the underlying morphophonemic strings that we expect to occur across morpheme boundaries (or orthographic pseudo-boundaries) are converted to the phonemic strings that serve as input to the rules that tell the articulatory organs how to realize the utterances. A native speaker of Korean unconsciously utilizes a filter of this sort, not directly accessible to observation. The filter can, however, be generated by a set of rules that more or less recapitulates the history of changing phonetic habits through the centuries, and it is possible that the speaker creates his filter, or bypasses it, by making use of such a set of rules. Below are the rules that account for the table, with a few notes on the historical developments that brought them into existence. (The rules are a revision of those in the introduction to KEd. The notes are largely based on Martin 1989 and the works cited there.)

Rules to convert morphophonemic/orthographic strings to phonemic strings:

(1) NASAL LATERALIZATION. Change **n** to **l** when it is contiguous to **l**.

(2) LIQUID NASALIZATION. Change **l** to **n** when it is after a consonant other than **l** or is after juncture.

(3) NASAL ASSIMILATION. Convert the oral stops **p t k** to the corresponding nasals **m n ng** when a nasal (**m n**) follows.

(4) CLUSTER REINFORCEMENT. Reinforce simple **p t k c s** to **pp tt kk cc ss** after an obstruent (**p t k**).

(5) ASSIBILATION. Pronounce **t** as **s** before **s** or **ss**.

(6) ASSIMILATION OF APICALS. Make the point of articulation of **t** and **n** be the same as that of a following labial (**p pp ph m**) or velar (**k kk kh**): **t → p** or **k**, **n → m** or **ng**.

(7) CLUSTER REDUCTION. Unless deliberately slowing the articulations, reduce three like consonants to two (**ttt → tt**); before **h** reduce two like consonants to one (**tth → th**).

It will be observed that strings of lax obstruents are not permitted: the expected **kp** is automatically replaced by **kpp**, etc. Since most cases of lax obstruent + reinforced obstruent (**kpp**, ...) are the result of juxtaposing two basic lax obstruents (**-k + p-**, ...), the default Hankul spelling is ···**k-p···** (...) for ALL cases of /**kpp**/ (...) except when the second element is clearly a form that has a basic shape with initial **pp···** (...). The string /**yakpalle**/ can represent both **yak palle** 'applies medicine' and **yak-ppalle** 'is shrewd and quick'. We are reminded of the appropriate spelling in each case by the recurrence of the forms in such unambiguous contexts as **yak ul palle** /**yakul( )palle**/ 'applies medicine' and **yak.ko ppalle** /**yakko( )ppalle**/ 'is shrewd and is quick'. As in other cases where morphophonemic decisions are called for, Koreans sometimes get confused and misspell words, either in the morphophonemically safer direction (**-kp-**, ...) or in their phonemic form (**-kpp-**, ...) as they are heard. (And the decision on where to divide a word into morphemes is sometimes in conflict with the history of the forms; see §2.10.6 for examples.)

An interesting example is provided by the convergence of the two sentences **pap to iss.e** 'there is also (cooked) rice' and **pap tto iss.e** 'there is more rice', which sound the same in rapid speech when no pause is inserted: /**papttoisse**/. With pauses ("open juncture") to distinguish the two sentences, they sound different: **pap to iss.e** /**paptto|isse**/, **pap tto iss.e** /**pap|ttoisse**/. In slow and overdeliberate pronunciations you may hear **-tkk-** and **-tpp-** instead of the usual reductions of **-kk-** and **-pp-** from **-tk(k)-** and **-tp(p)-**. Some speakers feel that they also articulate **-tcc-** for the **-cc-** from **-t c(c)-** but that is questionable. The pronunciation of **-tss-** from **-t s(s)-** is highly artificial; a genuine /**tss**/ is used by many speakers in pronounced the loanword **syaccu** 'shirt' (also **syassu**) as [**šattsi**], following the articulatory habits of Japanese, from which the word was borrowed.

As earlier observed (§1.5), Chinese loanwords regularly reinforce the sequences ···**ls···**, ···**lc···**, and ···**lt···** to ···**lqs···**, ···**lqc···**, and ···**lqt···**. For /**lc**/ and /**lt**/ it is fairly easy to find non-Chinese words without the **-q-**, such as the forms made by attaching the endings **-ci** and **-ta** to **l**-extending verb stems (§8.3.2), and compounds such as **thel cangkap** 'wool gloves'. Words made up of Chinese morphemes may appear in compounds without the reinforcement: **sil-cakca** 'a reliable person', **chelmul-cen** 'hardware store'. For /**ls**/ it is not so easy to find contrasts, and I suspect there may be Koreans who reinforce all cases to ···**lqs···**. (To be sure, many Koreans simply fail to distinguish /**ss**/ from /**s**/ in any environment; we do not speak of them.) Yet certain types of compounds and phrases turn up cases where I have observed /**ls**/ from at least some speakers. One textbook (M 1:1:70) indicates **kyōsilq se** for 'in the classroom' but that is pronounced **kyōsil se** by speakers I have heard (such as [1]**Yi Tongcay**). Examples:

> **pyel soli** 'unexpected remark', **pyel swu** 'extraordinary good fortune', **pyel sālam** 'an eccentric'; **Sewul se** 'from Seoul', **Sewul si** 'the city of Seoul', **thukpyel si** 'special city [of Seoul]'; **pāl-soy** 'informing on others', **naphal-swu** 'bugler', **sol-song namu** 'hemlock spruce', **sal-son ulo** 'with bare hands'; **mal sōl** 'horse brush', **cil soth** 'earthenware kettle', **māl somssi** 'eloquence', **māl silqswu** 'tongueslip', **congtal say** 'skylark', **chel say** 'seasonal (= migratory) bird', **thel sīl** 'wool yarn', **cil sas-pan** 'small reed tray attached to an A-frame carrier', **Hānkwuk māl sensayng** 'teacher of Korean'; **sīlsil-i** 'thread by thread, every thread'; **hoth-pel sālam** 'shallow-minded person'; **wul sēyta** '(clan is strong =) has a large family', **kkol**

sănapta 'has an ugly face', **pul salunta** 'commits to the flames', **al sunta** (← su-l-) 'emits spawn, lays eggs', **nal sunta** (← su- < se-) 'gets sharp(-edged), takes an edge', **nal seywunta** 'sharpens, puts an edge on'; **twūl sai** 'between the two', but **twūlq cwung** 'of the two' — [1]Yi Mayngseng tells me that he uses **twūlq sai** more often than **twūl sai** and that he thinks **twūl cwung** occurs but is rare.

In certain compounds made up of Chinese elements the reinforcement seems to be optional: [1]**ipal(q)-so** 'barber shop', [1]**ipal(q)-sa** 'barber'.

The assimilations and reductions described here take place across words and phrases, when the phonetic cues to their boundaries are omitted, as often happens in normal rapid speech: **Acik moluni?** 'You still don't know?' (/···ngm···/), **Wang sepang to kkamcak nōllan mas!** 'The taste that surprised Mr Wang!' (ad for 3-minute "instant meal") (/···ngn···/), **kot na onta** 'will come right out' (/···nn···/), **tōn ul nāynta** 'pays the money' /tōnullaynta/, **khunq īl nass.ta** 'that's terrible' /khunnīllatta/.

2.7. Sequence variants.

There are certain types of variants which are widely systematic: a given sequence of phonemes for which we always (or always within a morph or a word), find a variant of consistent shape. There are also some which are less predictable, but also widespread, of a similar sort. Nine types of these SEQUENCE VARIANTS are described below. See also the remarks on **oy** (§2.2) and **uy** (§2.3).

2.7.1. Precision variants.

In speech at a normal rapid tempo, n is replaced by m before p or m, and by ng before k:
> sānqpo → sāmppo 'stroll, walk', han pen → ham pen 'one time', cwūnpi → cwūmpi 'preparation', sinmun → simmun 'newspaper', (mōs mek.e → mōt mek.e →) mōn mek.e → mōm mek.e 'can't eat'; chinkwu → chingkwu 'friend', pankawe → pangkawe 'is happy', sonq-kalak → song-kkalak 'finger'.

In faster speech, m is replaced by ng before k:
> cāmqkan → cāngkkan 'a while', nemkye → nengkye 'across, over', īmkum → īngkum 'king', cikum kkaci → cikung kkaci 'up to now'.

Sometimes, in fast or sloppy speech, pk(k) is replaced by kk:
> komapkeyss.[s]up.nita → komakkeyssumnita 'I will be grateful (to you)', poypkeyss.[s]up.nita → poykkeyssumnita 'I will see you'.

In sloppy speech ng often drops between vowels, especially when it is before i or y:
> cwungang → cwuang 'central'; congi → coi 'paper'; tongyang → to.yang 'Orient'; the placenames **Phyengyang → Phye.yang** (→ **Pheyyang**, §2.7.9), **Yangyang → Ya.yang**; ... .

Sometimes a final ···ng is dropped: the **hapsung** (jitney) boys in 1960 Seoul would call out **sīche!** for **sīcheng** 'City Hall'. In those days when you left a Seoul restaurant you might hear a cordial **A(n)nyē kapsye!** for **Annyeng hi kapsio!** 'Good-bye, sir'.

A casual reduction of m to w can be heard in rapid versions of **ku man twue (yo)** > **kuwantw[u]e(yo)** (§2.7.7) > **k[u]wante(yo)** = **kwante(yo)** > **k[w]ante(yo)** (§2.7.4) > **kante(yo)** 'cut it out (= stop); let it go (at that)'.

2.7.2. Vowel length variants.

Vowel length is distinctive in Korean, and the long vowel can be considered as a string of two identical short vowels. But many speakers do not use long vowels in all the words for which some speakers retain them, so that most words with a long vowel within a morph have short variants. Even for a speaker making maximum use of the length distinctions, the long vowel is usually restricted to the first syllable of a word, so that virtually every morph with a long vowel has a grammatically conditioned alternant with the short counterpart, as can be seen from the pair of synonyms **ūngpo** = **pōung** 'retribution'. But not all short-vowel morphs have long alternants or variants; many are always short. For practical purposes, I indicate a variable long vowel — any long vowel within a morph — by putting a macron above the letter symbol. In some Korean dictionaries, a long mark is put over the entire syllable; in others, the syllable is followed by two dots, like the colon that is used to mark vowel

length in the International Phonetic Alphabet. A problem arises as to whether the length should be marked LEXICALLY, and accordingly seldom written on a syllable that is not initial in a word, or MORPHEMICALLY. The synonym pair cited above showed a lexical marking of the length; a morphemic marking would be ūngpŏ = pŏūng. South Korean dictionaries have generally shown the length morphemically (and etymologically) for words of Chinese origin. The North Korean dictionary (NKd), and the Yale dictionary (KEd), mark the length lexically, as is the general practice of this book, though in a number of examples the morphemic marking will be seen. Lexical marking seems to be the safer approach, since lexical units can be readily checked with native speakers, and many problems arise in morpheme identifications and our decisions on "basic" length for both Chinese and non-Chinese morphemes. The Chinese characters are not always a reliable guide: the cities of **Taykwu** and **Taycen** are pronounced with short first syllables that represent the character **tāy** 'large, great', for which the length may be heard in words like **tāy-hak.kyo** 'university'.

The words **kiil** 'fixed date, term' and **kīl(q)** 'to be long' at times are homonyms for some speakers; at other times for those speakers and at all times, perhaps, for other speakers, they are not. In rapid speech both words may even sound like **kil** 'road'. The word **chwīim** 'inauguration' is to be pronounced in two syllables, with the first long, but it is often said as a single long syllable, and in rapid speech even that may be heard shortened. The distinction between e and ē is the easiest to hear, for in Seoul speech the long variety of that vowel is conspicuously higher in quality, and the short variety is not only lower but backer and more rounded. That helps distinguish **heen** 'falsehood' from **hĕn** ··· 'old, worn(-out)', and **tĕpta** 'is hot' from **te epta** 'shoulders more' (An Sangchel 1988:120) and **te ĕps.ta** 'lacks more'. For other vowels the length is mainly observed when needed to distinguish particular sound-alikes in certain contexts. For more examples of vowel length, see KM 8-9.

When a one-syllable phrase ends in a vowel, that vowel is automatically lengthened, so that when cited in isolation the words **si** 'poem' and **sī** 'city' are identically /sii/. The automatic lengthening disappears when the word is part of a longer phrase: **si to** 'poem too', **sī to** 'city too'. This kind of lengthening is ignored by all the orthographies and most of the linguistic descriptions. (A similar phenomenon is common in western Japan and in the Ryūkyūs.)

He Wung (1965:89) points out some length alternations in verb forms. The vowel length found in many of the verbs here called l-extending, s-dropping, and -W- (p-leniting) stems is lost before endings that begin with a vowel − **kē-l-** → **kel.e** 'hangs', **cī(s)-** → **cie** 'builds', **kōw-** → **kōpta** but **kowa** 'is pretty' − and also in voice-derived forms such as **alli-** 'informs' ← **ā-l-**. The stem **pē-l-** 'earn money' is an exception (**pēl.i** 'earning money', **pēl.e** 'earns money'), probably because it is a reduction of **peu-l-**; similar exceptions are **kkū-l-** 'pull' (**kkūl.e**), coming from earlier **kuu-l-**, and **ssē-l-** 'chop' (**ssēl.e**), which goes back to *sehul-* (LCT 449b). With the exception of **tut-** 'hear', the verbs that end in leniting **t** (the verbs here treated as modern l-final stems = -T/L- stems) have vowel length before a consonant, where they preserve the original stop unlenited: **kēt.ko** 'walking', **kel.e** 'walks'. The length on these stems resulted from the blend of a Middle Korean low tone on the first vowel and a high tone on a lost vowel that must have followed the consonant before the lenition took place: *ke˙tu-˙kwo* > ˝ket-˙kwo, then *ke˙tu-˙e* > ke˙l-e. A similar history accounts for the vowel length of s-dropping and -W- stems (Martin 1973; Ramsey 1975, 1978); see below. On the accentual exception of **tut-** 'hear' it is interesting that this seems to be the only one of these stems that Phyengan preserves unlenited, with the infinitive **tut.e** = Seoul **tul.e** despite Seoul-like **sil.e** 'load' and **kel.e** 'walk' (Kim Yengpay 1984:53).

The vowel length of a Chinese morpheme usually drops when it is noninitial in a word; this is part of a general tendency to retain accentual distinctions only in the initial position.

In addition to the sort of lexical length mentioned above, there also occurs an "expressive lengthening" as a voice qualifier, often accompanied by rasp or other voice qualifiers, for certain mimetic words, such as the last syllable of adjectival nouns ending in -us (hata). CF §14.

Younger Seoul speakers have largely lost the old vowel-length distinctions but they have new long vowels based on dropped ···h··· (§2.7.3) or ···u··· (§2.7.5), or in words borrowed from English and

other modern languages. The older vowel-length distinctions are ignored in Hankul orthography. The new long vowels in modern loanwords are also ignored in the North Korean orthography but in the south the length is sometimes written with a repeat of the vowel as a separate syllable (with the zero initial), though occasionally you will see instead a dash (−), a usage borrowed from the Japanese treatment of katakana words. You may find khulīm 'cream' spelled "khu-lim", "khu-li-im", or even "khu-li-−-m".

Decisions on noting vowel length for certain common words can be troublesome. We have followed LHS, KEd, and NKd in writing the stems cīna- 'go past' and cīnay- 'go past it' (and their derivatives) with a long first vowel, and that is historically correct, but Kim Minswu follows contemporary Seoul standards in writing them short, and the student is advised to treat them as short despite our retention of the length. We write the noun sihem 'examination' without vowel length, but dictionaries list it as sīhem (KEd, NKd) or sihēm (LHS), and the usual pronunciation today is /syēm/, with the intervocalic -h- dropped (as usual) and the i losing its syllabicity (reduced to y) but with compensatory lengthening of the following e. The word traditionally spelled iyaki 'talk, tale' is usually pronounced yāyki or (more commonly) yēyki, and all three versions will be found in this book. The first vowel of the stem komaw- 'be grateful' is short, not long, but sometimes "expressive" length is superimposed in saying Ko(:)mapsup.nita, and that is responsible for the misleading remark in KEd 141b "Some pronounce long [kōmapta]". There are probably a few other cases of this sort that have escaped my attention. The student need not worry about vowel length except when he hears it, for younger Koreans pronounce most of the older long vowels as short, maintaining only those long vowels that are the result of contraction, such as mām < maum 'soul', and the newly arrived long vowels that have come in with modern loanwords (sometimes written double, as geminates): khātu = khaatu 'card', aphāthu = aphaathu 'apartment house', sīcun = siicun 'season', ēythosu = eyeythosu 'ethos', phēsuthu = pheesuthu 'first (base)', khōtu = khootu 'cord', khyū = khyuwu 'cue, Q'. Sometimes a bar is written for the second vowel, and sometimes it is simply ignored. The diphthongized English long vowels are usually treated as eyi and owu.

The distinctive length of the central area corresponds to distinctive pitch or a combination of pitch and length in certain other parts of Korea. In the province of South Kyengsang, for which we have He Wung's description of his native dialect of Kimhay, there are three lexically distinct pitch levels HIGH, MID, and LOW. (The high pitch sometimes has a slight fall, especially on a monosyllable in isolation.) In North Kyengsang (e.g. Antong) and also in North Cenla (e.g. Kwunsan), there are only two lexically distinct pitches HIGH and LOW, and part of the distinction is carried by vowel length. The low pitch of Kimhay is cognate with LONG low nuclei in Antong and the mid pitch of Kimhay is cognate with SHORT low nuclei. (Apparently there are no long vowels in Antong with HIGH pitch.) Farther north, in Hamkyeng (e.g. Hamhung and Hoylyeng) HIGH and LOW pitch are distinguished but there is no cognate distinction of length. Moreover, both the mid and low pitches of Kimhay are cognate with the HIGH pitch of Hamhung, and the LOW pitch of Hamhung is cognate with the high pitch of Kimhay. In each of the Korean dialects the situation is complicated by a certain amount of pitch sandhi (partly described by He Wung) that is similar to the length alternations of standard Korean. We refer here to the "basic" accents of words. The distinctive lexical pitch is not to be confused with the SENTENCE INTONATION of standard Korean, described in §2.8. Speakers from Seoul and from most of the north and west do not differentiate words by pitch alone. But many speakers from the south and east retain their native distinctions of pitch even after they have adjusted their pronunciation to the standard language quite well in other respects.

Below is a table that shows a few stock examples to demonstrate the cognate relationship of pitch and length in the dialects. The first column lists the examples in standard forms; the other columns show the pitch and length for each example in the four dialect types known to me.

STANDARD	SEOUL	KIMHAY	ANTONG-KWUNSAN	HAMHUNG-HOYLYENG
mal 'horse' **pay** 'pear' **son** 'guest'	short	high	high	low
mal 'measure' **pay** 'stomach; boat' **son** 'hand'	short	mid	low short	high
māl 'words' **pāy** 'double' **sŏn** 'loss'	long	low	low long	high

In Middle Korean the syllables of the second type were preceded by a dot, representing high pitch, and those of the third type by a double dot, which represented a long rise going from low to high. In the Yale Romanization the two accent marks of Middle Korean can be represented with a raised dot and a dieresis (raised double-dot): *swon* 'guest', `swon` 'hand', ¨*swon* 'loss'.

From a typological point of view, it can be said that Korean words have lexical ACCENT, manifested by pitch or length or a combination of pitch and length, depending on the dialect. Somewhat similar remarks can be made about Japanese. But the tones of Chinese are different: they represent a pitch contour that is part of each monosyllable, just like the consonants and vowels. The accent patterns of Korean and of Japanese spread over longer stretches, since these languages have many polysyllabic words and morphemes.

2.7.3. Disappearing *h*.

The phoneme h freely drops between typically voiced phonemes (the vowels and y w m n ng l): a[h]op 'nine', sīm-[h]i 'extremely', mān[h].i 'lots', sin[h]on 'new marriage, honeymoon', un[h]ayng 'bank', cen-[h]ye 'totally', kyel[h]on 'marriage', chel[h]ak-cek ulo 'philosophically', pāng[h]ak 'school vacation', annyeng [h]i 'in good health', kŏ[h]yang 'hometown', kyo[h]wan 'exchange', sel[h]wa 'story, tale', in[h]yeng 'doll', um[h]yang 'sound, noise'. The h-less version of kŏ(h)yang i 'home town [as subject]' can sound like ko.yangi 'cat', though in Seoul that word usually contracts to kwāyngi. And ol hay 'this year' can sound like olay 'for a long time' (both /oley/). There can be more than one dropped h in a phrase: ¹īhay hay (yo) 'I understand' is often reduced to /īeyey(yo)/.

For certain words the version with the elided ···h··· is now considered standard: puengi 'owl' (dialect puhengi, puhii) < `pwuhwe`ngi, hwāng'a = hwanghwā 'sundries, variety goods' < HWANG-`HWA (for the dropped w in these two words, see §2.7.4); pinye 'hairpin' < pinhye (? < `PIN 'hair on temple' + `hye 'tongue' or ¨hye- 'pull'); ili 'wolf' < `ilhi. From a strictly synchronic point of view, there is no h in words like mān(h).i, despite the spelling, which is morphophonemic; we infer the h from other forms such as mānkho ← mānh.ko, as it is spelled. In unfamiliar Chinese words, the underlying h will emerge as a kind of reading pronunciation, but it usually drops when the word comes to be often said. Inflected forms of h-final stems are pronounced without the h when it is between voiced sounds, but occasionally you will hear the h restored for emphasis in certain forms, as in Cōh.un kyēy[h]oyk ita 'It is a GOOD plan', though never in other forms, such as cō[h].a > /cōwa/, which can be emphasized only by further lengthening the vowel (cō:wa), for the h has been completely absorbed in the infinitive, and an epenthetic glide w has taken its place. How old is the h-elision and, after a rounded vowel, the epenthetic w? 1882 Ross 35 has nwo.wa.la < noh.a la. There are examples of n[h] in the 1500s and 1700s: ¨ma`ni (?1517⁻ ¹No 2:26a, Pak 1:20a) and man.i (1703 Sam-yek 5:2) = mān(h).i 'much'; skun.e (1736 ⁿYe 3:13 [LCT]) = skunhe (1783 Cahyul 1) = kkun(h).e 'end'.

Sometimes the entire h··· syllable drops: Na [ha]nthey? 'For me?'; Kulena silphay [hay]ss.c[i] yo 'But they failed'. The verb expression in Pusan ey se Kim Sencwu thukpha-[w]en i pŏto hap.nita 'From Pusan, correspondent Kim Sencwu reports' is often said as pŏto [ha]p.nita = /pŏtomnita/ and equally often as pŏt[o h]ap.nita = /pŏtamnita/ < /pŏt[w]amnita/ (o > w, §2.7.7). A similar example: kac[i] an[h].ulye ko hap.nita = /kacanulyekamnita/ < /··· k[w]amnita/ 'I won't go'.

2.7.4. Disappearing w.

Before a mid or low vowel the phoneme w freely drops after p, ph, ps, m, wu, or o: sam-[w]el 'March', sam [w]en 'three wen [monetary unit]', kwu [w]en 'nine wen', kyŏ[w]en 'teacher', ŏ-[w]el 'May', cĕm.[w]en 'shop clerk', pep.[w]ang 'pope', m[w]e 'what', cip.h[w]ey = cip.hoy 'meeting', cham.[w]ey (→ chami → chaymi, §2.7.9) = cham.oy 'melon', ip.[w]en 'entering hospital', caps[w]e 'partakes' (< capswue, §2.7.9). The usual way to say Māl hay pwā 'Tell me about it' is [mareba] = Māl [h]ay p[w]ā. There are diachronic examples of postconsonantal w dropping even from wo, which is usually taken to be a monophthong vowel: ˙pacwo (1562) > paco (1748) > paca 'reed fence'.

In sloppy speech (and widely in Seoul) w often disappears after nonlabial sounds, too, when a mid or low vowel follows: si[w]en hata 'is cool', an [w]ass.ta 'didn't come', towa c[w]e 'does the favor of helping' (< cwue, §2.7.7), n[w]ā t[w]ess.e 'put it away' (< noa, §2.7.7) < no[h].a twuess.e, tōngmul-[w]en 'zoo', chil-[w]el 'July', ceng-[w]el 'January', pyĕng[w]en 'hospital', kong[w]en 'park', ceng[w]en ey 'in the garden', tāy[h]ak-[w]en 'graduate school', cik.[w]en 'staff, personnel', k[w]ank[w]ang-kayk 'tourist', meych [w]el iess.na yo /meyt[w]eli(y)enna.yo/ 'what month was it?', kh[w]aysok hata 'is speedy' (the first syllable is typically devoiced), h[w]ankap '60th birthday', ⁿyen[hw]ey = ⁿyenhoy 'annual meeting', chen [hw]an 'a thousand hwan (outdated monetary unit = wen)'. As the last two examples show, hw can drop as a string: pho[hw]an 'cannonball, shot (put)', so[hw]al [h]i 'sloppily, carelessly' (also /sowali/, /swāli/). For many speakers the phrases cĕn[hw]a 'ta 'it's a phone call' and cen [h]ata 'reports' can converge. The string hw, when not dropped internally or when initial, is articulated by many speakers as a bilabial fricative [F], as noted in §2.4.

From the viewpoint of our Romanization there is an interesting case in tewun ⋯ ' ⋯ that is warm' → teun ⋯ → (§2.7.5) tĕn ⋯ . Notice that all cases of -owun, -owul, and -owum freely contract to -ōn, -ōl, and -ōm; and all cases of -wuwun, -wuwul, and -wuwum to -wūn, -wūl, and -wūm.

Because oy is generally pronounced as wey, words spelled with that diphthong often end up just as [w]ey, so you may hear an tey = an t[w]ey for an toy(e) 'it won't do; too bad'. Other examples: pĕmc[w]ey = pĕmcoy 'crime', sath[w]ey = sathoy 'declining / refusing office', ⋯ . When you hear /keyley/ it may escape you that this could be k[w]eyl[w]ey and the word can be found in the dictionary as koyloy 'puppet'. The h of hwey (< hoy) freely drops along with the labial, but only when a voiced sound precedes, as in wi[w]en[hw]ey = wiwen-hoy 'committee', and in rapid speech that can even be compressed further to /wĕney/! On the other hand, um.ak-hoy 'concert' can be reduced to umakhey but not *umakwey or *umakey (the latter could only represent um.ak ey 'in / to / of the music'), and kwuk.hoy = kwuk.hwey 'national assembly' can shorten to kwukh[w]ey = kwukhey but not to *kwukwey or *kwukey. For thōywen hayss.ta 'got out of the hospital' you will hear (thwĕywen > th[w]ĕy[w]en =) /thĕyen[h]etta/ or even just /thĕynetta/.

Further compressions may baffle the ear. When i or u are left directly preceding a vowel by the eliding of h or w (or hw), the high vowel often loses its syllabicity and becomes a semivowel glide: si[h]em 'test' > syĕm with compensatory lengthening of the remaining syllable. And swuep > swĕp (§2.7.7) 'class instruction' may be further reduced to sĕp. In rapid speech you will hear drastic reductions such as kyĕyhoyk = kyĕyhweyk > kyĕy[h]weyk > kyĕy[w]eyk > kyĕyk = /kĕyk/ 'plan'. The expression swĩpsseykoki is from sw[u]ipss[w]eykoki = swuip soy-koki 'imported beef', and in dialects you may hear swĩpsseykeyki < ⋯k[w]eyki < ⋯koyki < -koki with partial assimilation (fronting or "umlaut") of the next-to-last vowel to the final high front vowel. The form swĩp does not further reduce to s[w]ĩp because the w drops only before a mid or low vowel, not i or u. But notice that some instances of hwu reduced to hw (§2.7.7) are followed by nonhigh vowels, and w before a mid or low vowel freely drops, so that in rapid speech (ku) hwū ey 'afterwards' > (ku) hw[u]ĕy = (ku) hwĕy sounds like (ku) hwĕy = (ku) hōy '(that) meeting' and both can be further compressed to (ku) h[w]ĕy = /(ku) hĕy/. The city of Swuwen is often called /swĕn/. The word kan[h]o-[w]en 'nurse' will drop the h and/or the w, and /kan(h)oen/ can be further compressed to /kanwĕn/, which in turn may drop its w leaving the listener with /kanĕn/ to puzzle out.

2.7.5. Postvocalic *u*.

Sequences of vowel + u are often pronounced with vowel length replacing the u: **kium, kīm** 'weed' (whence **kīm** 'seaweed'?); **taum, tām** 'next'; **maum, mām** 'soul, heart, mind'; **cheum, chēm** 'for the first time'; **maul, māl** 'village'; **keyuluta, kēyluta** 'is lazy'; **koul, kōl** 'district, county'. Since h drops readily a sequence of vowel + h + u is often reduced to a long vowel: **noh.una, nōuna, nōna** 'puts it but', **tāh.uni, tāuni, tāni** 'since it arrives', **cŏh.umyen, cŏumyen, cŏmyen** 'if it's good'. CF §8.1.2, §8.2.4.

A similar reduction whereby i (after Vy) behaves as u does above will be heard in **nayl ← nāyl ← ¹nayil** 'tomorrow'. (The suppression of the newly acquired vowel length remains to be explained.)

2.7.6. Intercalated semivowels.

The vowel component FRONT occurs in the phonemes **i ey ay (oy) (wi)** and the component ROUNDED in **wu o (oy) (wi)**. These two features freely overlap a following vowel to spawn an etymologically unmotivated semivowel y or w. From **pi** 'rain' + **os** 'garment' comes **pi os** 'rain-gear', which sounds like /piyot/, The infinitives **chwue** 'dances' and **chwuwe** 'is cold' ordinarily sound the same /chwuwe/, and the infinitives **peyye** 'gets cut' (← peyi-, a passive stem) and **pēye** 'cuts' (← pēy-, a transitive stem) are often indistinguishable as /peyye/. Some speakers try to differentiate words like **kiyak** 'weakness of spirit' and **cwuwi** 'surroundings' from the quasi-homonyms **kiak** 'instrumental music' and **cwuuy** /cwui/ 'ism' by holding on to the y and w. Other speakers, however, distinguish a y or w which is motivated (morphophonemically expected from our knowledge of other alternants, e.g. in **yakca** 'weakling' and **sāwi** 'all around') from one which is simply the predictable lag in phase of a phoneme feature. Such speakers make a difference in pronunciation between **nāyo** 'puts out [authoritative style]' (< nay-o) and **nāy yo** 'puts out [polite style]' (< nāy-e yo). An analogous situation occurs in English with words like "prints" and "prince", which are seldom if ever distinguished in speech.

The practice of the Korean Language Society is to write y or w in all cases of semivowel except when there is a clearcut etymological reason NOT to do so. Within a morpheme the semivowel is written: **iyaki** 'story' (contrast **i aki** 'this child'), **kwiyal** 'paint-brush', **swuwel hata** 'is easy, handy'. The two apparent exceptions of **ppay-as-** 'grasp' and **payam** 'snake' either show the influence of their abbreviations **ppāys-** and **pāym** or else reflect an etymological analysis (CF **as-** 'snatch', dialect variants **piam** and **pi-emi** 'snake'). Other apparent exceptions are **kayam** 'hazel nut' and **sayang** (abbreviation **sāyng**) 'ginger' — but **sayyang** also occurs.

The phenomenon extends to cases of **wu** or **o** + the disappearing h of §2.7.3: **no(h.)a** 'puts' and **towa** 'helps' rime for most speakers, and both are sometimes shortened to **nwā** and **twā** (§2.7.7). These phenomena have been attested for some time: *nwowala* (1882 Ross 35) = **noh.a la** 'put it [there]!' The intercalated palatal semivowel can be seen in the Middle Korean spelling of --i/y + particle ·ey as "·-i/y·yey" (in contrast with the "·-i/yey" that represents --i/yGey).

2.7.7. Desyllabification of *i*, *wu*, and *o*.

Sequences of i + vowel or of i + y + vowel are often reduced to y + vowel. The vowel is usually lengthened if it is in the first syllable after pause. The most conspicuous examples are of the infinitives of stems that end in i: **kitalie → kitalye, masie → masye** (usually pronounced **mase**, at least by older Seoul speakers), **kacie → kacye** (usually pronounced **kace**), **kaluchie → kaluchye** (usually pronounced **kaluche**), **titie → titye**, ... Since the honorific marker is -(u)si-, the sequence -(u)sye is especially common — and usually pronounced as if -se, at least by older speakers, but among the younger generation the pronunciation with /sy/ [š] is prevalent and it seems to be spreading. Example: **kasie → kasye (→ kase)**. Shortening of longer infinitives in ··ie is standard practice in written Korean nowadays. The one-syllable stems are usually not abbreviated in writing but in speech you hear the same sort of shortening, usually with compensatory lengthening of the vowel: **ttyē** for **ttie** 'wears a belt', **phyē** for **phie** 'smokes (= phiwe); blooms', **chyē** (pronounced **chē**) for **chie** 'hits', **cyē** (pronounced **cē**) for **cie** from either **cī(s)-** 'build' or **ci-** 'bear on one's back; ... '.

The vowels **wu** and **o** are often reduced to **w** before a vowel and to nothing before **w** + vowel, especially when the result is not immediately followed by a pause: **cwe** for **cwue** 'gives', **twe** for **twue** 'puts away', **twa** for **towa** 'helps', **mwe** (further reduced to **me** by §2.7.4) for **mue** 'what'. The phenomenon extends to words in which the **h** disappears (§2.7.3): **nwa** for **noh.a** 'puts', **cwa** for **cōh.a** 'is good'. The vowel sometimes lengthens: **twā yo** (= **towa yo**), **nwā yo** (= **noh.a yo**), **cwā yo** (= **cōh.a yo**). The reduction of longer infinitives in **···wue** is in written Korean nowadays but the one-syllable stems ending in **wu** are not usually abbreviated in writing, except that **cwue** and **twue** as auxiliaries are often written **cwe** and **twe**. The **···w···** then often drops in rapid speech (§2.7.4).

In general the vowel of monosyllabic infinitives reduced from **i-e**, **wu-e**, and **(w)o-a** are basically long (**cyĕ**, **cwĕ**, **twĕ**, **nwā**, **pwā**, **wā**) but the length is suppressed in the past forms: compare **wā iss.ta** 'is (come) here' and **wass.ta** 'came, has come'. And the length is often dropped when the infinitive closely follows other another form, as the auxiliaries often do. In this book we follow LHS (and we correct KEd) in writing **chyĕ 'ta** (**pota / poita**) and **chyĕ tulta** despite the seeming irregularity of **chye cwuta / kata / nāyta / pelita**. NKd has **chye 'ta pota** but **chyĕ 'ta poita** and, I believe, **chyĕ tulta** (the photoprint is unclear). The long vowel in the infinitive **wā** 'come' is questionable; the contraction was the usual form in Middle Korean and marked with a single dot, not the double dot that would lead to the modern length. If genuine, the length may be new.

The short vowel of the infinitive in **phye cita** owes to the earlier (and dialect?) form **phyeta** = modern Seoul **phita**. The infinitive **khye** < **khyeta** = **khita** is similar. These infinitives, like that of literary (and dialect?) **seta** = **suta** 'stand', simply absorb the infinitive ending **-e** with no compensatory lengthening, just as **ka** < **kata** absorbs the **-a**. A stem that ends in unrounded **u** drops that vowel when it attaches the ending, and there is no lengthening of the resulting syllable: **khe** < **khuta**, **sse** < **ssuta**, **tte** < **ttuta**, **the** < **thuta**. The irregular length of **kkĕ cita**, **thĕ cita** (and for LHS and Kim Minswu **thĕ ttulita**) is anomalous. Also anomalous is the length of **kkĕ** from **kkuta**, for which no good explanation is apparent; the earlier form was **˙pske** (1462 [1]Nung 2:43b, 1481 Twusi 25:13a) with but a single dot, and the earlier form of **the** was similar, **˙pthe** (1481 Twusi 7:24b). (LHS lists **kke** without a long mark, thus short, but all of his compound verbs have **kkĕ**. NKd has a long mark for **kkĕ** itself and a number of the compounds, but strangely leaves **kke cita** unmarked.) There are several pairs of expressions that show irregularity with respect to vowel length. We hear, for example, **kkāy cita**, **kkĕ cita**, and **thĕ cita** but **kkay ttulita**, **kke ttulita**, and (according to NKd and KEd) **the ttulita**, though LHS and Kim Minswu have **thĕ ttulita**, as if the geminate **tt** had curtailed the length. NKd strangely has short **ph'e cita** despite **ph'ĕ ttulita**; both are long in the other sources.

Other cases of vowel reduction are often heard in the casual construction **-ci yo → -c[y]o**, in the command form **-usio / -usipsio → -us(y)o / -usips(y)o**, and in an occasional noun, such as **kyĕk ca** for **kiek ca** 'the letter K'. I have heard **/aneyyo/** = **an' ey yo ← anyey yo ← ani (y)ey yo** 'it isn't' **← ani + ie(y) yo**. Also: [1]**nayil → [1]nāyl → [1]nayl** (§2.7.2) 'tomorrow'; (§3.5.[9]) **oylye ← oilye** (§2.7.3) < **ohilye** (< **˙wohi˙lye**) 'rather'; **toylye ← tolie** (< **tolihye** < **twolo-˙(h)hye**) 'conversely'.

2.7.8. Reduction of *wie*.

The sequence **wie** is often replaced by **ōy** (as if by way of *****wye**) and **oy** is often further replaced by **wey**, as noted earlier. Examples are **swīe → sōy** 'sours', **swīess.e → sōysse** 'soured'; **ttwie → ttōy** 'jumps', **ttwiess.e → tōyss.e** 'jumped'. The standard Hankul spelling writes this reduction as "**wey**", apparently influenced by the many speakers who do not distinguish **oy** from **wey**; compare the spelling of "**way**" for the infinitives of stems ending in **oy**, §9.4. The stem **sakwi-** (**sakwie → sakōy**) is an irregular development from *sa˙kwoy-* 'get acquainted'.

2.7.9. Vowel assimilation.

The vowel **ey** is frequently replaced by **i** in rapid speech when the following syllable contains **i** or **y**: **ciil → cēy-il** 'number one', **kitali yo ← kital(y)ey yo ← kitalye yo** 'waits', **kitali ya ← kital(y)ey ya ← kitalye ya** 'only by waiting', **cikhi ya 'nta ← cikh(y)ey ya 'nta ← cikhye ya hanta** 'must maintain'; **kasi yo ← kasey yo ← kasye(y) yo** '(someone esteemed) goes'; **··· i yo ← ··· (y)ey yo ←**

··· ye yo ← ··· ie yo 'it is'; hwuli chinta ← hwuley chinta ← hwulye chinta 'lashes, whips'.

We also find pairs of words in which one member, usually the more common form, has a front vowel either after c(h) or before a syllable that contains i or y. Examples: achim, achum 'morning'; ilccik(-i), ilccuk(-i) 'early'; ayki, aki 'child'; teyli-, tayli-, tali- 'take (someone) along'; kitayli-, kitali- 'wait'; yēyki, yāyki, iyaki 'story, talk'; tay(n)ni-, ta(y)ngki-, ta(n)ni- 'go back and forth regularly'; caymi, cami 'fun'; hayk.kyo, hak.kyo; teyngi, tengi 'lump'; hayngkil (← hangkil §2.7.1) ← han-kil 'street'. Notice also meychil 'how many days' < myech-(h)ul, not to be misinterpreted as containing the Chinese il < ˙Q̇ı̇Ltext Q 'day'. More complicated explanations are needed to account for taynchu = tanchwu 'button', weynsswu = wensswu 'enemy', mayntunta = mantunta 'makes', oynthong (or weynthong) = ōn-thong 'entirely'. The adjectival noun weyn-man hata 'is fairly good' is a reduction of wuyen-man hata. Where it causes no confusion the assimilated form has been standardized as the spelling for some of the words. One of the vexing problems is with a large group of voice-derived verbs (causatives and passives) in which a vowel of the stem is often assimilated, and there are back formations "correcting" a legitimate /i/ to /u/ (or, after a labial, /wu/). In question are words like cwuk.i- 'kill' (often pronounced cwiki-) from cwuk- 'die', mek.i- (often meyki-) from mek- 'eat', sok.i- 'cheat' (often soyki-) from sok- 'be cheated'. In the appropriate part of Appendix 1 there is a comprehensive list with cross references from the spoken assimilations or back formations to the standard written forms.

The word soycwu ← socwu < ¨sʏwow-¨cʏwuw 'hard liquor' may reflect metathesis of the glide and/or assimilation. But sōy-koki < ¨sʏwoy-kwo˙ki 'beef' is contracted from *˙sʏwo ˙oy kwo˙ki = so uy koki 'meat of the ox' (CF LCT 1971:223; the accentual anomaly is unexplained). For the compound talk 'chicken' + al 'egg' the expected pronunciation would be /takal/, but instead the standard written form is talk yal (spelled phonemically tal-kyal), and that seems to come from talk [u]y al /talk[e]yal/ < tol˙k oy ˙al 'egg of chicken'. Common variants include talk eyl, talk ayl, and talk yayl. (The possibility of a form like *talk yeyl is excluded by §4.3.) Perhaps similar is the pronunciation /silye/ for /sile/ silh.e 'I dislike it', which is popular today among young women in Seoul, but seems to have been around for a while (1936 Roth 185 gives silh.e / silh.ye). Yet no other ···lh- has that sort of variant: /kkulye/ means only kkulh.i-e 'boil it' and kkulh.e 'it boils' is pronounced /kkule/. It might be thought that the intruded palatal glide of /silye/ is due to the i of the preceding syllable, but there is an attestation of sulhye in 1887 Scott 63, apparently made on the earlier version of the stem, which was ˙sulh-: kaki sultha 'I don't care to go' (1887 Scott 80). One explanation might be a shortening of sul ho.ye > sil-h[ ]ye, with the irregular infinitive ho.ya / ho.ye of °ho- > ha- 'do', for which the attestations of sul-ho.ye (1676 Sin.e 9:10b), sul-˙hu˙ye (1586 Sohak 5:9b), and earlier ˙sul-˙ho˙ya (1447 Sek 13:18a) provide support. Compare modern cen-hye 'entirely' < cen + ha.ye and hāyng-'ye < hāyng-hye 'by chance' < hāyng < HHOYNG + ha.ye.

Less commonly i is substituted for u in attaching endings to stems that end in ···s-, ···ss-, ···c-, or ···ch-: wusina = wus.una 'laughs but', issina = iss.una 'there is but', chacina = chac.una 'finbut', cochina = coch.una 'follows it but'. The popular Seoul pronunciation til.ye 'ta ponta for tul.ye 'ta ponta 'peers into; looks (gazes) at' assimilates the first vowel to the following palatal syllable. A common phenomenon, especially in the north, is the reversal of ye to ey: pey for pye 'rice plant', making it a homonym of pey 'cloth' and also of the pey which is a variant of pay 'boat; stomach' for those who do not make the ay ≠ ey distinction; Phey(ng)yang for Phyengyang (name of city — often spelled "P'yang" in the headlines of English-language newspapers in Korea); peyng(w)en < pyēngwen 'hospital'. The written word myech 'how much' is usually pronounced meych even in Seoul, and it is so written here.

2.8. Standardization variants.

A number of words appear in several shapes, either phonemically or just orthographically, and they reflect different notions of what is "standard" Korean. In some cases, the words are isolated instances, in other cases they reflect more general problems. There is considerable agreement among the Korean grammarians, in both the north and the south, on most of the isolated cases and on many of

the general problems. Where my own observations of current standard usage agree with the decisions of the Korean grammarians I simply use their spellings without comment. In other cases, I have spelled out my differences of opinion, as in my preference for **tat.e** (etc.) over **tat.a** as the infinitive of **tat-** and of **hay** over **ha.ye** as the infinitive of **ha-** (§1.9, §9.3) and my preference for **-tuni** over **-teni** as the retrospective sequential (see the entries in Part II). I have been somewhat crankier than the Korean grammarians in insisting on distinctions between **iya** (particle) and **ia** = **ie** (copula infinitive), between **iyo** (particle) and **io** (copula); with most of them, I deplore the writing of intercalated "**y**" within forms of the copula ("**iye**" for **ie** etc.). But I appreciate the difficulty faced in making these decisions and recognize that most people prefer to write the intercalated **y** within inflected forms without worrying about the internal structure, since the contraction of (···)**ie** is (···)**ye**. In general, I frown upon the widespread writing of words and phrases in abbreviated forms, since that obscures the grammar and often leads to confusion. In this book I have used an apostrophe to indicate omitted letters, as in '···· = **i-** or **ha-**. In some cases, current South Korean orthographic practice is at variance with the North Korean and those differences I have shown by superscript letters, as follows:

This book	North Korea	South Korea
1. iss.�ˢup.nita 'is'	iss.sup.nita[1]	iss.up.nita[2]
iss.ˢo 'is'	iss.so[3]	iss.o
2. anʰay 'wife'	anhay	anay
3. ŏlʰ-paluta 'is upright, ... '	olh-paluta[4]	ol-paluta
4. uʸlyey 'usually'	uylyey	ulyey
5. mʸĕy [Chinese morphs]	mey	myey
phʸĕy [Chinese morphs]	phey	phyey

(See §4.3; also §§1.5-6.)

[1] An example appears in Mkk 1960:4:26 [sic].

[2] But the 1988 revised rules of the Ministry of Education abolishes the spelling "**-up.nita**" and writes **-sup.nita** whenever a consonant precedes. Presumably **-ˢo** is to be treated similarly; the published rules neglect to inform us of that.

[3] CF Mkk 1960:3:26.   [4] Pronounced /ŏlpalu-/ according to NKd.

Earlier I had included here "**mopˢsi**" 'very', a word that has been spelled both **mopssi** and **mopsi** in South Korea but only **mopsi** in North Korea, which disregards the etymology: **mŏs** < ¯**mwot** + **-(p)ssi** < *ˈpsi*, derived adverb < **(-p)ssu-** < ˈpsu- 'use'; CF **mopssul** 'useless, no good' from the prospective modifier. But since the South Korean linguistic authorities, too, mostly favor ignoring the etymology, we will write **mopsi** and treat the adverb as opaque. (¹Yi Ungpayk 1961 gives the first vowel as long for both **mopsi** and **mopssul**, reflecting the etymology, but that length is not reported by other sources.)

The past **-ess-** and future **-keyss-** behave, of course, like **iss-** in group 1; many South Korean grammarians agree with the North Korean spelling reflected in the superscript ˢ, but in practice the other spelling is more widespread in the south. We assume here that **-sup.nita** and **-so** are being used after ALL consonant stems. If the less standard versions **-up.nita** and **-uo** are being used throughout, then they should also be used after **ss**. That is, if you say **mek.up.nita** it makes sense to write **iss.up.nita**, but if you say **meksup.nita** it would be more consistent to write **iss.sup.nita**. The important thing is to use one or the other consistently (CF §9.2). Notice also the remarks on superscript ¹ and ⁿ (§1.6).

There are a few words which, though historically ···nn···, are actually pronounced ···ll··· (as if coming from ···n.l···). In South Korea the spellings have been standardized as ···n.l···, but in North Korea the historical spellings are used, despite the irregular pronunciation. We write ···n.¹n··· :

This book	North Korea	South Korea	Pronunciation
kŏn.¹nan 'difficulty'	konnan	konlan	/kŏllan/
han.¹nan-kyēy 'thermometer'	hannankyey	hanlankyey	/hallangkey/ (§4.3)

In parts of the north there are speakers who substitute ll for nn in various words, such as **allyeng** for **annyeng**. In Anpyen and Tek.wen of South Hamkyeng **tullunta** is used for /tunnunta/ < **tut.nunta** 'hears' (Kim Yengpay 1984:53).

There are other spellings that vary from the current spoken usage in Seoul:

1. The noun **iyaki** 'story' is usually said as **yāyki** or **yēyki**.
2. The gerund **-ko** and the particle **to** are usually **-kwu** and **twu**, even in the speech of people who do not substitute **wu** for **o** wholesale. (CF §2.2.)
3. Less generally recognized is the substitution of **e** for **a** in many common words: ⋯ **henthey** for ⋯ **hanthey** (particle), **hekwu** for **hakwu** for **hako** (particle), **he(n)ta** for **ha(n)ta** 'does; is'.
4. The verb stem for 'stand' is written **se-** but pronounced **su-** even by Seoul speakers who do not ordinarily substitute **u** for **e** (except in **-tun** for the written **-ten**, noted earlier). The verb stems written **phye-** and **khye-** are pronounced **phi-** and **khi-** in Seoul; the stem written **kenne-** is pronounced **kēnnu-**. The spellings in this book conform to the Seoul pronunciation.
5. An artificial spelling distinction: **olun** 'right (in direction)' ≠ **olh.un** 'correct'. See §5.3.

I have followed the Korean grammarians in assuming only one standard treatment of the l-doubling vowel stems (§8.3.1), such as **pulu-** 'call' and **molu-** 'not know' with their infinitives **pulle** and **mōlla**, but many otherwise standard speakers double the l everywhere, pronouncing the stems as **pullu-**, **mollu-**, etc. I have also followed the grammarians in the standard version of the intentive **-ulye / -lye**, with a double ll only when attached to the extended stem of the l-extending vowel verbs (**wūllye** 'about to cry' from **wū-l-**), but many speakers use a version with a double ll everywhere: **-ullye / -llye**. For such speakers we will have to say that the ending attaches, in the shape **-llye**, to the UNextended stem of the l-extending vowel verbs. And many of those speakers use the vowel **a** instead of **e**: **-ullya / -llya**.

There seems to be confusion among Korean grammarians over whether to spell **-ulq ka** as "**-ulka**" or "**-ulkka**". Some would like to treat anything that appears after a verb stem as an unanalyzable ending, to be written phonemically. (Compare the remarks on **-un ya** in §1.9.)

For a fuller discussion of problems of standardization, see Martin 1968.

2.9. Intonations.

The following statements about intonation follow the analysis in Martin 1954 (= KM). Every phrase or utterance of more than one syllable has a gradual nondistinctive rise throughout until the onset of a particular intonation, which occurs near the end of the phrase and in conjunction with a pause. The meaning of statement, question, suggestion, and command are sometimes carried (in whole or in part) by the intonation, but often these meanings are wholly or partly expressed by morphs in the ending of the verb form.

Seven intonations are recognized for Seoul speech:

1. PERIOD intonation (.): a fall, beginning on the third, second, or last syllable from the end of the sentence (if on the last syllable this intonation is homophonous with 4).
2. COMMA intonation (,): a rise on the last syllable of a phrase.
3. QUESTION-MARK intonation (?): a rise on the third, second, or last syllable from the end of the sentence (if on the last syllable the intonation is homophonous with 2).
4. EXCLAMATION-POINT intonation (!): a quick fall on the last syllable of the sentence, often accompanied by a voice qualifier of overloudness.
5. DOUBLE QUESTION-MARK intonation (??): a dip on the third, second, or last syllable from the end of the sentence (homophonous with 7 when on the last syllable).

6. DOUBLE EXCLAMATION-POINT intonation (!!): a dip on the third, second, or (rarely) last syllable followed by a fall on the next (rarely, the same) syllable.

7. TRIPLE-DOT intonation (...): a dip on the last syllable of a phrase or sentence, often accompanied by a voice qualifier of overlength.

Three phonetic features are involved: rise, fall, and dip. The dip can be described as a fall immediately followed by a rise. King tells me children use ... **hanta** as an exclamation with dip and rise (ha$_n$**ta**).

The question-mark intonation primarily means QUESTION; the exclamation-point intonation shows INSISTENCE. The meaning of the double question-mark is RHETORICAL QUESTION or LIVELY, and that of the double exclamation-point is LIVELY AND INSISTENT. The comma intonation signals TEMPORARY SUSPENSION and the triple-dot intonation expresses HESITATION. The period intonation is the sentence-final default when no other intonation is called for. The intonations marked ?? and !! seem to be peculiar to Seoul speech and are largely limited to casual statements of the -ci (yo) type, but occasionally occur with other sentences, as in **Ani (yo)!!** 'No'. For examples of the intonations in various types of sentence, see KM 62.

2.10. The earlier phonology.

Korean of the 15th-century Hankul texts, called (Late) Middle Korean and here dubbed "MK", differed from the language of the 20th century in offering a somewhat richer pattern of sounds and strings of sounds. We can explore the earlier system through the Hankul spellings, making inferences about the articulatory values of the written syllables and the environments where the same string of phonemes was written in varying ways or where different strings were written as if they were the same. From the dates of the texts carrying critical examples we deduce the relative timing of changes in the articulatory habits of Korean speakers over a period of four or five centuries. From the patterns found in the earliest Hankul texts we can surmise changes that must have taken place over the preceding hundred years or so, and reconstruct patterns for that period with relative confidence.

Putting the accent patterns aside for separate study (§2.12), we will seek to date the changes in: (1) the vowel system = syllable nuclei, (2) the initials = onsets, (3) the finals = codas, and (4) the intersyllabic strings = interludes.

What clues we have to the pronunciation of Korean earlier than the 15th century, beyond what we can obtain from internal reconstruction, are words written by means of Chinese characters, for the most part intended as phonological representations of the Korean words. Interpreted in terms of the MK pronunciations of the characters, the forms show few surprises, and there is little to suggest that the system of sounds was drastically different from that recorded by the early users of Hankul.

2.10.1. The earlier vowels.

The earlier language had a vowel system similar to the modern system but with the addition of the low back (and functionally unrounded) vowel *o*. In dialects other than that of Ceycwu the extra vowel was lost and merged with other vowels. In noninitial syllables *o* merged with its higher counterpart, the high back unrounded *u*; that merger began in the 15th century and for the central dialect of the texts it was completed during the 16th century (CF LKM 1972a:118). With the exception of a few words such as *holk* (*hol´k o´lwo* 1518 Sohak-cho 10:23b) > *hulk* (*hul´k ulwo* 1586 Sohak 6:122a), in word-initial syllables what *o* merged with was *a* but under certain circumstances in certain dialects *o* was replaced by *wo* – in Phyengan (Kim Yengpay 1984:67) before a labial consonant or a syllable with a rounded vowel so that *´nom* > **nom** 'other person' (nam) and *non´hwo-* > **nonwu-** 'divide' (nanwu-). The standard language includes a few such cases: *´so´may* / *´so´moy* > **swomay** (1617) > **somay** 'sleeve'. And there are also several words where *o* became e, such as ... *´pol* 'time(s), layer(s)' > **ay pel** 'first (in time / order)', *pol´(s)sye* / *pol´sye* > **pelsse** [dialect palsse] 'already', *po´li-* > **peli-** 'discard', *to´li-* > **teli-** [dialect] > **teyli-** 'bring a person along'. (The regular development for the verbs is found in the dialect versions **pali-** and **tali-**.) Writing the old vowel, called *a´lay o* = **alay a**, persisted in conservative spellings long after its distinctive value was lost. As [1]Yu Huy (1824 Enmun-ci 12) observed, "*o* is confused with *a* (as ʌ 'child', sʌ 'fact') or with *u* (as *hulk* 'earth')". Symbols were

created to write the syllables *yo and *yu, though the sounds did not exist in the language of the writers of the early texts. It is surmised that those syllables had existed in a pre-Hankul version of the language and were lost in the central dialect not long before the creation of Hankul in 1445. There is evidence in dialect forms to reconstruct *yo for a number of words.

The created symbols are found in "ㅛ kyo ㅠ kyu" (1446 Hwun 26a); later the letters ᆢ yo and ᆢㅣ yoy were created and exemplified with the syllables ㅛ kyo and ㅛㅣ kyoy (?1750- Hwunmin cengum wunhay 16a), and still other symbols such as ㅛㅑ yw(y)a and ㅛㅕ yw(y)e were used to write Chinese sounds. CF Ledyard 1966:253, LKM 1972a:126.

In the 15th century the vowels ey ay oy uy were articulated as diphthongs, and wey way woy wuy were treated as triphthongs. For woy and wuy this statement may be questioned, since we assumed that the Hankul symbols corresponding to the digraphs wu and wo of our Romanization represent simple rounded vowels, unlike the diphthongs represented by wa and we. But I am now prepared to revise that assumption and propose that the rounding represents a functional semivowel even in wu and wo.

Later the diphthongs got monophthongized, but the syllable uy itself, which had become u when initial and i when not, was partially restored at the beginning of a word as the dissyllable ui by younger educated speakers following the spelling tradition for the Chinese morphemes it represents. The modern pronunciation of the genitive marker as /ey/ (the same as the locative marker) may reflect a raised version of /ay/ from the MK allomorph ˙oy rather than a lowered version of * /i/ < ˙uy itself. The triphthong wuy became the diphthong wi, further monophthongized to a high front rounded vowel [ü] by some speakers. The triphthong way was reduced to the diphthong way [ɟͨe], and that was further monophthongized by some speakers to the relatively rare articulation of a low front rounded vowel [ɶ], just as wey > wey was monophthongized by some to the mid front rounded vowel [ö]. In modern Seoul ay has merged with ey except when word-initial, where the distinction is maintained. In much of the south the two are merged in all positions, and so are u and e. It is hard to say just when the process of monophthongization took place in various parts of the country. The diphthongs can still be heard as such in parts of Hwanghay, as noted in §2.2, and probably elsewhere, too.

The unrounded u was distinguished from wu even after labials (p ph pp m) until about 1748, but then the vowel was assimilated to the labial, so that the modern mul (with "u" an abbreviation of /wu/) represents the two distinct MK syllables ˙mul 'water' and ˙mwul 'crowd' (for which the modern word is muli, with the accretion of the suffix -i).

It is generally assumed that earlier the modern back vowels u and e were articulated nearer (if not all the way to) the front of the mouth. The Seoul pronunciation of u today, in fact, is fairly far forward (central rather than back), and the sound of e has moved lower and toward the back, getting rounded to something like [ɔ], which approximates the sound we assume for the lost MK vowel o. Kim Wancin has proposed that the MK vowels were quite different from the modern values (in all dialects) because a Great Vowel Shift took place. He claims that the shift moved to the back of the mouth those vowels that once were front and that it raised an earlier mid-central shwa *[ə] to the value of the modern u, while the former *[e] shifted back to the shwa position which is still heard for e in many dialects, though Seoul has moved the vowel on toward the back low rounded version, apparently during the past fifty years. Linguists in Korea generally accept the notion of the vowel shift, it seems, but do not agree on its timing. Together with some of them, I favor retaining values for the vowels of the 15th century that are close to the modern values, while I reserve judgment on the validity of the vowel shift at an earlier period.

2.10.2. The earlier initials.

The language of the 15th century had all the initials of modern Korean with the exception of the initial geminates pp tt kk cc ss. In addition the scribes wrote several kinds of clusters. There is general agreement that initials spelled "pC-" began with a labial stop. And everyone assumes that there was an oral obstruent at the beginning of the odd word sna˙hoy (1447 Sek 19:14b) 'man (male)', probably contracted from sona˙hoy (not attested until perhaps 1517), the source of modern sanay, though some (such as LCT 121a) would interpret this as [tn] rather than [sn]. Yet many scholars (including LKM

1963:19) have doubted the face value of the initial sibilant written in the clusters "*sp-- st-- sk--*" and claim that these strings had a pronunciation identical to that of later "*pp tt kk*", the tense and crisply unaspirated stops we refer to as "reinforced". The geminate spellings of these initials were used in the earliest texts only to present somewhat artificial readings for Chinese characters, in an attempt to capture Middle Chinese distinctions that were ignored in nativized borrowings. They were sometimes used also for phrase-internal strings that represented the prospective modifier -$(^{u/o})lq$ + a voiceless obstruent initial in the following word (especially when it was not a free noun), though these strings were also given other treatments: (1) they were simply ignored, as often in 1481 Twusi and in modern Korean; or (2) they were written with a cluster of final *l* + *q*, a symbol which otherwise wrote the glottal-stop initial of traditional Chinese readings. And the digraphs *ss* and *hh* were used not only to maintain traditional Chinese distinctions but also to write the initials of a few native words that had perhaps incorporated an emphatic prefix. The only such examples of *hh--* are the verb stem *(h)hye-* 'pull; ... ' and compounds that incorporate it. I believe that by and large the textual spellings of native Korean words must be taken at face value, and that when the scribes wrote geminates, including the *ss--* and *hh--*, they were pronouncing them tense and with the same crisp release into the vowel that is heard today. When they wrote *sC--* (or *--s C--* or *--s--*) they heard a sibilant articulation. The initial clusters include not only the groups *pt-- pth-- ps-- pc--* (no **pk--*) and *sp-- st-- sk--* but also *pst-- psk--*. Those reluctant to allow the sibilant clusters treat these as equivalent to *pt-* and the missing **pk--*. But that makes it hard to explain the spelling contrasts found in ˙*ptoy* 'dirt', ˙*pstay* 'time', and ˙*sta[h]*, to say nothing of the many strings that attach the genitive particle *s* in a phrase *N s N* to either the preceding or the following noun, or run the words together with no junctures, as indicated by variant spellings (see Martin 1982/3 and ?1991). LKM, however, rejects the notion that reinforcement in obstruent clusters was automatic in the 15th century (as it is today) and upholds the view that the orthographic *pt--* contained a lax apical stop in contrast with the tense version in *pst--*. I believe that the "*sC--*" clusters were pronounced with a sibilant both when initial (as syllable onsets) and when medial (as interludes). The obstruent after the sibilant was unaspirated (as in modern English) and identical with the reinforced obstruents of modern Korean, so that we can think of them as "*spp stt skk*". The tenseness of the obstruent is a feature of the clustering of two obstruents, of which the minimal case is two identical obstruents, the geminate *pp tt kk cc ss*, as indicated by spellings such as *--l ˙tta* for *-lq ˙ta* 'will you -- ?'. What happened later (in the 16th century) was simply a suppression of the *s* that left the tense allophones of the simple stops newly standing in contrast with the lax allophones that were now the only version of *p t k* and also *c* and *s*. The change was probably gradual and took place as the corresponding interludes became *--tC(C)--* in accordance with the merger of syllable-final *--s* and *--t* which slowly took hold in the course of the 16th century, after a few earlier harbingers. There was occasional dropping of *p* from initial clusters in a few attestations of the 15th century; by the middle of the 16th century that was more prevalent. The dropping of the sibilant in the *sC* (= *sCC*) clusters was probably complete by 1632, but it is unlikely that it started until the internal *-sC-* had become *-tC-* (= *-tCC-*) in the middle of the 16th century; it probably got under way around 1575. Not all of the modern geminate consonants go back to clusters as such; some were created later as emphatic versions of words, such as the sporadic appearance of forms noticed by Kim-Renaud 1977:92 in casual speech accompanying an emotional connotation. There were a few early verb doublets with *(s)C--* that are thought to reflect a similar connotation added by tensing the initial (id.:93, Ramsey 1978b:64), and the emphatic version is preserved as the modern stem: kkū(s)- < *skuzu-* (1463 Pep 7:91a) < *kuzG-* (1463 Pep 2:200b) 'pull', ccih- < *stih-* (1466 Kup 2:62b) < *tih-* (1459 Wel 17:19a) 'pound', ssip- < *ssip-* (1462 ¹Nung 5:46a) < *sip-* (1462 ¹Nung 8:138a) 'chew', ssu- < ˙*ssu-* (1447 Sek se:4b) < ˙*su-* (1465 Wen 2:2:2:41a) 'write'. The doublets have been used to buttress the argument that the *sC--* clusters did not contain a sibilant, at least in these words, but it is quite possible that an emphatic prefix may have had the sibilant pronunciation.

　　With respect to the readings of the Chinese characters, LKM 1963:20 says that up until 1480 the orthography used experimental elements, but then gave them up and simplified the spellings to be more

natural. He finds that the natural readings began with 1496 Cin.en kwenkong, since 1481 Twusi gave
no readings for the many Chinese characters it uses. Perhaps that is why it is said that orthographic *w*
and *Q* were last seen in 1467. But that date is a bit too early, for texts from 1475-85 contain examples:

- *··W*   ·*KYWOW-*¯*SYWUW* (1475 Nay 2:2:69b) 'teach', ¯*TTWOW* (1482 Kum-sam 2:3a) 'way',
    PPEN-¯*NWOW* (1482 Nam 2:6ab) 'agony', ¯*PPWU-*¯*MWUW* (1485 Kwan 7b) 'parents'
- *Q··*   ·*QILQ-*·*POYK* (1475 Nay 2:2:72a, 73b) '100', ·*QILQ-SOYNG* (1482 Kum-sam 2:1b)
    'life', ·*QAK* (1482 Nam 1:77a) 'evil', ·*LI-*·*QYEK* (1485 Kwan 1a) 'gain'
- *··LQ*   *CIN-*·*SSILQ* (1475 Nay 1:47b) 'true', ·*QILQ-*¯*TTI* (1482 Kum-sam 5:18a) 'one
    ground', ·*KAK-*·*PPYELQ* (1482 Nam 2:63b) 'particular', ·*HWOLQ-ZYEN* (1485 Kwan
    9a) 'suddenly'

And it should be noted that 1481 Twusi wrote *··lq C··* in at least one passage: *··* ·*se nilGwuylq* ·*ta*
(23:44a) 'will you be able to achieve the writing of ... ?'. But usually the reinforcement after the
prospective modifier was simply ignored by this work and later texts, with occasional exceptions: ¯*kin
[KWA-*·*KUK]* ·*ul* ¯*mal kkwo* (1481 Twusi 10:27b) 'will they give up the long spears?'; ¯*hwol* ·*tt i.n i*
·¯*la* (1588 Mayng 13:1b) 'will do'. There are examples of *··lq C* in virtually all of the texts from 1445
to 1462; and also ⁇1468⁻ Mong, with *··lq t*, *··lq c* (15b, 24a), *··lq s*, *··lq st*, and even *··lq h* (5b); and
one exceptional case in 1475 Nay (*puthulq* ·*ka* 1:2a). But 1463 Pep, 1463/4 Yeng, 1464 Kumkang, and
1482 Kum-sam have only *··l CC* for *··*lq C*, and the reinforcement is totally ignored by 1465 Wen,
1466 Kup, 1482 Nam, and 1485 Kwan. The texts that use *··lq C* also have examples of *··l CC* to
varying degrees, but the admirably morphophonemic spelling of 1449 Kok has only *··l* ·*ss oy* and *··l*
·*ss ye* (it lacks an example of *··*lq s*), and uses *··lq C* for all other cases. The glottal was also used by
one or more of the texts in *··lq st*, *··lq sk*, *··lq psk*, *··lq pst*, *··lq pt*, *··lq th*, and *··lq kh*. Since in a few
instances it was used even before a voiced initial such as *n* or *wo*, the second symbol of the *··lq* string
perhaps sometimes reflected nothing about the pronunciation, but just helped identify the ending.

A number of Hankul-written words began with initial *l··*. Some, such as ¯*lwongtam* 'joke' and
lwo·*say* 'mule', are known to be of Chinese origin; and others, such as *la*·*kwuy* 'donkey' and *le*·*ngwul*
'raccoon-dog' are probably borrowings from Mongolian and Tungusic languages. The adnoun *la*·*won*
(1463 Pep 5:202b) 'joyful' − ·*lawon* in 1481 Twusi 7:25 − may be a contraction of ·*LAK* ¯*hwon* ' *··* that
is joyous'. The *l··* in these nativized borrowings and the many Chinese words beginning with *L··* were
probably not distinguished from *n··* by most Koreans of the 15th century, just as the two initials were
not kept apart later: the Chinese loanword *LOY-*·*ZILQ* (1459 Wel 7:16a) '(to)morrow' was assimilated as
noy·*zil* (1482 Nam 1:40b). But there may have been speakers who kept initial *l··* distinct from *n··*:
1898 Tayshin has [rasil] for 'tomorrow'.

An initial *z··* occurs in a few nativized borrowings from Chinese, such as ·*zywoh* 'mattress'
(Middle Chinese nhywok), as well as in readings of Chinese characters, always as *ZY··* or *ZI··*, and a
couple of mimetics (*zel-zel*, *zem-zem*). The origin of ·*zywuch* > *yuch* 'the four-stick game' is
unknown, but I suspect that the shape was earlier *nywusk or *niwusk, in view of the Hamkyeng
dialect versions (**nwus, nyukku, nyukkwu, nyukki, yukku, yukkwu, yukki, yuchi**); a variant of
ne(yh) 'four' may be the first part of the word. It is unclear whether, or how, initial *z-* (or *Z··*) was
pronounced, but it continued into the 16th century before eventually disappearing. Internal *··z··*
resulted from lenition of *s* (including *s* from *c), often at the end or the beginning of a morpheme or
forming a morpheme in itself. A few nouns seem to have had an intrinsic *··z··* that remains to be
explained, though I believe that they too contain lenitions from *s* or, in the following words, *c:
mozom > **maum** 'heart, mind', *kye*·*zulh* / *kye*·*zul* > *kyewul* 'winter', *kozolh* / *kozol* > **kaul** 'autumn',
... . (The second syllables of these words were written with affricate-initial phonograms in 1400⁺
Kwan-yek.) As Ramsey has shown, the *··z-* verb stems come from underlying *··z*⁴⁄₀*o-* (see §8.2.5), and
that in turn I believe is the result of leniting an *s*, under conditions as yet unclear. See §2.11.4.

In modern Korean a phonetic syllable can begin with the velar nasal provided it is between
vowels, but with a few marginal exceptions the *···ng* is final in a morpheme or in a syllable of a
polysyllabic morpheme. There are a couple of MK morphemes with the initial *ng··*: the polite marker

-ngi and a bound noun *ngek* 'place', as in *kunge῾kuy* (= **ku ngek ῾uy*) 'there'. But words and phrases did not begin with the velar nasal. The traditional initial *NG⸻* was written for Chinese readings, but when the words were nativized the initial was omitted, as was the glottal initial *Q⸻*. There are at least 25 examples of *NG⸻* that are illegitimate from the standpoint of seventh-century Chinese or of Sino-Japanese. Virtually all begin with *NGW⸻* or *NGYW⸻*, as in *NGWANG* 'king', *῾NGWUW* 'exist, have', and *῾NGYWENG* 'longlasting'. But a glide is uniquely lacking in the perfective particle *῾NGUY* (1451 Hwun-en 2a), and while Tung T'ung-Ho reconstructed a voiced velar fricative for the Old Chinese initial of this particle, Karlgren had treated it as *z*. The Old Chinese reconstruction for all the *NGW⸻* and *W⸻* words, based on shared graphic components in etymological sets, assigns them a voiced velar — a stop in Karlgren's system, a fricative in Tung's. The character meaning 'do; serve' has two readings in the texts: *NGWUY* and *῾WUY* (sometimes *῾῾WUY*), and the nativized version is *῾wuy* (1446 Sek 6:7b, 24a). The colloquial pronunciation of the 15th century lacked the means to cope with the prescribed distinction of *NGYEN* 'polish' : *YEN* 'extend' : *QYEN* 'smoke', or of *῾NGWUY* 'guard' : *῾WUY* 'position' (also *῾῾WUY*) : *῾QWUY* 'entrust' (also *῾῾QWUY*), with the resulting homonymy found in today's **yen** and **wi**. Kōno (1968:17) says that in Korea *NGA* was pronounced like *(Q)A*, presumably as /a/, from very early, since there is a (mis)spelling with the phonograms *NGA-TWO* for the name of the priest called *A-TWO* who came to Korea from China in 375. Quite a few nativized fish names end in *⸻nge* and that represents a retention of the initial of *NGE* 'fish' when not at the beginning of a word, as in *῾linge* (1518 Sohak-cho 9:25a) = *῾LI-NGE* (1466 Kup 1:52b) 'carp'; *chyenge* 'herring' (1799 ¹Nap-yak 27b) must go back to **CHYENG-NGE* (unattested as such, but see 1527 Cahoy 1:11a=20b), with the two nasals simplified to one. In the 16th century the symbol for the velar nasal came to be written only at the end of a syllable and fell together in graphic shape with the zero initial with which it was in complementary distribution.

2.10.3. Palatalization and dispalatalization.

In the 15th century the phoneme *c* and its aspirated counterpart *ch* were affricates, as they are today, but they were not palatalized. The realization of *c* was as [ts⸻] or (§2.10.6) [⸻dz⸻]. The palatalized articulations of the apicals in syllables such *tye thye cy chye sye nye lye* was an anticipation of the glide and must have been present also in *ti thi ci chi si ni li*, as contrasted with *tuy thuy cuy chuy suy nuy luy*. Because of examples of *hy⸻* and *hi⸻* that turn up in various dialects as s(y)⸻ and **si** we can probably assume that *hye* and *hi* (perhaps also the uncommon *hhye* and *hhi*) were palatalized. Later, all these articulations underwent divergent developments in different parts of the peninsula.

In the south the nonpalatalized affricates were palatalized: *ce* merged with *cye* and *che* with *chye*, so that there are two modern syllables **ce** and **che**, spelled "cye" and "chye" only when they are contracted from "cie" and "chie". Then the palatalized stops were affricated: *tye* and *ti* merged with *ce* and *ci*. (The modern Seoul **ti** is a monophthongization of *tuy*, a raising of **tey** in specific words, or the result of borrowing foreign words; and **tye** is for the most part a shortening of ti(y)e < *tuy(y)e*.) The syllable *si* was made or kept palatal (a single frontal articulation, so not to be described as "palatalIZED"); *sye* got dispalatalized and merged with *se*, but was reintroduced to represent the shortening of si(y)e. At the beginning of a word, *ny⸻* and *ni⸻* (including *ly⸻* and *li⸻* pronounced as *ny⸻* and *ni⸻*) dropped the apical articulation and merged with *y⸻* and *i⸻*, and they are so written in the standard orthography of the south. Modern Seoul word-initial **ni** is the result of monophthongizing *nuy*, raising the **ney** of specific words, or foreign borrowing. The suspective ending in Phyengan is **-ti** from MK -῾*ti*, though the influence of Seoul has made the palatalized version **-ci** quite popular (Kim Yengpay 1984:100).

In much of the north the affricates stayed apical, with no frontal coarticulation except before *y* or *i*. But in those cases there was an erosion of the palatal quality: *cye* merged with *ce*, and *tye* with *te*. The dispalatalization extended to *nye* and *lye*, which were not differentiated from *ne* and *le*, with the result that ⁿ*yeca* 'woman' is pronounced **yeca** by southern speakers but **neca** by many in the north, where the spelling is standardized as "nyeca" instead of the southern "yeca". Internally, Phyengan has **swulo** for **swulyo** 'completing a course' and **illwu** for **illu** 'topnotch' (Kim Yengpay 1984:69).

We are not sure just when these changes happened, though the affrication of *ti* and *ty* seems to have taken hold around the turn of the 18th century (LKM 1972a:67-8). For the nasal, there are words that have individual histories, and a few doublets existed already in the 15th century. The verb stem **ⁿyeki-** 'deem' was written *nye˙ki-* in 1481 but earlier the spelling was *ne˙ki-*, a form that persists in 1936 Roth 37, no doubt the result of his hearing of South Hamkyeng speech. The verb *neh-* 'put in' appears as early as 1466 (Kup 1:13a, 2:41b) but the prevalent version was *nyeh-* (as in 1447 Sek 9:21a), which led to modern **yeh-** in Kyengsang (and elsewhere); yet here Seoul uses the glideless version **neh-** heard widely in the north. In the word for 'yes' Seoul also follows the northern form **nēy** rather than the southern **yēy**. 1894 Gale writes (95) *niaki* 'story' (**iyaki** > **yāyki** > **yēyki**) and (165) has the passage "*yeng ila howo* it is called 'nyeng' (mat)" − note the initial "ny" in the gloss − which must be a contraction of **(n)ieng** 'thatching', derived from *˚ni-* > *˚ni-* > **nī-** 'thatch (a roof)'.

1902 Azbuka kept *sy* [š] distinct from *s*, as did 1900 Matveev; and 1898 Tayshin "*tsiui*" < MK *˙cwuy* 'rat' seems to intrude the glide *y* without palatalizing or deaffricating the *c* [ts]. (Azbuka has *hāysye* ? < *hāy [i]sie* for 'did'.) 1894 Gale 65 gives *-l syeng pwuluta* and *-l syeyta* 'it is likely that' (= **-ulq seng siph.ta**).

Among early signs of palatalization: fronting of the vowel in *a˙cik* (1463 Pep 1:14a, ...) < *an˙cok* (1447 Sek 6:11a, 1463 Pep 1:44a, ...) 'yet' (? < **a˙ni cek* 'not time'), *˙ho.yem ˙cik* (1518 Mayngca 14:21b) = *˙ho.yem ˙cuk* (id. 14:16a) 'worthy of doing', *achim* (1736 ⁿYe-sa 3:9; cited from LCT 522b) < *a˙chom* (1447 Sek 6:3b) 'morning'; the doublet *wum˙chi-* (*wum˙chye* 1462 ¹Nung 2:43b) = *wumchu-* (*wum˙che* 1462 ¹Nung 2:40a) 'huddle, shrink'. Notice also, without affrication, *ti˙s ˙'i* (1449 Kok 43) = *˙to˙s ˙'i* (1459 Wel 10:20b) 'like'; *kile˙ki* (1568 Sohak 2:49a) = *˙kuy˙lye˙ki* (1527 Cahoy 1:8b=15a) = *kulye˙ki* (1462 ¹Nung 8:121b) = *kulye˙kuy* (1459 Wel 2:40b) 'wild goose'. On the other hand the front vowel of **silh.ta** is not attested until quite late; 1894 Gale (177) has *sulkhwo* 'disliking' < *sulh-* < *˙sul ˙ho-*. Yet (99) he writes *nucin* for **nuc.un** 'late' and offers the option of *hol sti* (= **hal tti**) or *hol ci* (= **hal[q] ci**) 'whether to do'; in *--ul ci entyeng (to)* (64) he has both affricated *ci* < *˙ti* and unaffricated *ty--*, if the representations are taken at face value. But there are examples of *t* and *th* in *?1517- ¹No* that are affricated in the Kyucang-kak version of 1795 ¹No-cwung though not in the Phyengyang kam.yeng version, which is older in its language: *"tywo˙hi* (*?1517- ¹No* 2:66a) = *tywohi* (1795 ¹No-cwung [P] 2:59b) = *cywohi* (id. [K] 2:61b) 'nicely'. The same stem appears somewhat earlier in *cywoha ˙yla* (1763 Haytong 103); and the postmodifier *˙thyey* 'pretense' is written *chyey* as early as 1730 (Chengkwu yengen 92). Examples of *c* written for *ty* and *chy* for *thy* are found in 1632 Twusi-cwung, according to An Pyenghuy 1957.

Palatalization of velars also took place, mostly in Kyengsang and Hamkyeng. King 1988b:291 finds seven examples of velar palatalization [k] > [tš] in 1900 Matveev, including *ciwo* 'long' = **kio** < **kī-l-**, *cilumi* 'butter' = **kilum** 'oil, grease', *ciley* 'on the road' = **kil ey**; also, with simple affrication [k] > [ts] for the /c/, *cili* = **kil** 'road'. The word **kimchi** 'pickled cabbage' is a back formation (by false analogy) from **cimchi**, widely heard in the south (and also in Hamkyeng), the expected palatalization of *tim˙choy* (1527 Cahoy 2:11a=22a) from Chinese *TTIM-"CHOY* 'soaked vegetables' (LCT 1971:46). A similar hypercorrection is responsible for the development of **cēmsim** 'lunch' into the dialect variant **kyemsim**, which appears in 1894 Gale 164 with the gloss 'dinner'. The word goes back to *[˙]tyemsim* (1518 ¹Ye-yak 38a) and comes from Chinese *"TYEM-SIM*, which refers to those Dim Sum tidbits that "dot your heart" at lunch time. A similar case: *kyel* (1898 Tayshin) for **cel** < *tyel* 'temple' (King 1988b:295:n18). Dialect **chi** corresponds to standard **khi** for three nouns: 'winnow' (*˙khi*), 'height' (*˙khuy*), and 'rudder', which has only the variant *˙chi* in the earlier attestations (1527 Cahoy 2:12b=25b "*mis* also *chi*" − of *mis* nothing more is found, perhaps < *"mi[l] s* 'pusher'). (1874 Putsillo also attests *chi* 'rudder'.) So the standard version of **khi** for 'rudder' seems to be yet another hypercorrection. Putsillo has *kina-* for **cīna-** < *"ti-°na-* 'pass by'.

For **Cye(···)** the palatal quality is often shifted from the consonant to the vowel, metathesizing the glide so as to produce the mid front monophthong of the modern language: **selmyeng > selmeyng, Phyengyang > Pheyngyang**, ... (King 1990 has examples that argue for **ye > yey > ey** with loss of the initial glide after the fronting took place, rather than metathesis of the glide.) In Phyengan (Kim

Yengpay 1984:69-70) *c(h)ye* > **c(h)ey** with nonpalatal [ts-], and *sye* > **sey**; *hy*⋯ dispalatalizes to **h**⋯ in general, as well as in **hey-** 'ignite' < *(h)hye-* (standard **khye-** = **khi-**). The word **myech** 'how many; a few' is widely pronounced **meych** and that is the way we write it for the modern language in this book. The dispalatalization of the syllables **m^{y}ey** and **ph^{y}ey** is recognized by the NK orthography but not by the standard spelling in South Korea. Both maintain a distinction of **kyey** from **key** and **hyey** from **hey** that is no longer part of the spoken language.

2.10.4. Nasal epenthesis.

A small number of words have forms with and without a nasal before an affricate. There being nothing obvious about affrication and nasality that would motivate a sporadic insertion of that sort, we wonder whether the form with the nasal is not, in fact, the basic form. But for verb stems such as *a(n)c-* 'sit' and *ye(n)c-* 'put on top' several kinds of evidence led LKM 1964 to the conclusion that the versions without the nasal are older.

Ramsey 1978a:54-6 gives a good description of the situation, and points out that for certain words the nasal insertion happened only after a non-affricate had become an affricate. Thus *te ̇ti-* 'throw' picked up the nasal of modern Seoul **tenci-** only after the syllable *ti* become **ci**. And *hwon ̇ca* (1518 Sohak-cho 10:6a) 'alone' did not have a nasal so long as it remained *howo ̇za* < *hoWo ̇za* < **hopo(n) ̇za* (see **honca** in Part II). Yet if the etymology is **ho[n] ̈pwun ̇sa* 'just one only', that already contains the nasal – and has another that is elided; but if the etymology is **ho[n] ̇po[l] ̇sa* 'just one layer', the nasal is not expected. The adverb **acik** '(not) yet' goes back to *a ̇cik* (1463 Pep 1:14a), which is attested also as *an ̇cik* (?1517⁻ ¹No 2:12a, ?1517⁻ Pak 1:64a) and *an ̇cok* (1447 Sek 6:11a, 1463 Pep 1:44a), a form surviving as the South Hamkyeng **an ̇cuk** cited by Ramsey, and it perhaps has the etymology **a ̇ni cek* 'not time'. If the nasal were original in all (or most) cases there would be no need to explain why it did not develop for more than a small number of the words with affricates. And the variable elision of the nasal could perhaps be attributed to whatever motivates the liquid elision before apicals, the MK suppression of stem-final *l* before *t n c s*. Somehow the nasal elision never happened to **mence** < *mwon ̇cye(y)* (also *mwon ̇coy*) 'ahead; earlier' in most of Korea, but one dialect in South Cenla has **mocye** (Choy Hak.kun 139). There was a nasal in an earlier attestation, according to the interpretation by Kim Wancin (1980:155) of the phonograms in hyangka 14:10.

The verb stem *a(n)c-* appears as *az-* or *as-* in the forms *as.non* (1447 Sek 19:6a) and *az ̇nwo ̇la* (1462 ¹Nung 1:3b) but that represents the reduction of the syllable excess (⋯*nc-* → ⋯*c-* > ⋯*s-*, different from the modern ⋯*nc-* → ⋯*n-*). If the stem had really ended in the lenited sibilant ⋯*z-* < ⋯*̇so-* we would expect the rising accent on the first syllable of those forms, as in the similar forms of 'seize': *ˇas.non* (1481 Twusi 22:49b), *ˇas.nwon* (1481 Twusi 16:68b), *ˇasno ̇n i* (1459 Wel 7:46b [*ni* miscarved as *na*]), *ˇasno ̇n i ''n i* (1462 ¹Nung 9:40a). Similar remarks apply to *ye(n)c-*: the forms without the nasal can be treated as reductions of ⋯*nc-*, with no rising pitch for *yes.no ̇n i ''la* (?1517⁻ Pak 1:56a) and a surprising initial high for *̇yes.non* (1481 Twusi 22:36b). All modern dialects have the nasal; Ceycwu alone is reported to have a doublet *aci-* / *anci-*. No modern dialect lacks the nasal for *enc-* (nor does any show initial *y*⋯). Putsillo 1874:572 has three forms with the nasal (*ansswo*, *ansswukuy*, *ansswukey*) and one without (*acuwo*). LKM observes that 1103 Kyeylim (#317) uses phonograms interpreted as "*a-cek-ke-la*" (for *anc.kela* 'sit down!') and 1400⁺ Kwan-yek (#349) used phonograms taken as "*a-ke-la*", both without the nasal, which could have been noted with a phonogram "*an-*", used by Kwan-yek to write "*an-ta*" (#389) for *ˇanta* (? = *a ̇no ̇ta* or = *ˇal ̇ta*) 'knows' or the one used by Kyeylim to write "*an(-h ay kwopoy)*" (#229) for *̇an ̇h oy kowoy* 'undergarment'.

There is an additional mystery. For the well-attested stem *mon ̇ci-* 'stroke' there are examples of a variant without the affricate: *mo ̇nye* (1459 Wel 21:133a), *mo ̇nisi ̇kwo* (id. 18:14a), ⋯ . Modern dialects all have the affricate.

NOTE: In the first entry of Ramsey 1978a:55 correct the Seoul form to **enchi** and the gloss to 'saddle blanket', corresponding to the earlier *enchi* (?1720⁻ Waye 2:17b) < *e ̇chi* (1481 Twusi 20:9b).

2.10.5. The earlier finals.

Koreans of the fifteenth century had syllables that, like the modern syllables, could end in a vowel or in one of the consonants *p t k m n ng l* but there were also syllables ending in an *s* that contrasted with *t* and was surely pronounced as a sibilant. Among the "overstuffed" morphemes were nouns and verb stems that ended in the affricate *c*, in the aspirates *ch kh th ph* and simple *h*, as well as clusters such as *lk lp lph lm nc nh sk* and a few others. The extrasyllabic element spilled over into the following syllable when an ending or particle beginning with a vowel was attached; otherwise (before consonant or juncture) it was reduced to one of the codas permitted to a syllable. In the case of simple *h* that meant it was dropped in the "free" form, so that *nwoh* 'rope' was pronounced (and written) *nwo* unless followed by a vowel-initial particle (*nwo῾h o῾lwo* 'with a rope') or by the copula (*nwo῾h i῾la* 'it is a rope'); but when a particle or ending beginning with *t* or *k* was attached, the basic *h* emerged as heavy aspiration so that *nwoh* + *῾two* was pronounced (and written) *nwo῾thwo* 'also / even the rope', and *nah-* + *-῾kwo* was *na῾khwo* 'giving birth'. Some texts, such as 1449 Kok, wrote the syllable excess morphophonemically so that *kwoc* 'flower', for example, was always written the same, while other texts wrote the phonemic form *kwos* when no vowel-initial particle was attached. But even the most generous of the morphophonemic spellers wrote the phonemic forms of phrases with those morphemes ending in a basic simple *h* and did so until quite modern times when (apparently around 1933) the "h-pat.chim" was invented. But by then the *h*-final nouns, dropping all traces of the *h*, had become ordinary nouns ending in a vowel (so that *no* 'rope' behaved like *no* 'oar') and only the verb stems required the h final. There is evidence for final *‑‑h*, presumably so pronounced, in earlier phonograms (1250 Hyangyak) for *῾mah* 'yam' and (1103 Kyeylim) for *῾cah* 'foot(rule)' and *pa[h]* 'straw rope'; there is no later direct evidence of the *h* in *pa[h]*, but King tells me the word is treated like other *‑‑h* nouns that are exempted from the umlauting rule in Hamkyeng. CF LKM 1972a:85-6.

The 15th-century distinction of *‑‑s* from *‑‑t* was lost during the middle of the 16th century (1576 [1]Yuhap 1:8 spelled "*sis namwo*" for the *sit namwo* 'maple tree' of 1527 Cahoy 1:5b=10a), so that in modern Korean the syllable-final phoneme *‑‑t* neutralizes those two final consonants, as well as the morphophonemic finals that were already neutralized in *‑‑t* (*‑‑th* and for some *‑‑lth*) and in *‑‑s* (*‑‑c*, *‑‑ch*). The affricates (*‑‑c* and *‑‑ch*) were distinguished in syllables written with phonograms in 1250 Hyang-kup (LKM 1972a:83-5), but they had fallen together before 1400+ Cosen-kwan, which wrote words ending in *‑‑c ‑‑ch ‑‑s* alike, with a Chinese character (THOUGHT) that must have represented a sibilant. In transcribing Manchu and Mongol the syllable-final *‑‑s* was treated as a sibilant (in contrast with the stop *‑‑t*) as late as 1748 (Martin ?1991:n13).

The Hankul system of initials made provision to distinguish five kinds of "throat" sounds at the beginning of a syllable: (1) simple vowel onset, using the zero initial; (2) sharp onset with the glottal stop *q‑‑*; (3) the nasal velar *ng‑‑*; (4) breathy onset with *h‑‑*; and (5) the reinforced (murmured) breathiness of *hh‑‑*. These were all needed to write the traditional distinctions of reading Chinese characters, but speakers of Korean did not normally distinguish *q‑‑* or *ng‑‑* from the smooth onset; 1446 Hwun [25b] explicitly states that the glottal onset was not distinguished from the smooth in native Korean words. And in the Chinese readings, the *q‑‑* was traditionally distinctive only before *i* or a glide: *QI(‑‑) QY‑‑ QYW‑‑ QW‑‑* were supposed to be different from *I‑‑ Y‑‑ YW‑‑ W‑‑* but for the other vowels the *q‑‑* was automatic so that the only versions were *QA(‑‑), QE(‑‑), QO(‑‑), QU(‑‑)*. For the Chinese readings only, the early spellings put a final zero (the circle symbol) below a syllable that ended in a vowel, so that every Chinese syllable carried a pat.chim of some sort, but this practice fell into disuse by the early 1500s. The zero (the circle symbol) was distinguished from the final *‑‑ng*, which had the teardrop shape with a tick at the top. When the open syllables of even the Chinese readings came to be written like the open Korean syllables (with no pat.chim) and the differentiation of initial *ng‑‑* from zero fell into disuse (by the 1490s), the symbols for the zero initial and the final velar nasal were placed in complementary distribution, and they ended up merged into a single symbol with different realizations as onset (nothing) and as coda (velar nasal).

Among the *‑‑lC* clusters, *‑‑lq* was written in non-Chinese expressions only for the prospective

modifier '(·· that is) to do/be', which had the effect of reinforcing the simple obstruents *p t k c s* (but not *h*) when they began a following noun in close juncture. The phenomenon was also written, as later, by using the geminate clusters: ··*l CC*·· = ··*lq C*··. And after 1480 it was often left unwritten; realizing that the liquid represents the final of the modifier, the scribe keeps constant the shape of the noun and spells ··*l C*··. So the coda ··*lq* represents a morphophonemic phenomenon rather than a string of two phonemes. The ··*q* anticipates the tense component of the reinforced obstruent, recognizing that it is not part of the basic shape of the noun – nor, originally, of any other morpheme of the language, since the modern geminate initials became phonemic only by grace of the initial *p*·· and *s*·· clusters. It is likely, however, that the source of the morphophonemic peculiarity is an attachment to the modifier of the genitive (= adnominal) particle *s*, as evidenced by the spelling ··*ls C*·· for a few examples of the structure (see - '*ul s* in Part II). The coda ··*LQ* was also used regularly to represent the reading of Middle Chinese unreleased final ··t, the "entering tone" equivalent of ··n in the other three tones. There was apparently no difference in pronunciation from an ordinary ··*l*, as shown by some of the words written as normal Hankul rather than character readings, but the creators of the system must have realized there was something odd about this group of syllables. They may have been aware that in this millennium some Chinese dialects, such as the language of Canton (Guǎngdōng), retain the 7th-century ··p ··t ··k while others (such as southern Mandarin) use a glottal stop for all syllables with the entering tone, merging the three codas: ··p ··t ··k > ··q. (Still others, such as northern Mandarin, lost the stops and merged the syllables into the other tones in various ways.) The creators of the system of spelling out the readings of Chinese characters may have been baffled by the Korean choice of ··*l* for the syllable coda when ··*t* was available in Korean words; 1446 Hwun [22] explicitly notes that the Chinese coda is properly ··*t* but that it is popularly treated as ··*l*. A satisfactory explanation of that has yet to be offered. Perhaps at the stage when the Chinese words were coming into the language Korean lacked a syllable-final ··*t*; the etyma with the MK final stop could have come about by shortening forms with a final vowel (is the negative ¨*mwot* from **mwo˙ta*?), so that ··*l* was the only available coda similar to the Chinese, and then as now it was already a lenition of basic *t* in certain words.

Yet there are at least two facts that suggest the coda ··*LQ* may not have been the same as /··*l*/. The first fact: in forms of the verb 'do' the contraction of *hok*·· to *kh*·· (rather than '*k*··) and of *hot*·· to *th*·· (rather than to '*t*··) takes place when the preceding phoneme was VOICED (*m n ng l W* V *Vy*), but ··*LQ* was sometimes treated as if voiceless: ˙*KYWELQ* '*key* (not *khey) *ho˙n i* '[he] let them decide it' (1447 Sek 9:20a), just like *na ˙kot* ¨'*key* (1447 Sek 6:1b) and *ko˙tok* ¨'*ti* (1462 ¹Nung 1:67a). There are counterexamples: *THWONG-˙TTALQ khe˙tun* (1463 Pep 1:9a) 'if they are knowledgable' rather than '*ke˙tun* (as in ¨*mwot* '*ke˙tun*), ¨*KAY-˙THWALQ* ˙*khey* (1459 Wel 21:48a) 'so as to emancipate', rather than ¨'*key*. And *˙*ho-to˙lwok* > *CYWUNG-˙ZILQ ˙tho˙lwok* (1465 Wen se:5a); *ho˙ti* > ˙*POLQ ˙thi* (1463 Pep 4:93b), ˙*TTAY-˙SSILQ ˙thi* (1464 Kumkang 38a), and even ˙*KYWELQ ˙thi* (1482 Nam 1:50a) contra the earlier example. Other cases of *l* are treated as voiced: ˙*ecul ˙khwo* 'is disturbed and' (1447 Sek 6:3b), ˙*ecul ˙khey ˙ho.ya* (1482 Kum-sam 2:19b) 'making them disturbed', ˙*ecul ˙thi a˙ni ˙ho˙ya is˙nwon ˙t oy* (1462 ¹Nung 1:69b) 'when it is not disturbed'; *CIN ˙ol ˙khwo ˙cye ho˙m ye n'* (1462 ¹Nung 7:73b) 'when one wants to be true'. And compare modern **kyel kho** 'absolutely (not)' < ˙*KYWELQ* + *h[o]˙kwo* 'deciding'. The second fact: in Chinese binoms the modern language always reinforces an initial *t*··, *c*··, or *s*·· of a morpheme which follows a morpheme that ends in ··*l* (see §1.5): **palqtal** = /**palttal**/ 'development' < ˙*PELQ-˙TTALQ*. Since this reinforcement has traditionally been ignored in the Hankul spellings, we presume that it continues the articulatory habits of the earlier language.

The MK voiced fricative *W* was a phoneme that represented the lenited form of *p* (§2.11.2). As a coda the symbol was also to write the labial glide (postvocalic ··u or ··o) that was traditional to certain Chinese syllables, but in the pronunciation of Koreans the letter was simply ignored.

The lenition of *k* (§2.11.1) was shown by a device that we interpret as the phoneme *G*, which was distinctive only after *l z y i*. (The device blocked the liaison that normally would make the *l* or *z* a syllable onset and would insert a *y* before a vowel following *y* or some cases of *i*.) After the 1400s *G* lost its phonetic effect, as shown by absence of the device in some of the spellings of 1527 Cahoy, such as *ke˙zwuy* (> **kewi**, dialect **kesi**) for earlier *kez˙Gwuy* 'intestinal worm' (CF LKM 1972a:86).

2.10.6. Intersyllabic strings; assimilations; conflation and compression.

The interludes between syllabic nuclei (vowels) of modern Korean comprise all the possible sequences of coda + onset, but with assimilatory adjustments that merge morphophonemically distinct strings, so that **ip man** 'just the mouth', **iph man** 'just the leaf', and **im man** 'just the beloved' are pronounced alike as /imman/. Variant spellings sometimes indicate an understandable confusion about the forms that make up certain words: *ancumpangi* (1894 Gale 183) = **anc.um pangi** is written for **anc.un payngi** 'cripple' and **pipin pap** (1965 Dupont 137) for **pipimq pap** 'rice hash'.

In MK spellings nearly all expected strings are found, so that there are quite a few interludes. To these are to be added the many strings created by the genitive (= adnominal) marker *s*. That particle in the structure *N s N* was handled in three ways: it was written as the coda (or part of the coda) of the preceding N, it was instead attached to the following noun as the onset (or part of the onset), or it was placed all by itself as a graphic syllable in its own right. The extreme case is probably *tolks 'pstay* (1446 Hwun [25b]) = *tolk s 'pstay* 'the Hour of the Cock', a phrase that was probably pronounced with one or two junctures, if all consonants were fully articulated. Comparable pronunciation problems in English can be found in "the milk's splatter", "sports credits", and "a barely glimpsed strain".

Whenever possible a syllable of Korean begins with an onset, so that if a morpheme that ends in a closed syllable is put before one that begins with a vowel, its coda becomes the onset of the second syllable and the first syllable becomes open. That is why **ip i** 'the mouth [as subject]' sounds like **i pi** 'this rain (or broom)' when the latter is pronounced without a juncture. This liaison phenomenon seems to have been present in the language as far back in time as we can go. When a spelling retains as coda a movable string and uses the zero circle to write the onset of a vowel-initial second element, we know that the string was written morphophonemically or includes a juncture − or (before *y* or *i*) that it represents /G/ (§2.11.1).

The assimilatory phenomena that affect the interludes quite often lead to the merger of morphophonemic strings, as we have seen in the replacement of voiceless oral + nasal by the corresponding nasal + nasal, but some are at an allophonic level − they are purely phonetic. Voicelessness is a nondistinctive feature in Korean. Obstruents are voiceless after or before juncture or when clustered with another obstruent (including h). Otherwise they are voiced, except that (at least in modern Seoul speech) s and h are intrinsically voiceless and, both alone or clustered, spread the voiceless stretch over most or all of the syllable − the vowel and often a final ···m ···n ···ng ···l, as well. The contrary tendency is for the simple h to get murmured and dropped between intrinsically voiced sounds (vowels, m n ng l). On the possible voicing of s to [z] in dialects and older varieties of the language, see §2.4, §2.11.4. The lenition phenomena of earlier Korean appear to support the notion (Martin ?1991:n2) that the MK simple stops and the affricate *c* were voiced between vowels, as they are today, and that the lenitions taking place were just a matter of the voiced stops weakening to fricatives. Since *s* was already fricative, however, a distinction between the unlenited and the lenited forms must mean it was voiceless when not lenited, assuming that the spelling indicates the situation with reasonable accuracy. What about the allophones of *l*? It is quite possible that the flap version [r] was common as a coda and that the lateral developed as part of the tendency to foreclose the release of consonants in the coda when they could not be moved over to become the onset of a following syllable, but the timing of both matters is uncertain. In any event, recognition that lateral articulations exist is made in 1446 Hwun ([25b]) which says "light and heavy *l* are not distinguished in Korean" and "there is only one initial in Chinese syllables", but suggests making a letter for the light liquid (**kapyewun liul**) by putting a circle below *l* (like that put below *p* or *m* to write W). The symbol was adapted by Korean scholars writing Manchu and Mongol glossaries of the 1700s, who put the little circle to the right of the syllable with the *l*; the circle was used also to mark other peculiar phonemes, so that it functioned as a kind of asterisk or pointer rather than a mark specific to the liquid.

Evidence of the nasal assimilation rules became more common in spellings (or misspellings) of the late 1600s, but there are examples I have seen of *-pn-* → *-mn-* from 1586, of *-kn-* → *-ngn-* from 1553, and of *-tn-* → *-nn-* from as early as 1481 and perhaps one from an unavailable text of 1466 (Mok 1; cited from LCT 406b): *punnon* ← *puth.non* 'igniting'. Noun stems ending in *-h* dropped the coda before a nasal (as before a vowel), so that *wuh* + *¨ma˙ta* → *wu ¨ma˙ta* (1447 Sek 6:31a) 'atop every one', but that may be because all nasal-initial particles were loosely attached. With verb stems, however, the processive *-no-* attached tightly, and a stem-final *-h-* was realized as either *t* or *n*: *il˙hwum cit.no˙n i ˙˙la* (1459 Wel 2:49b) 'affixes a name' ← *cih-*, *cet˙nwon ˙t ol* (1462 ¹Nung 2:54a) '(the fact) that one fears it' ← *ceh-*; *˙cwonno˙n i* (1463/4 Yeng 1:59b) 'is quite pure' ← *˙cwoh-*, *nwot˙nwo˙n i* (1447 Sek 13:19ab) 'sends one off' ← *nwoh-*. Some early texts used the unique syllable-initial geminate *nn-* to write the result of *-h-* + *-n-*, as in *˙han ¨swum ti.nnon swo˙li* (1447 Sek 19:14b) 'the sound of uttering a deep sigh' and *ta.nno˙n i ˙˙la* (1451 Hwun-en 15a) '(it is that) it touches' ← *tah-*. When the stem ended in *-lh-* the result was the unique string *-l.nn-*, as in *il.nno˙n i ˙˙la* (1462 ¹Nung 2:2a) '(it is that one) loses' ← *ilh-*. The same text will also write *il.no˙n i* (1:62b) '(that one) loses', so perhaps the difficult pronunciation *iln-no-* was simplified to just *il-no-*, since there was no other need for syllable-final *-ln*. There are also rare spellings of *-lh.n-* as in *halh.no˙n i* (1462 ¹Nung 8:5b) '(it is that one) licks', retaining the basic morphophonemic shape. But the most common spelling is *-l.n-*, as in *tung ˙ul al˙nwo˙n i* (1459 Wel 2:9a) ← *alh-* 'has an aching back' and *sul˙nwon ˙pa ˙yl ˙s oy* (1481 Twusi 8:7b) ← *sulh-* 'because it is distressing'.

In the modern standard language the liquid dominates the nasal in the morphophonemic strings *-ln-* and *-nl-*, both of which merge with *-ll-*, pronounced as a long lateral with lateral release. Misspellings indicate that this merger began in the 1700s. In the 1800s there was a tendency to write "*l.n*" for /ll/ regardless of the etymology.

Variant spellings indicate that some of the different consonant strings written between vowels were phonetically equivalent. The difference in spelling is due to (1) considerations of the basic shape of the morphemes juxtaposed, (2) attention to compression or conflation under differing speeds of articulation (tempos), (3) misinterpretations and indecisions stemming from other factors. In the case of simple interludes, the placement of the syllable boundary (as indicated by the dots in the Romanization) was irrelevant to the pronunciation except when it indicated a juncture, usually shown by space or hyphen in the Romanization. The following sets of orthographic strings were phonetically equivalent in Middle Korean (a dot shows the syllable boundary):

s.p	= *.sp*	*p.t*	= *.pt*	*ns.k*	= *n.sk*	*lp.s*	= *l.ps*	
s.k	= *.sk*	*p.th*	= *.pth*	*ns.t*	= *n.st*	*lp.sk*	= *l.psk*	
s.t	= *.st*	*p.s*	= *.ps*	*ms.k*	= *m.sk*	*lp.psk*	= *l.psk*	
s.s	= *.ss*	*p.h*	= *.ph*	*ms.t*	= *m.st*	*lp.c*	= *l.pc*	
s.G	= *.zG*[1]	*k.h*	= *.kh*	*m.psk*	= *m.sk*	*lp.t*	= *l.pt*	
		t.h	= *.th*	*m.pst*	= *m.st*	*lp.h*	= *l.ph*	
		p.sk	= *.psk*			*lk.k*	= *l.kk*	= *lq.k*
						.nn	= *n.n*	
						l.nn	= *l.n*	

[1] As in *pos˙Ga* (1447 Sek 6:31a) = *poz˙Ga* (1462 ¹Nung 1:5a) 'crush'.

Through the centuries spellers have been plagued by the fact that when the tempo of speech slows, the reinforced and aspirated consonants are anticipated by closing a preceding open syllable: **appa** and **apha** become **ap-ppa** and **ap-pha**, **kacca** and **kacha** become **kat-cca** and **kat-cha**. (But you will rarely hear the word /isse/ slowed to become *it-sse or /mōsse/ said as *mōt-sse.) Since each of these strings can represent several morphophonemic strings, the speller has to pay attention to the morphemes to know whether to write t.h, t.th, .th, th., or h.t — or even th.h, h.th, th.th (though the morpheme structure makes those particular spellings unlikely). In rapid speech these strings will all be compressed to just /th/ and in slower speech they will all be conflated to /tth/. Texts of the past several hundred years have many examples of misleading conflated forms such as that of 1894 Gale

cip.phoyngi for **ciphayngi** 'staff', and those cited in Martin 1982, to which can be added an earlier example of perhaps a similar sort (assuming a scribal interpretation of *nyek* as *nyekk*): TWONG *nyek ʾkuy* [= *nyeʾk uy*] *chi l'* (1466 Kup 1:21b) 'the ones from the east'; compare *twong nyek ʾkwoʾlwo* [= *nyeʾk woʾlwo*] (1518 Sohak-cho 9:98a) = *twong ʾnyek ʾkhuʾlwo* [= *ʾnyeʾkh uʾlwo*] (1586 Sohak 6:91a) 'to the east'. Earlier texts also have examples of misguided morpheme divisions such as 1894 Gale *pip.ye* (162) = **pipye** 'mix' and *nyek.yes.ci.wo* (113) = ⁿ**yekyess.ci yo** 'deemed', as well as etymologically motivated examples such as **cip.wung** (1936 Roth 42) 'roof' and *pak.aci* (1881 Ridel 166) 'gourd dipper' (so spelled also in 1632 Kalyey 4:20a).

When the reinforced consonants emerged as phonemes in their own right, the *s* which had so often preceded them was widely used to write *sp st sc sk* where the modern language has chosen to institutionalize a different device, less common earlier, the geminate **pp tt cc kk**. Since the syllable-final *-s* had merged with *-t* in the 16th century, a majority of the morphemes that are heard in certain environments as ···**t** are written ···**s** because in other environments (before a vowel-initial particle, ending, or copula) they have the sibilant pronunciation. These morphemes, too, get conflated in slow speech as shown by such spellings as *wos.si* (1894 Gale 99) = **os i** 'clothes [as subject]' and *stus.sun* id. 109) = **ttus un** 'as for the meaning', in both of which the interlude represents a long sibilant. In *nas.cun* (id. 110) = **nac.un** 'low' and in *is.hun nal* (id. 115) = **ithun nal** ← **ithut nal** 'the next day' the *s* represents an apical stop: /natcun/, /itthunnal/. In the case of *pas.sol* (id. 104) = **path ul** 'the field [as object]' the slow form /passul/ tells us that Gale was hearing a dialect that had simplified some of the overstuffed nouns, **path → pas**.

When foreign words have an interlude spelled "···**tt**···" Koreans like to use the Hankul final ···**s** to represent the first initial: **Los.ttey** 'Lotte', **Cheyusu Maynhays.then Unhayng** 'Chase Manhattan Bank'. This violates the unstated rule that the conflated form is to be written only if a morpheme boundary is recognized. A corollary to the rule is that /ptt/ (or the like) is to be spelled **p.t** unless the second morpheme begins with **tt**, but in the case of **ipttay** 'up to now' and **cēpttay** 'not long ago' the decision ignores the etymology (< *ʾi + ʾpstay, ʾtye + ʾpstay*), as it does in **copssal** 'millet grain' (< *cwo[h] ʾpsol*) and similar words, and associates the second syllables directly with modern nouns **ttay** 'time' and **ssal** 'grain'.

2.11. Lenitions and elisions; sources of *G*.

The fifteenth-century language of the early Hankul texts offers many examples of the weakening or total loss of certain consonants between vowels. Some of the effects can be seen at the end of verb stems or at the beginning of suffixes and particles. Others are internal to words or morphemes. The Hankul system made provisions to write voiced fricatives for labial, velar, and sibilant categories. These functioned as distinct phonemes *W*, *G*, and *z* in the language of early texts, but we have reason to believe that other varieties of Korean of that day retained the *p*, *k*, and *s* which had been lenited to create the passing distinction of the voiced fricatives. Many examples of these MK sounds turn up unlenited in modern dialects, especially those of Kyengsang and Hamkyeng (CF Ramsey 1975, Martin 1982/3, Kim Yengpay 1984:168-72): **melkwu** 'mulberry, wild grapes' (**melwu**) < *melGwuy*, **molkay** 'sand' (**molay**) < *mwolʾGay*; **masul** 'village' (**maul**) < *mozolh*; **saypi** 'shrimp' (**saywu**) < *saʾWi*; ... . In the case of verb stems, the lasting effects of the lenitions can be seen in the shape alternations of the -**W**- stems (···**w**-/···**p**-), the -(**S**)- stems (···**s**-/··· -), and some of the -**LL**- stems (···**lu**-/···**ll**-). The -**T**/**L**- stems, earlier as today, showed an alternation of the stop ···**t**- before a consonant and the flap ···**l**- before a vowel; the flap represents a lenition of the stop. Since certain dialects today do not have the lenited forms for -**W**-, -(**S**)-, and -**T**/**L**- stems, we assume they are preserving paradigms of unwritten forms of the fifteenth-century language that were closer to the original system. (An alternative argument would say that these dialects have restructured the paradigms by analogy.) We believe that the motivating factor for the lenitions was largely accentual, but the detailed circumstances remain to be adequately described. Some of the patterns probably result from accompanying vowel elisions and other factors inducing compression. The susceptible particles and endings mostly have velar initials (-*k*··· → -*G*···), but notice also the bound stem -ʺ*zoW*- (deferential), source of the modern -**sup**- that

marks the formal style, and the particle ˙*za* 'precisely, only (if)', still said (i)sa as a dialect version of Seoul (i)ya, which comes from attaching that particle to the nominative marker ˙*i*, then eliding all cases of -*z*- so that ˙*i˙za* became *ia*, which inserted the glide heard in iya. Elsewhere it is proposed that the copula forms **ila** and (?)**iley** are lenited versions of **i-ta** and **i-tey**.

The phoneme *G* as assumed here neutralized the several kinds of lenition. The 15th-century spelling distinguished the phoneme only after *y*, *i*, *l*, and *z*, but it seems likely that earlier it may have been present between two vowels, especially when one or the other was the minimal (and often epenthetic) *u* or *o*, and especially between *y* and *u* or *o*, where we will write *yGu* and *yGo* even though there is no contrasting */*yyu*/ or */*yyo*/: *keyGulu-* / *keyGulG-* 'be lazy', ˜*nwuyGus.pu-* 'be remorseful', ... For a number of such words the source of the *G* can be found in dialect versions that preserve the original consonant: *keyGulu-* / *keyGulG-* 'be lazy' is **keykulu-** in North Kyengsang (Kim Hyengkyu 1974:368) and Hamkyeng (Kim Thaykyun 1986:55), and *nwuuy* < **nwu[G]uy* 'sister' not only has dialect versions **nwupay, nwupi, nwupu** but was written with the phonograms ˜*nwu-pi*˜ in 1400+ Cosen-kwan. For a verb stem like *towoy-* 'become', where a missing consonant is suspected, we are tempted to write, for example, ˜*to[G]woy-*˜ with the understanding that the source of the *[G]* may be a velar (a lenited *k*) or a labial (a lenited *p*), and occasionally even a sibilant (*z* = lenited *s*). In the case of 'become' we know the missing consonant was labial because of the attested variant *toWoy-*, so we can presume a history of **topoy-* > *toWoy-* > **toWwoy-* > **to[G]woy-* > *t[o]woy-* = modern **toy-**. But we will forgo writing *[G]* in these cases and use that notation only for the elision of the velar initial of certain bound elements (˙*kwa*, ˙*kwos*, ˙*kwom;* ˙*ka*, ˙*kwo;* ˙*key*, ˙*kuy;* ...) which appear with the lenited velar (˙*Gwa*, ˙*Gwos*, ˙*Gwom;* ˙*Ga*, ˙*Gwo;* -˙*Gey*, -˙*Guy*) after *l*, *y*, and often *i*. Such notations as ˙*[G]wa* and -˙*[G]wo* are offered as helpful reminders of the immediate sources of forms with elision. But we will write 'become' as *towoy-*, and similarly leave implicit the likely dropped consonant in these words, among others: *e˙[ ]wul˙Gwu-* 'join them', *ku[ ]wul-* 'act', *mwu[ ]u-* 'shake', *no[ ]woy(˙ya)* 'again', *sa˙[ ]ol* / *sa˙hol* 'three days', *te[ ]u-* 'increase', *ta[ ]o-* 'get exhausted'.

Because of the neutralization represented by the phoneme, Kim Cin.wu and To Swuhuy (1980) treat our -*G*- as a juncture phenomenon rather than a segment holding specific phonetic content. And *G* may very well have become a purely graphic convention in later stages of the orthography, before it vanished altogether.

In our Romanization of modern Korean we sometimes indicate an elision with an apostrophe, though not in paradigmatic forms. Among the elisions represented by the apostrophe are these: [k] in **¹yu'-wel** 'June', [p] in **si'-wel** 'October', [m] in **camca' kho** 'quietly', [ng] in **su' nim** 'monk', [l] in **cha'-cita** 'is sticky', [i] in **kac'-kac(i)** = kaci-kaci 'all kinds', [e] in **hal-'meni**, [wu] in **mak'-kelli** 'coarse liquor', ... And sometimes the elision is of a syllable: [ci] in **ape' nim** 'father', [ni] in **eme' nim**. (The elision in these two expressions is ahistorical, for the etyma are ap^e/a and em^e/a.)

2.11.1. Velar lenition and elision.

Under certain circumstances the MK velar stop *k* lenited to the sound that we transcribe as *G*, which was probably articulated as a voiced fricative (velar or laryngeal) or at least a glottal squeeze. The sound was recognized only after *y*, *i*, *l*, and *z* (*zG* was often written *sG*). Hankul used indirect devices to show it, blocking the usual liaison that would (1) make ···*l* or ···*z* the onset of the following syllable and (2) accrete a syllable-initial *y* before a vowel after ···*y* or ···*i*.

The circumstances calling for velar lenition (CF LCT 1961) involve the joining of noun + particle or verb + ending. The endings include the gerund -˙*kwo*, the adverbative -˙*key* or its variant -˙*k^{u}oy*, and those complex endings that incorporate the gerund or are built on the effective formative -˙*ke*-; but there are no examples of lenition (to *-˙*Gi*) of the summative -˙*ki*, which was little used at the time. The lenition took place after all stems ending in ···*y*-, ···*l*-, or ···*z*- but not after most of those that ended in ···*i*-. For an ···*i*- stem to qualify, it had to be:

(1) the copula ˙*i*·· , which predicates nouns. Examples can be found in these entries of Part II: ˙*i˙Gen ma˙lon*, ˙*iGe˙na*, ˙*iGe˙nol* = ˙*iGe˙nul*, ˙*iGen ˙tyeng*, ˙*iGe˙n ywo*, ˙*iGe˙tun*, ˙*i˙Gey*, ˙*i˙Ge ˙za*, ˙*i˙Gwo*, and their shortenings to ˙*y*·· and ˙··.

(2) the causative ¨ti- 'drop it' (< °ti- 'fall').

(3) one of a few polysyllabic stems ending in ··li- (such as spu˙li- 'sprinkle', e˙li- 'be stupid', ...) that were probably confused with the structure -u˙l i '·· (copula prospective modifier + postmodifier + copula). But most of the ··li- stems do not trigger the lenition: po˙li˙kwo 'discarding it', ki˙li˙kwo 'praising', ... And the "confused" stems do not always lenite: e˙li˙Gwo (1462 ¹Nung 7:67a, 1463 Pep 2:242a) but also e˙li˙kwo (?1517‑ Pak 1:9a) 'being stupid'; no˙li˙Gesi˙nol (1445 ¹Yong 8; for *no˙li˙kesi˙nol = *no˙lisike˙nol) '[the emperor's command] came down, and ... ', yet no˙li[˙]kwo (1481 Twusi 10:35b) 'coming down'.

The peculiar behavior of the stems ˙i- and ¨ti- led LKM to the conclusion that the basic forms they represent are ˙iy- and ¨tiy-; contrast ti˙kwo (1445 ¹Yong 86) 'falling' with ¨ti˙Gwo = ¨tiy˙Gwo (1459 Wel 10:24b) 'dropping it'. Independent motivation for that conclusion can be seen in the MK abbreviation of the copula as 'y- after a vowel (where modern Korean usually suppresses i- leaving no trace) and in the derivation of the stem ¨ti- from *ti-˙[G]i- (intransitive verb + causative), as confirmed by the accentuation.

Nouns and adverbs that end in ··i generally triggered the lenition: ¨ne y ˙i˙cey swo˙li ˙Ga a˙ni ˙Ga (1462 ¹Nung 4:126b) 'is it now your sound or isn't it?'; ˙i ˙Gwa (1451 Hwun-en 1b) 'with / and this'; ku˙li ˙Gwos (1459 Wel 8:62b) 'just / precisely that way'; ˙wuli ˙Gwos kyeyGwu˙m ye n' (1459 Wel 2:72a) 'if we are the ones defeated'. But after the negative precopular noun a˙ni 'not' and the expression hon ka˙ci 'one kind = the same' the lenition seems to have been optional:

˙tye non hwo˙za ¨salom a˙ni ˙ka (1475 Nay 2:1:16a) 'isn't he a person alone?'; ˙i ˙SYWELQ-˙PEP ka, ˙i ˙SYWELQ-˙PEP a˙ni ˙Ga (1482 Kum-sam 4:37b) 'is this preaching the law or isn't this preaching the law?'

hon ka˙ci ˙ka talo˙n i ˙ye (1459 Wel 8:31b) 'are they the same or different?'; hon ka˙ci ˙Ga a˙ni ˙Ga (1462 ¹Nung 1:99a) 'is it the same or not?'

The obligatorily leniting nouns include most prominently the postmodifier ˙i 'the one that ·· ; the fact that ·· ' in all of its uses. Most examples involve the zero abbreviation of the copula stem, as seen in these entries of Part II: -u˙l i ˙Ge˙m ye, -u˙l i ˙Ge˙n i (˙Gwa, '˙ston), -u˙l i ˙Gen ma˙lon, -u˙l i ˙Ge˙nul, -u˙l i ˙Ge˙ta, -u˙l i ˙Gwan˙toy. I have been unable to find structures with *-u˙n i ˙G··. And all of the examples of /-(u)˙li˙Gwo/ or /-(u)˙ni˙Gwo/ are questions (-u˙l i ˙Gwo, -u˙n i ˙Gwo, see below), for there seem to be no such expressions with the copula gerund (*-u˙l i ¨˙Gwo or *-u˙n i ¨˙Gwo). In structures with the postmodifiers ˙ka and ˙kwo 'question', the copula modifier (˙in) is usually suppressed: (-u˙n i ˙Ga, -u˙n i ˙Gwo; -u˙l i ˙Ga, -u˙l i ˙Gwo; -ke˙n i ˙Gwo) but there are examples that let it surface, as found in the entries a˙ni 'n ˙ka (= a˙ni ˙Ga = a˙ni ˙ka), a˙ni 'n ˙kwo (= a˙ni ˙Gwo = *a˙ni ˙kwo), and ˙in ˙kwo of Part II. Also included: the suspective -˙ti (< ˙t i, postmodifier + nominative particle), as found in nwop˙ti ˙Gwos (1459 Wel 1:37b) 'the higher they are ... '.

The particles ˙kwa 'with', ˙kwos 'precisely', and ˙kwom 'each' regularly lenite to ˙G·· after a noun that ends in l (including LQ), y, or i. The velar initial is totally suppressed after other vowels (including vowel + w); we note this by writing the G in brackets, as a reminder to help identify the morphemes. The postmodifier ˙ka 'question', is regularly preceded by a modifier but the copula modifier ˙in is usually omitted, so that ˙ka stands right after the noun, as if a particle, and it lenites just like the other particles. The few exceptions written without lenition may be due to scribal error or later restructuring:

na˙la[h] s ˙kul ˙i ¨ta ¨HWO ˙uy ˙hoy˙Gwon ˙pa ˙ka (1586 Sohak 6:41b) is a rewrite of na˙la[h] s ˙kul˙Gwel i ¨ta CHWOY-¨HWO ˙uy ˙hon kes ˙ka (1518 Sohak-cho 9:45b) 'is the writing of the nation's history all by Cuĭ Hào?';

ha˙nol kwa ˙sta.h i ˙khu˙kwo (1481 Twusi 21:2a) 'heaven and earth are large' should be ha˙nol ˙Gwa (1462 ¹Nung 8:131b) or ha˙nol˙khwa = ha˙nolh ˙kwa (1462 ¹Nung 2:20b).

The example na kwos (?1800 Hancwung 90; cited from LCT) 'precisely I' is from a late text. The word cey˙kwom (1518 Sohak-cho 8:3a) is a shortening of ceyye˙kwom 'individually', a derivation yet to be explained. The adverb-intensifying suffix -˙kwom (which may or may not be the same etymon as the

particle) never lenites: *ta si- kwom* (1447 Sek 6:6a) 'again', *kwop koy- kwom* (1459 Wel 1:47b) 'double; twice (the age)'. Perhaps juncture could account for *a lwo m i a ni ka* (1462 ¹Nung 3:33a) 'isn't it that one knows?' The postmodifier *kwo* 'question', like *ka*, occurs after a noun by omitting the copula modifier. It lenites after *l*, *y*, and *i*: *mu sum elkwul Gwo* (1462 ¹Nung 3:59a) 'what face is it?', *mu sus ⁻ccwoy Gwo* (1463 Wel 1:7a) 'what sin is it?', *hon ka ci a ni [ ]Gwo* (1482 Nam 2:42a) 'isn't it the same?'. After other vowels, both elided and unelided velar are found: *⁻es.ten cyen cho [G]wo* (1482 Kum-sam 3:52b) 'what kind of cause is it from?', *i mu su kwo* (1482 Kum-sam 2:41a) what is this?', *mu sum yang co kwo* (1462 ¹Nung 3:84a) 'what are the looks?'; *ne 'y susu ng i nwu kwo* (1447 Sek 23:41b) 'who is your master?'; *⁻es.tyey il hwum i ·PALQ-⁻ZYA [G]wo* (1464 Kumkang se:8b) 'why is the name prajñā (wisdom)?' In Chinese passages the Chinese particle *YA* is followed by the Hankul [G]a (?1468⁻ Mong 53a) or [G]wo (1482 Kum-sam 3:52a).

When attached to a noun that ends in basic *--h* a metathesis takes place: *--h k--* → *-- kh--*. The only example offered for *ka* is *hona kha* [= *honah ka*] *ye sus ka* 'are they one or are they six', and that is given by LCT 706a as "1462 ¹Nung 106", but both the locus and the citation seem to be in error; it was perhaps taken from *hona khwa* [= *honah kwa*] *ye sus kwa* 'one and six' on the preceding page. The form in the example, however, is just what we would expect, parallel to that of *kwo* in *ku ⁻es te 'n sta khwo* [= *stah kwo*] (1463 Pep 5:165a) 'what land is that?'.

The 15th-century lenition of velar-initial particles was indicated orthographically throughout the 16th century. But in texts from the 1540s and later (cited by NKW 54-5) there are a number of random spellings of unlenited *kwa* after vowels (including *i*), *y*, *l*, and *--[h]*, often in close proximity to a lenited version. The 17th-century texts always write *k* after *l* and often (randomly) after a vowel, as well. For both *kwom* and *kwos* the velar was written in the few examples found in later texts. The elided form of *kwa*, spelled "*wa*", was always used in 19th-century texts (as in the 20th century), but there was some random variation in the 17th and 18th centuries, as seen in *twos.th oy kwoki wa yes kwa yang uy kwoki kwa* (1799 ¹Nap-yak 18a) 'the meat of the pig and the meat of the fox and the sheep'.

There are examples of lexical lenition, as in *kaci-Gaci (s nay lol)* (1569 Chilqtay 10b) 'all kinds (of smells)', lexicalized from *ka ci ka ci* (1463 Pep 5:137b). And there are velar elisions in nativized Chinese words:

mwo[k] ywok (1489 Kup-kan 1:104, 1527 Cahoy 3:11a = 5b) 'bathing' < ·MWOK-⁻YWOK (1447 Sek 6:27b) and *mwo[k] ywok thang co* (?1517⁻ Pak 1:52a) 'bathhouse' < THANG-⁻CO.

lywu[k]- we l uy (?1517⁻ ¹No 1:27b) = *nywu[k]-wel* (1608 Thay-yo 16a) 'June' < ·LYWUK-·NGWELQ; CF *si- Gwe l ey n'* (?1517⁻ Pak 1:18a) < ·SSIP-·NGWELQ 'October'.

soyng-[k]ang (1527 Cahoy [Tōkyō] 1:14a, 1489 Kup-kan 6:21 [cited from LCT]) > *soyng-yang* (1562 Cahoy [Hiei] 1:7b, 1583 Kwang-Chen 3b) = *soyngkang* (1583 Sek-Chen 3b) 'ginger' < SOYNG-KANG.

Although the MK spelling of final *--l* unlinked to a following vowel is usually to be treated as *-lG-*, when the vowel begins a particle in those texts (such as 1449 Kok) that treat particles as separate words, no "*G*" is to be written: *i nal ay za* (1449 Kok 109) – CF *mozom ay* (ibid.). In other texts we find *na l ay*, *mozo m ay*, ... , syllabified phonetically. But the *-G-* is indicated, as part of the noun, for forms of *azo / azG--* 'younger brother' such as *az G on* (1445 ¹Yong 24), *az G i* (1445 ¹Yong 103), *az G i la* (1462 ¹Nung 1:86a), and *az G ilwo n i* (1462 ¹Nung 1:76b).

2.11.2. Labial lenition and elision.

Spellings with *--G--* do not always derive from a lenited velar; some are from lenited labials. We know this either from variant forms that retain the labial or from modern dialect versions with *--p--*. Despite that information, we will write the MK sound as *G* except when there are morphophonemic grounds to do otherwise, as there are when other forms of the paradigm of a verb contain a labial. In the case of *e lwu sol [W]wo l i syas ta* (1463 Pep 4:70-1) 'it will be possible to tell them' we choose to identify clearly the stem by noting its elipted *W*, a lenition of *p*, as *[W]* rather than write the *G* that would be called for by our rules, because of other forms in the paradigm and also the competing

version found in *sol˙Wwo.l i ˙˙n i* (1449 Kok 2). But because of what happened to the vowel (*-Wu-* > *-Gwu-*) we write *˙chiGwun* (1481 Twusi 6:43a) = *˙chiWun* (1459 Wel 18:51a) 'cold' < **chipu-*. The phoneme *G* when used represents a neutralization, thought to be the result of merging the labialized velar fricative and the velarized labial fricative, articulations that are hard to keep apart.

The lone particle is *pu˙the* '(starting) from', shortened from (*˙˙ ˙ᵘᵒl*) *pu˙the*, a verb infinitive. That particle usually keeps its initial, even after *i*, *y*, and *l*: *˙i pu˙the* (1447 Sek 13:1a, 1463 Pep 1:65a) 'starting from this', *˙˙a˙lay pu˙the* (1449 Kok 109) 'from earlier', *˙nyey pu˙the* (1459 Wel 2:70a) 'from long ago', [no example of *˙˙l*?]. There are only two or three examples of a lenited form *Gwu˙the* < **Wu˙the* < *pu˙the*, such as *wo˙nol Gwu˙the* (?1517⁻ ¹No 1:35b) 'starting from today' and *˙˙en˙cey Gwu˙the* (?1517⁻ Pak 1:13a) 'since when'. And there are no examples of **˙˙phu˙the* with metathesis of noun-final *˙˙h*; instead the independent form of the ⁿᵒᵘⁿ ᵃᵖᵖᵉᵃʳˢ, ᵃˢ ⁱⁿ *wu pu˙the* (1464 Kumkang se:6a) 'from above'. The modern particles **pota** and **poko** are derived from the transferentive and the gerund of the verb **po-** 'look at, see'.

No verb endings begin with *p˙˙*, but the bound adjective *-p-* is incorporated in a group of subjective adjectives that end in *˙˙W-*, such as *˙˙swuyW-* (> **swiw-** / **swīp-**) 'be easy' from *˙˙swuy-* 'rest'. And the verb stem *pat-* 'butt' becomes *-˙Wat-* > *-˙Gwat-* > *-wat-* to derive a few intensive stems: *koli˙Gwat-* 'conceal', *nilu˙Gwat-* 'raise', *ta˙Gwat-* 'approach; defy', *mulli˙Gwat-* 'spurn; repel', *penguli˙Gwat-* 'crack / split it', *˙thiGwat-* 'push up against', *wuy˙Gwat-* 'lift up'.

Lenition of *-p˙˙* in compound nouns: *tay-˙˙We˙m ul* (1445 ¹Yong 87) 'a mighty tiger' < *˙˙pem* 'tiger'; *phwunglywu-Wa˙ci* (1459 Wel 24:28b) 'musician' < *˙˙ pa˙ci* 'a professional'; *kolo-˙Wi* (1459 Wel 1:36b) 'a fine rain, a drizzle' < *˙pi* 'rain'; *mwosi ˙Gwoy* = *mwosi ˙pwoy* (?1517⁻ Pak 1:51b; in contiguous passages) 'ramie cloth' (> **mosi pey**); *˙pwul˙Gwep* (?1517⁻ Pak 1:74b) = *˙pwul ˙pep* (id. 1:75b) < *˙PWULQ-˙PEP* 'Buddha's Law', *˙syel˙Gwep* (id. 1:75a) < *˙SYWELQ-˙PEP* 'explaining the Law'. There is even one example of *pye˙˙* > *-Wye˙˙*: *˙swoy-Wye˙lo* (1445 ¹Yong 3:13b [Chinese text]) 'Iron Cliff' [placename]. Examples that survive in the modern language include **si'-o li** '15 leagues' and **si'-wel** 'October' < *˙si-˙Gwe˙l ey n'* (?1517⁻ Pak 1:18a) < *˙SSIP-˙NGWELQ*; CF **yu'-wel** 'June' < *˙lywu[k]-˙we˙l uy* (?1517⁻ ¹No 1:27b) = *nywu[k]-wel* (1608 Thay-yo 16a). An elision of noun-final *˙˙p* gives us *ci[p] s* 'of the house' in *ku ci[p] s ˙sto˙l i* (1447 Sek 6:14a) 'the daughter of that house', *na 'y ci[p] s ke[˙]s ul* (?1517⁻ ¹No 2:49a) 'things of my house', *i˙Gwut ˙ci[p] s nul˙ku˙n i* (id.) 'the old man in the house next door', ...

The most common labial lenition is that of the *-W-* stems, with *˙˙p-* before a consonant but *˙˙W-* > *˙˙w-* before a vowel. Most of the *-W-* stems are adjectives, but there are a small number of verb stems, too (see §8.2.3). The *-W-* stems include *˙˙lW-*, for which the only modern example is the literary **sēlw-** = **selew-** < *˙˙syelW-* 'be sad'. MK had *˙˙ptelW-* = **ttēlp-** 'be puckery', *˙˙polW-* = **pālp-** 'tread', and *˙˙yelW-* = **yᵉ/ₐlp-** 'be thin', which do not lenite in the modern language, and also *˙˙kolW-* 'line up; compare', which is obsolete. Other MK *˙˙lW-* stems: [*˙˙]molW- 'be sad', *˙˙solW-* 'humbly say' (modern **saloy-**), *˙˙skolW-* 'be difficult', *˙˙tulW-* 'pierce, bore' (modern **ttwulh-**, Hamkyeng **twulp-**).

For a few words we know from dialect evidence that the *˙˙G˙˙* within an opaque lexical item represents the weakening of a labial stop, rather than a velar. The noun *i˙Gwuc* 'neighbor' (1462 ¹Nung 3:37a) has the modern dialect versions **ipuci, ipucey, iput, iwuci, iwut**, as well as the standard **iwus**, and it is written with the phonograms "*i-pun*" in 1400⁺ Cosen-kwan. (The Hankul *ipus* in 1569 Chiltay is thought to be one of many dialect influences from Kyengsang, where it was published.)

2.11.3. Apical lenition; elisions of *l* and *n*.

The apical stop *t* weakened to the flap allophone of *l*. That, we assume, is what accounts for the peculiarities of the *-T/L-* (or "leniting T") stems as contrasted with the regular *˙˙t-* stems. The final *˙˙t-* of the leniting stems was replaced by *˙˙l-* when a vowel followed.

There are a few etymological examples of lenited *t* → *l* (Martin 1983:27): *mwolan* 'peony' (1576 ¹Yuhap 1:7b) < *˙˙MWUW-TAN*, *˙cho˙lyey* (1527 Cahoy 1:34a=18b) 'order' < *˙CHO-˙TTYEY* (1447 Sek 19:8b). In certain cases the source of the lenition survives as the modern affricate because of the (southern) merger **ty** > **c**, as in the ˙doublet **tōlyang** / **tōcang** 'Buddhist seminary' < (?*) *˙˙twotyang* < *˙˙TTWOW-TTYANG* (1447 Sek 24:36a). The MK doublet *pa˙lol* (1445 ¹Yong 2) = *pa˙tah* (1459 Wel

1:23b) 'sea' may go back to a hypothetical *pa˙talh. And the adverb ˙tat (1447 Sek 9:16a) suggests that talo-/talG- 'be different' < *talok- (§8.3.1) is a lenition of *tatok-. The noun me˙li < ma˙li 'head' is written with the phonograms "ma-ti" in 1103 Kyeylim. The Ceycwu word iti 'this way' (Seng ¹Nakswu 1984:24) appears to preserve the unlenited source of MK ˙i˙li. The copula forms ila < ˙i˙la and iley are probably lenited from ita < ˙i˙ta and itey.

Before another apical sound (t, c, s, n, and rarely l itself) the phoneme l was often elided. The elision was quite regular in verb forms, so that the word representing ¨al-˙ta 'knows' was pronounced and spelled ¨a˙ta. In listing these -L- verbs we take note of the ellipsis (writing, for example, ¨a[l]ta) but in general we follow the spelling and write the forms as they sound. (The headings of dictionary entries such as "¨alta" in LCT and NKW can be thought of as written morphophonemically or etymologically.) Though we often note elided consonants such as ···[l]··· with an apostrophe, that is not done within a stem or paradigmatic form: ¨sa˙ti < ¨sa[l]-˙ti, ¨sa-˙two < ¨sa[l]-˙two or < ¨sa[˙ti] ˙two, ¨sa˙nwon < ¨sa[l]-˙nwon. Many modern dialects continue to elide the liquid before an apical, and even in Seoul the l is sometimes suppressed before -ca (māca) 'as soon as' (Part II, -ca NOTE 1). In fishing villages of North Kyengsang (Choy Myengok 1979:23) when ···l is stem-final it drops before ALL consonants, not just apicals, and stems ending in ···lm- are reanalyzed as ···mu-. The dropping of stem-final ···l- takes place also when stems are compounded: ¨sa[l]-˙ni- 'go on living'; ¨nwo[l]-[˙]ni- > nōnil- 'stroll'; ¨two[l]-[˙]ni- > tōnil- 'walk around, circle'; ¨wu[l]-˙ni- 'go on crying'.

In specific phrases MK nouns ending in ···l (including the reduction of basic ···lh) sometimes elided the liquid before the genitive particle s (CF He Wung 285, 313-4): pa[l] s pata˙ng ay (1462 ¹Nung 10:79a) 'on the sole of the foot'; ˙ki[lh] s ˙ko˙z ay s namwo mi˙th uy i˙sye ˙sye (?1517- ¹No 1:27b) 'under a tree by the side of the road'. That seems to be the origin of the adnoun mus 'many, all (sorts of)' < mwus < ˙mwu[l] s 'of the crowd' and of the noun tokki 'ax' < ¨twos˙kwuy < *¨two[l] s ˙kwuy '(ear/)edge of stone'. Spellings that leave the ···l s or ···n s intact tell us the particle was probably set off by juncture. For an unusual elision before n··· of the string [l s], see Part II, s NOTE 1. Less often, a noun-final n is elided before the particle s: swo[n] s twop (1462 ¹Nung 1:51b) − preserved by 1874 Putsillo as swotthopi; ˙i ˙ma[n] s ˙kam yang ˙uy (?1517- ¹No 2:22a) 'for no more sheep than this' = i man.skan yang ey (1795 ¹No-cwung [P] 2:20a; by then presumably pronounced /nkk/) = i man yang ey (id. [K] 2:21a). But the several examples of ˙ma[n] ˙two may be simply ˙ma + ˙two: ··· cywungsoyng ˙ma ˙two ¨mwot ˙hwo-ngi ˙'ta (1447 Sek 6:5a) 'is inferior to [the life of] any living creature'. (It is quite possible that the final n of ˙man developed from a separate morpheme attached to ˙ma.) See Part II.

In compound nouns final l sometimes drops before n, l, s, or c: ˙pso[l]-¨nwun (1527 Cahoy 1:1b=2b) = psol-nwun (1576 ¹Yuhap 1:4a) 'pellets of dry snow' (ssalaki nwūn); ˙chil-˙pha[l] ˙li s ˙kil˙h i (?1517- ¹No 1:60a; < ˙CHILQ-˙PALQ ¨LI) 'a road of seven or eight leagues'. The word phā'-il 'the eighth (of April = Buddha's birthday)' must have elided the l of phal-il < ˙PALQ-˙ZILQ at a time when the Chinese morpheme for 'day' was felt to begin with an apical sibilant.

Etymologies with elision of l before an apical (LKM 1963:87-8) include:
kyeo-sali (1748 Tongmun 2-46; cited from LCT) 'mistletoe' < *kyezu(l) sali ('winter life'); "WINTER-ul-sa-li" (1431 Wellyeng), "WINTER-sa-i" (1250 Hyang-kup);
kwu[l]-cwokay (?1544- Akcang: Cheng-san) 'oysters and clams; oyster (with shell)' = ˙kwul s cywokay (1489 Kup-kan 6:81; cited from LCT); "kwulq-cwo-kay" (1250 Hyang-kup);
minali < *munali < *mul nali 'parsley'; "WATER-nay-lip" (1250 Hyang-kup).

In a maximally informative notation all elisions can be shown with the elided consonant between brackets, as above for [l]. And it is possible, as set forth in Part II, to treat ···[l]-˙two as ···[-ti] ˙two though that is probably not the best historical explanation. When the elision is between two words (or within a noun compound), the apostrophe is used: kau' nāy 'throughout the autumn', **kyewu' nāy** 'all

winter long'; atu' nim, tta' nim; so' namu 'pine tree'; cha'-tōl 'quartz; silicon'; ˙na'-˙tol 'days and months'; ppu'-takw(un)i 'a part or corner sticking up' (< ppul 'horn'); mu'-soy 'cast iron'; panu' cil 'needlework, sewing', kantu'-cak kantu'-cak 'swaying gently' (< kantul kantul); cha'-pssal '(hulled) glutinous rice'.

Before i and y the phoneme n is sometimes weakened to just nasality and even dropped. Ramsey (1978:52-3) says that in South Hamkyeng both n and ng are reduced to nasality on the preceding vowel when y or i follows, but a trace of the apical articulation of the n remains in that the preceding vowel will not be fronted (in the usual assimilation to the following y or i). Speakers in various places say [ãi] or [ai] for ani 'no'. Examples of n-elision from fishing villages of North Kyengsang (Choy Myengok 1979:23): ku key cip i a(y)ila(y) 'that's not a house'; ma:i = mānh.i 'lots'. The MK noun ˙kwoy 'cat' has the earmarks of a missing consonant *kwo˙[ ]i and 1103 Kyeylim writes the word with the phonograms "kwo-ni". Quite a few modern dialects, including that of Ceycwu, attest the word as konayngi (Kim Hyengkyu 1974:b-170), retaining the nasal.

2.11.4. Sibilant lenition and elision.

Before a vowel the stem-final consonant of ···(s)- verbs (§8.2.5) like cīs-/ci- 'build' and nās-/na- 'be/get better' vanishes in modern Seoul, but in MK it was a voiced [-z-], so that the infinitives were spelled ci˙ze and na˙ze, using the obsolete triangle symbol for the MK /z/. Since modern dialects retain forms such as /nasa/ for naa 'get/be better' ← nā(s)-, we assume that the MK version was an ephemeral lenition of an earlier -s-, a lenition which took place under conditions absent from the regular s-final consonant stems (see Martin 1973, Ramsey 1975). Most of the modern ···s- stems were leniting in the 15th century, including as- 'seize', but pes- 'take off (clothes, ...)' and its obsolete variant pas- are attested only as regular ···s- stems. And MK is- (> modern iss-) 'exist', a contraction of MK isi-, never lenited, for that allomorph was used only before consonants. The verb wūs- 'laugh' was a leniting stem in the 15th century, with the infinitive wu˙ze, but the lenition did not survive to give us modern *wue, and the stem is regular today. Kim Wancin (1973) believes that this stem was restructured because of a clash between the homonyms that developed for such forms as MK wu˙lun > wūn ' ··· that cried' and wu˙zun > wu-un → wūn ' ··· that laughed'; but notice that 1876 Kakok has (122) wu-un and (90) wu-um as forms of 'laugh'. Are there any modern dialects that treat the verb as leniting?

According to the map in LSN 1956:103 the unvoiced [s] is retained for MK z in dialects of the northeast and much of the south but is lost in the middle and the northwest; the area where -z- was lost is somewhat wider than that of the loss of distinctive pitch accent but it covers that territory. LSN concludes that the assimilatory voicing of -s- between voiced sounds (vowels, l, m, n) arose in the middle and northwestern areas during the middle ages (1300-1600); it was apparently not present in the Sinla language, he says, and it began to disappear again in the middle of the 16th century. He did not address the question why some MK words have ···z··· but others have ···s···. Unless we can establish prosodic conditions for the lenition, the exceptions will have to be treated as the result of dialect mixture or the failure to maintain or even establish an orthographic tradition in the midst of the collapse of the distinction. Did the modern dialects lacking the distinction of -(s)- stems ever go through a stage when they had the voiced [z]? Probably not, though that would be implied by an explanation that would have their modern paradigms restructured by analogy. As mentioned in §2.4, it is rare to hear [z] as an allophone of /s/ in any modern dialect, but there is evidence for that in earlier Hamkyeng speech as reported by Putsillo in 1874 (see Martin ?1991, King 1990), though it is apparently absent in that area today. There would seem to be no good motivation for a voiced fricative sound to become voiceless precisely in all-voiced environments, so I assume that modern s (rather than elided [z]) in areas for which the voiced version was earlier reported must be due to people being overwhelmed by the habits of nearby speakers who never gave into the lenition.

Some of the MK words with ···z··· appear with s in modern dialects: kozolh/kozol 'autumn' > kasil, kusul, kisil as well as standard kaul; mozolh 'village' > masul, masil, maswul, ... , as well as

standard **maul**; *mwuzu / mwuzG···* < **musuk* 'radish' > **musu, musi, muku, mukkwu, mutkwu,** and (Pukcheng) **mukk** as well as standard **mwuwu**. The word for 'kitchen' appears both as *puzep* (1451, 1466, 1481) > *puep* (1632) and as *puzek* (1481, 1527) > *puek* (1632) and has the modern dialect versions **pusep, pusap, pusek, pusik, pucek, pucik,** (Pukcheng) **pĕkk** as well as standard **puekh** (usually treated as **puek** in Seoul); it is probably from an old compound with *·pu[l] s* ·· 'of the fire' attached to a variant of **seph** < **s(y)ep[h]* (the *syep* spelling is in 1632 Kalyey but earlier attestations are all *sep*, and the hypothetical final *h* is not attested before the 20th century), perhaps a variant of *nyeph / nyekh* 'side', which would help account for the doublet forms with *··p* and *··k*. It is unclear how far back the final aspirated velar of the standard version *puekh* can be traced; Scott wrote *pwuek ey* (1887 Scott 196 = 1893 Scott 240). For more on **puekh** see Ramsey 1984. The noun *mozom* 'heart, mind' > **maum** is reported as *moum* or *mosum* in Ceycwu dialects; the MK *z* may have lenited from *c*, since phonograms of 1400+ Kwan-yek (item 405) represent *"mo-com"*. It should be kept in mind that a few of the *··z··* words survived with an affricate (instead of *s* or zero): **honca** 'alone' (see the entry in Part II and the discussion in §2.10.4), ... And the particle **kkaci** < *s koc(i)* < *s ko·c(ang)*, as well as *ko·cang* 'end' and (> **kacang**) 'most, very', offers evidence for the history of *"kos* < *ko·zo* < **ko·co* 'brink, edge'. LKM 1972a:38-9 calls attention to the forms *·swon·cwo* (?1517· Pak 1:63a) < *·swonzwo* (1447 Sek 6:5a) 'by his / her own hands, personally' and *mwomcywo* (1617 Sin-Sok chwung 1:36) = *·mwomswo* (1586 Sohak 6:25a) [= *chin·hi* 1518 Sohak-cho 9:27b] < *·mwomzwo* (1481 Twusi 6:34a) 'with one's own body, personally', and would explain modern **samcil** 'Double Three day (= the third of March)' as continuing a nativized SAM-·ZILQ 'day three'. He also mentions MK *namcin* 'man, husband', which must be from a nativized NAM-ZIN.

Some of the *··z··* words are lexicalized from phrases: *"ilza·ma* (1462 [1]Nung 6:70b, 1463 Pep 7:159a) 'indulging in' < *"il (·lwo) sa·ma* 'making it one's business'. And *"twu·zeh* 'a few' is from *"twu[lh]* + a variant of *"seyh* 'three'. Other examples of lenition of a morpheme-initial sibilant include the deferential *-"zow-* and the particle *·za*.

The stem *"wuzW-* 'be laughable', found in *"wuzWu·l i* (1445 [1]Yong 16) and *"wuz·Wi* (1449 Kok 179) has undergone a second lenition (labial) by attaching the leniting bound adjective *-p-*; the source form must have been **wusupu-*. The stem *"yez·Gwo-* (*"yez·Gwa* 1462 [1]Nung 10:41a, *"yes·Gwa* 9:87b) derives from **yez-Wwo-* < *"yes-·pwo-* 'spy on' (He Wung 126).

2.12. The accent of earlier forms.

The language spoken in modern Seoul differs from the 15th-century language in lacking accentual distinctions that are still found in northeastern and southern parts of the peninsula in the form of patterns of pitch or combinations of pitch and vowel length. Although some of the southernmost dialects (such as Kimhay) have three pitch levels − high, mid, low − others (such as Antong) have two levels, high and low, but distinguish some of the low syllables by lengthening the vowel. Still other dialects (such as Hamhung) merge those two categories but end up with both pronounced high and the expected high pronounced low. And in older Seoul speech the vowel length of the third category was preserved, but a difference of pitch level got lost, so that there was a merger between the short high and low syllables. In most of the texts of the 15th century a single dot was placed to the left of a high-pitched syllable, a double dot to the left of syllables that were long and rose from low to high, and the low short syllables were left unmarked. When a word is cited in isolation without tone marks we cannot be sure whether it represents all low syllables in a tone-marked text or is taken from a text that did not mark the tones. In words and phrases of more than one syllable the stretches of tones formed accentual patterns, much like those of Japanese pitch accent, and that makes Korean different from a tone language such as Vietnamese or classical Chinese. Scholars of the early Hankul period were acutely aware of the traditional Chinese four tones (sā-seng) and wrote these for the Hankul readings of Chinese characters, equating the low tone with the "even" tone (phyeng-seng), the high tone with the "going" tone (kĕ-seng), and the long low-high with the "rising" tone (sāng-seng).

The "entering" tone (ip-seng) was posited by Chinese phonologists to account for the syllables ending in unreleased voiceless stops -p, -t, and -k, still heard in Cantonese but lost in northern Chinese. In borrowing Chinese words, Koreans treated those stops as -p, -l, -k, with the apical version written -LQ in Hankul readings of characters, and marked them with the single dot of the "going" tone. But the character readings, with respect to tone as well as other features, were somewhat artificial, constructed to conform to the information that Chinese phonologists had compiled as riming guides for the language of the 7th century. Chinese words that got into popular usage were often treated differently, though the "even" tone (accounting for almost half the Chinese morphemes) was usually equated with the Korean unmarked low tone.

The accentual patterns of native Korean words did not, of course, come from China, but must be considered a distinctive part of the ancestral forms. Because of partial correlations between the accent and the canonical shapes of morphemes, it is suspected that at least some of the patterns were internal developments, so that possibly the ancestral language may have treated pitch as nondistinctive; but that hypothesis remains unproven. The low-high rise marked by the double dot is often the result of collapsing two syllables (low + high) into a single long syllable; and sometimes, especially in verb forms, it indicates retention of the high pitch of a syllable that elided its vowel, typically the nondescript u or o that represented a minimal vowel quality. Thus for 'walk' the modifier ke·lun < *ke·tu-n (1459 Wel 1:27b) has an overt vowel to carry the high tone, but the gerund ¨ket·kwo < *ke·t[u]-·kwo (1449 Kok 130) does not, so the high pitch is added on to the low pitch of the preceding syllable. (See Ramsey 1978a:209-24.)

The MK tone dots have been transcribed as they appear (or do not appear) in the cited passage when that is from a photocopy of the original text or when it is from a secondary source that included the information. The examples from 1445 ¹Yong carry the accents of LKM's 1962 interpretation. I have added in brackets a few tone marks that I think are missing because of broken type, or that are the result of surface processes (such as the frequent loss of a dot from a string of three dotted syllables), where the restoration helps the reader see the structure. I have not, in general, given the basic or reconstructed dots for strings of morphemes in endings. There, as toward the end of long phrases in general, a tendency developed to disregard distinctive accent after the first in a stem (or a noun), either omitting the marks or indicating an automatic "sing-song" tune of alternating pitches. The tendency became quite noticeable in 1481 Twusi, where Kim Chakyun (1979), like Kim Wancin and Ceng Yenchan earlier, observes that many particles and endings that had been marked ˙ (high) in 1445 ¹Yong, 1447 Sek, 1449 Kok, and 1459 Wel are left unmarked (low) or marked ¨ (low-high), and that is even more striking in 1587 Sohak; he characterizes the trend as (38) "neutralization at end of word". We have left unmarked the frequent suppression of a final dot on the infinitive ending when a particle (with dot) is attached, such as e·wule ˙za (1451 Hwun-en 13a) CF e·wu·le (1463 Pep 2:114b). And for the most part we do not call attention to suppression of the second of three dots on contiguous syllables, as in ˙pwola·m ol (?1468- Mong 20a) 'the sign' — CF ˙pwo·la.m i˙n i (1459 Wel 21:217-8), but we make a few exceptions when it helps account for the words in a phrase: ˙wos ˙kwa ˙pap [˙]kwa ˙ay (1481 Twusi 16:19a), ˙swoy [˙]yey ˙sye (1459 Wel 2:28b), swo·li [˙]yey ˙sye (1447 Sek 24:1b), ˙hoy [˙]yey ˙za (1447 Sek 23:13a), ˙i kak·si [˙]lwo ˙za (1459 Wel 7:15b). We leave unmarked the suppression of an accent in ¨twuy.h ey ˙nun (1445 ¹Yong 30) = ¨twuy[˙]h ey ˙nun, CF ¨twuy˙h ey n' (id. 70).

There are numerous examples of the crasis of a final low pitch with the tonal residue of an ellipted high-pitch syllable (CF He Wung 337): ¨nay˙h ay to¨li ¨eptwo·ta (1481 Twusi 25:7a) 'there is no bridge on the river' < ·toli ˙[i]; ¨CO ˙non mot nwu¨uy ˙ˈGwo ˙MOY ˙non azo nwu¨uy ˙ˈla (1459 Wel 21:162a) '[the Chinese word] ¨CO is an older sister, ˙MOY is a younger sister' < nwuuy ˙i ˈGwo -- nwuuy ˙i ˈla. That is what accounts for the rising accent in preconsonantal forms of the -L- stems (§8.3.2).

2.12.1. Accentual patterns.

A limited number of patterns were available for words of a given length. The patterns are shown below, with examples, for nouns and adverbs of one, two, and three syllables.

L	H			R
mol 'horse'	ʼ*mal* 'measure'			¨*mal* 'words'
LL	HL	LH	LR < LLH	RL
pwoli 'barley'	ʼ*seli* 'midst'	*me ʼli* 'head'	*mak* ¨*tay* 'club'	¨*cyepi* 'swallow'
	HH(/HL)			RH
	ʼ*mwo ʼkoy* 'mosquito'			¨*ke ʼcus* 'false'
	(HLL/)HLH	LHH	LLH	RHH
	ʼ*twos.ka ʼpi* 'goblin'	*mye ʼnu ʼli* 'wife'	*kama ʼkwoy* 'crow'	¨*a ʼmo ʼlyey* 'how'
	HLH	LHL	LLR	RLH
	ʼ*muci ʼkey* 'rainbow'	*ye ʼtolay* '8 days'	(−)	¨*sama ʼkwoy* 'mole'
LLL	HHH			RLL
cintolGwuy 'azalea'	ʼ*kuy ʼlye ʼki* 'goose'			(−)
LRL	HRH	HLR	LHR	RHL
(−)	(−)	ʼ*ema* ¨*nim* 'mother'	*a ʼpa* ¨*nim* 'father'	¨*ke ʼcu-* ¨*mal* 'lie'
RRL	RRH			RLR
(−)	(−)			(?)

Ramsey, following Ceng Yenchan (1971), assumes that certain patterns freely varied with each other: HH / HL; LHL / LHH; HLL / HLH / HHL. That assumption is made for two reasons: the patterns are merged in the reflexes found in the modern dialects, and for some of the words the early attestations vary. We find three kinds of evidence for a given etymon:

(1) Only one pattern is attested. For these, we have no direct evidence that the pattern was not distinctive.

(2) Two or three patterns are attested and the variants are unmotivated, in that they cannot be explained by their environments. For certain words there may be only one attestation for a variant pattern, while for other words there are several attestations for each pattern.

(3) Certain words accentuated H(H)H are converted to H(H)L when a particle or copula expression is attached. This is a prosodic adjustment, as if to avoid a long string of high syllables, though such plateaus can be found in other phrases.

In the examples that follow, the English gloss is given first.

Type H X X

HHH

'wild goose' ʼ*kuy ʼlye ʼki* (1527 Cahoy 1:8b=15a)

HLH / HHL

'goblin' ʼ*twos.ka ʼpi* (LCT; 1447 Sek 9:36b, 1449 Kok 163, 1482 Kum-sam 4:23a); ʼ*twos ʼkapi* ʼʼ*n i* (1459 Wel 21:105a).

HHH / HLH (? or HLL, attributing the accent to the particle)

'crane' ʼ*twu ʼlwu ʼmi* (LCT; 1459 Wel 7:66a, 1527 Cahoy 1:9a=16a); ʼ*twulwu ʼm[i] uy* (?1517- Pak 1:27b)

HLH

'rainbow' ʼ*muci ʼkey* (1445 [1]Yong 50, 1462 [1]Nung 2:87b, 1481 Twusi 16:42b, 1527 Cahoy 1:1b=3a)

'tadpole' ʼ*wolchang-ʼi* (1527 Cahoy 1:12b=24a) = ʼ*wolchang* (1446 Hwun 29a; the dot is strangely missing in the Taycey-kak repro, but it is clear on the photo plate included in [1]Yi Sangpayk 1957)

'rather' ʼ*wohi ʼlye* (1459 Wel 1:37a, 21:149a; 1462 [1]Nung 2:67a; 1463 Pep 2:77a, 2:158a, 4:192-3; 1475 Nay 2:1:2b)

HLR

'mother' ´ema ¨nim (1445 [1]Yong 90, 1449 Kok 16, 1459 Wel 2:6b), ~ ´i (1459 Wel 8:84b) = ´ema ¨ni´m i (1459 Wel 21:27b, 21:28a)

HLH / HHH

'grandfather' ´hana´pi (= ´ha.n a´pi) (1527 Cahoy 1:16a=33a), ´hana´pi l' (1445 [1]Yong 125); ´ha´na´pi (?1517- [1]No 2:34a)

HHL / HLH / HHH

'peak' ´tyeng´paki (1447 Sek 6:43b, 1459 Wel 18:16b); ´tyengpa´ki (1465 Wen 2:2:1:38a); ´tyeng´pa´ki (1527 Cahoy 1:13a=24b) 'peak'

HLH / HHL

'elephant' ´kwokhi´li ´´Gwo (1459 Wel 1:27b), ´kwokhi´li ´´n i (id. 1:28a); ´kwo´khili (1527 Cahoy 1:9b=18a) < *´kwoh ki´l[u]-´i 'nose long-one' = 'long-nosed one'

Type L X X

LLH

'ant' kayya´mi (1447 Sek 6:35 [[1]Yi Tonglim version], 6:37, 1481 Twusi 15:56a, 1482 Nam 2:32a), kayya´mi l' (1481 Twusi 7:18b) = ka.ya´mi (1459 Wel 18:39b, 1481 Twusi 8:8a, 1482 Kum-sam 5:36a)

'branch' kayya´ci (1481 Twusi 23:23a) = ka.ya´ci (1481 Twusi 10:5b)

'here' inge´kuy (1447 Sek 19:17b; 1459 Wel 13:35b, 14:59a; 1481 Twusi 7:14a; 1482 Nam 1:14a)

LHL

'eight days' ye´tolay (1459 Wel 2:35ab)

'mullet' ka´mwothi (1527 Cahoy 1:11a=20b)

LHR

'acorn' two´thwo-¨pa.m ol (1481 Twusi 24:39a) = LHH two´thwol-´Gwam (id. 25:26b)

'father' a´pa ¨nim (1449 Kok 23); ~ ´ul 1459 Wel 8:84b, ~ ´i 10:2a; a´pa ¨nim s ´kuy (1447 Sek 6:1a)

LHH

'harp' ke´mun-´kwo (1481 Twusi 16:30b; 1586 Sohak 6:94b), ke´mun-´kwo y (1481 Twusi 21:35a)

'nine days' a´ho´lay (1447 Sek 9:31a = 1459 Wel 9:51ab)

'puddle' wung´te´ngi (1527 Cahoy 1:3a=5b)

'sneeze' co´choy´ywom (1475 Nay 1:49b, 1527 Cahoy 1:15b=29b, 1586 Sohak 2:7a)

'wife' mye´nu´li (1447 Sek 6:7a, 1527 Cahoy 1:16a=31b, 2:1a)

'acorn' (1) two´thwo´li ([1517→]1614 Saseng 2:68a [dots obscured in repro], 1527 Cahoy 1:11b)
      (2) two´thwol-´Gwam (1481 Twusi 25:26b)= LHR two´thwo-¨pa.m ol (id. 24:39a)

LHL / LHH

'aunt' a´comi (1445 [1]Yong 99, 1481 Twusi 8:38a); a´co´mi (1527 Cahoy 1:16b=31b, 1:16b=32a), a´com[y] oy ´swon-toy (1475 Nay 2:1:29b)

'midst' ka´won-toy (1482 Kum-sam 2:65a), ka´won-toy s (1482 Kum-sam 2:31b); ka´won-´toy (1447 Sek 6:31a; 1459 Wel 1:4a, 1:30a, 2:51b, 9:22b; 1462 [1]Nung 2:84b, 3:38a; ?1468- Mong 43b, 64b; 1481 Twusi 15:44a; 1518 Sohak-cho 8:32b), ka´won-´toy n' (1449 Kok 70), ka´won-´toy l' (1482 Kum-sam 2:65a), ka´won-´toy s (1527 Cahoy 3:34b=15b)

'a mute' pe´weli (1550 [1]Yenghem 11b); pe´we´li (1447 Sek 19:6b, 1459 Wel 17:52a, 1527 Cahoy 2:16b=34a)

'packsaddle' ki´luma (1481 Twusi 15:1b, 21:22b, 22:8b; 1586 Sohak 5:54a); ki´lu´ma (1527 Cahoy 2:13b=27a)

'seagull' kol´myeki (1481 Twusi 7:37a, 10:2a, 15:53a, 21:38a); kol´mye´ki (1527 Cahoy 1:9a=16b)

'traveler' na´kunay (1481 Twusi 7:2a [LCT is wrong], 7:9a, 7:14b, 7:26b, 10:2b, 15:23a, 15:31b); na´ku´nay ´´n i (?1517- [1]No 1:18b)

At least one noun has variants starting either low or high:

LLH / HLH

'cricket' *moyya˙mi* (1527 Cahoy 1:12a=22b), *moyya˙m[i] oy* (1482 Nam 2:40b); *˝moyya˙mi* (1481 Twusi 15:27b; LCT "*˝moyGa˙mi*", but *ya* is clear in the repro), *˝moyya˙m[i] oy* (1481 Twusi 20:8b)

There are a few words with more than one rise. They are reduplications, phrases, or half-assimilated Chinese loans:

RR

'always, ever' *˝nay˝nay* (1445 ¹Yong 16, 1447 Sek se:2a, 1463 Pep 2:20b [dots obscured in repro])

'filial devotion' *˝hywo˝yang* (1586 Sohak 6:50b = 1518 Sohak-cho 9:55a) < *˙HYWOW-˙YANG*

'grudge' *˝wen˝mang* (1586 Sohak 6:83b) = *˝wen˙mang* (1518 Sohak-cho 9:90a) < *QWEN-˙MANG*

RRH

'bird beak' *˝say ˝pwu˙li* (1527 Cahoy 3:3b=6b)

To the examples of rise patterns we can add various forms of verbs and compound verbs, taken from examples in Part II and here listed without gloss or source:

RRL *˝ti-˝nayGwo*

RRH *˝ket-˝nay˙ya*

RLR ?

RLL *˝etusil, ˝wulGenul*

RLH *˝ayGwa˙thye, ˝azop˙kwo, ˝cyektwo˙ta, ˝cywokwo˙ma, ˝ep.su˙sya, ˝hoyGi˙ta, ˝hoyGwo˙ta, ˝ilGe˙tun, ˝kyesi˙ta, ˝mantha˙la, ˝salGe˙na, ˝samke˙nul, ˝sitcop˙key, ˝twolo˙sya, ˝wulGwe˙le*

RHH *˝al˙Gwa˙tye, ˝cwos˙soWa˙n, ˝cye˙ku˙na, ˝nam˙to˙lwok, ˝sa˙ni˙ta, ˝wu˙ni˙ta*

RHL *˝a˙losil, ˝a˙losyam, ˝a˙molyey, ˝ep˙kesin, ˝ep˙siGwul, ˝ep˙susil, ˝kye˙siken, ˝mey˙zoWa*

LLR *kolo˝chywom*

LRL *cap˝sopke˙n, mas-˝nala, tut˝copkwo, tu˝zopta*

LRH *tut˝cop˙kuy, nip˝sop˙kwo, tut˝cop˙ti*

LHR *kol˙hoy-˝nay*

HRH ?

Examples of (invariant) LH:

'butterfly' *na˙poy* (1462 ¹Nung 7:83b; 1481 Twusi 15:11b, 21:6b; 1527 Cahoy 1:11b=21b), *napoy ˙lol* (1463/4 Yeng 1:22b; dot obscured?), *na˙pwoy* (1481 Twusi 15:32a, 23:20a) ≠ *na˙p oy* 'of the monkey' (1465 Wen se:64a, 1482 Kum-sam 2:44b) = *nap ˙uy* (1481 Twusi 20:21a)

'bug' *pel˙Gey* (1447 Sek 9:24b, 1449 Kok 28a, 1459 Wel 9:26a, 1462 ¹Nung 7:83b, 1463 Pep 2:107a [dot obscured in repro], 1527 Cahoy 3:2a=3a)

'fault' *he˙mul* (1459 Wel 2:6a; 1462 ¹Nung 4:53a, 4:122a; 1463 Pep 4:36b; 1527 Cahoy 2:17a=35a, 3:29a); *he˙mu˙l* (~ *ul* 1445 ¹Yong 119; ~ *i* 1447 Sek 9:4b, ~ *un* 1462 ¹Nung 7:85a)

'fish; flesh, meat' *kwo˙ki* (1447 Sek 6:10b; 1481 Twusi 7:5a, 7:7b, 10:31b, 16:19b, 22:7b; ?1517- ¹No 1:22a; 1527 Cahoy 2:11a=21b, 3:2a=3a), ~ *˙lol* (1447 Sek 9:12a), ~ *lol* (1481 Twusi 25:14b), ~ *non* (1481 Twusi 16:19b), ~ *˙la ˙two* (1447 Sek 9:13a); *kwo˙k[i] oy* (1459 Wel 1:14a), ~ *lan* (1481 Twusi 21:3a)

'root' *pwul˙hwuy* (1445 ¹Yong 2, 1462 ¹Nung 2:22a, 1463 Pep 2:131a, 1481 Twusi 7:23b, 1527 Cahoy 3:2a=3b), ~ *˙˙la* (1459 Wel se:21a), ~ *˙lol* (1447 Sek 6:30b, 1449 Kok 99)

'scales (of fish, etc)' *pi˙nul* (1527 Cahoy 3:2a=3a; ~ *˙ul* 1449 Kok 28a, ~ *˙Gwa* 1459 Wel 7:35a), *pi˙nu˙l ey* (1447 Sek 13:8a), *pi˙nu.l ol* (1482 Nam 1:64a), *pi˙nol* (1481 Twusi 25:14b)

2.12.2. Accentual variants.

Certain words are attested with two or more accentual patterns. In the most common type, the variant loses all dots but the first, exemplifying the tendency to neutralize pitch distinctions in the later part of a word:

'as if' *˙ma˙chi* (1447 Sek 6:25b, ?1517- Pak 1:23a, ?1517- ¹No 2:66a) > *˙machi* (1481 Twusi 7:7b, 10:9a; 1482 Kum-sam 2:53a)

'fitting' *˙mas˙tang* (1462 ¹Nung 1:89a; error?) > *˙mas.tang* (1447 Sek 13:12b, 1462 ¹Nung 10:42b, 1463 Pep 3:196b, ?1468- Mong 20a, 1481 Twusi 8:6b, 1482 Kum-sam 2:37a, 1475 Nay 2:1:49a)

'deliberately' *kwu'thuy'ye* (1459 Wel 9:13b, 1463 Pep 2:203a, 1481 Twusi 20:29a) > *kwu'thuyye* (1449 Kok 145; 1481 Twusi 10:12a, 25:29a)

'first' *pi'lu'se* (1463 Pep 1:131a, 1465 Wen 1:2:3:6a) > *pi'luse* (1464 Kumkang se:6b; 1465 Wen 1:2:2:140a, 2:3:1:25a, 2:3:1:52a, 2:3:2:68a; 1475 Nay 2:1:16ab; 1482 Kum-sam 2:3a, 4:36b; 1482 Nam 1:33b)

'mirror' *ke'wu'lwu* (1462 ¹Nung 2:17b,b; 1481 Twusi 21:35b) > *ke'wulwu* (1447 Sek 24:20b; 1459 Wel 8:20b; 1482 Kum-sam 2:63a, 3:31a)

'obligatorily' *mwo'lwo'may* (1447 Sek 6:2b; 1451 Hwun-en 13a; 1459 Wel se:17a, 7:15b, 14:31b, 23:91b; 1462 ¹Nung 4:77a; 1465 Wen 2:3:2:44a; ?1468⁻ Mong 10b; 1463 Pep 4:148b; ?1517⁻ ¹No 2:44a) > *mwo'lwomay* (1475 Nay 1:76b; 1481 Twusi 15:6a, 15:42b, 20:4b; 1482 Nam 1:24a)

'necessarily' *pan'to'ki* (1462 ¹Nung 1:17a, 1:67a) > *pan'toki* (1465 Wen 1:1:1:63a, ?1468⁻ Mong 13a)

'king' ⁻*nim*-⁻*kum* (1445 ¹Yong 33, 49, 84, 121; 1459 Wel 1:31b) > ⁻*nim-kum* (1481 Twusi 10:9b, 22:46 [faint]; 1475 Nay 1:9b)

'woman' ⁻*kye'cip* (1463 Pep 2:28b; 1447 Sek 6:6b) > ⁻*kyecip* (1447 Sek 6:4a, 19:19b, 24:2b; 1459 Wel 7:10b, 8:94b; 1463 Pep 4:176a,b)

The honorific term for '(one's) words' is usually ⁻*mal-ssom* but when it is before the particle '*o'lwo* it appears as ⁻*mal-*⁻*ssom*, as in 1447 Sek 13:48a (⁻*mal-*⁻*sso.m o'lwo*) and 1465 Wen se:11a (⁻*mal-*'*so.m o'lwo*); CF He Wung 328. (He Wung misreads 1451 Hwun-en 1a as a similar example with the nominative particle, but the text has ⁻*mal-sso.m i'la*.)

The word for 'cloud' is '*kwulwum* (1445 ¹Yong 42; 1447 Sek 19:41b; 1449 Kok 81; 1459 Wel 2:51b, 7:35a, 7:31-2; 1462 ¹Nung 4:6a, 8:50b; 1463 Pep 3:35a; 1465 Wen 1:1:10b; 1481 Twusi 7:23b, 8:11b, 15:9a, 15:9b, 21:7b, 21:14b, 21:22b, 21:41b; 1482 Nam 1:34a; 1482 Kum-sam 3:36b; ...) but there is at least one example of '*kwu'lwum*: '*kwu'lwu.m i'la* (1459 Wel se:18a), yet on the next page (18b) '*kwulwu'm ulh*.

A word for 'branch' is cited as '*kaci* by LCT and as '*ka'ci* by NKW, and He Wung gives a single example of the latter, '*ka'ci 'lwo'ta* (1481 Twusi 7:1a), but in the only reproduction of the passage I have seen the marking is unclear; in any event, it could be treated as '*ka'c' ilwo'ta* with the second dot going with the copula form ('*ilwo'ta*). Other examples (1447 Sek 13:47a, 1449 Kok 19, 1459 Wel 1:43b, 1481 Twusi 8:3b, 15:4a) all seem to be '*kaci*. Compare the LH word *ka'ci* 'kind, sort' (as noun 1465 Wen 1:1:2:61a; as counter 1447 Sek 6:4a and 24:2b, 1459 Wel 21:88-9, 1462 ¹Nung 2:17a, 1481 Twusi 8:24b, 1482 Kum-sam 4:40a), whence *hon ka'ci* 'same' (1447 Sek 13:29a, 23:4a; 1459 Wel 2:61a, 8:31b, 9:22a; 1462 ¹Nung 1:17a, 1:99a, 2:19a, 6:54a; 1482 Kum-sam 4:20b; ?1517⁻ Pak 1:72).

Ramsey 1978a:109 has a list of forty two-syllable nouns said to be High-Low or High-High in Middle Korean, including the above three. But for these three, at least, the attestations of the High-High versions are very few, as we see above, and perhaps are to be accounted for as a back-shift of the initial accent of the copula forms *i'la* and '*ilwo'ta* and of the particle '*o'lwo*, which often functions as an adverbialization of the copula ('so as to be, being, as'). Of the other words listed by Ramsey, for 'fly' LCT has '*pho'li* (1527 Cahoy 1:11b=21b) and NKW '*pholi* (1481 Twusi 10:28b, 20:26a), but the High-High pattern occurs only isolated in the 16th-century dictionary; the word is one of several early examples of the accreted noun/suffix -*i* and was earlier (1446 Hwun 27b) just '*phol*. The only tone-marked examples of '*kwuki* 'ladle' (1527 Cahoy 2:7a=11a), '*pak.ha* 'mint' (1527 Cahoy 1:8a=15a), and '*toypha* 'plane' (1527 Cahoy 2:8b=16b) are High-Low, as are those of:

'chick' '*piywuk* (1446 Hwun 28a)

'owl' '*puheng* (1446 Hwun 28a) = '*puhweng-i* (1527 Cahoy 1:8b=15b), probably < '*puhweng* (*pa'hwoy*) 'Phoenix (Rock)' (1445 ¹Yong text 5:27b) = ⁻*pwonghwang* (1527 Cahoy 1:8a=15a) < ⁻*PWONG-HWANG*

'midst' '*seli* ('*seli 'yey* 1445 ¹Yong 4, 1449 Kok 124; 1459 Wel 9:35f; 1481 Twusi 7:10b, 10:13a, 16:39a; '*seli ''la* 1459 Wel 1:19b). If not a mistake, *kwulwum se'li lwo 'sye* (1481 Twusi 22:21b) treats the first two words as a compound; we expect a dot on the first syllable of '*kwulwum* 'cloud'.

'taro' '*thwolan* (1481 Twusi 7:21b, 22:56a; 1527 Cahoy 1:7b=14a)

The only attestations of the following words are High-High:
'jar' ˈtanˈti (ʔ1517- Pak 1:41a, 1527 Cahoy 2:7a=12b)
'rice wash-water' ˈstuˈmul (1459 Wel 21:110b, 1527 Cahoy 3:5b=11a)
'strawberry' ˈptalˈki (1527 Cahoy 1:6b=12a; correct the heading "ˈptalki" in LCT 199a)
'belch' ˈthuˈlim (1527 Cahoy 1:15a=29b)
'helmet' ˈthwuˈkwu (1445 ¹Yong 52, 89; 1527 Cahoy 2:14a=28a)
'goat' ˈyemˈsywo (1527 Cahoy 1:10a=19a)

The word for 'wave' is normally treated as a phrase: ˈmul s ˈkyel (1465 Wen 1:2:3:22b) = ˈmu[l] s ˈkyel (1527 Cahoy 1:2b=4b), ˈmul s ˈkye.l i (1449 Kok 107; 1482 Nam 2:58a, 2:58b), ˈmul s ˈkyel s (1447 Sek 13:9b, 1459 Wel 9:22b, 1462 ¹Nung 8:84a, 1463 Pep 1:51a), ˈmul s ˈkye.l ul (1463 Pep 1:51a, 1465Wen 1:2:1:28a), ˈmul s ˈkye.l uy (1481 Twusi 8:11b), ˈmul s ˈkye.l iˈla (1462 ¹Nung 1:64a). But the second dot is absent in: ˈmul s kyeˈl ul (1481 Twusi 10:3b) and ˈmul s kyel TYWUNG ˈey (ʔ1468- Mong 43a) – yet ˈmul ˈs ˈkyeˈl ey (ibid.). CF 'tear' ˈnwun s ˈmul (1449 Kok 45, 1475 Nay 2:2:13b; ~ [ˈ]Gwos 1481 Twusi 8:30a), ˈnwun s ˈmu.l ey (1481 Twusi 8:45b), ˈnwun s ˈmu.l ul (1481 Twusi 7:10b) = ˈnwun z ˈmuˈl ul (1445 ¹Yong 91). Other words treated as phrases include:
ˈpal s tung 'heel' (~ ˈkwa 1463 Pep 2:12a, ~ ˈul 1463 Pep 1:55a, ~ ˈiˈGwo 1463 Pep 1:55a), ˈpal s tuˈng i (1459 Wel 2:40b, 2:57a; 1463 Pep 2:12a); and the lexicalized all-low version pa[l] s tung (1527 Cahoy 1:15a=29a).
ˈpal s paˈtang 'sole of foot' (~ s 1459 Wel 2:37b), ˈpal s paˈtaˈng i (1459 Wel 2:40a, 1462 ¹Nung 2:115b), ˈpal s paˈtaˈng ay (1466 Kup 1:32b; 1:63b lacks dot on /ng ay/); and the lexicalized pa[l] s paˈtaˈng ay (1462 ¹Nung 10:79a), pa[l] s paˈtang (1527 Cahoy 1:15a=29a).
ˈpal s kalak 'toe': ˈpal s kalaˈk ol (1482 Nam 1:50a); and the lexicalized pa[l] s kalaˈk oˈlwo (1447 Sek 6:39a [¹Yi Tonglim version]).

Ramsey concludes that all cases of High-High or High-Low belong to a single class of words with optional retreat (or spread?) of the high pitch, whether both variants are attested or not. In this book, a noun attested in only one variant is cited in that form; those with two variants are cited as one or the other, depending on the distribution. In effect, we imply that the earlier language had two classes, which eventually fell together, as indicated by the accent classes of the modern dialects described by Ramsey. To the extent we differ with Ramsey, it is perhaps a question of the timing of the merger of patterns, but we end up with at least four accent classes and he has only three: Low-Low (as in *toli* 'bridge', *mozom* 'mind', *motoy* 'joint', *polom* 'wind', *pwuthye* 'Buddha', ...), Low-High (as in kwoˈki 'fish, meat', naˈlah 'nation', seˈli 'frost', aˈtol 'son', aˈchom 'morning', ...), and High with the pitch of the second syllable nondistinctive as in these examples:
HH / HL
'child' ˈaˈki (1447 Sek 9:25b; 1459 Wel 1:44b, 8:100b, 8:101b, 21:124b; 1463 Pep 6:47a; ʔ1517- Pak 1:56a, 1:57a, 1:57b), ˈaˈk[i] oy (1459 Wel 8:81b, 8:83a); ˈaki (1447 Sek 6:13b; 1449 Kok 148; 1459 Wel 2:33b, 8:86a, 8:86b, 10:24b, 23:74b, 23:87a; 1475 Nay 2:1:40b; 1485 Kwan 10b)
'drought' ˈkoˈmol (1527 Cahoy 1:3a=2a), ˈkoˈmol s (1447 Sek 9:33b, 1462 ¹Nung 8:115a); ˈkomoˈl ay (1445 ¹Yong 2, 1463 Pep 2:28a), ˈkomoˈl i (1481 Twusi 7:36b, 25:11b)
'firefly' ˈpantwoy (1446 Hwun 29ab; 1465 Wen 1:2:3:40b, 2:2:1:52a; 1481 Twusi 8:40a, 21:9a, 24:7a; 1482 Nam 2:59b); ˈpantwoy ˈlol (1481 Twusi 6:20b)
= ˈpanˈtwo (1527 Cahoy 1:11b=21b); ˈpanˈtwoy ˈlwo[ˈ]ta or ˈpanˈtwo ˈylwo[ˈ]ta (1481 Twusi 8:12b)
'food' (*[TTA-ˈPPEN] >) ˈchaˈpan (1447 Sek 6:16a, 1527 Cahoy 2:10a=20a), ˈchaˈpan ˈol (1449 Kok 122), ˈchaˈpan ˈtwo (ʔ1517- Pak 1:7a); ˈchapan (1459 Wel 1:32a), ˈchapaˈn on (1459 Wel 2:25b), ˈchapan ˈul (1481 Twusi 24:63a); [ˈ]chapaˈn i (1481 Twusi 22:6a)
'granny' ˈhal-ˈˈmi (1459 Wel 10:17b, 1527 Cahoy 1:16a=31a), ˈhal-ˈmi ˈlol (1445 ¹Yong 19); ˈhal-ˈm[i] oy (1482 Kum-sam 3:12a; 1482 Nam 1:8b, 2:4a)
'lightning' ˈpenˈkey (1445 ¹Yong 30, 1447 Sek 6:32a, 1449 Kok 161, 1463 Pep 3:35a, 1482 Kum-sam 2:44a, 1527 Cahoy 1:1b=2b); ˈpenkey (1465 Wen 2:1:2:19a), ˈpenkey s (1482 Kum-sam 2:44b)

'mark' `pwo`lam (1463 Pep 5:14a, 1527 Cahoy 1:18b=35a), `pwo`la`m i (?1517- [1]No 2:16a),
`pwola`m ol (?1468- Mong 20a); `pwolam (~ `ho`ya 1462 [1]Nung 1:70b, ~ `ho.ya 1482 Nam 1:
70b), `pwo`la.m i`n i (1459 Wel 21:217-8, 1462 [1]Nung 8:119b)

'mother' `e`mi (1527 Cahoy 1:16a=31a; 1459 Wel 8:86a, 21:22a, 21:27a, 21:53a; 1482 Kum-sam
2:61a; 1481 Twusi 8:67b), `e`mi `lul (1518 Sohak-cho 9:55a), `e`mi l' (1462 [1]Nung 5:85b), `e`m[i]
uy (1459 Wel 21:21b), [`]`Je`mi i`sya (1459 Wel 8:83a); `emi `lol (1447 Sek 6:1b; 1459 Wel 21:20a,
93a), `emi `two (1447 Sek 6:3b), `emi `Gwa (1462 [1]Nung 5:85b); `emi `'la (1459 Wel se:14a),

'net' `ku`mul (?1517- Pak 1:70b; 1527 Cahoy 2:17a), `ku`mu.l i`la (1464 Amitha 7a); `kumu`l ey
(1447 Sek 9:8a, 1462 [1]Nung 8:93a), `kumu`l i (1459 Wel 8:10b), `kumu`l un (1481 Twusi 7:3a),
`kumu`l ul (1463 Pep 2:8b, 2:24b), `kumul s (1481 Twusi 21:38a)

'rabbit' `thwos`ki (1465 Wen 1:68a, 1527 Cahoy 1:10b=19b), `thwos`ki l' (1481 Twusi 16:36b);
`thwos.ki (1481 Twusi 21:38a, 1482 Kum-sam 4:63a), `thwos.ki `lol (1481 Twusi 10:26a),
`thwos.k[i] uy (1462 [1]Nung 1:74a, 1466 Kup 1:6a, 1482 Kum-sam 2:66b) = `thwos.k[i] oy (1481
Twusi 24:25b, 1482 Kum-sam 4:36b)

'shade' `ko`nol (1462 [1]Nung 8:50b, 1463 Pep 6:165a, 1527 Cahoy 1:1a). `ko`nol`h i (1462 [1]Nung
8:51a)l `ko`nol`h ay (1465 Wen 3:1:2:50a); `kono`l i (1463 Pep 5:180a), `konol `Gwos (1481 Twusi
23:8a), `konol`h ay (1463 Pep 2:103-4, 1481 Twusi 7:24a), `konol`h i (1459 Wel 18:26a, 1463 Pep
3:45b, 1481 Twusi 24:30a), `konol.h on (1481 Twusi 15:9b)

'sleeve' (1) `so`may (1527 Cahoy 2:11b=23a); `somay (1481 Twusi 8:45b), `somay `lol (1481 Twusi
20:47a, 22:25a), `somay `yey (1481 Twusi 6:4a, 23:2a),
(2) `so`moy `yey (?1517- Pak 1:72a), `so`moy s (1463 Pep 1:31b)

'snake' `poy`yam (1527 Cahoy 1:1b=22a), `poy`ya.m i `Gwo (1459 Wel 21:42b); `poyya`m i (1445
[1]Yong 7), `poyya`m oy (1463 Pep 2:165b), `poyya`m on (1481 Twusi 21:38b), `poyya`m ol (1481
Twusi 15:8b), `poyyam `kwa y (1462 [1]Nung 7:79a, 1481 Twusi 6:4a), `poyyam `kwa (1550
[1]Yenghem 15b)

'thunder' `wul`Gey (1447 Sek 6:32a, 1463 Pep 3:35a, 1482 Kum-sam 2:2b, 1527 Cahoy 1:2b),
`wul`Gey s (1481 Twusi 10:18a); `wulGey (1481 Twusi 7:24b, 10:19a; 1482 Nam 34b)

'topknot' `syang`thwu (1527 Cahoy 2:12b=25a) = `syangthwo (1586 Sohak 2:2a)

'twenty' `su`mul `sal (1445 [1]Yong 32) '20 arrows', `su`mul `kwo`t ile`la (1447 Sek 6:38a) 'it was 20
places', `su`mul[h] hon `hoy s so`zi `yey (1447 Sek 6:47a) 'in the space of 21 years'; `su`mul.h i`m
ye (1462 [1]Nung 2:57b), `sumul`h in SSI-`CYELQ `ey (1462 [1]Nung 2:8b) 'when 20 (years old)', `su`mu
`nal (?1517- Pak 1:8b) '20th day', `su`mu na`mon `hoy `lol (1447 Sek 24:2a) 'for over 20 years',
`su`mu `nas (?1517- Pak 1:20a), `su`mu lyang `two (id. 1:20b); `su`mul`h ey `sye (1462 [1]Nung
2:6b), but `sumul`h ey (ibid., also 1481 Twusi 8:19a)

'wolf' `il`hi (1527 Cahoy 3:10a=18b); `ilhi `Gwa (1447 Sek 9:24b) 'and wolves'; `ilhi towoy`ye
`ys.two`ta (1481 Twusi 10:19b) 'has become a wolf'.

Not in Ramsey's list of HH / HL nouns:

'bowl' `swo`la s (?1517- Pak 1:56a); `swola `lol (1586 Sohak 2:3b)

'mosquito' `mwo`koy (1447 Sek 9:9b, 1459 Wel 9:26a), `mwo`kuy (1527 Cahoy 1:1:11b=22a);
`mwokoy swo`li ?< `mwokoy [s] swo`li (1462 [1]Nung 4:3b); [`]`]mwo`koy (1579 Kwikam 2:60a)

'net-edge guide ropes' `pye`li (1527 Cahoy 2:8a=14b); `pyeli `lol (1481 Twusi 16:63b)

'now' `icey [< `i cek 'this time'] (1447 Sek 6:5b, 6:11ab, 24:16a; 1459 Wel se:13b, 2:42b, 2:64a,
8:98a, 8:101a, 9:35f, 10:8b, 13:19ab, 21:21b; 1481 Twusi 7:31b, 8:10b, 8:38a; 1482 Nam 1:30b),
`icey n' (1463 Pep 2:41a), `icey s (1447 Sek se:6b, 1459 Wel 2:9b, 9:35d), `icey `two (1459 Wel
2:64a), `icey `za (1449 Kok 115), `icey `'la (1459 Wel se:13b); `i`cey (1462 [1]Nung 4:126b, ?1517-
[1]No 1:1a), `i`cey l' (1462 [1]Nung 10:19a). Also icey (1459 Wel 23:78a), icey n' (1463 Pep 5:178b).

'pillow' `pye`kay (1527 Cahoy 2:6b=11b); `pyekay (1463 Pep 2:73a, 1481 Twusi 15:11b)

'picture' `ku`lim (1527 Cahoy 3:9v=20v); `kulim (1481 Twusi 16:25b, ?1517- Pak 1:64b)
Note that kuli`mey (= kulim`cey) is a noun meaning 'reflection, image, shadow' and is not to be
taken as `ku(`)lim 'picture' + particle `ey, for which we lack an example.

'plow' ˙ko˙lay (1527 Cahoy 1:6a=11r); ˙kolay (1481 Twusi 16:39a); kolay (1446 Hwun 28a, 1481 Twusi 25:22a)

The noun ˙hyenma 'how many / much' has both syllables high in ˙hyen˙ma s with the genitive particle.

For certain words the accent-marked attestations are really too few for us to draw conclusions:

'thunder' ˙pye˙lak (1527 Cahoy 1:1b=2b) is also attested (says LCT) in 1481 Twusi 18:19, but that text is not available to me;

'flute' ˙phi˙li (1527 Cahoy 2:16r=32b) is reported also in 1481 Twusi 9:40, to which I lack access;

'lotus persimmon' ˙kwo.ywom (1446 Hwun 28b) appears also with the odd pattern HR ˙kwo¨ywom (1527 Cahoy 1:6b=12a) and it is HH ˙kwo˙ywom in 1517 Saseng 2:13a (says NKW, but the Taycey-kak repro lacks the dots).

The first-person plural pronoun ˙wu˙li (1447 Sek 6:5a; 1459 Wel 13:35b, 13:36a; ?1517‑ Pak 1:54a; ...) suppresses the second accent when followed by a particle: ˙wuli ˙Gwos (1459 Wel 2:72a), ˙wuli ˙two (1459 Wel 8:100a), ˙wuli ˙za (1463 Pep 5:121b), ˙wuli n' (1459 Wel 2:69b), ˙wuli ˙tol˙h i (1447 Sek 9:40a, 19:30b; 1459 Wel 10:12b, 10:31a, 18:18b), ˙wuli ˙tol˙thwo [= ˙tolh ˙two] (1459 Wel 18:3a), ˙wuli ˙uy (1463 Pep 2:231a). Modifying a noun in the sense 'our' the word is often ˙wuli (1445 ¹Yong 3; 1459 Wel 18:42b, 21:193b; 1462 ¹Nung 10:42b; 1463 Pep 2:5b; 1482 Nam 1:54b; ?1517‑ Pak 1:51a) but there are also examples of ˙wu˙li (1447 Sek 6:5b; 1451 Hwun-en 1a; 1459 Wel 2:69a, 2:70b) which might be treated as compressions of ˙wuli ˙uy. Some cases where a single dot occurs for an earlier double dot may be due to broken type (as seen from the placement of the remaining dot), but often these result from historic change, whereby the double-dot (low rising) accent merged with the simple high accent represented by the single dot, so I have generally left these the way the text carries them.

The hypothesis that (at least by a certain time) the high pitch was distinctive only in the first syllable of a word will account for some of the variant accents found for verb forms in §2.12.4: ˙ho(˙)ya 'do', ˙ti(˙)ye 'fall', ˙pwuy(˙)ye 'cut', ˙psti(˙)kwo 'insert', ˙psu(˙)ti 'use', ˙ptu(˙)m ye 'float', ... But the majority of the HH- stems do not exemplify the variation. The hypothesis that there was no distinction between LHL and LHH could account for accent variants in a few verb forms:

pwo˙nayya (1481 Twusi 25:27b) = pwo˙nay˙ya (1447 Sek 24:15ab) 'send'

te˙pule (1481 Twusi 7:37a, 20:29a) = te˙pu˙le (1447 Sek 6:23a, 13:15a; 1459 Wel 2:6b) 'take along'

i˙kuyti (1481 Twusi 8:42a) = i˙kuy˙ti (1481 Twusi 7:7b, 1586 Sohak 2:9b) – CF i˙kuy˙ye (1459 Wel se:9a) 'win'

e˙wulGwo (~ ˙two 1449 Kok 134) = e˙wul˙Gwo (1462 ¹Nung 3:38a) 'join'

ne˙kikwo (1481 Twusi 25:23a), ne˙kiti (1481 Twusi 16:61b, 1482 Kum-sam 5:14a, 1475 Nay se:6a) = ne˙ki˙kwo (1462 ¹Nung 1:34b), ne˙ki˙ti (1447 Sek 24:3ab, 1475 Nay 1:17a) 'deem'

¨te˙leWun (1447 Sek 13:33b) = ¨tele˙Wun (1459 Wel 9:24a, 1459 Wel 18:39ab), ¨tele˙wun (1462 ¹Nung 4:38b) 'dirty'

il˙Gwusyan (1447 Sek se:5b); CF il˙Gwu˙sya (1459 Wel 21:218b) 'achieve'

Peculiarities in the accent patterns of certain pronouns and indeterminates are not amenable to generalization (CF Ramsey 1978a:170-4, ¹Yi Sangek 1978:112-6); the attested facts are stated in the individual entries of Part II.

2.12.3. Accent suppression before particles.

A number of nouns suppress the high pitch on a syllable before the locative-allative particle ˙⁶ay and its variant ˙⁴oy (He Wung 327). Included are most of the monosyllabic nouns that have the high pitch, and at least one two-syllable noun:

˙kalh 'knife' → kal˙h ay (1466 Kup 1:82a)

˙kilh 'road' → kil˙h ey (1447 Sek 6:3b, 6:15b; 1481 Twusi 7:6a, 8:2b, 10:27b; 1482 Nam 1:49b; ?1517‑ Pak 1:54a)

˙kwoh 'nose' → kwo˙h ay (1447 Sek 13:38b, 1459 Wel 1:36b), kwo˙h ay ˙sye (1462 ¹Nung 3:24b)

˙kwuy 'ear' → kwuy ˙yey (1447 Sek 19:16a, 1449 Kok 2, 1475 Nay 1:37a)

˙*mwom* 'body' → *mwo˙m ay* (1447 Sek 19:19b, 1462 ¹Nung 10:18a, 1481 Twusi 8:33-4) and *mwo˙m ay s* (1447 Sek 9:12a, 1459 Wel 2:53b)

˙*moyh* 'moor' → *moy˙h ay* (1463 Pep 6:154b, 1481 Twusi 7:30a), *moy˙h ay s* (?1468⁻ Mong 27; 1482 Nam 1:4a, 1:49b; 1482 Kum-sam 3:34b), *moy˙h ay sye* (1481 Twusi 7:39a)

˙*nac* 'daytime, noon' → *na˙c oy* (1445 ¹Yong 101)

˙*nwun* 'eye' → *nwu˙n ey* (1481 Twusi 25:9b, 25:47a)

˙*pich* 'light' → *pi˙ch ey s* (1447 Sek 19:18a), *pi˙ch ey ˙sye* (1481 Twusi 8:9b)

˙*ptut* 'meaning, mind, intention' → *ptu˙t ey n'* (1447 Sek 19:34a), *ptu˙t ey s* (1447 Sek 9:26b)

˙*tet* 'time' → *a˙ni han te˙t ey* (1463 Pep 4:32a, ?1468⁻ Mong 26b, 1485 Kwan 9a) 'in a short while'

˙*pam* 'evening, night' → *pa˙m oy* (1447 Sek 6:19b, 1462 ¹Nung 1:16b), *pa˙m oy ˙two* (1459 Wel 2:27a), *pa˙m oy [˙]za* (1481 Twusi 23:6b)

˙*pwom* 'spring' → *pwo[˙]m oy* (1482 Kum-sam 2:6b; the repro obscures the dot)

˙*stah* → *sta˙h ay* (1449 Kok 41; 1459 Wel 1:28b; 1462 ¹Nung 8:123a; 1481 Twusi 7:7b, 15:45a, 21:42b, 25:43a; ?1517⁻ Pak 1:64b)

swo˙li 'sound' → *swoli ˙yey* (1481 Twusi 7:39a)

For at least one word this holds for the genitive uses of the particle ˙*ᵘoy*, too: ˙*nom* 'another person' → *no˙m oy* + NOUN PHRASE (1447 Sek se:6a, 1463 Pep 2:28b, ?1517⁻ Pak 1:9b, 1465 Wen 3:3:1:62a, ?1468⁻ Mong 20b, 1518 Sohak-cho 8:15a [*no˙m* is smudged], 1475 Nay 1:9a); and also as the genitive-marked subject of an adnominalized verb (1465 Wen se:77a). That differs from ˙*nwom* 'lowly person' where the genitive is ˙*nwo˙m oy* (1459 Wel 17:76b), later reduced to ˙*nwo.m oy* (1481 Twusi 7:6b).

Monosyllabic nouns which do not lose their accent before the locative: ˙*hye* 'tongue', ˙*hoy* 'sun', ˙*poy* 'belly', ˙*pi* 'rain', ˙*mul* 'water', ˙*mwul* 'crowd', ˙*pul* 'fire', ˙*pol* 'community, village' as in ˙*i ˙po˙l ay* 'in this village' (1459 Wel 8:94a), ˙*skwum* 'dream'. Kim Wancin would assign these exceptions an underlying pattern of High-High, rather than just the single High assigned to the other accented monosyllables. Perhaps the high persists from a lost or absorbed second syllable?

The word for 'bosom' is not attested without the locative particle, but we infer that *phwu˙m ey* is from * ˙*phwum* on the basis of the attested accent of the related verb ˙*phwum-* 'embrace'.

In the same environment (before the locative marker) the double dot is sometimes reduced to a single dot, i.e. the low-high rise becomes just high:

¨*mwoyh* 'mountain' → ˙*mwo.h ay s* (1482 Kum-sam 3:36b) = ¨*mwoy˙h ay s* (1482 Kum-sam 3:33a); but ¨*mwoy˙h ay* (1449 Kok 41), ¨*mwoy˙h ay s* (1481 Twusi 7:30b)

¨*swok* 'deep inside' → ˙*swo.k ay s* (1481 Twusi 7:24b) but ¨*swo˙k ay* (1459 Wel 1:13a)

¨*twolh* 'beam' → ˙*twol.h ay* (1481 Twusi 7:5a) 'to the beams'

Usually the double dot is retained: ¨*nwu˙n ey s ˙tol* (1482 Kum-sam 2:61b) 'moonlight on the snow'; ˙*mul s ¨ko˙z ay* (1459 Wel 8:99a) 'at the water's edge'; *(⋯ s)* ¨*i˙l ey* (1475 Nay 2:2:47b) 'in the event (of ⋯)'; ¨*twuy˙h ey ˙sye* (1445 ¹Yong 28), ¨*twuy˙h ey n'* (id. 70), ¨*twuy.h ey ˙nun* (id. 30), ¨*twuy ˙h ey (s ⋯)* (1459 Wel se:24b) 'in back'.

The modern dialects of Hamkyeng and Kyengsang show a similar cleavage of monosyllabic tonic nouns, and the grouping is probably inherited from the 15th-century accent, but we lack sufficient data to set up a system of correlations that will account for the exceptions. (See Ramsey 1978a:167-9.)

The accent of a monosyllabic noun is sometimes lost before the genitive particle *s*, perhaps evidence that certain cases of N₁ s N₂ are compound nouns: ¨*mwoyh* → *mwoy[h] s ¨kwo˙l ay* (1447 Sek 6:4b, 1449 Kok 141) 'in a mountain valley', ⋯ .

2.12.4. The accentuation of verb forms.

There are many complexities in the accentuation of MK verb forms and the corresponding forms in the modern dialects. Studies by He Wung, Kim Wancin, Ceng Yenchan, Kim Chakyun, ¹Yi Sangek, and others shed light on many of the problems, and in particular Ramsey 1978a presents a wide view of the situation and discusses the interpretation of the available data in admirable detail.

We must assume a basic accent for the endings -˙*ᵘom*, -˙*ᵘolq*, and -˙*ᵘon* so as to account for such phrases as *pa˙to˙m ye* (1462 ¹Nung 8:104b), *me˙kulq ˙tet* (1459 Wel 8:8b), and *two˙to˙n i* (1445 ¹Yong

101) even though the accent is often or always suppressed in many structures. That is why there are discrepancies between the accent of entry citations and examples for some of the forms in Part II.

Stems fall into two major types, depending on whether they begin high (single dot) or low (no dot or double-dot), but many of the monosyllabic low-accent stems that do not end in a consonant take on high pitch before certain endings − or, put another way, many of the monosyllabic high-accent stems that end in a vowel lose the accent in many of the common paradigmatic forms, such as the gerund -`kwo, the adverbative -`key, the indicative assertive -`ta, the suspective -`ti, the hortative -`cye, the substantive -(`ᵁₒ)m which appears only in the complex structure -(`ᵁₒ)`m ye, the modifier -(`ᵁₒ)n and prospective modifier -(`ᵁₒ)l(q) and forms based on these (including the subjunctive attentive - `la, as in ho`la 'do it'). But they retain the accent before the infinitive - `ᵉₐ, the honorific -(ᵁₒ)`si-, the deferential - ̈zop-, and the aspect markers -(`)no-, - ̇tᵉₐ-, - ̇kᵉₐ-. This seems to indicate that the infinitive, like the other markers, was originally a bound stem. (And that deepens my suspicion that - ̇ᵉₐ is cognate with Japanese a[r]- 'be'.) The polite marker -ngi is like the bound stems, to judge from (··`ᵉₐ) `ci-ngi ''ta 'wants (to do)' < `ci-, ··· `i-ngi ''ta (1459 Wel 21:218b) 'it is ·· ' < `i-, and kwo`c i `phu- ̇tos `ho-ngi ''ta (1463 Pep 1:85b) 'the flowers seem in bloom' − but also ̈ep- ̇tos ho-ngi ''ta (1462 ¹Nung 1:105b) 'seems to lack'. If so, the lack of an initial dot on ha-ngi ''ta (1463 Pep 7:68b, 1464 Kumkang 62b) 'are many' < `ha- is puzzling. The high/low stems are basically low before the modulator (- ̇wᵁₒ- etc.), though after most vowels that is obscured by the usual ellipsis of that morpheme, which leaves behind an accentual trace:

̈na`toy (1447 Sek 19:7b, 1449 Kok 185) ← na-[wo]- ̇toy, ̈nalq (1462 ¹Nung 3:24b) ← na-[wo]lq < `na- 'emerge'

̈ha`m ol (1482 Kum-sam 3:19a) ← ha-[wo]-m < `ha- 'much / many'

̈cwulq (1447 Sek 9:12a) ← cwu-[wu]-lq < `cwu- 'give'

̈wo`m i (1459 Wel 9:10b, 1482 Kum-sam 3:19a), ̈wo`m ol (1482 Nam 1:50b), ̈wo[`]m ay (1481 Twusi 21:25b) ← wo-[wo]-m < `wo- 'come'

̈pwom (1462 ¹Nung 2:84a) ← pwo-[wo]-m < `pwo- 'see'

But after ···i- the modulator survives intact:

ni`ywu`n i (1481 Twusi 7:1a), ni`ywun (id. 10:18b) ← ni- ̇wu-n, ̈niywon (1482 Nam 1:72b; ?= ni`ywon) ← ni- ̇wo-n < `ni- 'roof, thatch (a roof)'

̈cywu`m un (1462 ¹Nung 8:8a) = (?*)ciywu`m un ← ci- ̇wu-m < `ci- 'carry on the back'

̈cywu`m ey (1481 Twusi 7:6b) = (?*)ciywu`m ey ← ci- ̇wu-m < `ci- 'cut (wood)'

There is something odd about the accent of `iywo`m on (1482 Nam 2:64a) where we expect *i`ywo`m on ← i- ̇wo-m < `i- 'carry on the head'; perhaps the scribe misplaced the dot.

Compare the modulated forms of those stems that are always high:

`thywo`toy (?1468- Mong 53a) ← `thi- ̇wo- ̇toy, `thywon (id. 10a) ← `thi- ̇wo-n, `thywum (1463 Pep 5:38a) ← `thi- ̇wu-m < `thi- 'hit'

`skoy`ywom (1462 ¹Nung 10:1b) ← `skoy- ̇wo-m < `skoy- 'wake up'

Before the causative formative - ̇i- the high/low stems are basically low, and that accounts for the rising accent of some of the stems of group 1a below: ̈nay- 'make emerge' < *na- ̇i- < `na- 'emerge', ̈pwoy- 'show' < *pwo- ̇i- < `pwo- 'see', ̈syey- 'erect, let / make stand' < *sye- ̇i- < `sye- 'stand', ̈tiy₁ 'drop, let / make fall' < *ti- ̇i- < *`ti₁ 'drop', and ̈tiy₂ 'smelt (metal), create (out of metal)' probably < *ti- ̇i- < `ti₂ 'become'. The basic final y on ̈tiy₁ 'drop' and ̈tiy₂ 'smelt, create' is needed to account for the velar lenition in such forms as ̈ti`Gwo₁ (1459 Wel 10:24b) 'dropping' and the unattested * ̈ti`Gwo₂ 'smelting, creating'. (The only other case of basic iy- is `iy-, the copula, with the gerund form `i`Gwo.) The summative - ̇ki is nonleniting, and that accounts for `swoy ku`lus ̈tiki `yey s `swo.h i`la (1465 Wen 1:1:2:181a) 'it is a mold for making metal vessels'.

Interestingly, when the summative - ̇ki started taking over part of the work of the suspective - ̇ti, it was treated not like - ̇ti or - ̇key, but like the bound stems: `ka`ki (?1517- ¹No 1:26b), `pwo`ki (id. 1:37b) − compare ka`ti (id. 2:7a), pwo`ti (below). The earliest examples of the summative, however, are what we expect: ho`ki `lol `cul`kye (1447 Sek 6:13a), ho`ki `lol `culki`ti (1459 Wel 10:18b). And

that 16th-century text also has *ho·ki ·Gwa* (?1517- ¹No 2:43b), so the first two examples above may be scribal errors. Another regular example: ¨*il ho·ki yey* (1481 Twusi 25:7b).

The transferentive, to my surprise, is treated as if a bound stem: ·*kata ·ka* (1445 ¹Yong 25, 1482 Nam 1:36b), ·*wota ·ka* (1447 Sek 23:57b), ·*hyeta ·ka* (1481 Twusi 16:1b), ·*hota ·ka* (1462 ¹Nung 3:84a, 1482 Kum-sam 2:31b), ·*na·ta ka ·'m ye* (1459 Wel 21:215b), ·*tita ·ka 'm ye* (1481 Twusi 25:43a), ... That argues in favor of the notion that *-ta·ka* is a bound infinitive rather than the indicative assertive *-·ta* + particle ·*ka*, as it is viewed in this book. The only apparent counterexample, in ·*na-ka·kwo cye tha ·ka* -- (1481 Twusi 8:29a) 'I want to go out but -- ', is probably a surface reduction of ·*na-ka·kwo ·cye ·hota ·ka*. Also arguing for explaining the transferentive as a bound infinitive is the accentuation of the low-pitched stems that are closed monosyllables:

> *makta ·ka k* (1466 Kup 2:66a), and not **mak·ta ·ka k*
>
> *cwukta ·ka* (1445 ¹Yong 25) despite *cwuk·ta* (1459 Wel 17:21a)
>
> *is.ta ·ka* (1482 Kum-sam 2:13b), and not **is·ta ·ka* despite *is·ta* (1462 ¹Nung 2:83a; 1463/4 Yeng 2:62a; 1482 Kum-sam 3:9b; 1482 Nam 1:14a; ?1517- ¹No 1:62b, 2:36a)

There is another set of structures on which the accent sheds light. What I had earlier taken as the indicative assertive *-·ta* (and ·*i·la*) + forms of the emotive bound verb ·*s[o]-* I now realize must be retrospective emotive forms: *-·taswo·la, -·taswo·n i, -·ta·songi ''ta, -u'l i ''la[·]s-ongi ''ta, -u'l i ''la[·]songi ''ta*. (See the entries of Part II, where they are so treated.) That is because of the accent of the stem in such forms as ·*hotaswo·la* (1481 Twusi 16:18a), *ho·taswo·n i* (1446 Sek 13:43b), and ·*ho·ta·s-ongi ''ta* (1462 ¹Nung 2:6-7).

In citing a stem or the "naming" form (the indicative assertive) of the high/low verbs we will use a hollow dot (˚), meant to represent zero (the low pitch) except when one of the relevant elements is attached — the infinitive ending or one of the bound stems. With the prominent exception of ˚*ho-* 'do; be' there are no high/low stems ending with the minimal vowel ^{u}*o*, for those are all high; the stems that end *-e-* or *-a-* are all of the high/low type. (There are no low-pitch monosyllabic stems ending *-^{u}o-*, but there are such stems with the shapes *-^{u}oy-* and ¨*-^{u}oy-*.) This fact may be used to argue that the vowel of ˚*ho-* must be a reduced form of some other vowel. Elsewhere I use the irregular infinitive to support the claim that the stem was earlier the unique shape **hyo-* (see the entry ˚*ho·ta* in Part II). It may be questioned whether the semivowel adequately strengthens the minimal vowel, but compare the monosyllabic stems that end in *-w^{u}o-*, which all belong to the high/low group with the unexplained exception of ·*skwu-* 'dream', which may well be contracted from a dissyllabic stem (as suggested by the initial cluster) and ·*hwo-* 'broad-stitch', for which the modern hõ- (and dialect accent corresponding to the long vowel) would suggest an earlier version *˚*hwo-* like ˚*pwo-* 'see'.

We find the following groups of monosyllabic stems that do not end in a consonant:

(1) Stems that are RISING, here marked with a preceding high double dot (¨*-*). None end in *-^{u}oy-* (without preceding *w*) or in *-^{u}o-*, nor in *-w^{u}o-*; the apparent exceptions such as ¨*cwu-* or ¨*pwo-* are modulated forms of non-rising stems (˚*cwu-*, ˚*pwo-*).

(1a) Rising in all forms. These stems end in *-ay-; -ey-, -yey-; -w^{u}oy-*. Also ¨*hoy-*, the causative of ˚*ho-* 'do', and two stems ending in basic *-iy-* that were originally causatives, too: ¨*tiy-₁* 'drop, let / make fall' and ¨*tiy-₂* 'smelt, create (out of metal)'. The modulated versions of simple ˚*-a-*, ˚*-e-*, ˚*-wo-*, and ˚*-wu-* also belong here: ¨*ka- ← ka-·[wo]- < *˚*ka-* 'go', ¨*sye- ← sye-·[wu]- < *˚*sye-* 'stand', ¨*pwo- ← pwo-·[wo]- < *˚*pwo-* 'see', ¨*cwu- ← cwu-·[wu]- < *˚*cwu-* 'give'.

(1b) Rising in most forms (including the effective forms with *-G^{e}a-*), but not the infinitive and forms containing the modulator or the short version of the effective aspect marker *-·(y)^{e}a-*. These stems end in *-w^{u}oy-, -ay-, -ey-, -yey-*. We mark them with two hollow dots (˚˚*-*).

(2) Stems that are always LOW, here left unmarked (*-*). These stems end in *-^{u}oy-* or *-w^{u}oy-*.

(3) Stems that are always HIGH, here marked with a preceding high dot (·*-*). These stems end in *-i-, -w^{u}oy-, -oy-*, or (?) *-uy-*; also the copula ·*iy-*. The stems ·*skwu-* 'dream' and ·*hwo-* 'broad-stitch' exceptionally belong here, rather than in group 4.

(4) Stems that are HIGH/LOW, here marked with a preceding hollow dot (˚*-*). They are low except in

the infinitive and when compounded with other stems, including bound stems such as the honorific (-ᵘᵢₒ˙si-), the aspect markers (-˙kᵉᵃ-, -˙tᵉᵃ-, -˙no-), the deferential (-˙zop-), and the polite (-ngi --). These stems end in --a-, ?--e-, --ye-, --wᵘᵢₒ-, --i-. (Apparently there are no monosyllabic stems that end in --e- without a y before the vowel.) The stems stay low when -˙two 'even/too' or -˙tos 'like' is attached.

The accent groups to which a stem of a given shape may belong:

	1a ¨..-	1b ¨¨..-	2 ..-	3 ˙..-	4 °..-
--i-	¨tiy-₁,₂			+	+
--ᵘᵢₒ-				+	°ho-
--ᵘᵢₒy-	¨hoy-		+	+	
--wu-	( )			˙skwu-	+
--wo-	( )			˙hwo-	+
--wᵘᵢₒy-	+	+	+	+	
--ye-	( )				+
--ey-	+	+			+
--yey-	+	+			
--a-	( )				+
--ay-	+	+			+
	RISING	RISING/LOW	LOW	HIGH	HIGH/LOW

The parenthesized blanks are modulated stems (stem + modulator) only.

There are stems that end in --i- both in Group 3 and in Group 4. Only the effective forms of °ni- 'go' are attested: ˙nike (1445 ¹Yong 58, 1459 Wel 8:1a), ˙ni˙ke (1459 Wel 8:101b); ˙nike˙la (1459 Wel 8:101a); ˙ni˙kesi˙n i (1459 Wel 8:93ab); ˙ni˙kesi˙tun (1445 ¹Yong 38); ˙nike˙nol (1463 Pep 4:37b). From these ˙ni-ke- forms alone we cannot tell whether the stem belongs with Group 3 (HIGH) or group 4 (HIGH/LOW), but we assign it to Group 4 to accord with °nye- 'go', from which it was likely derived. The somewhat later stem ¨nyey- seems to belong with Group 1a (ALWAYS RISING).

A number of accentually anomalous examples have to be explained individually, as prosodic adjustments or scribal mistakes: ˙wUY [˙]ho˙sya (1463 Pep 7:17a); ˙i˙la [˙]hosya˙l i (1447 Sek 6:17a), ˙kot [˙]hosi˙n i (1463 Pep 2:43b); ho˙n i [˙]Gwo (1481 Twusi 7:40a), ¨mwot ho˙si.l i ˙˙la (1462 ¹Nung 2:50b); ¨ep-˙tos [˙]ho-ngi ˙˙ta (1462 ¹Nung 1:105b); solang [˙]hosi˙nwon pa ˙lol (1475 Nay 1:55b); ¨mwot ho˙ya ˙ys.ke˙nul (1462 ¹Nung 8:57a), a˙ni ho.ya is˙ta.n i (1481 Twusi 7:23a), a˙ni ho˙ya ˙ys.ta˙n i (1465 Wen 1:1:1:44b), a˙ni hotwo˙ta (1481 Twusi 8:2a); ˙QILQ-˙TTYENG ho˙sa-ngi ˙˙ta (1459 Wel 8:96b). We would expect the contractions of °ho-kᵉᵃ- to be ˙khᵉᵃ-- and that is what we find in ˙khᵉᵃn ma˙lon, ˙khesin, ˙khesina, and ˙khesin ma˙lon. But most of the other forms are attested only without the accent: khe˙n i (˙Gwa, ˙˙la), khe˙nol, khe˙nul (˙za), khen ˙t i, (a˙ni) khan ˙t i ˙.n i ˙˙la, khen ˙tyeng (CF ˙hoken ˙tyeng), khe˙ta, khe˙tun. And only khe[˙]n ywo despite ˙kha.n ywo (1481 Twusi 16:37b), khe˙n i ˙Gwa despite a˙ni ˙kha.n i ˙Gwa (1481 Twusi 16:61b). These anomalies are probably the result of secondary loss of the accent, though the details are unclear. That must be the case, too, for khe ˙za (1475 Nay 2:1:16b) < ˙hoke ˙za; compare ˙khe ˙za (1463 Pep 2:224b). There are a few similar cases for ˙the-- < ˙hote-- , such as ku˙le the˙n i a˙ni the˙n i (1459 Wel 9:36d) < ˙hote˙n i, a˙ni tha˙n i (1463 Pep 2:28b) < ˙hota˙n i, a˙ni thwo˙ta (1481 Twusi 8:2a, 16:22b) < ˙hotwo˙ta.

There are two ways to look at the stems of group 4. The usual assumption (He Wung, Kim Wancin, Ramsey 1978a) says that the stems of the first group are historically low and acquired an accent before the infinitive, the bound stems, and so forth. ¹Yi Sangek 1978:119 (and now Ramsey 1992) would treat the stems as high, especially because as the first element in compound verbs they are high regardless of the following stem. (But the form in the compound is often the infinitive.) There are arguments both ways. Suppose we say that all the stems in groups 3 and 4 were basically high, but that those with the sturdier vowels suppressed the accent in the paradigmatic forms mentioned. We would then have to explain why there are examples of --i- in both groups, and there seems to be nothing else that differentiates these two sets of stems. Several causative and passive stems are derived from

monosyllabic vowel stems and the derived stems almost all start low, even those from the always-high stems: *pto˙i-* (1481 Twusi 16:71a) < ˙*pto-* 'pick, pluck', *thoy˙Gwo-* (1459 Wel 7:52b) < ˙*tho-* 'receive, undergo' or 'ride', *skoy˙Gwo-* (1481 Twusi 15:26a) < ˙*skoy-* 'awaken' [the first dot of the LCT entry "˙*skoy˙Gwo˙ta*" is an error], *pso˙i-* (1459 Wel 14:7b) < ˙*pso-* 'wrap', *pco˙i-* (1475 Nay 2:2:51b) < ˙*pco-* 'weave', *psu˙i-* (1481 Twusi 23:38a) < ˙*psu-* 'use', *su˙i-* (1481 Twusi 10:39b) < ˙*su-* 'write', *ptuy˙Gwo-* (1459 Wel 8:99a) / *ptuy˙Gwu-* (1459 Wel 18:56b, 1481 Twusi 22:39b) < ˙*ptu-* 'float', *phwuy˙Gwu-* (1462 ¹Nung 7:16b, ...) < ˙*phwuy-* 'burn (a fire)'. The one exception (LCT 693b) is from a passage poorly reproduced: [?˙]*choy˙i-* (1466 Kup 2:18a) < ˙*cho-* 'kick'. Examples derived from the high/low stems of group 4: ¨*hoy-* < *ho˙i-* < ¨*ho-* 'do', ¨*cay-* < **ca˙i-* < °*ca-* 'sleep', ¨*nay-* < **na˙i-* < °*na-* 'emerge', *sye˙i-* (1518 Sohak-cho 9:19b) [LCT ¨*syei˙ta* is incorrect] = ¨*syey-* (1445 ¹Yong 11, 1481 Twusi 15:29b [under wrong entry in LCT]), ¨*pwoy-* < **pwo˙i-* < °*pwo-* 'see'. Yet ˙*cii-* (1459 Wel 21:106a; CF LCT 683b) < °*ci-* 'carry on the back' is inexplicably high.

The entries in the dictionaries are unreliable guides for many of the verbs discussed here: NKW has ˙*sye˙ta* 'stand' with an initial dot while LCT lacks the dot; LCT has a dot on ¨*hhye˙ta* but not on ¨*hye˙ta* 'pull' while NKW omits the dot for both; neither dictionary has a dot on °*sa˙ta* 'buy'. Of the high group, ˙*hoy˙ta* 'white' has the dot in NKW but not in LCT.

Further complications of stem behavior are largely the result of compressing syllables. They are taken up in the description of verb conjugations.

2.12.4.1. Vowel-final monosyllabic stems that are rising.

Group 1a. Rising in all forms

¨*pwoy-* 'show': ¨*pwoyGwo* ˙*cye* (1465 Wen se:43b), ¨*pwoyGwo* ˙*za* (1447 Sek 6:34ab); ¨*pwoy˙m ye* (1462 ¹Nung 6:89a); ¨*pwoy˙ya* (1459 Wel 13:35b, 1463 Pep 4:63a); ¨*pwoyye˙ton* (1462 ¹Nung 2:23a); ¨*pwoy˙Gesi˙nol* (1449 Kok 110); ¨*pwoyno˙ta* (1465 Wen 1:1:2:107a); ¨*pwoy˙sya* (1462 ¹Nung 2:17a); ¨*pwoyywo˙m i* (1459 Wel 10:7b), ¨*pwoy˙ywo.l i ˙˙la* (1459 Wel 21:21b)

¨*pcwoy-* 'shine': ¨*pcwoyGwo* (1481 Twusi 8:47a); ¨*pcwoyl* (1463 Pep 3:12b, 1462 ¹Nung 4:72b, 1527 Cahoy 3:6a=13a); ¨*pcwoy˙m ye n'* (1466 Kup 2:14b); ¨*pcwoy˙n i* (1459 Wel 2:51a); ¨*pcwoy˙ya* (1459 Wel 1:48b, 1462 ¹Nung 3:76a); ¨*pcwoynon* (1482 Kum-sam 3:59a); ¨*pcwoyywo˙m ol* (1481 Twusi 7:13b), ¨*pcwoyywo˙n i* (1481 Twusi 10:31-2)

¨*nay-* 'make emerge, ... ': ¨*nay˙ti* (1463 Pep 2:249b), ¨*nayti* (?1468⁻ Mong 18b); ¨*nay˙Gwo* (1481 Twusi 8:30ab); ¨*nay˙Gey* (1459 Wel 21:20a, 1462 ¹Nung 1:29a); ¨*nayl ˙ss oy* (1463 Pep 3:180ab), ¨*nay.l i ˙˙le.n i ˙˙la* (1464 Kumkang 79b) − *nay.l i* (1463 Pep 5:196b) = ¨*nay˙l i*; ¨*nay.n i ˙˙la* (1447 Sek 24:16b); ¨*nay˙m ye ...* (1459 Wel 7:48a); ¨*nay˙ya* (1447 Sek 6:9b, 1449 Kok 49), ¨*nay˙ye* (1518 Sohak-cho 10:34b); ¨*nayya˙nol* (1482 Kum-sam 4:39a); ¨*naynwon* (1447 Sek 9:12a); ¨*nayno˙n i* (1459 Wel 1:27b); ¨*nay˙ywon* (1462 ¹Nung 3:24b); ¨*nay˙sya* (1463 Pep 6:97a); ¨*naysil* (1447 Sek 24:37ab, 1459 Wel 1:11a), ¨*naysi˙n i '-ngi ˙˙ta* (1445 ¹Yong 8); ¨*nay˙ywol* (1481 Twusi 21:42a), ¨*nayywo˙m i* (1482 Kum-sam 4:39a), ¨*nayywo.m i˙la* (1462 ¹Nung 4:27b)

¨*kay-* 'get clear': ¨*kay˙Gey* (1459 Wel 10:88a); ¨*kayl* (1527 Cahoy 3:1b=2a); ¨*kayn* (1462 ¹Nung 10:1b), [¨]*kay[˙]n i* (1481 Twusi 23:20a); ¨*kayGe˙nol* (1481 Twusi 16:65a); ¨*kaytwo˙ta* (1481 Twusi 7:7b)

¨*cay-* 'put to sleep': ¨*cay˙key* (?1517⁻ ¹No 1:47b; ˙*key* = ˙*Gey*); ¨*cayte˙n i* (1447 Sek 6:16a). The infinitive should be *¨*cay˙yᵉᵃ*, the effective forms *¨*cay˙Gᵉᵃ...*, and the modulated stem *¨*cay˙ywᵘᵇo-*.

¨*pskey-* 'pierce': ¨*pskey˙Gwo* (1459 Wel 1:2a, 2:48b); ¨*pskey˙m ye* (1459 Wel 8:24b, 1462 ¹Nung 1:28a, 1465 Wen 1:1:2:16b); ¨*pskey˙n i* (1445 ¹Yong 23, 43), ¨*pskey˙n i '-ngi ˙˙ta* (1445 ¹Yong 50); ¨*pskey* (1518 Sohak-cho 8:35a, 1463 Pep 5:194b); ¨*pskey˙ye* (1449 Kok 4), ¨*pskey˙ye ti˙n i* (1449 Kok 41), ¨*pskeyye ˙ys.ke˙tun* (1459 Wel 1:27b); ¨*pskeyye˙nul* (1449 Kok 41); ¨*pskeyywo˙m ol* (1465 Wen 1:1:1:76a); ¨*pskeyGa˙la* (1481 Twusi 24:37a); ¨*pskey˙Ganwos˙ta* (1481 Twusi 24:26b); ¨*pskeyzo˙Wa* (1459 Wel 1:6b); ¨*pskeysi˙n i '-ngi ˙˙ta* (1449 Kok 14); ¨*pskeytwo˙ta* (1462 Kum-sam 3:48a)

¨*mey-* 'shoulder, bear': ¨*mey˙ti* (1465 Wen 1:1:1:90a); ¨*mey˙Gwo* (1465 Wen 1:1:1:90a, 1586 Sohak 6:66a); ¨*meyl* (1527 Cahoy 3:10b=23b); ¨*mey[˙]m ye* (1963/4 Yeng 2:73b); ¨*mey˙syam

(1463 Pep 4:79a); ``meyte˙n i (1449 Kok 119); ``mey˙zoWa (1459 Wel 10:10b), ``mey˙zoWa ˙za (1459 Wel 10:12b), ``mey˙zoWo˙n i (1459 Wel 10:12b); ``mey˙zoWwo˙l ye (1459 Wel 10:12a), ``meyzo˙Wwo.l i ˙'˙la (1459 Wel 10:10b)

``sey- 'be strong': ``sey˙m ye (1459 Wel 1:28a); ``seyn (1459 Wel 2:6b); ``seyl (1459 Wel 10:30a); ``seysil (1449 Kok 40). This assignment assumes that the unattested infinitive would be * ``sey˙yᵉ⁄a, the effective forms * ``sey˙Ge-- or * ``sey˙yᵉ⁄a-, the modulated stem * ``sey˙ywᵘ⁄o-.

``hyey- 'reckon, count; think, consider, figure': ``hyey˙ti (1459 Wel 17:34b; 1463 Pep 3:62b); ``hyey˙Gwo (1459 Wel 2:63b); ``hyey˙Gwo k (1481 Twusi 15:4a); ``hyey˙Gey (1459 Wel 1:19a, 1463 Pep 1:26a); ``hyeyl (1447 Sek se:1b; 1527 Cahoy 2:1b=2b, 3:9a=21a), ``hyey˙l i ˙le˙la (1459 Wel 1:21a); ``hyey˙ye (1447 Sek 6:6a, 13:26a; 1459 Wel 7:31b; 1462 ¹Nung 3:76a) − Is hyey˙ye ˙two (?1517- Pak 1:61b) an error?; ``hyey˙Gen ˙t ay n' (1459 Wel 21:104a, 1462 ¹Nung 1:101a), ``hyeyſ˙ʃGen ˙t un (?1517- Pak 1:64a), ``hyeyGa˙l ye two (1459 Wel 21:14a), ``hyeyye.l i ˙Ga (1481 Twusi 10:12a); ``hyeym ``hyey˙non (1459 Wel 9:13b), ``hyeynon ˙ta (1447 Sek 6:8a), ``hyeynwo˙la (1481 Twusi 15:5b) ``hyey˙sya (1445 ¹Yong 104); ``hyeyzo˙Wol (1447 Sek se:1b); ``hyeyywo˙toy (1462 ¹Nung 4:123b); ``hyey˙ywom (1465 Wen 3:3:1:62a), ``hyeyywu˙m i (1481 Twusi 21:42a); ``hyey˙ywon (1447 Sek 19:11b), ``hyeyywo˙n i (1481 Twusi 14:4b)

``syey- 'make stand; build': ``syey˙Gwo (1447 Sek 6:44b); ``syey˙m ye (1459 Wel 17:37a); ``syey˙ye (1447 Sek 9:19b, 1462 ¹Nung 4:123b), ``syey˙ya (1459 Wel 21:213a), ``syeyya ˙two (1482 Kum-sam 3:48b); ``syeysi˙n i (1445 ¹Yong 11); ``syeyno˙n i (1459 Wel 18:82b); ``syeyzo˙Wa (1449 Kok 65), ``syey˙zoWo˙n i (1449 Kok 10), ``syeyzo˙Wosi˙n i (1449 Kok 34), ``syeyzop˙nwon (1447 Sek 13:14b); ``syey˙ywolq (1462 ¹Nung 5:8b); ``syey˙ywo˙m i (1462 ¹Nung 1:19a), ``syeyywo˙m ol (1475 Nay 2:2:15b), ``syey˙ywo˙m o˙lawa (1459 Wel 23:76b); ``syeyywo˙toy (1459 Wel 17:37b)

``nyey- 'go': ``nyey.m ye (1481 Twusi 23:19b); ``nyeyywo˙toy (1482 Kum-sam 5:38a). Some of the unattested forms must have been * ``nyey˙ti, * ``nyey˙Gwo, * ``nyeyn, * ``nyeyl(q), * ``nyey˙m ye, * ``nyey˙yᵉ⁄a, * ``nyey˙ywᵘ⁄om.

``kyey- '(time) pass, exceed': ``kyeytwo˙lwok (1459 Wel 7:9b); ``kyeyGe˙tun (1459 Wel 7:31b; broken type looks like ``key``). This assignment assumes that the unattested infinitive would be * ``kyey˙yᵉ⁄a, the modulated stem * ``kyey˙ywᵘ⁄o-.

``tiy-₁ 'drop, let / make fall': ``ti˙Gwo (1459 Wel 10:24b [twice]), ``tiGwo (1481 Twusi 15:14ab); ``tiye (1481 Twusi 7:18b); ``ti˙sya (1449 Kok 45); ``tiGe˙tun (1481 Twusi 10:32a); ``tiywo˙m ol (1481 Twusi 8:57b), ti˙ywo˙m ul (?1517- Pak 1:44b)

``tiy-₂ 'smelt (metal); create (out of metal)': ``tiſ˙ʃm ye (1482 Kum-sam 2:31a); ``ti˙ye (1465 Wen 2:2:2:24b) = ``tiſ˙ʃye (1482 Kum-sam 2:30a); ``ti˙zowo˙m ay (1463 Pep 1:220a); ``ti˙ywun (1465 Wen 1:1:2:181a); ``tiſ˙ʃki ˙yey s (1465 Wen 1:1:2:181a)

``hoy- 'make / let do': ``hoy˙Gey (1462 ¹Nung 3:115b), ``hoy˙m ye n' (1449 Kok 99); ``hoy˙l i ˙'-ngi s ˙kwo (1464 Kumkang 11a); ``hoyn (1482 Nam 1:68b); ``hoy˙ye (1447 Sek 9:21a, 1459 Wel 9:39a, 1482 Nam 2:5a), ``hoyye (1481 Twusi 7:16b, 25:37a); ``hoy˙non (1463 Pep 1:9b); ``hoy˙sya (1447 Sek 6:7b); ``hoysi˙m ye (1465 Wen 1:2:2:92b)

The stem ``ey- 'turn' is attested only in the suspective ``ey˙ti (1518 Sohak-cho 8:2b). If the infinitive was * ``ey˙yᵉ⁄a, it belongs to Group 1a; if it was *ey˙yᵉ⁄a to 1b.

Group 1b. Rising in all forms except the infinitive, the modulated forms, and the short effective forms

``⁰⁰pwuy- 'be empty': ``pwuy˙m ye (1449 Kok 18) = ``pwuy.m ye (1482 Kum-sam 2:54a); ``pwuy.l i ˙ye (1459 Wel 1:37a); ``pwuyn (1481 Twusi 7:4a, 10:32b) ‖ pwuy˙ye (1459 Wel 1:48a); pwuy˙ywu˙toy (1462 ¹Nung 5:59b), pwuy˙ywu˙m ey (1447 Sek 13:10a)

``⁰⁰mwuy- 'move': ``mwuyta (1459 Wel 2:14a); ``mwuy˙ti (1462 ¹Nung 3:9b); ``mwuyGwo (1481 Twusi 15:52b) = ``mwuy˙Gwo (1482 Kum-sam 4:39b); ``mwuy˙m ye (1449 Kok 172, ?1468- Mong 42b) = ``mwuy.m ye (1481 Twusi 7:23b); ``mwuyl (1445 ¹Yong 2; 1459 Wel se:2b, 2:14a); ``mwuyn (1481 Twusi 15:15b, 1482 Kum-sam 2:18a); ``mwuyno˙n i (1463 Pep 3:35a); ``mwuyte˙n i (1449 Kok 172), ``mwuyte˙la (1481 Twusi 8:10a) ‖ mwuy˙ye (1459 Wel se:3a, 1462 ¹Nung 3:117a); mwuy˙ywo.m i ˙Gwo (1465 Wen 2:3:2:32a), mwuy˙ywum (id. 1:1:2:106-7), mwuy˙ywu.m ey (1481 Twusi 7:29b)

``cwuy- 'grasp'; ``cwuyGwo (1466 Kup 1:15b), ``cwuy`lak (1462 ¹Nung 1:108b, 113a) ‖ cwuy`ye
(1481 Twusi 25:21a); cwuy`ywom (1462 ¹Nung 1:109b)

``swuy- 'rest': ``swuy`ti (1462 ¹Nung 8:128a); ``swuyGwo (1481 Twusi 22:10a, one of the dots is
faint), ``swuy`Gwo cye (1463 Pep 3:83a); ``swuy`Gey (1463 Pep 2:203a); ``swuyl (1459 Wel 1:48a),
``swuy`l i 'lwo`ta (1481 Twusi 22:33b); ``swuyno`n i (1481 Twusi 16:33b). The unattested infinitive
should be *swuy`ye, the modulated stem *swuy`yw⁴⁄₆-; swuy`Gwu`m un (1459 Wel 13:18b), though
listed by LCT under ``swuy-, ought to be from the causative stem swuy`Gwu- and mo`l ol
swuy`Gwola (1481 Twusi 21:44b) must be from a variant of that stem, swuy`Gwo-.

``woy- 'wrong; left(-hand)': ``woy`ta (1447 Sek 9:14a), ``woyta (1445 ¹Yong 107; 1482 Nam 1:38a,
38b, 39a); ``woy`ti (1482 Nam se:2a); woy`Gwo (1481 Twusi 8:10a) − ? repro error for ``woy`Gwo;
``woy`Gey (1462 ¹Nung 9:77b); ``woy.m ye (1482 Nam 1:39a); ``woyl (1527 Cahoy 3:12b=29a;
15a=34b); ``woyn (1447 Sek 6:30a, 9:36a; 1482 Kum-sam 2:34a), ``woy`n i (1459 Wel 1:42b, 1462
¹Nung 2:59a, 1482 Kum-sam 2:3b), ``woy.n i (1482 Nam 1:39a) ‖ woy`ywo.m i (1482 Nam 1:39a),
woy`ywo`m ol (1462 ¹Nung 9:83b; 1463 Pep 1:6a, 1:10b). The unattested infinitive should be *woy`yᵉᵃ.

``mwoy- 'accompany, escort' is attested only with -zoW- attached: ``mwoyzo`Wa (1446 Sek 23:31b).

``twoy- 'hard; severe': ``twoyn (?1517⁻ Pak 1:18a); ``twoy`sya (1459 Wel 10:5a), ``twoysya`m ay
(1475 Nay 2:2:63b) ‖ twoy`ywola (1475 Nay 2:2:15a). The unattested infinitive should be *twoy`yᵉᵃ,
the effective forms *``twoy`Gᵉᵃ⋯ or *``twoy`yᵉᵃ-. Other unattested forms: *``twoy`ti and *``twoy`Gey.

``tey- 'burn': ``tey`Gwo (1459 Wel 7:18a); ``tey`n i n' (1466 Kup 2:7b); ``teyGe`nul (1475 Nay
se:4a), ``teyGe`n ya (1518 Sohak-cho 10:3a) ‖ tey`ye (1466 Kup 1:9b). The unattested modulated
forms would be *tey`yw⁴⁄₆⋯ , the short effective forms *tey`ye⋯ .

``pyey- 'pillow one's head on': ``pyeyGwo (1466 Kup 1:61b); ``pyey`m ye (1459 Wel 1:17a)
‖ pyey`ye (1481 Twusi 22:19a); pyey`ywun (1459 Wel 1:17b)

*``myey- 'get clogged': myey`ye (1459 Wel 8:84a, 8:98a) 'get clogged', myey`ye 'ys.kwo (1481
Twusi 20:33a), myey`ye 'ys.twota (1481 Twusi 20:35a). Only the infinitive is attested.

``syey- 'get white': ``syey`Gwo (1459 Wel 17:47b, 1463 Pep 5:120b); ``syey`m ye (1462 ¹Nung
2:9b), ``syeyn (1445 ¹Yong 19; 1481 Twusi 8:12b, 10:2b, 10:6b, 21:14a), ``syey.n i (1481 Twusi
7:12a); ``syeyla 'n 't oy (1481 Twusi 21:42b); ``syeyto`lwok (1481 Twusi 16:18a); ``syeytwo`ta (1481
Twusi 7:28a) ‖ syey`ywom two (1481 Twusi 15:49b). The unattested infinitive should be *syey`ye; the
effective forms should be *``syey`Gᵉᵃ⋯ or *syey`yᵉᵃ⋯ .

``pay- 'destroy, exterminate; capsize': ``payta (1481 Twusi 15:34a); ``payti (1481 Twusi 22:37b);
``payGwo (1481 Twusi 20:4b); ``pay`m ye (1463 Pep 5:43a, 1475 Nay 1:1b) ‖ pay`ya (1462 ¹Nung
10:92a, 1463 Pep 1:109a, 1482 Nam 2:57b); pay`yan ma`lon (1445 ¹Yong 90); pay`ywo.m ol (1481
Twusi 21:36b), pay`ywo.l i ''la (1459 Wel 7:46b)

``cay- 'swift; deft': ``cay`Gwo (?1517⁻ Pak 1:45b); ``cayn (?1517⁻ Pak 1:30a, 1527 Cahoy
2:5a=10a), ``cay`n i ''la (?1517⁻ No 1:12b) ‖ cay`ya (1449 Kok 74, 157). The unattested effective
forms should be *``cay`Gᵉᵃ⋯ or *cay`yᵉᵃ-, the modulated stem *cay`yw⁴⁄₆-.

``say- 'dawn': ``sayl (1462 ¹Nung 10:45b, 1527 Cahoy 1:1b); ``sayno`n i (1481 Twusi 15:46a);
``sayGe`tun (1447 Sek 6:19a); ``say to`lwok (1463/4 Yeng 1:41b) = ``say`two`lwok (?1517⁻ Pak
1:21b). The form sa`ya two (1482 Kum-sam 4:52b) is either a mistake for the expected infinitive
say`ya or made on an otherwise unattested variant stem *sai-. The modulated stem: *say`yw⁴⁄₆-.

2.12.4.2. Vowel-final monosyllabic stems that are low.
<u>Group 2. Stems that are low in all forms</u>

chuy- 'make / let eliminate': chuy`ywu`l ye (1459 Wel 13:21a), chuy`ywu.l i ''n i (id. 13:20b, 1463
Pep 2:206a), chuy`ywu.l i 'la (1465 Wen se:47a), chuy`ywo`m on (1463 Pep 2:207a). Contracted <
chu`i- (chu`i`kwo 1463 Pep 2:241a, chu`ike`tun 1518 Sohak-cho 9:24b), causative of `chu-₁.

muy- 'hate': muy`ti (1459 Wel 9:42a); muy`m ye (1447 Sek 13:56b); muyl (1462 ¹Nung 8:30a);
muysya.m i (1463 Pep 2:19b, but part of a longer passage in which all of the dots are absent);

muy·nwola (1481 Twusi 7:20b, 23:23a); *muy·ywo·m i* (1462 ¹Nung 4:27b), *muy·ywu·m ul* (1462 ¹Nung 9:109a, 1464 Kumkang 79b)

suy- 'be sour': *suy·Gwo* (1481 Twusi 15:21b); *suy·m ye* (1462 ¹Nung 5:37b, 1463 Pep 6:68b); *suyn* (1445 ¹Yong text 5:4b, 1462 ¹Nung 2:115b, 1466 Kup 1:32a); *suyl* (1527 Cahoy 3:6b=14a)

ptuy- 'make / let it float': *·ptuy·Gwo* (1481 Twusi 10:34b); *ptuy·ywo·m on* (1462 ¹Nung 6:26b), *ptuy·ywu·m i* (1463 Pep 7:50a)

stuy- 'wear (a belt), gird oneself with': *stuy·Gwo* (1482 Nam 2:18b); *stuy·m ye* (1586 Sohak 2:2b); *stuy·ye* (1463 Pep 2:39b [broken type]); *stuy·sya* (1445 ¹Yong 112); *¨stuy < *stuy-·i* 'belt' (der n)

poy-₁ 'get pregnant with (child)': *poy·Gwo ·cye* (1462 ¹Nung 7:55b); *poyn* (1463 Pep 6:47a); *poyl* (1527 Cahoy 1:17b=33b); *poy·ya* (1447 Sek 13:10a, 1462 ¹Nung 4:76a); *poy·ywon* (1459 Wel 8:81a)

poy-₂ 'soak': *poy·Gwo* (1462 ¹Nung 5:88a); *poy·n i* (1466 Kup 1:16a)

moy- 'tie / sew (on), attach': *moyl* (1459 Wel se:3a, 1462 ¹Nung 8:106b); *moy·n i* (1449 Kok 76); *moy·ya* (1463 Pep 4:37b), *moy·ye sye* (1481 Twusi 8:53b) — CF *moy·ye* (1465 Wen 1:1:1:89b) < *moy·i-* (VP), *moy·Gye* (1459 Wel se:3b) < *moy·Gi-* (VP); *moy·syan* (1462 ¹Nung 5:24a), *moy·yesi·na* (1481 Twusi 7:34a); *moy·ywom* (1465 Wen 1:2:2:161a), *moy·ywo.m i·la* (1462 ¹Nung 5:88a), *moy·ywo·m ol* (1464 Kumkang 83, 1465 Wen 1:1:1:101b); *moy·ywolq* (1462 ¹Nung 7:8a), *moy·ywon* (?1468- Mong 58, 1481 Twusi 8:47b)

ptwuy- 'jump': *ptwuy·Gwo* (1482 Nam 2:66a); *ptwuy·m ye* (1482 Kum-sam 2:13a); *ptwuyl* (1459 Wel 9:19b); *ptwuy·n i* (1482 Kum-sam 4:31b); *ptwuy·ye* (1481 Twusi 16:2b; 1462 ¹Nung 8:15a, 8:40a, 8:139a); *ptwuy·ywo·la* (1462 ¹Nung 8:139a)

pthwuy- 'spring, snap, splash': *pthwuy·n i* (1481 Twusi 25:53a); *pthwuy·nwos.ta* (1481 Twusi 25:19a; dot smudged); *pthwuy·ye* (1481 Twusi 17:13a). VC *pthwuy·Gwun* (1445 ¹Yong 48).

twoy- < towoy- < toWoy- 'become': *twoy·Gwo* (1518 Sohak-cho 8:3b; faint dot), *twoy·kwo* (1586 Sohak 1:7b); *twoy·n i 'la* (1518 Sohak-cho 10:6b); *twoy·sikwo* (1588 Cwungyong 19b). The unattested infinitive should be **twoy·ya*; the modulated stem **twoy·ywo-*.

2.12.4.3. Vowel-final monosyllabic stems that are high.

<u>Group 3. Stems that are high in all forms</u>

·skwu- 'dream': *·skwu·kwo* (1449 Kok 67); *·skwum ·skwulq* (1462 ¹Nung 4:130a); *·skwumywo·m i* (1475 Nay 2:2:73a)

·hwo- 'broad-stitch': *·hwol* (1527 Cahoy 3:9a=19b); *·hwo·wa* [= *·hwo·a*] *is·kwo* (?1517- ¹No 2:52b)

·twoy- 'measure' — noun *·twoy* '(measure)' (1459 Wel 9:7b); *·twoy·ti* (?1517- Pak 1:67b); *·twoy·Gey* (?1517- Pak 1:12a); *·twoy·m ye n'* (?1517- Pak 1:12a); *·twoy·non* (1459 Wel 9:7b); *·twoyGe·nul* (1447 Sek 6:35b); *·twoyte·n i* (1447 Sek 6:35a, 1449 Kok 168); *·twoyywo·m i·lwoswo·n i* (1481 Twusi 8:10a). The unattested infinitive should be *·*·twoy·ya*.

·pwuy- 'cut': *·pwuyGwo* (1481 Twusi 8:61a) — *¨pwuyGwo* (id. 7:38b) must be a mistake; *·pwuyn.i* (1481 Twusi 7:38b); *·pwuyl* (1527 Cahoy 3:3a=5b) = *·pwuylq* (1459 Wel 8:98b); *·pwuyye* (1481 Twusi 7:32b) = *·pwuy·ye* (1459 Wel 1:45a, 1482 Kum-sam 4:31a); *·pwuynon* (1481 Twusi 7:18b, 10:32a); *·pwuy·ye·tun* (1459 Wel 1:45a). The modulated form in *pwuyywo·m ol* (1481 Twusi 21:24b) should carry a dot at the beginning; I lack access to the text of ⁽?⁾*pwuy·ywul* (1481 Twusi 9:30_).

·phwuy- 'burn (a fire)': *·phwuy·Gey* (1462 ¹Nung 7:16b, 7:18a); *·phwu·m ye* (1459 Wel 7:35a); *·phwuyn* (1462 ¹Nung 7:18a). Presumably the infinitive was *·*phwuy·ye*. The causative stem is *phwuy·Gwu-*.

·chu-₁ 'eliminate, get rid of': *·chu·key* (1463 Pep 2:214b); *·chu·m ye* (1465 Wen 2:1:1:52a); *·chul* (1465 Wen se:47a); *·chwu·m* (~ *on* 1459 Wel 13:21a, ~ *un* 1463 Pep 2:207a)

·chu-₂ 'sift': *·che* (1459 Wel 17:17b, 1462 ¹Nung 7:9a); *·chwu·m on* (1463 Pep 5:155b)

·chu-₃ 'dance': *·chukwo* (1481 Twusi 8:41b); *·chu·m ye* (1459 Wel 21:190b)

·khu- 'big': *·khu·kwo* (1447 Sek 6:32b); *·khu·kuy* (1447 Sek 6:34a), *·khu·key* (1462 ¹Nung 1:3a, 1518 Sohak-cho 9:24a); *·khu·m ye* (1462 ¹Nung 2:4ab, 1463/4 Yeng 2:12b), *·khu·m ye n'* (1459 Wel 23:77a); *·khul* (1527 Cahoy 3:11a=25b); *·khun* (1445 ¹Yong 27; 1462 ¹Nung 4:18b; 1463 Pep

2:190a, 2:231b, 2:232a, 7:141b; ?1468⁻ Mong 47b; 1482 Kum-sam 3:25b, 4:22a); ʿkhe (1447 Sek 6:12b, 1449 Kok 28, 1459 Wel 2:47b), ʿkhe ʿza (1463 Pep 2:224b); ʿkhuʿkenul ʿza (1482 Kum-sam 2:16a); ʿkhwu.m uʿlwo (1459 Wel 1:29b)

ʿphu- 'bloom': ʿphuʿkwo (1459 Wel 21:2a); ʿphulq (1447 Sek 13:25a); ʿphuʿm ye (1459 Wel 2:31a, 21:6b), ʿphu.m ye (1482 Kum-sam 2:6b), ʿphuʿm ye n' (1459 Wel 2:47a); ʿphun (1447 Sek 13:25a, 1481 Twusi 21:15b), ʿphu.n i ''la (1459 Wel 2:47a); ʿphe (1449 Kok 158, 1459 Wel 2:47a), ʿphe ʿys.non (1482 Nam 1:37b), ʿphe ʿys.keʿtun (1463 Pep 6:47a), ʿphe ʿys.teʿn i (1447 Sek 6:31a, 1449 Kok 9, 1459 Wel 1:21a, 1481 Twusi 8:34b), ʿphe ʿyʿsywo.m ol (1481 Twusi 23:30b); ʿphukeʿtun (1459 Wel 8:75b); ʿphutwoʿta (1482 Kum-sam 3:33a, 1482 Nam 1:66a); ʿphu-ʿtos (1463 Pep 1:85b); ʿphwuʿm i (1462 ¹Nung 1:19a), ʿphwu.m ol (1482 Kum-sam 3:33b); ʿphwulq ʿt i (1462 ¹Nung 1:19ab); [ʿ]phwuʿtoy (1459 Wel 7:57b)

ʿptu-₁ 'float': ʿptuʿti (1462 ¹Nung 6:26b), ʿptun (1462 ¹Nung 1:62b; 1481 Twusi 7:12b, 21:22b); ʿptuʿlak (1481 Twusi 7:2a); ʿptuʿm ye (1462 ¹Nung 3:79b) and ʿptu.m ye (1462 ¹Nung 2:31a); ʿpte (1462 ¹Nung 1:47b); ʿptwuʿm i (1462 ¹Nung 3:106a)

ʿptu-₂ 'open (eyes)': ʿptuʿkwo (1449 Kok 65); ʿptukuy (1482 Kum-sam 2:59b); ʿpte (1462 ¹Nung 1:59a); ʿptukeʿna (1459 Wel 8:8b) ʿptwuʿm i (1463 Pep 2:163b)

ʿptu-₃ 'spoil': ʿptul (1527 Cahoy 3:6a=12a); ʿptun (1466 Kup 2:61b); ʿptunoʿn i (1466 Kup 2:61b)

ʿpthu- 'burst': ʿpthuti (1463 Pep 2:243a); ʿpthukwo (1481 Twusi 25:26b); ʿpthe (1481 Twusi 7:24b)

ʿpsku- 'extinguish': ʿpskuti (1482 Kum-sam 5:3a); ʿpskun (1459 Wel 8:38b, 1463 Pep 6:153a); ʿpske (1459 Wel 2:71b, 1462 ¹Nung 2:43b, 1481 Twusi 25:13a); ʿpskukeʿnul (1447 Sek 6:33b); ʿpskunun (1449 Kok 106); ʿpskuʿsya (1449 Kok 101); ʿpskwutoy (1482 Kum-sam 5:3a)

ʿpsu-₁ 'bitter': ʿpsuta (1481 Twusi 8:18a); ʿpsuʿm ye (1462 ¹Nung 3:9b, 5:37b); ʿpsun (1462 ¹Nung 3:9a, 1466 Kup 78b, 1482 Kum-sam 2:50a); ʿpse (1459 Wel 2:25b); ʿpswum (1462 ¹Nung 3:10a). The expected dot is mistakenly omitted in psul (1527 Cahoy 3:6b=14b).

ʿpsu-₂ 'use': ʿpsuʿti (1447 Sek 19:30b), ʿpsuti (1482 Kum-sam 5:8a) − 1518 Sohak-cho 10:1b has psuʿti ʿnon but that may be a mistake, since the preceding line has ʿpsul; there seems to be a mistake also in psuʿkey (1459 Wel 23:73a) 'so as to use', countered by ʿpsukwo ''la a little later in the same passage; ʿpse (1462 ¹Nung 1:81a, 1463 Pep 2:240a, 1481 Twusi 8:17a); ʿpsunon (1451 Hwun-en 1b, 1482 Kum-sam 2:17b); ʿpsuʿsya (1445 ¹Yong 77); ʿpswuʿtoy (1464 Kumkang 87b), ʿpswu.m i (1482 Kum-sam 5:8a); ʿpswul (1462 ¹Nung 1:19a)

ʿ(s)su-₁ 'write': ʿsun (1482 Kum-sam 3:7b); ʿssul (1527 Cahoy 3:9a=20b); ʿssu.m ye (1447 Sek 6:43a, 1463 Pep 2:163a); ʿsse (1447 Sek 9:30a), ʿse (1481 Twusi 23:44a); ʿsswutoy (1463 Pep 4:72b), ʿsswun (1447 Sek se:4b)

ʿ(s)su-₂ 'wear on head': ʿsukwo (1482 Nam 1:30b, 1481 Twusi 15:6b), ʿssuʿkwo (1459 Wel 10:95b, 1463 Pep 7:176a)

ʿstu-₁ 'cauterize': ʿstukwo (1466 Kup 1:22a); ʿstuʿl i (id. 1:41a); ʿstula (id. 1:36b) = ʿstuʿla (id. 1:3a, 19a, 25a, 26b, 29a, 76a); ʿstuʿm ye n' (id. 1:22a); ʿstum (?1517⁻ Pak 1:38a); ʿstuʿn i (ibid.); ʿste (1466 Kup 2:72b); ʿstwutoy (1466 Kup 1:20a, 36b) = ʿstwuʿtoy (?1517⁻ Pak 1:38b); ʿstunoʿn i (id. 1:57a)

ʿstu-₂ 'scoop': ʿstuʿkwo (1481 Twusi 15:54a), ʿste (1475 Nay 1:3a), ʿstul (1527 Cahoy 2:15a=7a)

ʿcho-₁ 'cold': ʿchoʿkwo (1459 Wel 1:26b); ʿchol (1527 Cahoy 1:1b=1a, 3:1b=2a); ʿchon (1449 Kok 102); ʿchwom (1462 ¹Nung 3:12a). The unattested infinitive should be *ʿcha.

ʿcho-₂ 'get full': ʿchoʿti (1449 Kok 180); ʿchoʿm ye (1447 Sek 19:7b); ʿchon (?1517⁻ Pak 1:55b, 1518 Sohak-cho 8:27b); ʿcha (1447 Sek 6:4b, 1449 Kok 140), ʿcha ʿza (1462 ¹Nung 8:28b); ʿchoke ʿza (1447 Sek 19:39a); ʿchwoʿm ol (1463 Pep 3:98b); ʿchoʿsya (1459 Wel 2:8b)

ʿcho-₃ 'kick': ʿchokwo (1482 Nam 1:50a); ʿthi-ʿchoʿm ye (1449 Kok 39); ʿchol (1527 Cahoy 3:4b=8b); pak ʿcha (1481 Twusi 15:33a)

ʿcho-₄ 'attach, fasten on': ʿchoʿti (1481 Twusi 8:49b); ʿcha (1465 Wen se:8b); ʿchokeʿna (1462 ¹Nung 7:46a); ʿchwon (1481 Twusi 25:8a)

ʿpho- 'dig': ʿphoʿkwo (1449 Kok 60); ʿpha (1459 Wel 1:7b, 1462 ¹Nung 7:9a, 1481 Twusi 21:42a); ʿphwom (1463 Pep 4:95b), ʿphwoʿm ol (1462 ¹Nung 3:87b)

˙*pto-* 'pick, pluck': ˙*ptokwo* (1475 Nay 2:2:69b), ˙*pto.l i* ʼʼ*Gwo* (1481 Twusi 10:8b); ˙*pta* (1449 Kok 99, 1459 Wel 2:12b); ˙*ptonon* (1475 Nay 2:2:68b, 1481 Twusi 8:15b); ˙*ptoten* (1481 Twusi 15:21a), ˙*ptwo.m ol*, ˙*ptwotoy* (1475 Nay 2:2:69a)

˙*ptho-₁* 'pluck (harp strings), play (string music)': ˙*pthokwo* (1481 Twusi 24:38a, 1482 Kum-sam 4:10b); ˙*ptho.m ye* (1482 Kum-sam 2:11b); ˙*pthol* (1459 Wel 8:49a, 1527 Cahoy 2:9a=17a); ˙*pthono ta* (1482 Kum-sam 5:8a). The unattested infinitive would be * ˙*ptha*.

˙*ptho-₂* 'cut open, split': ˙*ptho kwo* (1459 Wel 23:73b, 1466 Kup 2:79a); ˙*ptha* (1482 Nam 1:15a)

˙*pco-₁* 'salty': ˙*pco m ye* (1462 ¹Nung 5:37b); ˙*pcol* (1527 Cahoy 3:6b=14a, 3:8a=17b); ˙*pcon* (1459 Wel 1:23a, 1466 Kup 1:32a); ˙*pcwom* (1462 ¹Nung 3:51a). The unattested infinitive: * ˙*pca*.

˙*pco-₂* 'weave': ˙*pco ti* (1462 ¹Nung 9:53b), ˙*pcon* (?1517⁻ Pak 1:29a), ˙*pcol* (1475 Nay 2:2:51b, 1527 Cahoy 3:8b=19a); ˙*pca* (1475 Nay 2:2:51a, 1481 Twusi 20:19a); ˙*pcwon* (1463 Pep 2:140a). The forms *pcoy isya* (1475 Nay 2:2:51b) and *pcoy ye* (id. 2:52a) are from the causative *pcoy i-*.

˙*psko-* 'peel, husk, shell; hatch': ˙*psko kwo* (1481 Twusi 7:32-3); ˙*psko m ye* (1463 Pep 2:116a, 2:117a). The unattested infinitive would be * ˙*pska*, the modulated forms * ˙*pskwo-*.

˙*pso-* 'wrap': ˙*pso kwo* (?1517⁻ Pak 1:28a) ˙*pso.m ye n'* (1481 Twusi 16:67b); ˙*pson* (1481 Twusi 8:33-4); ˙*psa* (1481 Twusi 20:39a); ˙*pswon* (1481 Twusi 21:4b)

˙(*s*)*so-* 'valuable': ˙*sso ta* (?1517⁻ ¹No 2:4b); ˙*sso m ye* (1447 Sek 13:22b); ˙*sson* (1459 Wel 18:78b); ˙*ssa* (1463 Pep 2:140a). The unattested modulated forms would be ˙*sswo–* .

˙*tho-₁* 'ride': ˙*tho ti* (?1517⁻ Pak 1:37b); ˙*tho kwo* (1459 Wel 10:28a), ˙*thokwo ˙cye s* (1481 Twusi 15:55b); ˙*thol* (1459 Wel se:18a); ˙*thon* (1459 Wel 1:27b); ˙*tha* (1482 Nam 1:36b); ˙*tho sya* (1459 Wel 1:27b); ˙*thwon* (1445 ¹Yong 34)

˙*tho-₂* 'receive, undergo': ˙*thoti* (1481 Twusi 8:33a); ˙*tho.m ye* (1475 Nay 1:se:2b); ˙*thon* (1447 Sek 19:2b); ˙*tha* (1481 Twusi 7:2b); ˙*tho no.n i* ʼʼ*la* (1462 ¹Nung 1:89a); ˙*thwo.m i* (1475 Nay 3:63a)

˙*tho-₃* 'burn (a fire):' ˙*tho ti* (1462 ¹Nung 9:108b); ˙*thol* (1465 Wen 1:1:2:181a)

˙*hoy-* 'white': ˙*hoyta* (1482 Kum-sam 4:22b); ˙*hoy Gwo* (1459 Wel 1:23a); ˙*hoy Gey* (1445 ¹Yong 50); ˙*hoyl* (1459 Wel 1:22b); ˙*hoyn* (1445 ¹Yong 50; 1447 Sek 6:43b; 1481 Twusi 7:1a, 16:60a; 1527 Cahoy 2:14b=29b); ˙*hoyGe nol* (1481 Twusi 16:1a). Probably scribal errors: ?*[ ]hoy Gwo* (1463 Pep 1:148b); ?*[ ]hoyywo m ol ko cang muy nwola* (1481 Twusi 23:23a) — CF ˙*hoyywo m ol* (1481 Twusi 7:27a). The unattested infinitive: * ˙*hoy ya*. Variant ˙*huy-* (˙*huyn mo¨toy* – 1481 Twusi 25:2b).

˙*moy-* 'remove (weeds), weed': ˙*moyl* (1527 Cahoy 3:3a=5a); ˙*moyya* (1481 Twusi 7:34b); ˙*moy ywo m i* (1462 ¹Nung 1:19a); ˙*moy ywolq ˙t i* (1462 ¹Nung 1:19a)

˙*soy-* 'leak': ˙*soy ti* (1463 Pep 3:56a); ˙*soy m ye n'* (1466 Kup 1:78a) — *[ ]soy m ye n'* (1459 Wel 23:77b) omits the dot here and twice above in the line; ˙*soyl* (1463 Pep 1:24b); ˙*soy ya* (1463 Pep 6:89b); ˙*soy non* (1462 ¹Nung 6:106b, 1465 Wen 1:1:2:107b), ˙*soynon* (1447 Sek 13:10b); ˙*soy ywom* (1465 Wen 1:1:2:97b)

˙*skoy-* 'wake up': ˙*skoyti* (1481 Twusi 10:7a, 1485 Kwan 3a); ˙*skoy Gey* (1459 Wel 13:18b); ˙*skoy m ye* (1464 Kumkang 38a, ?1468⁻ Mong 42b); ˙*skoylq* (1447 Sek 9:31a); ˙*skoyn* (1465 Wen 1:2:1:47a); ˙*skoy ya* (?1468⁻ Mong 59a); ˙*skoy yan* (1465 Wen 1:1:2:151a); ˙*skoyGe na* (1459 Wel 10:70b); ˙*skoyywo n i* (1459 Wel 10:24b), ˙*skoy ywom* (1465 Wen 1:1:2:37b), ˙*skoyywo m ol* (1481 Twusi 21:20b).

˙*chuy-* 'slant, lean': ˙*chuyti* (1463/4 Yeng 1:52a), ˙*chuyn* (1459 Wel 1:45b); ˙*chuy ye* (1465 Wen 1:1:110a, 1586 Sohak 2:62a)

Critical examples are lacking for ˙*kuy-* 'crawl', ˙*skuy-* 'shun', ˙*spuy-* 'drain', ˙*pco-₃* 'squeeze', and a few others. The only examples of ˙*muy-* 'get cracked' are of the infinitive, as in ˙*muyye ˙tye* (1481 Twusi 16:29b). These are put into the always-high group by default.

˙*iy-* (copula): ˙*i Gwo* (1459 Wel 1:31a); ˙*i Gey* (1462 ¹Nung 2:27b); ˙*i la* (1447 Sek 6:17a; indicative assertive); – ˙*i m ye* (1463 Pep 5:30a), – ˙*i m ye n'* (1459 Wel 2:49a); – ˙*in* (1462 ¹Nung 2:6b, 2:8b; ?1517⁻ ¹No 2:54b); ˙*i sya* (1447 Sek 13:29a), ˙*isi na* (1449 Kok 2); ˙*i-ngi* ʼʼ*ta* (1447 Sek 24:46b, 1459 Wel 21:218b); ˙*ila n i* (1446 Sek 6:19b; retrospective modifier). Presumably the loss of accent is secondary in *syel hu.n in* ˙*hoy* ˙*yey* (1462 ¹Nung 2:6b), ¨*twul.h i m ye* (1447 Sek 13:49b), ˙*SYANG isya- s-ongi* ʼʼ*ta* (1447 Sek 23:22b), ...

ʿchi- 'raise': ʿchiˑkwo (1463 Pep 7:77b), ʿchil (1459 Wel 8:87a); ʿchinon (1459 Wel 1:46b)

ʾpski- 'insert, ... ': ʾpskikwo (1481 Twusi 10:26a) = ʾpskiˑkwo (ʾ1517- Pak 1:26a); ʾpskil (1459 Wel 13:56b), ʾpskiˑm ye (1463 Pep 5:13a); ʾpskye (1459 Wel 2:18b, 1465 Wen 2:3:1:54b, 1475 Nay se:7a) − ˮpskye (1466 Kup 1:88a) must be a mistake

ʾpti- 'steam': ʾptil (1462 ¹Nung 4:18b, 1527 Cahoy 3:6a=12a); ʾptin (1481 Twusi 7:18a, 1586 Sohak 5:48b); ʾptye (1462 ¹Nung 6:89b, 1481 Twusi 20:38a, 1482 Kum-sam 5:45b); ʾptinon (1481 Twusi 8:9b)

ʾthi- 'hit': ʾthiˑm ye (1462 ¹Nung 8:88b), ʾthiˑm ye n' (1447 Sek 6:28a); ʾthil (1527 Cahoy 3: 13a=30a); ʾthye (1447 Sek 6:28a, 1449 Kok 156); ʾthikeˑtun (1459 Wel 7:53b); ʾthinoˑta (1462 ¹Nung 4:130a), ʾthywoˑtoy (ʾ1468- Mong 53a), ʾthywon (ʾ1468- Mong 10a), ʾthywum (1463 Pep 5:38a)

2.12.4.4. Vowel-final monosyllabic stems that are high/low.

<u>Group 4. Stems that are high only before the infinitive ending or one of the bound stems</u>

ˆci_1 'want to do' (aux): ciˑla (1447 Sek 24:8a, 24:9b; 1459 Wel 1:10b, 1:11b, 7:12a, 8:101b; 1462 Pep 2:28b; 1481 Twusi 8:1b, 22:35a) ‖ ˆciˑye (1462 ¹Nung 1:16b), ˆcye (1447 Sek 6:14b, 6:15a; 1451 Hwun-en 3b; 1459 Wel 18:3a, 21:124-5; 1462 ¹Nung 1:38a, 7:73b; 1465 Wen se:43b, 1:1:2:75b, 2:3:1:47a; 1481 Twusi 7:14a, 8:38b, 15:55b; 1586 Sohak 6:35b), ˆcye ʾy.n i ʾʾla (1463 Pep 4: 134b); ˆci-ngi ʾʾta (1445 ¹Yong 58; 1447 Sek 6:22b, 24:8b; 1459 Wel 2:9b, 2:27b, 8:1a, 8:4-5, 10:10b)

ˆci_2 'carry on the back': ciˑkwo (1463 Pep 2:165a), cil (1527 Cahoy 3:10b=24a); ˮcywum (1463/4 Yeng 2:73b), ˮcywuˑm ul (1481 Twusi 24:32a) ‖ ˆcye (ʾ1517- Pak 1:11b; 1481 Twusi 7:28a) < ˆciˑye

ˆci_3 'chop (wood)': ˮcywuˑm ey (1481 Twusi 7:6b) ‖ ˆcinon (1481 Twusi 7:39a). This assignment assumes such unattested forms as *ciˑti, *ciˑkwo, *cin, *cil(q), *ˆcye < *ˆciˑye.

ˆ(c)ci- 'get fat': ciˑti (ʾ1517- Pak 1:22b); ciˑkwo (1481 Twusi 16:62b); cin (1481 Twusi 15:4b, 1466 Kup 1:80a); cciˑkey (1459 Wel 23:73a) ‖ sol[h] ˆcye (1481 Twusi 16:15b) < *ˆciˑye

ˆi- 'carry on the head': iˑta (1482 Nam 2:64a); iˑkwo (1482 Kum-sam 2:11a − also 1481 Twusi 18:10, unavailable to me); il (1527 Cahoy 2:10b=24b) ‖ ˆiye (1449 Kok 34) = ˆiˑye (1462 ¹Nung 8:93b, 1463 Pep 4:174a). The substantive *iˑm ye is unattested; ˮim (1482 Kum-sam 5:34a) is the modulated substantive (we expect *ˮywum < *iˑywum) = ˆiywoˑm on (1482 Nam 2:64a), see p. 70.

ˆni- 'roof, thatch': ˮnil = nil (1527 Cahoy 3:8r=18r) ‖ ˆnisiˑkwo (1475 Nay 2:2:72b). SEE p. 70.

ˆti_1 'fall': tiˑkwo (1445 ¹Yong 86); tiˑkey (1459 Wel 1:29a); til (1527 Cahoy 3:3a=5a); tin ˆt ol (1445 ¹Yong 31) − "ˆtin tol" (LKM 1962:117) must be a misprint (CF Taycey-kak repro) ‖ ˆtiˑye (1447 Sek 9:27b, 1518 Sohak-cho 10:11b), ˆtiye (1481 Twusi 15:44a); ˆtikeˑnul (1447 Sek 6:30-1), ˆtikeˑtun (1462 ¹Nung 1:19a); ˆtinwon (1481 Twusi 21:14b); ˮtywu.m ul (1481 Twusi 23:30b), ˮtywuˑm i (1482 Kum-sam 2:49b), ˮtywu.m ay (1482 Kum-sam 2:6b); ˮtywulq (1447 Sek 9:28a)

ˆti_2 'become' (aux): tiˑkey (1447 Sek 6:13a); tiˑkwo (1481 Twusi 20:16a); tiˑm ye (1459 Wel 2:71b); ‖ ˆtiˑye ʾys.keˑnol (1481 Twusi 15:44b)

ˆpsti- 'overflow': pstiˑm ye (1449 Kok 178), pstiˑkwom (1459 Wel 7:9b). There are no attested examples that would call for ˆpsti-- , but such forms as ˆpstiˑye and ˆpsti(ʾ)ke-- must have existed.

ˆca- 'sleep': caˑti (ʾ1517- ¹No 1:47b); caˑkwo (ʾ1517- ¹No 1:10b); caˑkey (ʾ1517- ¹No 1:46b); caˑm ye (ʾ1468- Mong 42b); calq (1462 ¹Nung 9:88a), cal (1459 Wel 1:25b, 1527 Cahoy 1:15b=30b) ‖ ˆca za (1481 Twusi 16:66a); ˆcasya (1482 Nam 2:76a), ˆcanoˑn i (1447 Sek 13:10b)

ˆha- 'many / much': halk ˆka [= halq ˆka] (1465 Wen 1:2:2:136a); haˑm ye (1459 Wel 10:19a), haˑm ye n' (1481 Twusi 22:20a); han (1445 ¹Yong 19, 1447 Sek 6:25b, 1459 Wel 17:44a, 1463 Pep 4:84b) − ˆhan ˆpi (1445 ¹Yong 67) 'heavy rain' must be either a mistake or a variant of the modulated modifier ˮhan (1447 Sek 6:2b); haˑn ye (1447 Sek 19:4a), haˑn i ʾʾla (1459 Wel 2:31b) ‖ ˆha ˆtwo (1463 Pep 7:62b), ˆhaˑa (1459 Wel 1:24b), ˆhanoˑn i (1445 ¹Yong 2, Manlyek text); ˆhasin (1449 Kok 18); ˮhaˑm ol (1482 Kum-sam 3:19a) ← ha-ʾ[wo]-m. SEE p. 70 for ha-ngi ʾʾta.

ˮka- 'go': kaˑti (ʾ1517- Pak 1:67b, ʾ1517- ¹No 2:7a); kaˑkwo (1462 ¹Nung 7:73b); kaˑkey (1447 Sek 6:9b); kaˑm ye (1459 Wel 8:10b, 1481 Twusi 7:3b), kaˑmye n' (1447 Sek 6:22b); ka-ˑtos (1459 Wel 2:7a) ‖ ˆka (1447 Sek 6:35b; 1459 Wel 2:11a, 10:20b, 18:71b; 1462 ¹Nung 2:50b; 1463 Pep 1:77a;

1481 Twusi 7:2a, 8:37b, 8:40a; ʔ1517‑ Pak 1:37b, 1:54a, 1:64b); ˙ka˙a (1447 Sek se:6b, 6:1a, 6:6b, 13:10b, 24:37b; 1459 Wel 8:100b, 10:13ab, 18:71b, 23:65a; 1463 Pep 2:138b); ˙ka˙sya (1445 ¹Yong 58; 1447 Sek 6:45b; 1459 Wel 1:5b, 2:11b), ˙ka˙non ˙ta (ʔ1517‑ ¹No 1:1a), ˙kano˙n i (1445 ¹Yong 2, 1447 Sek 6:9b), ˙kanon ce˙k uy (1447 Sek 6:19a), ˙kata ˙ka (1445 ¹Yong 25, 1482 Nam 1:36b)

˙na- 'emerge': na˙ti (1462 ¹Nung 1:8b) − CF modulated ¨na˙ti (1447 Sek 6:19a); na˙kwo (1459 Wel 1:46a); na˙key (1463 Pep 1:158b); nan (1459 Wel 1:28b, 21:216a; 1463 Pep se:7b); nal (1527 Cahoy 1:17b=34a); na˙m ye (1447 Sek 23:44a; 1462 ¹Nung 1:51b), na˙m ye n' (1462 ¹Nung 7:74b); ¨na˙toy (1447 Sek 19:7b, 1449 Kok 185) ← na-˙[wo]-˙toy, ¨nalq (1462 ¹Nung 3:24b) ← na-˙[wo]-lq (1459 Wel 21:215b) ‖ ˙na (1481 Twusi 7:39a); ˙na˙a (1449 Kok 41, 1459 Wel 1:5a); ˙na˙ta ka '˙m ye (1459 Wel 21:215b)

˙sa- 'buy': sa˙kwo (1481 Twusi 7:21a); sa˙key (ʔ1517‑ Pak 1:2a), sal (1527 Cahoy 3:9b=21a) ‖ ˙sa (ʔ1517‑ ¹No 2:21a); ˙sa˙a (1447 Sek 6:8a, 1459 Wel 1:10b)

˙(h)hye- 'pull, drag': hhye˙kwo (1449 Kok 39), hye˙kwo (1463 Pep 4:93b); hye˙ti (ʔ1517‑ ¹No 2:31a); hhyen (1463 Pep 2:100b) − ¨hhyen (1462 ¹Nung 1:17b) is the modulated modifier; hhyel (1459 Wel se:3a), hyel (1527 Cahoy 1:18b=35b) ‖ ˙hhye (1463 Pep 1:158b, ʔ1468‑ Mong 58a); ˙hye˙a (1482 Kum-sam 2:64b); ˙hyeta ˙ka (1481 Twusi 16:1b)

¨nye- 'go': nye˙ti (ʔ1468‑ Mong 41b, 1481 Twusi 7:6a); nye˙key (1463 Pep 2:39b, 1481 Twusi 7:6a); nyel (1447 Sek 9:21b, 1482 Nam 1:28b) = nyelq (1459 Wel 21:119a), nye˙l i ˙Gwo (ʔ1517‑ ¹No 1:30b) > nyey.l i Gwo (1795 ¹No-cwung [P] 1:27b), nye˙cye (ʔ1517‑ ¹No 1:10b) = nyeycya (1795 ¹No-cwung [P] 1:9b); nye˙m ye ¨nye˙m ay (1482 Kum-sam 4:2a) ‖ ˙nye (1481 Twusi 7:2a, 14:29b, 25:29a, 14:29b; ʔ1517‑ ¹No 1:1b); ˙nye˙a (1449 Kok 86); ˙nyeke˙tun (1463 Pep 3:155b); ˙nyenun (1459 Wel 7:52b), ˙nyenon (1481 Twusi 21:14a), ˙nyenwon ˙t ol (1482 Kum-sam 4:2a); ˙nyesi˙n i (1482 Kum-sam 4:54a), ˙nyesil (1463 Pep 2:39b)

˙phye- 'spread it': phye˙ti (1481.Twusi 8:4b); phye˙kwo (1462 ¹Nung 9:88a); phye˙key (1459 Wel 18:61b); phyel (1459 Wel 21:4a, 1527 Cahoy 3:6a=12b); phye˙m ye (1481 Twusi 16:55a) ‖ ˙phye (1447 Sek 9:21b, 9:29a; 1462 ¹Nung 1:4a), ˙phye˙a (1447 Sek 6:6a, 13:10a), ˙phye˙e ˙ys.ten (1447 Sek 6:2a); ˙phye˙ta˙la (1463 Pep 4:170a); ˙phyesi˙m ye ˙phyesi˙kwo k (1462 ¹Nung 1:108b); ˙phye˙sya (1462 ¹Nung 1:3a); ˙phyesyan ˙t ila (1482 Kum-sam 5:35b); ˙phyesi˙nwon (1482 Nam 1:5a)

˙sye- 'stand': sye˙ta (1447 Sek 19:13a); i˙le sye˙ti (1475 Nay 1:34a); sye˙kwo (1463/4 Yengka 2:12a), syel (1527 Cahoy 3:12a=27a), ¨syelq (1462 ¹Nung 3:36a; modulated) ‖ ˙sye˙a (1447 Sek 19:31a, 1459 Wel 2:64b), ˙sye˙e (1459 Wel 10:17b); ˙sye˙sya (1445 ¹Yong 28). The phrase ans.ke˙na [˙]syeke˙na (1447 Sek 19:5b) 'whether sitting or standing' suppresses the stem accent even before the effective aspect -˙ke-, but that is peculiar to this idiom.

˙wo- 'come': wo˙ti (1459 Wel 7:29b); wo˙key (1447 Sek 6:43b), wo˙kwo (1481 Twusi 16:65a); wolq ˙t ol (1449 Kok 147), won ˙ta (ʔ1517‑ Pak 1:51a), wo˙n i (1459 Wel 1:45a); wo˙m ye n' (1586 Sohak 4:33a); ¨wo˙m i (1459 Wel 9:10b, 1482 Kum-sam 3:19a), ¨wo˙m ol (1482 Nam 1:50b), ¨wo[˙]m ay (1481 Twusi 21:25b) ← wo-˙[wo]-m ‖ ˙woke˙na (1459 Wel 9:43a); ˙woke˙nol (1481 Twusi 8:40a); ˙woke˙ton (1482 Kum-sam 3:27b), ˙woke˙tun (1459 Wel 10:25a), ˙wona˙ton (1447 Sek 6:16b, 19:6a), ˙wa˙ton (1463 Pep 3:2b); ˙wo˙sya (1459 Wel 8:55b), ˙wosya ˙two (1447 Sek 6:4b), ˙wosya ˙za (1445 ¹Yong 38); ˙wosi˙n i (1459 Wel 1:5b); ˙wo˙silq (1459 Wel 2:18b), ˙wosil ˙ss ye (1447 Sek 23:29a); ˙wosi˙n i (1459 Wel 1:5b); ˙wosin ˙t i (1463 Pep 5:119b); ˙wona ˙two (1481 Twusi 25:23a); ˙wona ˙two (1481 Twusi 25:23a); ˙wona˙ta (ʔ1517‑ Pak 1:3a); ˙wo˙nan ˙t i (ʔ1517‑ ¹No 1:68b); ˙wo˙na˙la (1459 Wel 7:7b, ʔ1517‑ ¹No 1:57b); ˙wona˙n i (1463/4 Yeng 1:90b); ˙wonan ˙t i (1463 Pep se:21a); ˙wona˙n ywo (1447 Sek 6:19b); ˙wo˙no-ngi '˙ta (1447 Sek 6:29b); ˙wono˙n ywo (1447 Sek 6:29b); ˙wo˙nwo˙la (ʔ1517‑ ¹No 1:1b); ˙wonwon ˙t in ˙t ay n' (1459 Wel 10:7b); ˙wota ˙ka (1447 Sek 23:57b); ˙woten ˙t ey n' (1445 ¹Yong 51)

˙pwo- 'see': pwo˙ti (1462 ¹Nung 2:37a; 1481 Twusi 7:29a, 8:24a); pwo˙kwo (1447 Sek 6:14a, 6: 19a, 6:30a, 19:10a, 24:20b; 1459 Wel 17:17b; 1482 Kum-sam 2:1b); pwo˙key (1447 Sek 13:10a); pwon ˙ta (1462 ¹Nung 2:8b, ʔ1468‑ Mong 58a); pwolq (1462 ¹Nung 2:111a); pwo˙m ye (1447 Sek 23: 22a, 13:23b, 19:10a; 1465 Wen 1:2:1:39b); ¨pwom (1462 ¹Nung 2:84a) ← pwo-˙[wo]-m; pwo-˙two (1447 Sek 24:28b) ‖ ˙pwo˙a (1459 Wel 10:4b), ˙pwoa ˙cye (1447 Sek 6:14b); ˙pwoken ˙t ey n' (1447

Sek 6:6a), `pwoken `t ay n' (1459 Wel 7:12b, 1462 ¹Nung 2:6-7); `pwo`asi`tun (1459 Wel 2:58b); `pwoa`ton (1447 Sek 6:15b); `pwosi`kwo (1447 Sek 6:17b, 1449 Kok 43); `pwosi`m ye (1475 Nay 1: 9-10); `pwosin `t ay (1449 Kok 49); `pwo`sya (1463 Pep 5:100a); `pwono`n i (1447 Sek 13:25ab, 1462 ¹Nung 1:108b), `pwo`no.n i `'la (1459 Wel 21:206a), `pwonon `ta (1462 ¹Nung 1:83b); `pwonwon (1459 Wel 2:53a); `pwonwo`la (1481 Twusi 15:52b, `pwonwo[`]la 7:11a); `pwonwon `ka (1449 Kok 2), `pwonwon `t i`m ye (1459 Wel 17:35a), `pwonwon `t on (1475 Nay 1:77b)

`(s)swo- 'shoot; sting' (not spelled `pswo- before the early 1500s): sswo`ta (1446 Hwun 24a); sswo`ti (1481 Twusi 10:26a); swol (1459 Wel 14:61b); the exceptional `sswo`m ye (1462 ¹Nung 8:88b) seems to be a mistaken continuation of the high pitch of the preceding string ca`pu`m ye `thi`m ye ‒ , and the dot on `pswol 'to shoot' (1527 Cahoy 3:5a=9a) is also a mistake that a few entries later is countered by the expected pswol 'to sting' (id. 3:5a=10a). ‖ `swoa (1481 Twusi 7:18a, 1482 Kum-sam 4:52a), `swoa `za (1465 Wen 1:1:1:113a), `swa (1481 Twusi 16:56b); sswo`sya (1445 ¹Yong 63), `sswosi`n i (1445 ¹Yong 57). Also swo`ta (1446 Hwun 24a) 'overturn' ? < 'shoot it down'.

`cwu- 'give': cwu`kwo (1463 Pep 4:37b); cwu`key (1465 Wen 2:3:1:125a); cwul (1527 Cahoy 3:9b=21b, 3:10a=21b), cwu`l i `Ge`n i (1447 Sek 9:13a), cwu`l i `ye (1447 Sek 9:12b); cwu`m ye (1447 Sek 9:12a), cwu`m ye n' (?1517- Pak 1:43a) ‖ `cwue (1481 Twusi 7:23b), `cwue `two (1463 Pep 2:77a); `cwusi`m ye n' (1447 Sek 23:55b); `cwue`nul (1459 Wel 17:20a); `cwu`esi`tun (1447 Sek 6:22b), `cwu`esi`ton (1475 Nay 1:9-10); `cwunu`n i (1464 Kumkang 21b); `cwu`sya (1445 ¹Yong 41). Unexplained: `mwut.cye `cwukwo `za (?1517- ¹No 1:51b) ← *`mwut`cye cwu`kwo `za.

`twu- 'put away': twu`ti (1482 Kum-sam 2:65a); twu`kwo (1447 Sek 6:23ab, 6:26a, 9:14a; 1459 Wel 1:28a, 21:78b), twu`kwo n' (?1517- ¹No 1:43b, 1518 Sohak-cho 8:37b), twu`kwo `za (1459 Wel 7:9a); twul `tta [= twulq `ta] (1459 Wel 2:64a), twu`l i `Ga (1481 Twusi 8:3b) ‖ `twu`e (1447 Sek 6:26a); `twuten `t ay n' (1463 Pep 2:231b); `twusi`kwo (1445 ¹Yong 58); `twu-`sywo`sye khe`nul (1445 ¹Yong 107)

`nwu- 'void (urine / feces)': nwu`m ye n' (1466 Kup 1:11b) ‖ `nwu`non (1586 Sohak 4:30b)

`ho- 'do': ho`ti (1475 Nay 1:70b); ho`kwo (1447 Sek 6:6a, 6:29a, 6:35b, 13:36a, 24:3b; 1451 Hwun-en 3b; 1459 Wel 1:13b, 1:26b, 1:30a, 1:30ab, 2:11a, 2:69a, 7:5b, 7:15b, 7:16a, 8:38b, 9:10b, 9:55ab, 10:9b; 1462 ¹Nung 8:104b; 1475 Nay 1:9-10, 1:34a, 1:84a; 1481 Twusi 8:27b, 23:23a; 1482 Kum-sam 2:6b, 2:21a, 2:55a, 2:65a, 3:55a, 4:48b; ?1517- Pak 1:25a, 1:39b, 1:43a, 1:57a; ?1517- ¹No 2:54b; 1586 Sohak 6:9b), ho`kwo k (1481 Twusi 8:33-4, 15:5a), ho`kwo n' (1459 Wel 17:54a; 1463 Pep 6:15b; 1482 Kum-sam 2:37a), ho`kwo `'la (1447 Sek 6:46a; 1459 Wel 1:13b, 10:4b); ho`key (1447 Sek 24:3a, 1459 Wel 21:219b), ho`kuy (1447 Sek se:6a, 9:5a, 24:2b);

ho`m ye (1447 Sek 9:12a, 9:17b, 13:22b, 13:23a, 19:7a, 19:7b, 21:68b, 23:34b, 24:28b; 1459 Wel 2:16a, 2:53a, 10:20b, 21:120a, 21:146a; 1462 ¹Nung 1:113a, 2:8b, 2:20b; 1463 Pep 3:178b, 5:212b; 1463/4 Yeng 2:126a; ?1468- Mong 62ab; 1475 Nay 1:76-7; 1482 Kum-sam 2:5b, 2:7b, 3:3b, 5:40b; ?1468- Mong 12a, 62ab, 1481 Twusi 7:31b; 1586 Sohak 2:9b), ho`m ye n' (1447 Sek 24:6b, 1459 Wel 1:12b, 1:49b, 8:62b, 10:18a, 18:18b; 1462 ¹Nung 1:77b, 3:47b, 5:85b, 7:73b; 1463 Pep 4:75a, 1463/4 Yeng 2:70a, 1464 Kumkang 64b, 1466 Kup 2:64a; 1482 Kum-sam 2:5b, 5:48-9);

hol (1481 Twusi 7:20b, 8:4b, 15:47b; 1459 Wel 1:18a, 18:13b; 1464 Kumkang 81b, 87b; 1475 Nay 1:35b; 1482 Kum-sam 2:20a; 1518 Sohak-cho 8:13b; 1586 Sohak 2:9b), holq (1459 Wel 8:69b); hol `tta (1463 Pep 4:176b) = hol `ta (?1517- Pak 1:10a, 1586 Sohak 6:50b); ho`l ye (1463 Pep 3:86a; 1464 Kumkang 69b; 1481 Twusi 21:38a); ho`l ywo (1447 Sek 6:24a, 1462 ¹Nung 2:81a, ?1517- Pak 1:3a); holq `t ol (1462 ¹Nung 3:68b) = hol `tt ol (1463/4 Yeng 1:5b); hol s (1475 Nay se:6a, 1:34a, 1:77a, 3:61a; 1482 Kum-sam 5:10b); hol `ss ol (1462 ¹Nung 1:29a) = holq `s ol (1462 ¹Nung 2:61a); hol `s i (1481 Twusi 8:1b) = hol `ss i (1463 Pep 2:60a), hol `ss i `Gwo (1447 Sek 9:37a) = hol `s iGwo (1482 Kum-sam 2:20b); hol `ss i`la (1447 Sek 6:46a, 1459 Wel 2:66b, 1462 ¹Nung 1:2b) = hol `s i`la (1465 Wen se:8b, se:77a); hol `ss i`m ye (1459 Wel 2:60a); hol `ss i`n i (1459 Wel 2:16a; 1462 ¹Nung 1:2b, 3:12b) = hol `s if`]n i (1482 Nam 2:6b); hol `ss oy (1447 Sek 6:2a, 13:36a, 19:25b, 24:40a; 1459 Wel 2:60a; 1462 ¹Nung 9:22a, 10:18a, 21:142b; 1463 Pep 1:164a) = hol [`]ss oy (1463 Pep 1:158b) = hol `s oy (1481 Twusi 7:5a); ho`l i (1447 Sek 13:15a; 1459 Wel 9:52a,

14:31b; 1462 ¹Nung 1:8b, 1:75a, 7:18a; 1463 Pep 1:208a, 2:6b, 2:28b; 1464 Kumkang 43a; 1465 Wen 1:2:2:4a; ⁷1468⁻ Mong 10b; 1481 Twusi 7:7b, 22:7b); *ho·l i ·za* (1463/4 Yeng 2:111a); *ho·l i ·Gwo* (1459 Wel 21:49b, 1481 Twusi 7:7b, 8:29a; ⁷1517⁻ Pak 1:7b, 1:64a, 1:74a) = *ho·l i [·]Gwo* (1459 Wel 21:49b; 1481 Twusi 22:7b; ⁷1517⁻ Pak 1:74a); *ho·l i ··la* (1447 Sek 6:1b; 1459 Wel 1:17a, 2:36b, 7:15b, 8:7a, 9:35de, 10:14b; 1462 ¹Nung 1:44a; 1463 Pep 3:47a; 1475 Nay se:6a); *ho·l i ·l ·ss oy* (1447 Sek 6:2b; 1459 Wel 1:28a, 2:61a, 7:15b) = *ho·l i ·l s oy* (1481 Twusi 8:2b); *ho·l i ··n i* (1459 Wel 1:49b, 1462 ¹Nung 5:85b, 1465 Wen 1:2:3:6a) = *ho[·]l i ··n i* (1463 Pep 4:86b); *ho·l i ·n t ay n'* (1482 Nam 2:6ab); *ho·l i ·-ngi ··ta* (1447 Sek 6:4a, 24:28a, 1459 Wel 1:17a, 10:12b); *ho·l i ·-ngi s ·kwo* (1459 Wel 9:24a, 23:91b; 1482 Kum-sam 2:4ab); *ho·l i ·n ·t ye* (1475 Nay 1:7a); *ho·l ye* (1462 ¹Nung 3:43b; 1463 Pep 3:86a); *ho·la* (1447 Sek 6:9b, 9:41a; 1459 Wel 7:42a, 8:8b; 1481 Twusi 8:7a, 25:56b; 1482 Kum-sam 5:14a; 1482 Nam 1:50b; ⁷1517⁻ Pak 1:6a); *ho·la ·n ·t oy* (1447 Sek 9:26b; 1459 Wel 13:35b, 1462 ¹Nung 3:24b; 1482 Kum-sam 2:2a); Unexplained: *coy·cwo ·hol ¨syeng ·i* (1518 Sohak-cho 8:37b) 'those who have talent'.

hon (1445 ¹Yong 47, 123; 1447 Sek 6:15b, 6:19a, 6:22a, 9:19-20, 13:33b, 13:39a, 13:47a, 13:39a, 24:2a; 1459 Wel 1:14ab, 1:23b, 1:46a, 2:12a, 7:7b, 7:48a, 8:38b, 10:8b, 10:9a, 10:19a, 17:12v, 18:13b, 21:34ab, 21:129a, 21:216a; 1462 ¹Nung 1:3a, 1:18b, 1:23b, 1:77b, 1:113a, 2:81a, 2:92b, 2:98a, 2:111a; 1463 Pep se:23a, 2:24a, 2:26a, 2:172ab, 3:180ab; 1464 Kumkang 72b; 1465 Wen 2:3:2:68a; ⁷1468⁻ Mong 20b, 47b; 1475 Nay 1:25b, 2:2:47b; 1481 Twusi 7:23b, 8:13b, 8:42a, 13:13a, 16:61b, 20:29a, 21:3b, 21:20a; 1482 Kum-sam 2:68b, 3:25b, 5:30-1; ⁷1517⁻ Pak 1:64a; ⁷1517⁻ ¹No 2:53b; 1586 Sohak 2:9b, 4:13a); *ho·n ywo* (1459 Wel 8:95a); *hon ·t ol* (1445 ¹Yong 69; 1459 Wel 17:17b, 17:33b), *hon ·t on* (1447 Sek 24:18a; 1459 Wel 2:70b; 1481 Twusi 8:7a); *hon ·t ay* (1447 Sek 24:49b, 1459 Wel 8:101b, 1481 Twusi 24:13a); *hon ·t oy* (1462 ¹Nung 7:54a); *ho·n i* (1445 ¹Yong 6, 18; 1447 Sek 6:5ab, 6:6a, 6:17b, 6:22a, 9:19-20; 1459 Wel se:11a, 18:7b, 21:216ab, 23:65b; 1462 ¹Nung 1:53a, 2:17b, 2:40b, 7:27a; 1463 Pep 1:249a, 3:196b, 6:144a; 1465 Wen 1:1:1:45b, 3:3:1:62a; ⁷1468⁻ Mong 20b; 1475 Nay se:8a, 1:18a; 1481 Twusi 7:13b, 8:9a, 15:42b, 15:47b, 16:70b, 22:50a; 1482 Kum-sam 2:1b, 2:2a, 3:3b, 3:19b, 3:34b; 1518 Sohak-cho 10:3a); *ho·n i ·za* (1447 Sek 24:20b; 1482 Kum-sam 2:3a); *ho·n i ··la* (1447 Sek 6:2b; 1459 Wel 7:44b, 7:70a; 1462 ¹Nung 1:113a, 4:11a, 10:42b; 1463 Pep 2:113b, 2:173a; 1464 Kumkang 11a; 1475 Nay 2:1:30b; 1482 Kum-sam 2:3a; 1482 Nam 2:5a) = *ho·n i ·[·]lla* (1465 Wen 2:3:1:38b, 1481 Twusi 16:47b; 1482 Nam 2:5a); *ho·n i -ngi s ·kwo* (1445 ¹Yong 28); *ho·n i ·Ga* (1481 Twusi 7:14a, 10:42a); *ho·n i ·Gwo* (1518 Sohak-cho 10:24b) = *ho·n i [·]Gwo* (1481 Twusi 7:40a); *ho·n i ·ya* (⁷1468⁻ Mong 31a, 31b); *ho·na* (1462 ¹Nung 2:89b); *ho-·tos* (1447 Sek 13:45a, 1462 ¹Nung 1:53a)

‖ *·ho·ya* (1445 ¹Yong 123; 1447 Sek se:2b, 6:1a, 6:3b, 6:4a, 6:8a, 6:8b, 6:9a, 6:11a, 6:13b, 6:15b, 6:16b; 6:23a, 6:27b, 6:34a, 6:35b, 9:4b, 9:14a, 9:24b, 9:40a, 13:19a, 13:36a, 13:43b, 13:49b, 13:57a, 13:57b, 13:58a, 13:59a, 13:61a, 13:58a, 13:59a, 13:61a, 18:26b, 19:6a, 19:8a, 19:29b, 23:11b, 23:29a, 24:6b, 24:29a, 24:37b; 1459 Wel 1:12b, 1:15a, 1:16b, 1:17b, 1:30ab, 1:53a, 2:42b, 2:60a, 2:69a, 7:13b, 7:17b, 7:31-2, 8:7a, 8:104b, 9:52a, 10:31a, 10:31b, 13:35b, 17:35a, 13:43b, 17:54a, 17:85a, 18:3a, 18:7b, 18:26b, 21:20a, 21:120b, 21:129b; 1462 ¹Nung 1:58a, 1:90b, 2:6b, 2:67a, 3:42b, 6:29a, 7:13a, 7:24a, 7:73b, 10:1b, 10:18a; 1463 Pep se:21a, 1:208a, 2:172ab, 2:226a, 3:47a, 3:104b, 3:196b, 3:197a, 4:75a, 4:154b; 1463/4 Yeng 2:62a; 1464 Kumkang 79b, 87b; 1465 Wen se:5a, 1:2:2:136a; ⁷1468⁻ Mong 22b, 32b, 43a, 62b; 1475 Nay 2:1:16a; 1481 Twusi 8:27b; 1482 Kum-sam 2:1b, 2:2a; 1485 Kwan 3a, 4b; ⁷1517⁻ Pak 1:3a, 1:6a, 1:18b, 1:54a; ⁷1517⁻ ¹No 2:19b, 2:36a; 1550 ¹Yenghem 8b; 1586 Sohak 2:9b); *·ho.ya* (⁷1468⁻ Mong 13b; 1475 Nay 1:77b, 1:84a, 2:2:17b; 1481 Twusi 6:43a, 7:2b, 7:9b, 7:12a, 8:2b, 8:33b, 8:52a, 16:19a, 16:37b, 20:29a, 22:7b, 22:34-5, 23:44a, 25:18a; 1482 Kum-sam 2:10a, 2:24b, 2:57a, 2:65a, 3:27b, 3:31a, 3:50b, 5:35b, 5:40b; 1482 Nam 1:24a, 2:2b, 2:63a), *·ho.ya ·sye* (1481 Twusi 25:56b), *·ho.ya n'* (1481 Twusi 7:29a), *·ho.ya ·two* (1459 Wel 1:13a, 21:20a; 1481 Twusi 22:7b, 24:59b), *·ho.ya ·za* (1447 Sek 6:2b; 1459 Wel 1:47a, 10:14b; 1462 ¹Nung 1:44a) = *·ho·ya za* (1586 Sohak 4:9b); *·ho·ye* (1518 Sohak-cho 8:33b), *·ho·ye ·sye* (⁷1517⁻ Pak 1:54b; 1518 Sohak-cho 8:38-9);
·ho.ya·nol (1447 Sek 6:8b, 23:23b; 1459 Wel 7:15b; ⁷1468⁻ Mong 32ab; 1481 Twusi 22:35a; 1482

Nam 1:30b); ˙ho.ya˙n ywo (1482 Kum-sam 3:52a); ˙ho.yasi˙nol (1459 Wel 2:64a, 1482 Nam 1:14a); ˙ho.ya˙ton (1482 Nam 1:44-5)

˙hoke˙tun (1447 Sek 24:3a, 1459 Wel 21:34ab); ˙hoke˙na (1447 Sek 13:52a, 1462 ¹Nung 8:77a); ˙hoke˙nul (1447 Sek 6:16a, 1475 Nay 2:1:30a); ˙hokan ˙t i˙la (1459 Wel 17:36b), ˙hoka˙n ywo (1481 Twusi 16:1b); ˙ho˙kesi˙nol (1459 Wel 2:5a); ˙ho˙kesi˙n i ˙Gwa (1459 Wel 1:12b); ˙hokes˙ta (1481 Twusi 21:42a); ˙ho˙ke.n i ˙Gwa (1482 Kum-sam 3:55a)

˙hote˙la (1447 Sek 6:15b, 6:30a, 24:3ab; 1459 Wel 2:42b; 1586 Sohak 5:48b), ˙hota˙la (1447 Sek 6:24b, 1459 Wel 7:14b, ˀ1517˙ Pak 1:37b); ˙hoten (1447 Sek 6:19a), ˙hote˙n i (1447 Sek 6:8-9, 6:19a, 19:40b; 1459 Wel 2:42b, 7:24b, 7:29b; 1481 Twusi 7:29a), ˙ho˙te.n i ˙˙la (1459 Wel 1:8ab); ˙ho˙tan (1459 Wel 7:13b); ˙ho˙tan (1459 Wel 1:7-8, 7:13b, 23:65b), ˙hota˙n i (1447 Sek 13:57b, 24:3a; 1463 Pep 2:5b, ˀ1517˙ Pak 1:58b), ˙ho˙ta.n i ˙˙la (1463 Pep 1:158b); ˙ho˙te-ngi ˙˙ta (1447 Sek 6:15a), ˙ho˙ta-ngi ˙˙ta (1463 Pep 2:4b); ˙hote˙tun (1447 Sek 19:34ab, 1481 Twusi 15:31b); ˙ho˙tesi˙ta (1447 Sek 6:1a, 6:44a; 1459 Wel 1:18b, 2:26-7); ˙hote˙sin (1447 Sek 13:58a); ˙ho˙tesi˙n i (1449 Kok 41, 1459 Wel 10:18b); ˙hotwo˙ta (1481 Twusi 7:12ab, 21:15a; 1482 Kum-sam 2:27b, 2:28b; 1482 Nam 1:36a; ˀ1517˙ Pak 1:46b), ˙ho˙two˙ta (1518 Sohak-cho 10:18b), ˙hotwu˙ta (1462 ¹Nung 3:116b), ˙ho˙twu˙ta (1518 Sohak-cho 10:18b)

˙hono˙ta (1447 Sek 6:2a, 6:14b; 1481 Twusi 7:2a, 8:1b, 8:52a); ˙honon (1447 Sek se:1a, 9:33a; 1451 Hwun-en 1b), ˙ho˙non (1459 Wel 21:215b, 1462 ¹Nung 1:77b, 8:104b; 1518 Sohak-cho 9:90a); ˙honon ˙kwo (1447 Sek 6:27a); ˙honon ˙ta (1459 Wel 9:46a, 1462 ¹Nung 1:84a, 1481 Twusi 8:24a, ˀ1517˙ Pak 1:31b); ˙ho˙non t oy (ˀ1517˙ ¹No 1:35b); ˙hono˙n i (1459 Wel 1:30ab, 5:59b, 9:23-4; 1462 ¹Nung 6:43a; 1481 Twusi 7:24b, 10:42a; 1482 Nam 1:36b); ˙ho˙no.n i ˙˙la (1447 Sek 6:5b, 13:2a; 1459 Wel 1:23b, 2:2a, 10:18b; 1459 Wel 1:11a; 1462 ¹Nung 6:43a; 1481 Twusi 20:34b; 1586 Sohak 2:25a), = ˙hono.n i ˙˙la (1481 Twusi 16:19b) = ˙hono˙n i ˙la (1482 Nam 2:6ab), ˙ho˙no.n i ˙non (1586 Sohak 4:43a), ˀ1517˙ Pak 1:58a); ˙ho˙no.n i s ˙ka (1447 Sek 6:18a) = ˙hono.n i s ˙ka (1447 Sek 6:16b), ˙hono˙n i n' (1481 Twusi 16:39b); ˙hono˙n ywo (1462 ¹Nung 2:111a, 1586 Sohak 6:58a); ˙ho˙nwon (1459 Wel 13:35b; 1462 ¹Nung 1:90b, 2:17a, 7:74b), ˙honwon (1447 Sek se:6a, 6:36a, 9:40b, 13:18-9; 1459 Wel se:16a; 1463 Pep 5:212b; 1482 Nam 2:30b; 1586 Sohak 6:44a), ˙honwo˙n i (1447 Sek 19:29b; 1459 Wel 1:11b, 13:37a, 21:125b; 1481 Twusi 21:13b), ˙ho˙nwo.n i s ˙ka (1447 Sek 6:16b); ˙honwo˙la (1447 Sek 6:8a, 1459 Wel 8:35a, 10:4b, 10:18a; 1462 ¹Nung 1:17b; 1475 Nay se:6a, 1:37a; 1481 Twusi 7:5a, 8:35a, 15:23b, 22:26a, 25:23a); ˙ho˙nwo-ngi ˙˙ta (1447 Sek 6:25b); ˙honwos˙ta (1481 Twusi 20:4b, 20:29a)

˙hosi˙kwo (1447 Sek 13:15a, 1459 Wel 10:6a, 21:219a); ˙ho˙sike˙tun (1459 Wel 8:48b); ˙hosil ˙ss oy (1459 Wel 2:62b); ˙hosi˙ta (1447 Sek 13:30b); ˙ho˙sitan (1459 Wel 23:65a); ˙ho˙siten ˙ka (ˀ1517˙ Pak 1:51a); ˙ho˙sitas˙ta (1459 Wel 21:208a); ˙hosite˙la (1447 Sek 13:59a); ˙hosin (1447 Sek 9:29a, 13:35b; 1475 Nay 1:40a); ˙ho˙sitwo˙ta (1481 Twusi 8:10b); ˙hosi˙na (1482 Kum-sam 5:10b); ˙hosi˙n i (1445 ¹Yong 107; 1447 Sek 6:9b, 23:53b; 1462 ¹Nung 2:92a; 1464 Kumkang 81b; 1482 Kum-sam 4:45a), ˙ho˙si.n i ˙˙la (1462 ¹Nung 2:49a, 1463 Pep 4:192-3); ˙ho˙sino˙n i (1447 Sek 6:5b, 24:9a; 1459 Wel 1:10b, 1:25b); ˙hosi˙m ye (1459 Wel 2:58b), ˙hosi˙m ye 'n (1449 Kok 36); ˙hosilq (1449 Kok 50; 1447 Sek 23:52b, 53a); ˙hosil ˙ss oy (1445 ¹Yong 34, 92, 121; 1459 Wel 2:62b), ˙hosil ˙s oy (1465 Wen 1:2:1:16b); ˙ho˙si.l i ˙˙la (1459 Wel 1:7-8); ˙ho˙si.l i ˙l ˙ss oy (1445 ¹Yong 92, 1459 Wel 9:11b), ˙ho˙si.l i ˙˙la (1459 Wel 1:7-8); ˙hosila 'n ˙t oy (1481 Twusi 22:7b); ˙hosin (1447 Sek 9:29a, 1459 Wel se:9a, 1475 Nay 1:40a), ˙hosin ˙ta ˙ma˙ta (1459 Wel 1:15a); ˙hosi˙n i (1445 ¹Yong 42, 64; 1447 Sek 6:9b; 1459 Wel 1:52a; 1449 Kok 43; 1465 Wen 1:1:2:125b; 1482 Kum-sam 3:3b, 5:14a), ˙ho˙si.n i ˙˙la (1447 Sek 23:42a, 1465 Wen se:6a, ˀ1468˙ Mong 49b); ˙ho˙sino˙ta (1447 Sek 13:26b); ˙ho˙sinon (1447 Sek 6:5b), ˙hosi˙non (1447 Sek 23:22b); ˙ho˙sinon ˙ka (1447 Sek 13:25b); ˙ho˙sino˙n i (1447 Sek 6:5b; 1459 Wel 1:10b, 2:69a, 9:11b, 9:35de; 1463 Pep 4:117a; 1465 Wen se:6a); ˙ho˙sino˙n i ˙˙la (1465 Wen se:6a); ˙ho˙sino˙n ywo (1447 Sek 13:26a); ˙hosi˙nwon (1462 ¹Nung 1:86a, 1463 Pep 5:169b), ˙ho˙sinwon ˙t i (1459 Wel 17:42a); ˙ho˙si-ngi ˙˙ta (1459 Wel 21:218b), ˙ho˙sitwo˙ta (1481 Twusi 8:10b);

˙ho˙sya (1447 Sek 6:4b, 6:9b, 6:17b, 13:27a; 1459 Wel 2:36b, 2:70b, 8:93b, 9:35de; 1462 ¹Nung 3:68b; 1463 Pep 2:231b; 1482 Kum-sam 2:2b), ˙hosya (1459 Wel 8:93b, 1463 Pep 2:231b, 1475 Nay 2:1:43a, 1481 Twusi 22:46a), ˙hosya ˙za (1447 Sek 6:12a, 1463 Pep 1:16a); ˙hosya˙m i (1462 ¹Nung 10:42b, 1463 Pep 5:100a, 1482 Kum-sam 5:14a), ˙ho˙sya.m i˙la (1459 Wel 14:58a), ˙hosya˙m ay (1459 Wel 14:59a), ˙hosya˙m olwo (1482 Nam 1:33b), ˙hosya˙m on (1462 ¹Nung 3:2a, 4:13ab; 1463 Pep 6:145b, 7:180b); ˙ho˙sya˙na (1465 Wen se:6a); ˙ho˙syan (1447 Sek 13:25b, 1463 Pep 6:144a), ˙hosyan (1447 Sek 6:7b, 1463 Pep 4:167a); ˙ho˙syal (1465 Wen 1:1:2:75b)

2.12.4.5. Bound stems.

It is difficult to predict the accent of later syllables in verb forms incorporating the common bound stems showing status, respect, and aspect. We will assume a basic and etymological accent for -˙k⁶a- (and variants -˙G⁶a- and -˙⁶a-), the effective, and for -˙t⁶a-, the retrospective. That is needed to account for such forms as:

RETROSPECTIVE nilk˙ten (1481 Twusi 21:42b), nilo˙ten (1459 Wel 9:36d), mwot˙te˙n i (1445 ¹Yong 9), is˙ten ˙t ay n' (1464 Kumkang 79b), is˙ten ˙ta (?1517⁻ Pak 1:37b), is˙tesin ˙ka (1445 ¹Yong 88, 89), pat˙te˙n ywo (?1517⁻ Pak 1:19b), mek˙te˙la (?1517⁻ ¹No 2:53b); ˙ho˙tan cyen˙cho ˙lwo (1459 Wel 7:13b), ...

EFFECTIVE cephu˙kesi˙n ywo (1449 Kok 123), kap˙kan ˙t i.n i ˙˙la (1459 Wel 18:18b), kos˙ke˙sin ma˙lon (1447 Sek 13:63a), me˙ke˙ta (?1517⁻ ¹No 2:39a), me˙ke˙nul (1447 Sek 6:32a), is˙kesi˙ton (1475 Nay 1:40a), na˙ma is˙kesi˙nol (1447 Sek 23:56b), nilo˙kesi˙tun (1482 Kum-sam 4:50b) = nilu˙kesi˙tun (1447 Sek 9:27a), nilo˙kesi˙na (1459 Wel 18:49b), talo˙kesi˙nul (1445 ¹Yong 101), ˙ca˙kesi˙nol (1482 Nam 1:28b), ˙wo˙kesi˙nol (1459 Wel 7:10a) = ˙wo˙nasi˙nol (1447 Sek 6:44b), ˙khu˙kenul ˙za (1482 Kum-sam 2:16a), ...

Quite often the accent of the marker will be suppressed for prosodic or other reasons that are hard to pinpoint. But no word of that sort will lack dots altogether: one or more of the other syllables will be marked as accented.

The situation for the PROCESSIVE is more complicated, so we put its dot in parentheses in citing the morpheme -(˙)no-. A number of the forms are attested as accentual doublets or near-doublets:

˙ho˙non (1459 Wel 21:215b; 1462 ¹Nung 1:77b, 8:124b; ?1517⁻ ¹No 1:35b; 1518 Sohak-cho 9:90a; 1588 Mayng 13:13a) but also ˙honon (1447 Sek se:1a, 9:33a; 1481 Twusi 7:1b); ˙ho˙no.n i (1586 Sohak 2:30b, 4:43a) but ['be many'] ˙hano˙n i (1445 ¹Yong 2, Manlyek text; 1459 Wel 1:30ab; 1482 Nam 1:36b); ˙ho˙no.n i ˙˙la (1447 Sek 6:5b, 13:2a; 1459 Wel 1:11a, 1:23b, 2:2a; 1462 ¹Nung 6:43a, 8: 86b; 1481 Twusi 20:34b; ?1517⁻ Pak 1:58a; 1586 Sohak 2:25a) but also ˙hono˙n i ˙la (1482 Nam 2:6ab) and ˙hono.n i ˙˙la (1481 Twusi 16:91b).

˙kanon (1447 Sek 6:19a, 1481 Twusi 7:10b) and ˙kano˙n i (1445 ¹Yong 2, 1447 Sek 6:9b) but ˙ka˙non ˙ta (?1517⁻ ¹No 1:1a)

˙ho˙nwon (1459 Wel 13:35b, 1462 ¹Nung 1:90b) but also ˙honwon (1447 Sek se:6a)

˙hosi˙non (1447 Sek 23:22b) but also ˙ho˙sinon (1447 Sek 6:5b)

¨a˙no.n i ˙˙la (1482 Kum-sam 2:3a) and ˙pwo˙no.n i ˙˙la (1459 Wel 21:206a, 1465 Wen 1:2:1:39b) but also ¨sano˙n i (1447 Sek 13:10a, 1481 Twusi 25:23a)

Processive modifier forms are usually unaccented: --[˙]non. The common form is.non -- ' -- that is / stays' is always unaccented, and that is true also of its contracted versions 'ys.non and 's.non with rare exceptions that imply *is˙non as the model: towoy˙ye 'ys˙no˙n i (1481 Twusi 8:42a, ~ ˙Gwo 7:26b), towoy˙ye 'ys˙no˙n ywo (1481 Twusi 8:42a); maſ˙jka 's˙non (?1517⁻ Pak 1:40a).

Processive indicative assertive forms (--no˙ta) never carry the accent on the aspect marker: ˙hono˙ta (1447 Sek 6:2a, 6:14b; 1481 Twusi 7:2a, 8:1b, 8:52a), ¨ano˙ta (1462 ¹Nung 2:114b), i˙kuyno˙ta (1481 Twusi 15:6a), mwo˙lono˙ta (1462 ¹Nung 1:16b), mekno˙ta (1481 Twusi 25:18a).

When the modulator -˙w⁴o- is attached to the processive, the combined form -˙nwo- (sometimes -˙nwu-) is usually accented: ˙ho˙nwon (1459 Wel 13:35b, 1462 ¹Nung 1:90b), is˙nwo˙n i (1447 Sek 6:20a), tut˙nwon ka (1449 Kok 2), ṭowoy˙nwo˙n i (1463 Pep 2:28b), cap˙nwola (1481 Twusi 10:7b), ip˙nwola (1481 Twusi 8:42a), ˙hosi˙nwon (1462 ¹Nung 1:86a), wolm˙ki˙si˙nwo˙swo-ngi ˙˙ta (1463 Pep

2:47a). But not in these examples: ˙honwon (1447 Sek se:6a), *[˙NGWEN] honwon ˙t un ...* (1579 Kwikam 1:24b); ˙honwo˙la (1459 Wel 10:4b); ˝mwutnwo˙la (1481 Twusi 22:39b) = ˝mwunnwo˙la (1481 Twusi 16:39b); ˙po˙lanwo˙la (1447 Sek se:6a); ˙wonwos˙ta (1481 Twusi 7:39a); ˙twu-˙ys.nwon (1482 Nam 1:15a); nilu˙sinwon (1447 Sek 9:35b; CF 1459 Wel 55-6).

After the honorific marker, the processive is sometimes accented − ˙hosi˙non (1447 Sek 23:22b), but usually not: ˙ho˙sinon (1447 Sek 6:5b), ˙ho˙sino˙ta (1447 Sek 13:26b); sisu˙sinon ˙ka (1449 Kok 124), tas.ko˙sino˙n i (1447 Sek 6:12a), nilu˙sino˙n i (1447 Sek 13:47b, 1462 ¹Nung 1:38a), ˙ka˙sinon (1459 Wel 2:52a), ˙nye˙sino˙n i ˙-ngi s ˙kwo (1447 Sek 6:23a), ˝alo˙sino˙n i ˙-ngi s ˙ka (1447 Sek 6:14-5). After the deferential -˝zop- the processive morpheme is normally not accented, but there are a couple of exceptions: cwo˝ccop˙non (1463 Pep 1:24b), ki˙tuli˝zop˙no.n i ˙˙la (1447 Sek 24:5b).

When the polite marker -ngi is attached the processive morpheme is always accented (-˙no-ngi ˙˙): ˙pho˙no-ngi ˙˙ta (1459 Wel 8:94b), ˙wo˙no-ngi ˙˙ta (1447 Sek 6:29b), ˙wosi˙no-ngi ˙˙ta (1459 Wel 10:8a). And -ngi itself never carries an accent.

The underlying accent of the honorific marker -ᵁ⁄o˙si- often surfaces: ˙ho˙sino˙n (1459 Wel 1:25b), ˙ho˙sino˙n i (1447 Sek 6:5b; 1459 Wel 1:10b, 2:69a), ˙ho˙sino˙n i ˙˙la (1465 Wen se:6a), ˙ho˙sino˙n i ˙-ngi s ˙kwo (1447 Sek 24:9a, 1459 Wel 9:35de), ˙ho˙sino˙n i ˙si˙n i ˙˙la (1463 Pep 4:117a); ˙ho˙sino˙ta (1447 Sek 13:26b), ˙ho˙siten ˙ka (?1517- Pak 1:51a); kwutu˙si˙ta (1463 Pep 2:173a); nwopho˙si˙kwo (1463 Pep 2:173a); tulu˙si˙kwo (1447 Sek 13:30b); sisu˙sinon ˙ka (1449 Kok 124); nilku˙si˙nwon (1465 Wen se:68a); ceho˙sya (1449 Kok 46), cwocho˙sya (1459 Wel 8:93b, 1463 Pep 3:19b), meku˙sya (1459 Wel 10:9a), anco˙sya (1459 Wel 8:101a); ... . Sometimes the accent appears on the preceding vowel: ˝ep˙susi˙kwo (1462 ¹Nung 1:18b), ˝ep˙susi˙ta (1449 Kok 53), ˝ep˙susya˙m i (1463 Pep 2:15-6) − CF ˝ep.su˙sya (1463 Pep 2:22a); ˝sa˙mosi˙n i (1447 Sek 6:4a); ˝a˙losi˙m ye (1465 Wen 1:2:3:6a); te˙pu˙lusi˙n i (1449 Kok 52); ˝wu˙lusi˙kwo (1459 Wel 8:101a); ˙tu˙lusya˙m i (1447 Sek 23:44a); twuthe˙wusi˙m ye (1462 ¹Nung 10:42b); ... . We can regard this as a prosodic displacement which pushes the accent back a syllable; there are no examples of the dot appearing on both the sibilant syllable AND the epenthetic vowel. When there is a dot on the syllable preceding ˙˙si˙˙ it is usually part of the accent pattern of the stem: mwo˙lo˙sya (1445 ¹Yong 19, 1459 Wel 21:210b), na˙thwo˙sya.l i ˙˙la (1459 Wel 17:78b), il˙Gwu˙syan (1459 Wel 21:218b), ˙tho˙si˙l i ˙le˙la (?1517- Pak 1:64b), ne˙ki˙sya (1447 Sek 6:17b), a˙ni ˙˙sya (1463 Pep 2:6a), ...

The basic rising accent of the deferential -˝zoW- is the result of contraction from *-zo˙po- (< *-oso˙po-) and it surfaces for some of the forms: cap˝sopke˙n i (1459 Wel 21:203a), mak˝sopke˙nul (1459 Wel 10:1b), ilkhot˝copnwon (1482 Kum-sam 4:11b), pat˝copte˙la (1459 Wel 2:37b), tut˝copkwo ˙za (1449 Kok 106), ... But in many of the forms only the low pitch survives: ˙hozo˙Wa (1447 Sek 24:5b), ˝pwozo˙Wa.n i (1459 Wel 8:17b), ˙kazo˙Wwon (1459 Wel 8:92b), tutco˙Wolq (1447 Sek 9:2a), ˝a˙zoWol ˙kka (1445 ¹Yong 43), ˙hozop˙kwo (1447 Sek 6:1b, 24:5b), ˝sitcop˙key (1447 Sek 24:10b), ˙pwozop˙ta (1459 Wel 8:28a, 18:81a), ˙hozop˙ten (1447 Sek 13:51a), ... Sometimes, instead, a high pitch appears, as the result of a prosodic displacement from the following element: ˙pwo˙zowa ˙two (1462 ¹Nung 1:47a), ˙ka˙zoWa ˙za (1447 Sek 23:40a), ˙ho˙zoWo˙m ye (1447 Sek 6:17a), ˙ho˙zopke˙na (1447 Sek 13:53b), ˙ho˙zopno˙n i (1463 Pep 5:186a), ...

2.12.5. Accent and spelling in Middle Korean texts.

The accent dots of Middle Korean were written to the left of the syllable and therefore vary in where they stand in the stream of phonemes depending on the extent to which morpheme identifications are permitted to override phonetic considerations. The text Wel.in chen-kang ci kok (= 1449 Kok) normally separates particles from a preceding noun that ends in a resonant: ye˙lum ˙ul (99), ˙nom ˙i ˙˙ ˙nom ˙ol (11), ˙ema ˝nim ˙i (17), mozom ˙o˙lan (121); nwun ˙ey (2), cey ˙kan ˙ol (40); ˙sal ˙i (41), ˙stol ˙ol ... mye˙nol ˙i (36); ... . But forms of the substantive are excepted: pwus˙kulywo˙m i (120). And the syllabification is phonetic for nouns with a voiceless final: ci˙p ul (45); ˙pa˙p ol (122); kwo˙c i (7), mi˙th uy ˙non ... (70). Noun + copula, like verb stem + ending, was left unanalyzed, and that accounts for the syllabification of /kwo-mil/ in ˙mwom ˙i ˙˙ ceyye˙kwo.m il ˙˙ss oy (134).

Sekpo sangcel (= 1447 Sek) spells noun + particle according to the spoken syllables, but certain nouns ending in ˙˙ng are excepted, probably because they are clearly of Chinese origin: cywungsoyng

ʾi (6:19b), ˝yang ˙o˙lwo (6:24b); CF ˝cywu˙ng uy (6:19a), susu˙ng uy (6:29b), for which the Chinese origin is less apparent. Examples of the usual syllabification: no˙m oy (se:6a); ˙ku˙l ul (se:6a); ˙pu˙l i (6:33a); ˙mwu˙l i (6:28a); ˙sto˙l i (6:13b, 14a), ˙sto˙l ol (6:15a), a˙to˙l i (6:5a, 9b), a˙to˙l ol (6:3b, 5b), a˙to˙l oy (13:19a); ha˙no˙l i (6:35b), ha˙no˙l on (6:36a) ˝i˙l ol (6:8a, 18a, 26a, 27a; 9:5a; 13: 33b; 19:40b), ˝i˙l i (6:9a; 9:17b; 19:10b, 20b, 24b) ˝i˙l oy (se:5b); ˝ma˙l ol (6:8b, 13:47b, 24:1b), ˝ma˙l on (6:36a, 9:27a), ˝ma˙l i (6:36a, 25:53b) tuthu˙l i (6:30b); ci˙p uy ˙sye (6:16a), ˙tul cci˙p i (6: 35b); ˝hoyngtye˙k ul (1447 Sek 6:2b); nye˙k ul (6:25a), nye˙k uy ˙sye (6:33b), nye˙k o˙lwo n' (1446 Sek 6:3a); ce˙k i ... (6:40a), ce˙k uy (6:19a), ce˙k u˙lan (6:11a).

The text of [1]Yongpi echen ka (= 1445 [1]Yong) follows the spoken syllables: ˙no˙m i (48), ˙no˙m on (77); ˙kwulwu˙m i (42), mozo˙m ol (85), ˝nim-˙ku˙m i (49) ˙hyen pe˙n ul (31); mo˙l i (31), ˙nwun z ˙mu˙l ul (91), ˝mil ˙mu˙l i (67), ˙ku˙l ul (7), ˝pye˙l i (50, 101), palo˙l ay (2); twoco˙k i (33), twoco˙k ol (19, 115); ˙kwo˙t ol (110), ˙kwo˙t ay (26); ˙ptu˙t i (8); na˙c oy (101).

The spellings of Nayhwun (= 1475 Nay) are similar, but exceptions are made for certain morphemes with final resonants, some of which are of obvious Chinese origin (kesang ˙ul 1:70b, ˝cams.kan ˙ina 2:1:2b, si˙cyel ˙ey 3:32a, ˙chapan ˙ul 2:2:73b, kanan ˙i 2:2:59b) though others are not: ˝nim-kum ˙i (10a), swu˙l ul (3:61a). CF ˙mwo.m o˙lwo (2:1:30a), no˙m oy (1:9a), mozo˙m ay (se:6a); ˙swo˙n i (1:18a); ˝ma.l i (2:2:47b), he˙mu.l i (1:84a), ˝i.l ol (1:53a, 1:84a, 2:1:40b).

Twusi enhay (= 1481 Twusi) follows the pronunciation in syllabifying noun + particle, but makes a few exceptions for morphemes with final resonants, both Chinese (˝sya˙wong ˙ol 25:9b) and non-Chinese (swul ˙ol 15:38a, yet for the same word also swu˙l ul 8:34a).

The later version of Sohak enhay (= 1586 Sohak) generally demarcated the particles: ˝kye˙sim ˙ay (6:122a) = ˝kye˙sim ˙ay (SEE p. 267), ancum ˙ul (3:9b), a˙chom ˙uy (4:33a), kunsim ˙ul (4:9b); ˝pyeng ˙i (1586 Sohak 6:27a), ˝syeng ˙i (8:37b); ˙kul ˙ul (6:102b), ˝mal ˙i (5:95b); swon ˙ay ˙choyk ˙ul (6:102b); ... . There were a few lexicalized exceptions: cwuk˙u.m wolwo (2:11a). The adverb ˝man ˙il (2:4b) 'if' reflects the Chinese source 'one in ten thousand [chances]'. And 1586 Sohak overanalyzed ˝nwul ˙ul (6:58a) = ˝nwu ˙lul (1449 Kok 52) 'whom'. The earlier version known as Pen.yek Sohak enhay (= 1518 Sohak-cho) syllabified phonetically: ka˙zo˙mye˙lwo˙m on (9:90a) − CF ka˙omyel˙wom ˙un (1586 Sohak 6:83b); ˝sa˙lo˙m uy (8:22a) − CF ˝sa˙lom ˙i (5:48b); no˙m oy (8:15a); il˙hwu˙m i (8:2b); ˙swo˙n i (10:3a) − CF ˙swo˙n ol (6:102b). Occasionally it conflated ··l ˙ul to ··l ˙lul, as in na˙la[h] ta˙soliten ˙il ˙lul [< ˝il ˙ul] (9:39a) = ˙ta˙solim ˙ul (1586 Sohak 6:35b).

None of the texts had a way to write final h or consonant clusters, so they were always syllabified phonetically: ˝nay˙h i (2); sta˙h ay (1449 Kok 41), ˙sta˙h ol (1447 Sek 6:19a); wu˙h u˙lwo (1447 Sek 13:13b); tu˙lu˙h ey (1445 [1]Yong 69); ˝twuy.h ey ˙nun ... al˙ph oy ˙non ... (1445 [1]Yong 30); ˙kil˙h ul (1447 Sek 6:19a, 1449 Kok 86); ha˙nol˙h i (1445 [1]Yong 21, 30, 34); ˙tol˙h i (1449 Kok 11); an˙h ay (1475 Nay 1:4b); nam˙k ol (1449 Kok 86), nam˙k i (1449 Kok 99); nyen˙k ul (1445 [1]Yong 20), nyen˙k i (1447 Sek 6:22b, 24:43b); twos˙k ol (1475 Nay 10a); hon ˝na˙th ay (1445 [1]Yong 47).

3.0. Words.

The description of Korean grammar in this book is based on a division of Korean sentences into WORDS, and an assignment of each word to a PART OF SPEECH. The decisions on word boundaries are based on syntactic criteria, and therefore they are more generous than the decisions that underlie the writing of spaces in Hankul texts, where the criterion is purely phonological, based on the likelihood of pause when a sentence is said. A short word, such as a postpositional particle that marks the grammatical function of a noun phrase, is usually joined to the preceding word as if a suffix, so that you will not hear an overt pause or slowdown between the words; but a silent grammatical juncture lurks just below the surface of the structure, and we find it convenient to reveal that with a space in our Romanized sentences.

3.1. Inflected and uninflected words.

On the basis of internal structure, the words of Korean clearly fall into two classes: inflected and uninflected. Each inflected word consists of a STEM + an ENDING. The stem (sometimes called the

BASE) belongs to a large but limited class of constituents which do not occur except with the attachment of one of a much smaller class of endings; the endings do not occur except when attached to a stem. Apparent exceptions:

(1) Derivationally related nouns and verb stems:

> hemul < *he'mul* 'error, misdeed', hemu-l- (< ?) 'tear down'
> īl < *"il* 'event, happening, matter; job, work', *"il-* 'come into being, happen'
> kēm 'black checker' (= hukci), kēm- < *"kem-* 'be black'
> kīl < *"kil* 'fathom', kī-l- < *"kil-*'be long'
> kot < *'kwot* 'straightway', kot.ta < *kwot-* 'be straight' (or *'kwot* 'place'?)
> kkwumi 'beef shreds', kkwumi- < *'skwu'mi-* 'decorate'
> mak < *mak* 'last', mak- < *mak-* 'block, obstruct; ... ; complete, put an end to, ... '
> phum < **'phwum* (→ *phwu'm ey*) 'bosom', phum- < *'phwum-* 'carry in the bosom'
> pis < *pis* 'comb', pis- < *pis-* 'comb the hair'
> pophul 'nap', pophu-l- '(cloth) has a nap'
> ppyēm 'span', ppyēm- 'measure by the span'
> sin < *'sin* 'shoe', sin- < *"sin-* 'wear on the feet'
> sŏl 'skin pustules', sŏ-l- 'be itchy and sore'
> tēl 'less', tē-l- < *"tel-* 'lessen'
> tti < *'stuy* 'belt', tti- < *stuy-* 'wear (a belt)'

In the case of -L- stems we might conclude that the noun is the imperfect adnominal (= prospective modifier), deriving kīl 'fathom' from kīlq 'to be long', but there is little to argue against treating such cases as simply the stem. The noun of the pair kamul < *'ko'mol* 'drought' and kamu-l- < *'ko'mol-*'go without rain' could be a reduction of kamulm, the regular substantive of the verb, in contrast with the irregular derived substantive kamul.um 'drought', which preserves the expected earlier form of the substantive in its uncontracted form (kamulm 'going without rain' < **'ko'mo'lom*); unfortunately, we lack attestations until around 1700 for either the verb stem or the noun. Neither as 'year of age' nor as 'flesh' can sal be directly related to sā-l- < *"sal-* 'live' for the nouns earlier had the low-back vowel /o/, MK *sol* and *'solh*, respectively. Similar: nal < *'nolh* 'warp', na-l- < *nol-* 'thread the warp (of a loom)'. Nor can we easily relate an 'inside' to ān- < *"an-* 'clasp to one's bosom' because the noun was earlier *'anh* (as attested by the h preserved in anphakk < *anh pakk* 'inside and outside'), nor cīs 'gesture' to cī(s)- < *"ciz-* 'make, do' because the noun apparently comes from an earlier *"cus* 'appearance'.

We should consider also those cases of derived nouns and adverbs that coincide with a stem having final ···i- or ···y-, such as kalkhwi 'a rake' and kalkhwi- 'to rake', toy < *'twoy* 'a measure' and toy- < *'twoy-* 'to measure', kkoy < *'skwoy* 'ruse' and kkoy- < *'skwoy-* 'cheat out of'. When verb stem and noun coincide in shape it is hard to decide which came first; often all we can say is that the two are derivationally related. In some instances the meaning of one of the pair is clearly secondary: ai lul pāy- < *poy-* 'conceive a child' must come from pay < *'poy* 'belly', not the other way around.

(2) The last word of Sālam sallye cwū 'Save me!' and Na com cwū 'Give me some!' is a contraction of cwuu < cwuo; compare cwuso contracted (by way of cwusyo) from cwusio 'give!'. Similar are I ke(s) pō 'Look at this!' and Ka-pō 'Go and see!' < poo. CM 1:119 is confused about these forms and those of (4) below.

(3) The stems i- 'it is' and ha- 'does; is' are often abbreviated to zero, leaving the endings standing as if free. In this book the abbreviation is shown by an apostrophe: twū si 'myen 'if it's two o'clock', pata 'ci 'it's the sea'; ka ya 'keyss.ta 'I'll have to go'.

(4) The infinitive (§9.4) has a zero alternant after certain stems, e.g. ka from ka- 'go'. In the intimate style we find commands like Ese ka 'Go on!' and I ke l' sa 'Buy this!'

(5) There are a few odd abbreviations like po' to tut' to mōs hanta = poci to tut.ci to mōs hanta 'can neither see nor hear' (similarly o' to ka' to mōs hanta 'can neither come nor go', olu' to nayli' to mōs hanta 'can neither rise nor fall'), and ...-' tus = ...-nun tus 'seemingly (...-ing)'. In Middle

Korean the *t-* forms could attach directly to the stem, and *-l-* stems elided the liquid. Starchevskiy (1890:668) described that and included the `sa` version of the particle `za`, the source of (i)ya, as well as `two` and `tus`; there are MK examples of that in Part II.

Unlike stems, uninflected words occur freely without the requirement that something be attached. There is a class of PARTICLES and they are very similar to the verb endings in some respects, but the nouns occur freely without a particle, in a great variety of environments, and many of the particles are found attached to verb forms (stem + ending) as well as to nouns.

3.2. Parts of speech.

In this book all the inflected words are called VERBS. There are, to be sure, many subclasses, but they share the characteristic of being stems that require the attachment of one of the inflectional endings in order to serve as a free word. The uninflected words divide into two broad categories called NOUNS and PARTICLES. The characteristic of particles, which are typically quite short, is that they occur as the last member of a PHRASE, or as part of a string that can be treated as the last member. In pronunciation they are attached to the last word of the phrase: a noun or a verb form or some other particle. These characteristics they share with forms of the copula (i-), a secondary subclass of verb. Typically, particles occur after nouns, but some of them also are attached to verb forms, not only those forms which often serve as the head of a nominal phrase (as does **haki** 'doing') or an adverbial phrase (as does **hakey** 'so as to do') but also forms which often stand as the head of a verbal phrase, such as **hay** 'does'. Particles that are CASE MARKERS specify valences that certain other languages express through affixes or prepositions; CONTEXTUAL particles (delimiters and particles of focus) convey information carried in many other languages by articles, adverbs, prosodic elements, or word order. Many of the particles originated as bound nouns or verb forms.

The verb ending is considered to be in construction only with its stem. The particle, on the other hand, is taken to be in construction with the entire phrase, which may end in a noun, a verb form, or one or more prior-attached particles. In a string of particles, the constituents are assumed to peel off from the right, even when two (such as **ey se**) form a frequent collocation.

3.3. Free and bound words.

The borderline between "free" and "bound" forms is not always easy to delineate and many decisions have to be somewhat arbitrary, but I try to be as consistent as possible. Every word is to some extent "bound" in that there are constraints upon its occurrence: 'eats' can take as its object 'rice' but not 'his high-jumping' though 'likes' can take both phrases as objects. But some words are much more severely bound than others, so that it is easier to list their constraints in general terms. In this book I speak of FREE and QUASI-FREE nouns, of FREE and BOUND verbs. I also speak of certain words as being SEPARABLE or INSEPARABLE, meaning that elements (such as particles) either can or cannot be inserted between those words and the other words with which they are typically in construction. Another kind of word category is that of the BOUND NOUNS, nouns that are restricted in construction to limited sets of partners. The bound ("prenoun" =) adnoun approaches the status of a noun prefix, the bound "postnoun" approaches that of a noun suffix. The bound "preverb" approaches the status of a verb prefix or an adverb, the bound "postverb" approaches that of a verb suffix. Ultimately perhaps all noun prefixes should be called "bound adnouns" and all noun suffixes should be called "bound postnouns", but I have made a division, based on the relative range of occurrence with different sets of nouns.

In the same sort of way, it might be said that those particles which appear only after nominals approach the noun subcategory of "postnouns" and those which appear only after verbals approach the category of verb endings. The difference lies in the constituency of the phrases: I consider that the particle always stands in construction with the entire remainder of the phrase.

3.4. Ionized parts of speech.

The chart labeled PARTS OF SPEECH (pp 90-91) presents a detailed overview of my analysis of Korean word types. We find three "polar" categories: the major groups of NOUN and VERB, the minor

group PARTICLE. There are numerous subcategories, some interrelated in complex ways that I have tried to capture in the chart. The categories of VERBAL NOUN and POSTNOMINAL VERB are "ionized" in that they show what seem like chemical bonds (attractions) between the categories of noun and verb. The verbal nouns occur in phrases that are in construction with postnominal verbs. Some of the verbal nouns also turn up in other constructions as ordinary nouns, and some of the postnominal verbs also occur as other subcategories of verb. Certain verbal nouns are SEPARABLE, in that they can form a phrase with additional elements (such as particles) before the appearance of the postnominal verb, while other verbal nouns are INSEPARABLE. And some of the postnominal verbs are separable, in that a particle or the like can intervene between the preceding noun and the postnominal verb, while others are inseparable. Frequently an inseparable verbal noun turns out be also PRE-INSEPARABLE (that is, it combines only with INSEPARABLE postnominal verbs), but some are PRE-SEPARABLE for they occur with postnominal verbs that, with certain other verbal nouns, are separable. Auxiliary verbs are also divided into separable and inseparable.

The class of VERBS divides into TRANSITIVE and INTRANSITIVE, and the intransitive includes the subcategory of ADJECTIVE (= descriptive verb), which in turn has the one-member subcategory of COPULA, a general noun-predicator. In the same sort of way, verbal nouns have properties of transitive (vnt = transitive verbal noun), intransitive (vni = intransitive verbal noun), and adjectival (adj-n = adjectival noun). There are a few verbal nouns that are DEFECTIVE, for they occur with only a few paradigmatic forms of the postnominal verb; there are also a few DEFECTIVE VERBS. In earlier treatments I have restricted the terms "verbal noun" and "adjectival noun" to constructions with the postnominal verb and adjective **ha-** 'do/be', since those are the most common. But the extended treatment offered here is logically more consistent. A list of examples of each of the part-of-speech categories will be found in later sections (§§5-7), and information on the constructions involved should be sought in those sections and in the appropriate entries of Part II.

3.5. Shortened words.

Some words frequently appear in shortened form. We have already (§3.1) called attention to the "zero" abbreviation of **ha-** 'do/say/be' and **i-** 'be'. After a vowel these stems may fail to emerge and that leaves just the endings, standing alone as if free words: **--V 'myen = hamyen** 'if it does/is' or = **imyen** 'if it is'. The suppression of **i-** takes place after a vowel unless the stem is itself followed by a vowel (as in the past **iess.ta** or the infinitive **ie**), when **i-** merely reduces to **y-** after a vowel: **kama 'ta** 'it's the oven' but **kama yess.ta** 'it was the oven'. The suppression of **i-** is so common after a vowel as to be considered standard (an alternant of the copula rather than a variant), but the abbreviation of **ha-** is somewhat less predictable and therefore, except in a few complex endings like **-ulye 'myen**, it is usually treated as a shortened variant. The difference in the way that suppressed **ha-** and suppressed **i-** are treated reflects the fact that the phonological bondage of the copula with a preceding word is closer than that of **ha-**. In **ka ya 'keyss.ta** 'I'll have to go' there is no pause, but one can be inserted with the **ha-** restored as **ka ya | hakeyss.ta** 'I will have to go'. On the other hand, it sounds pedantic or bookish to say **wuli nala ita** for **wuli nala 'ta** 'it's our country'.

The shortened forms of the plain and prospective modifiers of these two verbs (**'n = han** 'that did; that is' or = **in** 'that is', and **'l(q) = hal(q)** 'that is to do/say/be' or = **il(q)** 'that is to be') are homonyms with the shortened forms of the postvocalic shape of the topic and object particles (**n' = nun, l' = lul**). In our Romanization we distinguish them by the location of the apostrophe: **uysa 'n (sālam)** '(a person) who is a doctor', **uysa n'** 'as for the doctor'. The "zero" abbreviation of the processive modifier of **ha-** (**'nun = hanun**) is distinguished only by our apostrophe from the homophonous full postvocalic shape of the topic particle **nun**: **cangsa 'nun (sālam)** '(a person) who is engaging in business', **cangsa nun** 'as for business'. When writing, Koreans do well to avoid abbreviations as much as possible. It makes the content easier to understand if you write out in full the forms of the copula and **ha-** wherever they occur in a Hankul text, and spell particles in their full forms, as well as taking care to specify the grammatical role of phrases by marking them with the appropriate particles more often than is usual in speech, where case markers are casually dropped.

Chart: Parts of speech *(left)*

```
bnd                              postsubst
postn (> suffix)                  /   _____1 ....←              ←.
                                  |     _____2 ..                  .
                                 postn        count        .                 .
                       quasi-free    .---------.            .                 .
bnd |                          \   | \      postmod          .                 .
pre- |                          \  |  \    .-----._____3←.....  .           .          ←sep
pcl |                            \ |   \           \         .          .        .          /
 .----.--BOUND--------- NOUNS ----------FREE         _____4 ........  .        .          /
     |   \            adv      /|\  \         \           ..... .. .      .        /
     |    \            .------/  \ \  \          \              .          .      /
     |     \           |    num  |  \  \ proper    \         .        .     ↑    /
     |      \          |         |   \  \ noun       6_5 ..←   .        .  ←insep /
     | bnd preverb     |       interj |  \             \..vni-----adj-n  |   /
     | (> adv,         |              |   \ deictic              |       | /
     |   prefix)       |             pren  noun             Verbal Nouns_____|/
bnd  |                 |_____/  |                |
pren (> prefix)                                          /   |                |___pre-insep
                                                        /   vnt               |
                                                       /                      |
                                                  defective                   |___pre-sep


                                      quasi-pcl n forms
                                        \    |   /
                                       PARTICLES    <---------------------------
                                        /   |   \
                        (postn) <-------only after noun  |   only after verb ----> (v ending)
                                                          |
```
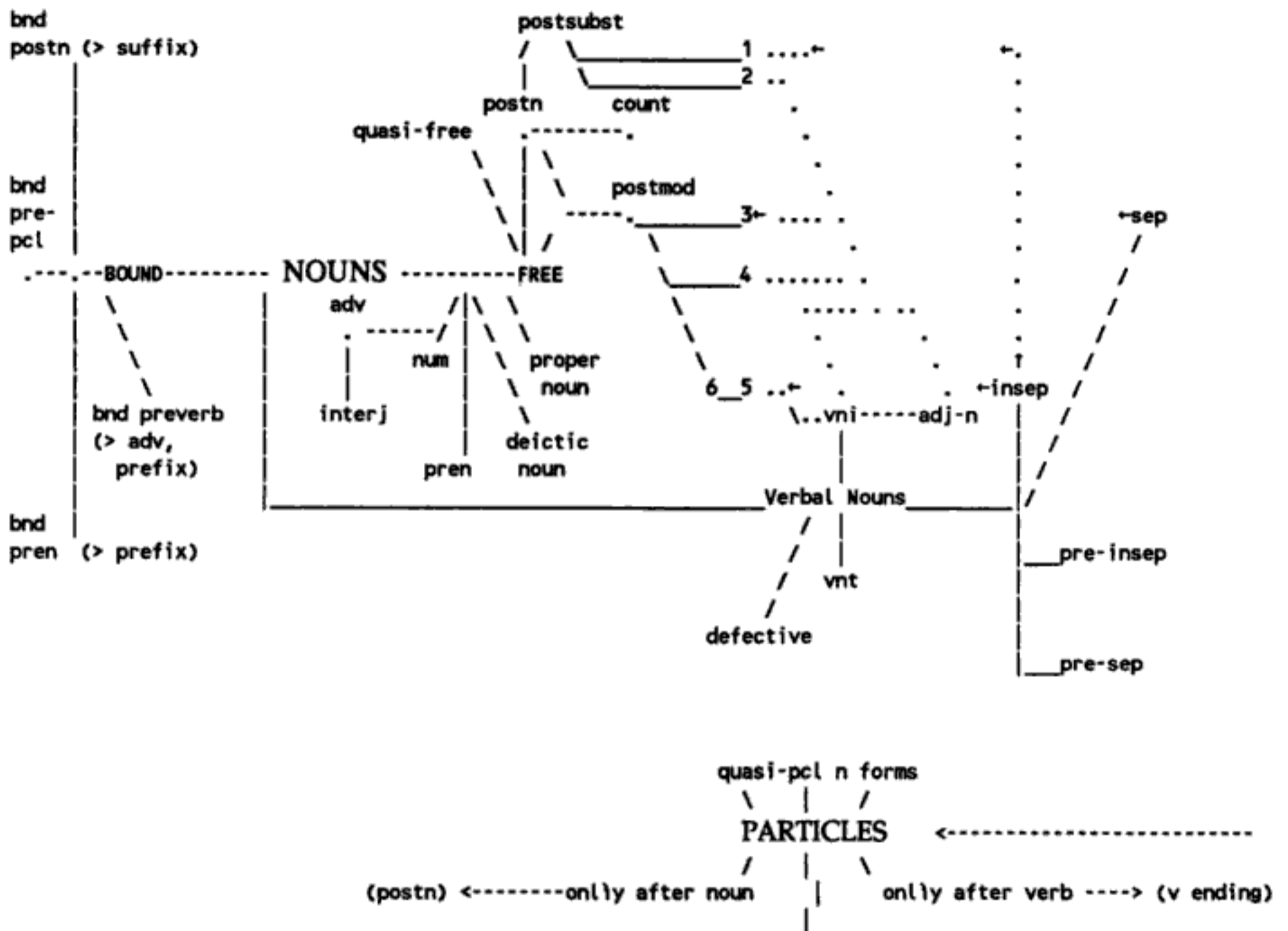
1 postsubst adj-n insep: cik
2 postnom/postmod adj-n insep: man
3 postmod adj-n sep: pep, tus
4 postmod adj-n insep: ak, man, (p)pen, wu
5 postmod vni insep: chek, (s)sa
6 pre-insep postmod: seng/sang

Chart: Parts of speech *(right)*

```
                    bound postverbs
                     (> suffixes)      defective
                                        infinitives
                           |           /
                           |          /
                           |     .defective
                           |        /
                           |       /
                           |      /
                     |     /
            Stems → VERBS  ← Endings
                     |
                     |
                     |
                     |
            vi---.----|----------vt
         pseudo-vi  /|
                   / |----------------------\
     insep        /  . qvi                   \      insep
          \      /   | (iss-, eps-,           \    /
          Postnominal|   -ess-, -keyss-)       aux
          /       \  |                        /  \
      sep          \ |                       /    sep
                    ADJ --------------------/
                   /
                 COP

    ↓
    |
    |
<--- quasi-pcl v forms
```
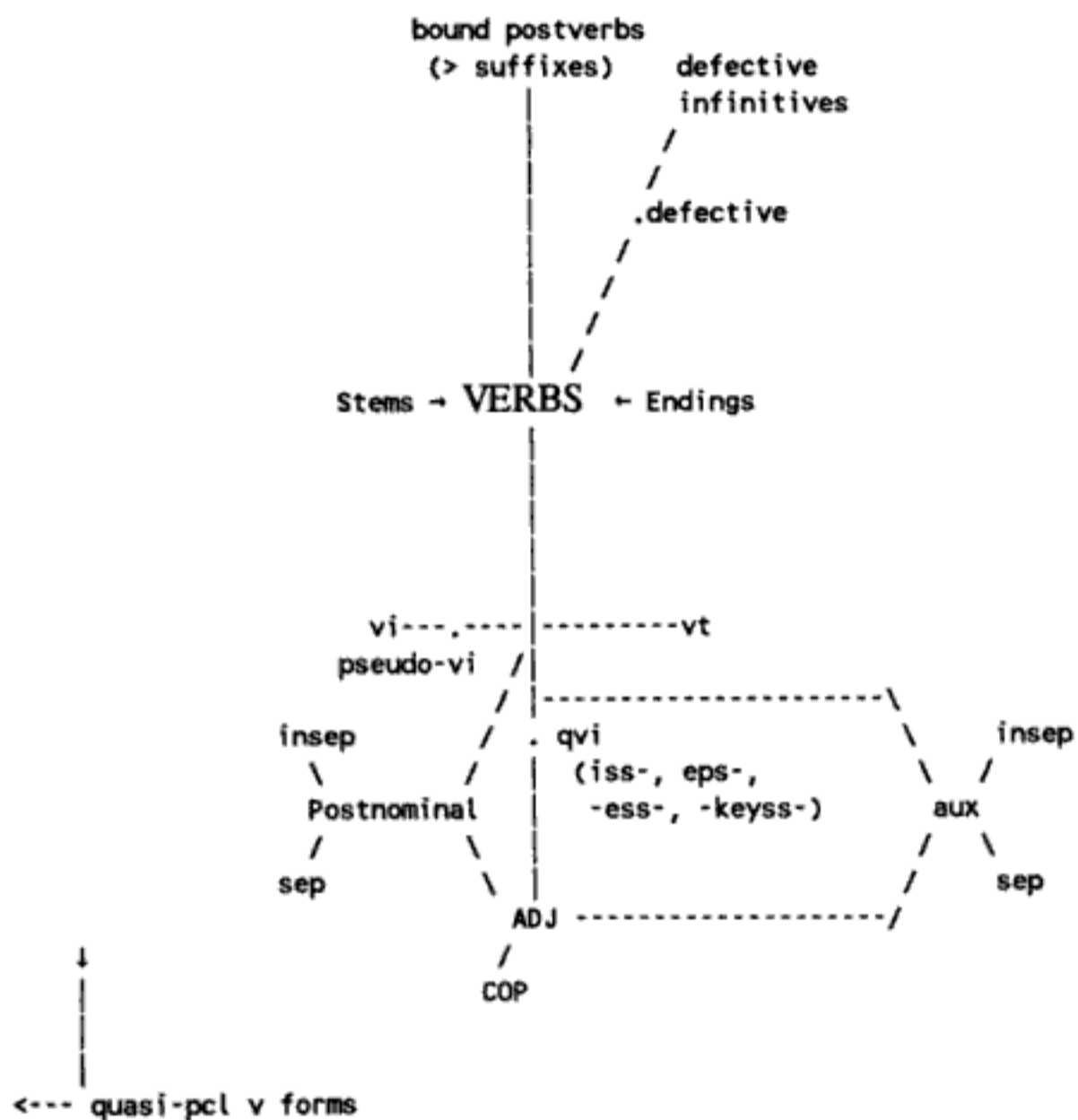
There are various other sorts of common abbreviations:

(1) ke = kes 'thing, one, fact'; mue, mwe, mwes = mues 'what, something'; an ⋯ = ani 'not'; key = keki 'there' or = (ku) kes i '(that) one'; cĕy = cĕki 'there'; yey = yeki 'here'; -ulq cey = -ulq cek (ey) '(at) the time that'; anh- = an ha- = ani ha- 'do / say / be not'; -canh- = haci anh- (= haci ani ha-) 'do / say / be not'; mas i 'ss.ta (mas-iss.ta) = mas i iss.ta 'is tasty'; caym' iss.ta or caymi 'ss.ta. Notice that /masitta/ is mas i 'ss.ta with the particle overtly present because the synonymous phrase mas iss.ta (without the particle i) is /matitta/.

(2) il' lo = ili lo '(toward) this way'; il' one la, ili ŏn', il' ŏn' = ili one la 'come here!'; k'an twu- = ku man twu- 'leave it alone'; et' 'ta = eti (ey) 'ta 'to where'; kac' 'ta cwu- = kacye 'ta cwu- = kacie 'ta cwu- 'bring it (for someone)'; teykko o- < teyliko o- 'bring him along'.

(3) The nominative particle i is shortened to y (the front component combining with a preceding vowel) in some of its irregular appearances after a vowel, where we would expect the suppletive alternant ka, and the copula i- is sometimes reduced to y in a similar way: (kes → ke →) key = kes i or kes i-. The nominative forms nay 'I', cey 'I [formal]', and ney 'you' appear either alone or pleonastically followed by the particle ka; they are historically from na, ce, and ne + this reduction of the particle i to y. The identical-sounding nay 'my', cey 'my [formal]', and ney 'your', on the other hand, are contractions of na uy 'of me', ce uy 'of me [formal]', and ne uy 'of you'. The pleonastic sequence i ka is used for i in the northeast, in Hamkyeng, according to Mkk 1960:4:26, which has the examples chayk i ka iss.ta = chayk i iss.ta 'there is a book' and sensayng i ka osinta = sensayng i osinta 'the teacher comes here'. This usage has been reported not only in dialects of Hamkyeng but also of Kyengsang.

(4) After most adjectival nouns, forms of ha- 'do/be' which consist of the stem with an attached ending that begins with t, c, or k have shortened variants, in which the vowel drops and h undergoes metathesis (that is, it switches positions) with the voiceless consonant: tha for hata, chi for haci, kho for hako. Examples are kantan tha 'is simple', kantan kho 'being simple', and kantan chi 'is simple, I suppose'. After certain processive verbal nouns, a few forms of ha- shorten in the same way: sayngkak hakey → sayngkak khey (→ sayngkakhey, CF §2.6) 'so that one thinks'. The shortened version of the suspective haci 'does' appears only in negative expressions, where it is optional. The variant has two shapes: chi after a typically voiced sound (as in salang chi anh.nunta 'does not love') and 'ci after a typically voiceless sound (as in sayngkak 'ci anh.nunta 'does not think'). After an adjectival noun the shortening of haci 'is' is usually chi regardless of the preceding sound, as in nek.nek chi anh.ta 'is not enough' and phyen.an chi anh.ta 'is not comfortable'. But many people seem to use 'ci and chi in free variation with both descriptive and processive verbal nouns. In the 15th century the short variants enjoyed wider use, including examples of 'do' as a transitive verb: CIN 'ol 'khwo 'cye ho'm ye n' (1462 [1]Nung 7:73b) 'if one wants to do the true thing'. The aspirated forms ('tha < ho'ta, 'thi < ho'ti, 'khwo < ho'kwo, 'khey < ho'key / 'khuy < ho'kuy) occur only after voiced sounds, and the unaspirated forms (''ta, ''ti, ''kwo, ''key, ''kuy, ...) appear only after voiceless sounds, but the ⋯LQ of Chinese loanwords, though probably pronounced just as /l/, was sometimes treated as voiceless (SEE p. 50): pat non'hwoki 'lol 'KYWELQ 'key ho'n i (1447 Sek 9:19-20) '[he] let them divide the fields'. (The Middle Chinese source of ⋯LQ was an unreleased final /t/.)

(5) There are a few examples of dropped p (CF §2.11.2): phul-'ath [dialect] = phul path 'weedy spot, bush, thicket'; si'-wel ← sip-wel 'October' (we would expect sip-'el, see §2.7.4) and si'-o li = sip-o li '15 leagues'; ka'-o [dialect?] kap-o (a cyclical binom); ttelum ha- (< ttĕlp- + -um) 'be a bit astringent'. There are also a few examples of dropped k, notably [1]yu'-wel ← [1]yuk-wel 'June' (but this may have been influenced by the poetic name for June [1]yuwel 'flowing month') and ŏnyu'-wel 'May or June'. But mokwa < ¨mwo-'kwa (1527 Cahoy 1:6a=11a) = mok.kwa < 'MWOK-KWA 'Chinese quince' and Paychen < Paykchen (placename) are variant borrowings. The texts provide at least one example of m dropped after p: 'pap-e'ki (?1517- [1]No 1:45b; the initial circle is too round to be an m) < 'pap me'ki (1481 Twusi 15:4b) 'eating, having one's meal'.

(6) Final l drops in many words when they serve as the first member of a compound that has the next member beginning with an apical articulation:

    kyewul 'winter', **kyewu' sal.i** 'winter garb', **kyewu' nay** (also **kyewul nay** with /ll/) 'all through the winter'

    kaul 'autumn', **kau' nay** 'all through the autumn'

    hanul 'heaven', **hanu' nim** 'God'

    pul 'fire', **pu' napi** 'moth (← fire butterfly)', **pu'-nemki** 'a kind of stove', **pu'-ce** 'fire tongs (← chopsticks)', **pu' son** 'fire scoop (← hand)', **pu' sap** 'fire shovel'

    atul 'son', **atu' nim** 'esteemed son'

    ttal 'daughter', **tta' nim** 'esteemed daughter'

    chal 'sticky', **cha' co** 'glutinous millet', **cha' tol** 'flint (← sticky stone)', **cha' pssal** (spelled **chap-ssal**) 'glutinous rice'

    hwal 'bow', **hwa' sal** 'arrow'

    mal 'peck', **ma'-toy** 'pecks and measurefuls'

    mul 'water', **mu'-cawi** 'pump', **mu'-nem.i** '(?) overflow', **mu' com** 'athlete's foot, fungus'

    mul 'dye', **mu'-sayk** 'dyed color'

    panul 'needle', **panu' cil** 'needlework', **pan'-cit koli** 'sewing box' < *panu'-ci[l] s 'kwo'li*

    kumul 'net', **kumu' cil** 'netting'

    kempul 'dried grass and twigs', **kampu' namu** 'tinder'

    petul 'willow', **petu' namu** 'willow tree'

    sol 'pine', **so' namu** (also **sol namu**) 'pinetree'

    ssal 'rice', **ssa'-cen** 'rice store'

    ipul 'bedclothes', **ipu' cali** 'bedclothes and mattress'

    cwul 'line', **cwu' tay** 'fishing line and pole'

    nal 'day', **na'-nal-i** 'day by day'

    tal 'month', **ta'-tal-i** 'month by month'

    sī-nay 'streamlet' (from **sīl** 'thread, ... ' + **nay** 'stream')

    si'-tha(y) 'ox pack' (from **sīt-** / **sil-** 'load' + **thay** / **tha** = **cim** 'burden')

Notice also **kwutu-ccil** 'hypocaust work' and **kwutwu-ttay** 'hypocaust' from **kwutwul** 'hypocaust' (by by way of *kwutwu[l] s cil, *kwutwu[l] s tay?); **pha'-il** from **phal-il** '8 April = Buddha's birthday'. This dropping of the liquid before an apical consonant was a general phenomenon in Middle Korean (CF §2.11.3), and it regularly occurred in verb forms such as "ma˙ti and "ma˙ta for modern **mālci** and **mālta**. The modern language retains the basic -l- of such stems except before **n** (**mānun**) and **s** (**māsinta**), or in fossilized forms such as **-ca māca**. The elision of l before n is no longer productive, however, and newer formations regularly have **l.n**, pronounced /ll/. See **nim** in Part II. Some dialects apparently never elided the l, e.g. that of Ceycwu (LSN 1978:18): *toltol-i* 'monthly', *nalnal-i* = /nallali/ 'daily', *ttol-nim* = /ttollim/ 'your daughter'. On the other hand, the [1]Yukcin dialect reflected in the Cyrillic versions of 1902 Azbuka retained the liquid elision of Middle Korean.

(7) When the infinitive ending **-e** is attached to a stem ending in **i**, the form is usually shortened by one syllable: ···**ie** → ···**ye**. The shortened form is more or less the written standard for polysyllabic stems (**kitalye** ← **kitalie** 'waits for') but monosyllabic stems are usually spelled out in full (**kie** 'crawls') except for the unshortened copula (**ye** = **ie** 'it is') and the auxiliary verb **ci-** 'become' (**-e cye** = **-e cie** 'gets to be' as in **hulye cye** 'gets to be cloudy'). Except in special circumstances the phoneme /y/ does not occur after **s**, **c**, **cc**, or **ch**, but the recommendation of the orthographers is to regularize the abbreviation ···**ie** → ···**ye** in these cases, too, and write **kasye** (rather than **kase**) for **kasie** 'someone esteemed goes', **kacye** (rather than **kace**) for **kacie** 'holds, gets', **kaluchye** (rather than **kaluche**) for **kaluchie** 'teaches', **sal-ccye** (rather than **sal-cce**) for **sal-ccie** 'gets fat'. What is said for the infinitive ending **-e** also applies to the past-tense forms in (···**i-** +) **-ess-**: **kasyess.ta** (rather than **kasess.ta**) for **kasiess.ta** 'someone esteemed went', **kacyess.ta** (rather than **kacess.ta**) for **kaciess.ta** 'has got', **kaluchyess.ta** (rather than **kaluchess.ta**) for **kaluchiess.ta** 'taught', **sal-ccyes.ta** (rather than **sal-**

ccess.ta) for **sal-cciess.ta** 'got fat'. The endings **-sye** and **-syess-** are particularly frequent because they contain the honorific marker **-(u)si-**, which can be used to turn almost any verb stem into an honorific. Some speakers pronounced ···**sye** not as /se/ but as /sye/ with the palatal sibilant they have learned to make for foreign loanwords such as **syassu**/**syaccu** 'shirt', but I have not heard speakers make a distinction of /cye/ from /ce/. The shortening of ···**ie** to ···**ye** is the source of virtually all cases of **ty**, **thy**, and /tty/: **titye** = **titie** 'treads', **pethye** = **pethie** 'props', **eph-tye** /epttye/ = **eph-tie** (= **eph-tulie**) 'overturns'. Words which, in the spellings of earlier days, once had **ty-** are now pronounced **c-** in the south and in the standard language, **t-** in the northwest dialects, such as that of Phyengyang, which is famous for the word **tengke-tang** = **cengke-cang** '[railroad] station' (from earlier **tyengke-tyang**) − see §2.10.3. I have tried to follow the recommendation of the Korean Language Society in this book, though I would prefer to have all the forms spelled out in full as ···**ie**, both in the Romanization and in Hankul, so as to avoid possible confusion.

(8) The dropping of **h** or **ng** (§2.7) sometimes leads to further shortening of vowel strings: **ohilye** → (**oilye** →) **oylye** 'rather, contrary to expectation'; **kongyen hi** → **ko'yen 'i** → **kōyni, kwāyni** 'in vain'; **āymay han** → **āymay '(e)n** → **āymen** 'vague'; **siwen hata** → **syēn hata** 'is refreshing'.

(9) ···**' tus hata** = **-nun tus hata** (in literary clichés) 'seems to do'; ···**' mōs hanta** = **-ci mōs hanta** 'cannot do' (in a few expressions).

(10) Final ···**i**, at times itself a morpheme, drops from the first member of a number of compounds, especially those involving diminutive suffixes: **kkoli** + **-ayngi** → **kkolayngi** 'tail', **kaci** + **-angi** → **kacangi** 'branch', **kkochi** + **-ayngi** → **-ayngi** → **kkochayngi** 'skewer, spit', **thokki** + **-ayngi** → **thokkayngi** 'rabbit', **ppuli** + **-eyngi** → **ppuleyngi** 'root'; **taykali** + **-ppali** → **taykal-ppali**, + **-ppayki** → **taykal-ppayki** 'head'.

(11) A phrase with two similar syllables juxtaposed sometimes reduces the first: **ec' cenyek** = **eceyq cenyek** 'last night'.

(12) The auxiliary adjective **siph.ta** appears in a shortened form taken from the southern dialect variant **siphuta**. Although that variant itself is seldom heard in Seoul, the shortening found in **-ko 'phuta** (= **-ko siph.ta**) 'wants to' is quite common: **nay ka poko 'phun sinmun** 'the newspaper I want to see'.

(13) For still other cases of shortening, see the various stems that are called s-dropping (§8.1.5), ambivalent (or h-dropping, §8.2.4), and − from the viewpoint of the Hankul spelling − the l-extending vowel stems (§8.2.2).

3.6. Vocabulary.

By source the bulk of Korean vocabulary falls into three classes, which I will call CORE or (even though it may contain early loanwords) native-Korean, CHINESE (systematically borrowed from China), and ENGLISH, though the class contains modern loanwords from other European languages. Many of the modern loanwords were borrowed through their Japanese renderings, but some of those have been given new versions taken directly from English. There remains considerable controversy over the standardization of current loanwords from English. The trend is to favor close imitation of American pronunciation of the words, rather than to follow Japanese patterns, as was sometimes done in the past. But for words well established over several generations, the now traditional version is usually conceded.

The Chinese vocabulary, which can be referred to as "Sino-Korean" when reference to it might be confused with the language spoken in China, has been well integrated during the past thousand years and it is now a component of the language − in sheer quantity the major component. It is interesting to observe that while the majority of all words in a Korean dictionary are of Chinese origin, only about ten percent of the words in the so-called "basic vocabulary" come from Chinese. Virtually all non-Korean words have been brought into the language as uninflected words, as some kind of noun. When the word clearly carries a verbal meaning, Korean has treated it as a verbal noun, putting the loanword

into construction with a postnominal verb, typically **ha-** 'do/be'. But there are also verbal nouns in the core vocabulary, most conspicuously the mimetic words described in §14. I know of only two verb stems of possible Chinese origin: **sangwu-** 'harm' (= **sang ha-**) ?< *SYANG ʼhwo-* and **pāy-** < *poy-* 'conceive (a child)', if that is from the Chinese morpheme **pay** < *PHOY* 'fetus' rather than **pay** < *ʼpoy* 'belly'. (The non-Chinese etymology is supported by the Japanese derivation of hara⸣mu < *para-ma- 'get pregnant' from hara⸣ < *para 'belly'; there is no alternative possibility from Chinese.)

Owing to the severe restrictions on syllable types in Chinese, morphemes of the Chinese vocabulary are limited to a rather neat pattern of shapes, roughly those permitted by the chart of Korean syllables spoken in isolation, with the exception of most of those with geminate initials (**pp tt cc ss kk**). A list of all the occurring types of Chinese vocabulary will be found in §4.5; those shapes that end in ···**p** ···**l** ···**k** had final unreleased ···**p** ···**t** ···**k** in Middle Chinese, as they still have in Cantonese. The core vocabulary, on the other hand, includes some shapes which are less than a syllable, such as the -n of **chan** ... '... that is cold' from **cha-**, the -ss- of **kass.e** 'went' (from **ka-**) or even less than a phoneme, as in the alternant of the infinitive that is represented by the palatal feature (front component) reflected by our spelling -**y** in **hay** 'does' from **ha-**. The core vocabulary includes some shapes which are more than a syllable but less than two syllables: **kiph-** in **kiph.e** 'is deep', **pakk** in **pakk ey** 'outside', **kkoch** in **kkoch ita** 'it's a flower', **kaps** in **kaps i** 'the price [as subject]'. And it includes some shapes which are two or three syllables (**phulu-** in **phuluta** 'is blue', **meli** 'head', **cwumeni** 'pouch', **kitali-** in **kitalinta** 'waits') or something slightly more than two: **muluph** in **muluph i** 'the knee [as subject]'. Words of four syllables or more are usually either borrowings or compounds (as are many words of two or three syllables), but in some cases the origins are obscure.

The alternations in shape of the Chinese vocabulary are fairly easily stated, as are the basic shapes. For the Korean vocabulary the statements are more complicated because: (1) "overstuffed" morphemes (like **pakk** and **kiph-**) must be reduced to permissible syllables when not followed by the copula **i-** or a particle that begins with a vowel; (2) decisions must be made on morpheme boundaries within words, and the decisions are not always so easy as they are for the Chinese vocabulary, where we are helped by the restricted shapes and the morphemic writing system of Chinese; (3) there are several special rules when endings are attached to verb stems.

Two morphemes, core and Chinese respectively, sometimes have shapes that begin with **ng**. These are -**ngaci** 'offspring of' (ultimately perhaps from **aki** 'child', though we find no other cases of affricating palatalization of the velar in a noninitial syllable) in **songaci** 'calf' (**so** 'cow'), **mangaci** 'colt' (**mal** 'horse'), and **kangaci** 'pup' (**kay** 'dog'); and -**nge** 'fish' in fish names taken from the Chinese: **ocinge, punge, ˡnonge, ˡīnge, sange, swunge, kwānge,** and **paynge** < **payk-(ng)e**.

3.7. Layers of vocabulary in earlier Korean.

By the time Hankul was created Korean had acquired many borrowed words from various other languages, such as Manchu and Mongol. Most of the loans, however, came from classical Chinese, which was the standard written means of communication. The Chinese words were borrowed as logographic characters and pronounced with an approximation to the Middle Chinese sounds. But some of the words were borrowed early and got thoroughly nativized, so that their association with the characters, and the traditional Chinese phonetic values, was forgotten. Most loans, however, retained their association with Chinese even when they became part of the common vocabulary of speech, as when **san** 'mountain' and **kang** 'river' displaced the native words attested as MK ¨mwoyh and ko⸣lom.

Scholars set up a system of somewhat artificial readings for the characters and codified this in a dictionary of character readings that was published in 1448 under the title Tongkwuk cengwun (*"TWONG-ʼKWUYK ¨CYENG-ʼNGWUN* — the tone mark on the first syllable is unexplained). The Tongkwuk readings were an attempt to capture in terms of Hankul symbols the traditional phonetic distinctions of Middle Chinese as found in the rime lists written by Chinese philologists. This reconstruction of Chinese phonology took place nearly five centuries before the Sinologist Bernard Karlgren interpreted the distinctions of Middle Chinese in terms of the Swedish Dialect Alphabet. The Tongkwuk readings were written as Hankul syllables immediately following the corresponding Chinese

characters in many of the texts of the 15th century. The modern way of pronouncing Chinese characters used in Korea is simpler than the Tongkwuk readings in that certain unrealistic distinctions (such as the initial velar nasal and glottal stop) are abandoned, and the unaspirated voiceless initials of Middle Chinese are equated with the plain series of Korean obstruents, rather than the emerging tense (reinforced) series favored by the prescriptive orthographers of the 15th century.

For certain words the prescriptive readings coexisted with nativized versions, so that a number of doublet forms can be found in the texts. The nativized version often appears in Hankul without the accompanying Chinese characters (CF LCT 1971:78):

cin˙sil lwo (1481 Twusi 20:19b) = *CIN-˙SSILQ lwo* (1482 Kum-sam 2:16a) = *CIN-˙SSILQ ˙lwo* (1459 Wel 9:36d) 'truly'

cywongywo (1518 Sohak-cho 8:9a *cywong¨ywo y* ← *cywongywo ˙i*; 1586 Sohak 3:8b) 'essence, the essential' = *CWONG-˙QYWOW* (1482 Kum-sam 2:69a)

cywungsoyng (1447 Sek 6:19b, ...) = *˙CYWUNG-SOYNG* (1447 Sek 6:5b, ...) 'creatures'

kanan (1475 Nay 2:2:47b; 1482 Nam 1:30b), *kannan* (1475 Nay 1:30a) = *KAN-NAN* (1447 Sek 6:15b, 13:56b; 1465 Wen 3:3:1:62a) 'poverty; poor'

kuypyel (1445 ¹Yong 35, 1459 Wel 2:43a) 'tidings, news, a letter' = *KUY-˙PYELQ* (1447 Sek 24:16a)

kwong˙so (1447 Sek 9:30b) = *KWONG-˙SSO* (1459 Wel 9:50b) 'engaging in public affairs'

mi˙hwok (1447 Sek 9:36b) = *MYEY-˙HHWOYK* (1459 Wel 9:17b) 'bewilderment'

¨naycywong (1462 ¹Nung 1:20a, 1463 Pep 3:161a), *¨nay˙cywong* (1518 Sohak-cho 8:19b) = *¨NAY-CYWUNG* (1447 Sek 13:29b) 'finally'

si˙cyel (1475 Nay 2:2:47b, 3:32a; 1481 Twusi 7:25b) > *si˙cel* (1518 Sohak-cho 8:19b, 21b) = *SSI-˙CYELQ* (1447 Sek 9:2a, 13:47b, 13:60b; 1462 ¹Nung 2:114b, 5:85b; 1459 Wel 18:83a; 1465 Wen 2:3:1:52a; ...) 'time (when)'

syang˙nyey (1447 Sek 6:10a; 1459 Wel 10:7b, 17:35a; 1463 Pep 5:212b, 1464 Kumkang 64b, 1482 Kum-sam 2:25a, ?1517- Pak 1:14b) = *SSYANG-˙LYEY* (1447 Sek 9:14a) 'always'

twocok (1445 ¹Yong 30; > *twocek*) = *˙TTWO-˙CCUK* (1459 Wel 2:19b) 'thief' (= totwuk)

tyangsyang (1466 Kup 2:64a) = *TTYANG-SSYANG* (1459 Wel 8:8b, [1447→]1562 Sek 3:22b) 'always'

¨wen °ho- (?1517- Pak 1:60a) = *¨NGWEN °ho-* (1586 Sohak 6:44a) = *˙NGWEN °ho-* (1447 Sek 9:40b, 13:44b, 24:18a; 1459 Wel 13:35b) 'do for (the sake of)'

wuytwu (1447 Sek 13:6a) = *NGWUY-TTWUW* (1459 Wel 10:25a) 'forming the head / van'

¨wuy °ho- (1447 Sek 6:1a, 6:7b, 6:13b, 6:16a, 13:49b) = *˙WUY °ho-* (1459 Wel 7:17b, 9:5-6, 13:35b, 13:36a, 17:54a; 1463 Pep 2:172ab, 2:231b, 7:17a; 1465 Wen se:6a; 1482 Kum-sam 5:48-9) 'do for (the sake of)'

LCT 1971:78 finds over thirty words that were usually written without the appropriate Chinese characters, and presumably they were all well assimilated. Additional notes on some of those words:

¨camskan (1459 Wel 7:15b) = *¨cams.kan* (1447 Sek 13:53b; 1475 Nay 1:55b, 2:1:2b; 1463 Pep 2:226a; 1465 Wen 1:1:1:44b; 1481 Twusi 7:1b; 1482 Kum-sam 2:13b; 1482 Nam 2:31a) 'a while' < (?*)˙CCAM s KAN "the space of a while"

˙cukcay (1459 Wel 9:35f; 1463 Pep 6:97a; 1466 Kup 2:4b) < *˙cukca˙hi* (1447 Sek 6:2a, 6:11a, 9:12b, 24:16a; 1459 Wel 2:6b) 'suddenly' < *˙CUK CA [< *˙CHO] ˙hi

coy˙cwo (1447 Sek 6:7a) 'talent, ability' < *CCOY-CHWOW

¨cwosim (1447 Sek 9:37a, 1459 Wel 1:6a) 'taking care' < *CHWOW-SIM = Beijing cāoxīn

cyang˙cho (1459 Wel 1:18a, 17:78b; 1462 ¹Nung 1:28b, 7:73b; 1463 Pep 1:123a, 3:35a; 1475 Nay 2:1:30a; 1482 Kum-sam 4:22b) 'in future' < *CYANG-˙CHO (> Beijing jiāngcì 'for a while; almost')

¨hoyng˙tyek (1447 Sek 6:2b) 'deeds' < (?*) ˙HOYNG ˙TUK "perform virtue" (CF Soothill 221b; LCT and Kim Wancin assign the second syllable to two different characters but both are read ˙CYEK)

in¨so (1459 Wel 2:9a) 'greeting (bow)' < *ZIN-˙SO "people-thing" (> Beijing rénshì 'gift')

kwu˙kyeng (1459 Wel 2:27b, 2:35b, 7:11a) 'viewing' < *˙KWUW-¨KYENG "seek the scene"

kwuy-s kes (1447 Sek 6:19b, 1482 Kum-sam 2:7b, 3:27b, 3:34b) < *¨KWUY s kes "devil('s) thing"

¨*lwongtam* (1447 Sek 6:24b, 1459 Wel 1:44b) 'joke' < *¨*LWONG-TTAM* "play talk"

¨*moyzyang* (1463 Pep 2:189b; 1481 Twusi 7:2b, 22:1b) > ¨*moyyang* (1481 Twusi 15:20a, 1518 Sohak-cho 10:12b) ?> *ˇmoy¨yang* (id. 9:24b), *ˇmoyyang* (id. 10:1b) 'always' < ¨*MOY (s) ˇYANG* "each('s) appearance"

phwunglywu (1447 Sek 9:21a, 13:9a) 'music' < **PWONG-LYWU* (CF Beijing fēngliu 'elegance')

pwunˇpyel (1447 Sek, 9:29b, 13:36a; 1459 Wel 2:6a) 'thinking, considering, worry' < **PWUN-ˇ(P)PYELQ* (> Beijing fēnbye 'separate, distinguish')

siˇhwok (1462 ¹Nung 9:88a, 1463 Pep 6:145b, 1481 Twusi 8:8a) 'sometimes; perhaps' < **SSI-ˇHWOK*

syang toWoy- (1459 Wel 1:43a) 'is common, vulgar' < *SSYANG* 'constant, always'

tangta.ng-i (1447 Sek 19:34a, 1459 Wel 1:7b, 1466 Kup 2:64a, 1481 Twusi 7:4b, 1482 Kum-sam 4:20b) = *tangtang-i* (1481 Twusi 7:9a, 7:31a, 20:34b) < **TANG-TANG ˇhi* 'suitably'

¨*tyangka* (1447 Sek 6:16b, 6:22a) '[marriage into] the husband's family' < *¨*TTYANG-KA*

For *cyen ˇhye*, ¨*hoyng ˇhye*, and *ˇtwok ˇhye* see Part II, **hye**. LCT's list is representative, but not exhaustive. We can add, among others:

namcin (1459 Wel 1:43b) 'male; husband' < **NAM-ZIN* "male person"

namˇphyen 'husband' < **NAM-PPYEN* "male side / direction / party"

¨*syaˇwong* 'husband' < *¨*SYA-WONG* "house elder"

kansywu ¨ho- (1447 Sek 9:36a, 1465 Wen 2:3:2:88b), *kanso ˇho-* (1475 Nay 3:32a) < **( )KHAN-¨SYWUW* 'guarding' > Beijing kānshŏu

ˇtyang ˇso 'selling' (1459 Wel 13:8b, 23:64a; 1463 Pep 6:170b) < **TTYANG-ˇSO* "market event"

Several common elements of modern Korean have Chinese origins that are now largely forgotten: ··· **ca** 'person' < ¨*CYA*, ··· **cha** 'on the verge; (as) an incidental consequence of; (for) the purpose of' < *ˇCHO* 'next, second(ary)', ··· .

Certain characters were given more than one reading (§4.7), sometimes reflecting divergent meanings in classical Chinese, and this led to doublet compounds, as well: ¨*KAY-ˇTHWALQ* (1459 Wel 14:39b, 1462 ¹Nung 7:27a, 1482 Kum-sam 2:4ab) = ¨*HHAY-ˇTHWALQ* (1447 Sek 13:43b) 'emancipation'. Here the character itself represents a triplet, with a third reading *ˇHHAY* as in *ˇMYWOW-ˇHHAY* (1482 Kum-sam 5:24b) 'the wondrous understanding'. Doublet forms that differ only by accent are virtually unfound in the Chinese part of the vocabulary. Tongkwuk cengwun recognizes more than one tone for certain characters: 'dye' is listed as *ZYEM*, ¨*ZYEM*, or *ˇZYEM*, but the only example I have found is the last, in the expression *ˇZYEM-ˇCCYENG* (1465 Wen 2:3:1:43a) 'pure-washed'. The character for 'separate, special' was read both *ˇPYELQ* and *ˇPPYELQ*: *ˇKAK-ˇPYELQ ˇhi* (1447 Sek 13:10b) = *ˇKAK-ˇPPYELQ ˇhi* (1462 ¹Nung 1:89a, 1482 Nam 2:63b) 'especially'.

Indirect evidence that the usual reading of *MWON* 'gate' was *mwun* (as made explicit in 1527 Cahoy 2:4a=7a) can be found in the choice of variant forms of particles in these passages: *spolˇli MWON ˇul ¨yelˇla ˇhoˇye ˇys.teˇn i* (1459 Wel 10:25a) 'wanted to open the door quickly' (we expect *MWON ˇol*); *kasoy ˇlwo ˇhwon [MWON] ˇulan sywokcyel [¨]ep.si [¨]ye[ˇ]ti [ˇ]mal[ˇ]la* (1481 Twusi 7:9a) 'do not to your regret open a door made of thorns' (we expect *MWON ˇolan*). Incorporated in the word *SA-MWON* 'śramana': *SA-MWON ˇuy ¨swon-ˇtoy* (1447 Sek 24:22a) 'to the śramana' (we expect *ˇoy*). In *sep [MWON] ˇey* (1481 Twusi 7:9b) 'to the twig gate' the writer was probably following the nativized *mwun* that would have been the normal spoken version, as attested in Hankul somewhat later (?1517-Pak 1:12b), for otherwise we would expect the particle to be *ˇay*.

Some of the compounds may have been borrowed from Chinese dialects of the day:

ˇcokya (1445 ¹Yong 25, 1447 Sek 6:5b, 9:33a; 1459 Wel 13:8b) < **ˇCCO-KA* = Beijing zìjiā 'self'

phunco (?1517- ¹No 2:23, 26) < **¨PWUN-¨CO* = Beijing fēnzi 'starch'

sywuˇlwup (1446 Hwun 29a [the dot is missing in the Taycey-kak repro but clear in the photocopy of ¹Yi Sangpayk 1957]) 'umbrella' ?< **¨SYWUY-ˇLIP* = (?) dialect equivalents of Beijing shuĭ 'water' + *lì* (< **lyep*) 'umbrella'

yangˇco (1447 Sek se:5a, 6:13b, 23:4a; 1459 Wel se:16a, 8:15b, 8:19b, 23:86b; 1462 ¹Nung 3:84a)

< *·*YANG-*¨*CO* = Beijing yàngzi 'appearance'; CF the postmodifier *¨yang* < ·*YANG* 'pretense'.
But other compounds were possibly made up in Korea and then nativized. That appears to be the
explanation for *cyen˙cho* (1447 Sek 6:2b; 1459 Wel 7:13b, 9:35d; 1462 ¹Nung 1:64b, 1:77b; 1465
Wen 1:1:1:47a; 1463 Pep 5:169b; 1482 Nam 1:5a) 'cause, reason' < *CYEN* 'effect' + ·*CHO* 'next,
second(ary)'; perhaps *¨chyen-lyang* (1447 Sek 9:13a, 24:47b; 1463 Pep 6:144a; ...) 'money and food'
< *CCYEN* 'money' + *LYANG* 'provisions' (modern Beijing qiánliang means 'tax; husband's allowance')
and (**canchi** <) ˙*can˙choy* 'banquet' < *CHAN* 'meal/eat' + *¨CHOY* 'vegetable'. The noun *hwe* (1462
¹Nung 6:96b, ...) 'boots' is taken from an ancestor of Beijing xuē ('boots', not xié 'shoes') that is more
immediate than the form reflected in the reading *HWA*.

Some of the Buddhist terms are borrowed from Chinese transcriptions of Indic words: *MI-·LUK*
'maitreya (the Buddha to come)', ·*NYELQ-PPAN* 'nirvāṇa (extinction)', ·*PPI-KHWUW* 'bhikṣu, (almsman,
mendicant monk)', ·*PPI-KHWUW-NI* 'bhikṣuni (nun)', *SA-MI* 'śrāmaṇera (religious novice)', *SAM-MA-·TI*
(1462 ¹Nung 5:31b) 'samādhi [a trance-like state of unperturbable meditation]', *SAM-·MOY* 'samādhi
(meditation)', *SA-MWON* 'śramaṇa (begging monk, ascetic)'. Others are Chinese calques (loan
translations) of Indic expressions: ·*CYENG-·KAK* 'sambodhi (Buddha wisdom)', ·*CYWUNG-SOYNG* 'sattva
(all living things)', ·*KYELQ-·CIP* = 'samgīta (a council to consolidate and collect the Buddha's teachings
and to decide orthodoxy)', ·*PEP* 'dharma, (Buddha's) law', *SYENG-MWUN* 'the śrāvaka (= hīnayāna
disciple in the first stage)', *¨SYWOW-SSING* 'hīnayāna (the Lesser Vehicle)', ·*TTAY-SSING* 'mahāyāna (the
Greater Vehicle)', *¨TTWOW* 'mārga (the Way)', *YWEN* 'pratyaya (secondary cause)'.

A number of words sound as though they might be from Chinese, but no characters have been
associated with them, e.g. **yengmun** 'reason' (no early attestations?), *¨ywumwu* (1447 Sek 6:2b, 1449
Kok 61) = *¨ywu˙mwu* (1518 Sohak-cho 8:22a) 'a letter', *¨cywong* 'slave' (?< *CYWONG* 'follow,
obey'), ... Certain words often suggested as Chinese loans may have other origins. Kang Hengkyu
1988:192 takes *soyng˙kak* 'thought' to be from Mongol sanaga rather than Chinese *¨SOYNG*
'contemplate, recollect' + ·*KAK* 'awaken' (LCT 1971:78, with question mark), and *solang* 'thought >
love' to be connected with ˙*solh* 'flesh' (and/or *¨sal-* 'live'? − the vowel is disconcerting) rather than
from *SO-LYANG* (LCT 1971:87) = Beijing sīliáng 'consider', but those etymologies seem less
convincing than the Chinese compounds. The noun *nungkum* 'apple' (first attested ?1834⁻) is from
lingkum (?1517⁻ Pak 1:4b) < *LIM-KKUM*. Both *¨cywung* 'monk' and ˙*swung* 'nun' seem to be variant
forms of *SUNG* 'Buddhist priest'. The expression ˙*sywok˙cyel ¨ep˙si* 'in vain, futilely' seems to be from
·*SYWOK-·CYELQ ¨ep˙s-i* 'without (even) a brief religious ceremony'.

Kim Wancin (1971:228-30) lists 36 words that he considers to be prehistoric borrowings from
Chinese, which preceded the wholesale borrowings called Sino-Korean, referring to reconstructions of
Middle and Old Chinese readings of certain characters. Some of the words are well deserving of such
attribution: ˙*cah* 'measure', *sywoh* 'vulgar, lay(man)', *tyeh* 'flute', and *zywoh* 'mattress' are surely
Chinese loanwords, as is ˙*mek* 'ink stick'. The nouns ˙*pwut* 'writing brush', *pwuthye* 'Buddha', and
tyel 'temple' are to be considered together with their Japanese counterparts as cognate borrowings. The
derivation of *cek* 'time' from Old Chinese *dyeg (> Beijing shí) is intriguing but must be weighed
against the comparison with Japanese toki⌐, just as the derivation of *¨kwom* < *kwo˙ma* 'bear' from Old
Chinese *gyum must be weighed against Japanese kuma⌐, and the derivation of *tolk* 'chicken' from Old
Chinese *tyeg 'bird' must share attention with the putative Japanese cognate tori⌐. Other derivations
that look good include ˙*sal* 'arrow' from Old Chinese *šyer and ˙*pwoy* 'hemp cloth' from Middle
Chinese *pwo˙ 'cloth' (Kim Wancin mistakenly labeled this shape as Old Chinese, but that form was
*pwag). On the other hand, *mol* 'horse' is more likely to have been directly borrowed from Mongol
mori rather than an early Chinese equivalent of *¨MA*, as Kim Wancin proposes.

4.0. Shapes.

Morphemes are abstract entities that take on shape only when they are realized as what are
sometimes called MORPHS, just as phonemes take on substance only when they are articulated as
PHONES. When a single phoneme is articulated with perceptibly different sounds, often determined by
the environment, the phones are said to be ALLOPHONES of that phoneme. When a morpheme is

realized in more than one shape, usually depending upon the adjacent sounds or morphemes, the morphs are said to be ALLOMORPHS of that morpheme. Quite often the variation in the shapes can be described in general terms that apply to groups of morphemes or to TYPES of shape. Words and stems often contain more than one morpheme, and they too can also be described in terms of shape types.

4.1. Shape types.

A word, or a morpheme, sometimes occurs in more than one shape. The SHAPE is the way the element is represented in phonemes, as actually pronounced. In general we find a resemblance between the several shapes of a given element. Except for the nominative particle **i / ka** and a few of the inflectional endings, the different shapes of a given morpheme or word have some stretches of phonetic makeup in common. The differences in shape between the alternants of many morphemes and words can be stated in general terms; such statements are often called MORPHOPHONEMIC rules. Some of these rules were stated in §2.6; a glance at the chart of permitted consonant clusters tells us to expect that a morpheme which sometimes has the shape **sip** can be expected to show the shape **sim** (and even the shape **si**) in certain environments. These alternations are so automatic (every "expected" ···**p** before a nasal turns out to be pronounced ···**m**) that for the most part they are disregarded by the Hankul spelling and by the Yale Romanization. When we hear the spoken sequence ···**mm**··· we cannot be sure that it will be spelled **p + m** (or **ph + m**, **ps + m**) instead of **m + m** unless we recognize the morphemes or words involved. As a result of convergence, Korean has a fair number of words and phrases that sound the same but are spelled differently because each constituent part is always written according to its "basic" shape, as found in some of its other environments. That is why the string /**cimman**/ is written **cim man** when it means 'just the burden' but **cip man** when it means 'just the house' and **ciph man** when it means 'just the straw'.

The alternations shown in the cluster table are AUTOMATIc in that you apply them to shapes regardless of the particular words involved; and they are FULLY AUTOMATIC because you need not even know what the grammar of the words may be. A similar kind of fully automatic alternation is found in English when an expected "s" is pronounced /z/ after /g/: we do not have to know the grammar to pronounced "legs" as /legz/, for the rules of our language automatically keep us from saying /legs/. Such rules work for nonsense words as well as real words: the pseudo-word "blegs" can only be pronounced /blegz/.

Notice that the morphophonemic rules apply only if the two syllables are run together, with no pause intervening. In general, that is true for most of our rules for alternations that occur at the point of contact between Korean morphemes or words. Thus, **l + n → /ll/** in **ku tul ney** /kutulley/ 'they', **tal nala** /tallala/ 'the moon (as a place)', **saynghwal-nan** /saynghwallan/ 'the hardships of life', **tūl-nol.i** /tūlloli/ 'picnic', and other expressions where pause virtually never intervenes. In certain other expressions, pause is infrequent: **kaul nal** /kaullal/ 'autumn day/weather', **onul nal** /onullal/ 'today' − compare **onul nal(-ssi)** /onul⎮nal(ssi)/ 'today the weather ··· '. The expression **cal nol.a** 'plays nicely' (adverb + verb) is usually pronounced without pause /callola/. Pause is infrequent between short unmarked object and verb, so that **atul nah.ko ttal nah.ko** 'giving birth to sons and daughters = (lived) happily ever after' is usually said /atullakho⎮ttallakho/. With a marked object, there are common versions with or without pause: **al ul nāynta** 'lays eggs' may be heard as /alullāynta/ or as /alul⎮nāynta/. Since the accusative particle ends in **l** and the verb **nāy-** 'puts out, ... ' takes many different nouns as object, that verb is frequently heard in the alternant shape **lāy-**. There are also cases of unmarked subject + verb that are such common expressions they are usually said without an intervening pause, e.g. **pul nanta** /pullanta/ 'a fire breaks out' (= **pul i nanta**). **Kyel nanta** and **kol nanta**, both meaning 'gets angry' (from 'temper appears'), are usually pronounced /···**ll**···/ as are their synonyms **kyel nāynta** and **kol nāynta** ('displays temper'). If a pause is inserted, it would be more natural to attach the appropriate particle to mark the subject or object: **kyel i ⎮ nanta**, **kyel ul ⎮ nāynta**. In expressions of modifier + nominal, an intervening pause is usually unnatural in relaxed speech, so that **tte-nal nal** 'the day to leave' is usually pronounced /ttenallal/. We can know the

appropriate spelling for the expressions **-ul nalum ita** 'it depends on' and **-ul nawi (ka) ēps.ta** 'there is not enough to; there is hardly a need to' only from etymology or reading pronunciations, for they are usually pronounced with /···ll···/. To be sure, by inserting a somewhat artificial pause the Korean speaker can distinguish an otherwise homophonous phrase like **salq kos** 'places to buy (them)' from **sal kkoch** 'flowers to buy', both /salkkot/ in normal speech, and **mōs kanta** 'can't go' from **mōs kkanta** 'can't peel', both /mōkkanta/ in normal speech.

The only cases of fully automatic (phonemically determined) alternation other than those from the table of permitted clusters are (in part) the alternations of l and n (§4.4) when after pause, and of **yey** (§4.3) when not after pause. Other alternations are widely but not fully automatic, because you have to be aware of at least some grammar to decide whether they apply. In the following sections six kinds of alternations are described:

(1) Treatment of syllable excess, §4.2.
(2) Treatment of **yey**, §4.3.
(3) Treatment of l and n, §4.4.
(4) Occurrence of reinforcement (-q) with the prospective modifier -ul, §1.5, §9.3.
(5) Occurrence of reinforcement (-q) with consonant stems that end in sonants (m, n, or an l that is reduced from basic lp, lph, lm, lth, lk), §8.1.1.
(6) Various alternations of "two-shape" elements, §5.1.

4.2. Syllable excess.

There is a limited group of "overstuffed" morphemes, each of which has a basic form that ends in a consonant that can occur only at the beginning of a Korean syllable or in a string of consonants that can occur only if divided between two syllables, part at the end of one syllable and part beginning the next. The "overstuffing" or SYLLABLE EXCESS is heard only before certain vowels. Before pause or a consonant − and in certain constructions also before a vowel − the excess is replaced by those corresponding consonants which are permitted at the end of a syllable. Before certain consonants the excess replacement then undergoes further replacements, those that are phonemically determined for the consonant (§2.6). For example, **kaps** 'price' is reduced to the shape **kap** before pause or in phrases like **kap to** 'the price too'; the final **p** of this shape **kap** is then subject to the automatic alternations of any final **p**, so we hear /kamman/ for **kaps man** 'just the price'.

Before a vowel which (1) begins a particle, such as the nominative marker i or the accusative **ul**, (2) begins the copula **i-**, or (3) begins an inflectional ending, such as the infinitive **-e** or the adversative **-una**, the full basic form is heard with its syllable excess intact: **kaps ul** 'the price [as object]', **kaps i** 'the price [as subject]', **kaps ita** 'it's the price'. (The phonemic shapes are actually /kapssul/ and /kapssi(···)/, because of the automatic rule under which an orthographic ps is not distinguished in pronunciation from pss, as we earlier observed.)

Before a vowel which does not begin an inflectional ending, the copula, or a particle, the usual treatment reduces the excess: **kaps olumyen** 'when the price rises' is pronounced /kapolumyen/ and **kaps ālki elyewe** 'it's hard to find out the price' is pronounced /kapālkielyewe/. There are exceptions in a few compounds (**yetelp hay** 'eight years' is /yetelphay/), in derived verb forms (**olk.hi-** 'get roped' /olkhi-/), and in iterated noun + the adverb-deriving suffix -i (**moks.moks-i** 'in portions, in shares' is /mongmokssi/). In a few combinations both treatments occur: /masisse/ or /matisse/ for **mas iss.e** 'is tasty' but the former is better regarded as **mas i 'ss.e**, a reduction of **mas i iss.e**, as we had occasion to remark earlier. According to one study (Kim Hyenglyong 1985) in modern written Korean there are 1,757 different orthographic syllables that carry a "final" component (**pat.chim**), and 1,384 (= .787) of these carry codas that are allowed at the end of a PHONETIC syllable: p t k m n ng l. The remaining 373 (= .213) represent morphemes with syllable excess.

The following list of morph-final strings includes all the occurring types of syllable excess. Some of the types occur with both nouns and verb stems; others only with one or the other. There are also

stems ending in **h, lh, nh,** and **w,** for which see §§8.2.2-3. Historically, there are nouns that once ended in **h, lh, nh,** and **mh,** but they have dropped the final h in modern Korean. The etyma have left morphophonemic relics in the case of **salh** 'flesh', **anh** 'inside', **amh** 'female', and **swuh** 'male', but the words in which a reflex of the h appears are now spelled (with respect to this feature) phonemically: **salkhoki = salh-koki** 'red meat', **anphakk = anh-pakk** 'inside and outside', **swukhay = swuh kăy** 'male dog', **amkhay = amh kăy** 'female dog'. (See below for more on this. A list of the MK *-h* nouns is at the end of this section.) There are also relics of excess at the beginning of certain syllables: **pssi = ssi** 'seed' in **pyepssi = pye-pssi** 'rice seed', **pssal = ssal** 'grain' in **ïpssal = ï-pssal** 'raw rice', **pttu- = ttu-** 'open (one's eyes / ears)' in **chiptte = chi-ptte** 'looking with raised eyes', ... For the inflectional stems ending in *-l-*, which show different behavior from other elements ending in l, see §8.1.4. There are a few archaic examples of excess **mk** in nouns: **namk = namu** 'tree' (CF modern **namak-sin** 'wooden shoes'), **kwumk = kwumeng** 'hole'. These go back to MK nouns that had two allomorphs which developed from $*-m^{u}ok$; there were similar types from $*-n^{u}ok$, $*-s^{u}ok$, $*-l^{u}ok$, and $*-l^{u}ol$. Those nouns are listed in §8.3.1, where we see how the verb stems of this type developed into the peculiar alternation found in the modern -LL- verbs. For all of the nouns with more than one shape, including those with syllable excess, the free shape that occurs before pause is also used before certain particles, such as the MK genitive *s*.

The first column of the list shows the morph-final ending, the second column shows the phoneme to which the excess is reduced; the third column gives a noun example, and the fourth a verb example. The notes immediately follow the list.

<div align="center">LIST OF MORPH-FINAL STRINGS</div>

p		cip 'house'	cap- 'catch'
t[1]		năt 'grain'	tat- 'close'
k		mok 'throat'	mek- 'eat'
l		mal 'horse'	tul- 'listen'[2]
m		kăm 'persimmon'	kăm- 'shampoo'
n		an 'inside'	sin- 'wear on feet'
ng		khong 'soy bean'	–
th[3]	t	path 'field'	math- 'take charge of'
s	t	os 'clothes'	pes- 'take off, doff'
ss	t	–	iss- 'exist, stay'
c[4]	t	nac 'daytime'	chac- 'look for'
ch[4]	t	kkoch 'flower'	coch- 'follow'
ph	p	aph 'front'	ciph- 'lean on'
ps	p	kaps 'price'	ĕps- 'not exist'
kh	k	puekh 'kitchen'	–
kk	k	pakk 'outside'	kkakk- 'cut, mow'
ks	k	moks 'share'	–
ls	l	tols 'cycle; postnatal year of age'	–
lth	l	–	halth- 'lick, taste'
lk	k, (l)	talk 'chicken'	ilk- 'read'
lm	m, (l)	[sălm 'life']	kwŭlm- 'go without food'
lp	p, (l)	(yetelp 'eight')	pălp- 'tread on'
lph	p, (l)	–	ulph- 'intone, chant'
nc	n	–	anc- 'sit down'

[1] Many speakers treat the few nouns ending in a basic t as if they ended with an s. Even **tikut** 'the letter T' is pronounced with final s by most speakers when it is followed by, say, the nominative marker i. But the Hankul spelling writes final t for this and for a few other nouns. Choice of final s

instead of t for the basic form of certain words, such as **ches** ⋯ 'first', would seem to be arbitrary, or based on the notion "when in doubt treat final /t/ as if from s". The only basis for writing the adverb **mŏs** 'not possibly' with a final s rather than the t used in older spellings is the word **calmos** 'mistake', derived from **cal mŏs hanta** 'cannot do it well' /cal(l)mŏthanta/, which is treated as having a final s (**calmos ul hanta** 'makes a mistake').

² But the consonant-stem **tut-** / **tul-** 'hear' is never pronounced with the syllable-final ⋯l, in contrast with the l-extending vowel stem **tu-l-**, which has the syllable-final allophone before a consonant, as in **tulko** 'entering' (compare **tut.ko** 'hearing'). The infinitive **tul.e** is said as **tu-le**, with the flap allophone, whether it means 'hear' or 'enter'. SEE §8.3.2.

³ In Seoul **th + i**, or **t + hi**, is regularly replaced by /chi/: **path ita** is pronounced /pachita/ 'it's a field' though **path ey** is /pathey/ 'in the field', and the passive forms **ket-hi-, tat-hi-, mut-hi-, ppet-hi-** are usually pronounced with /⋯chi-/. Notice that a morpheme boundary is always involved; there are no cases of /thi/ within a morpheme. In a similar fashion, **t + i** is replaced by /ci/: /kwuci/ for **kwut.i** 'firmly' (but **kwut.e** 'is firm' is pronounced /kwute/); /ttampaci/ for **ttam pat.i** 'sweatshirt' (but **ttam ul pat.e** 'receives sweat'), /haytoci/ for **hay tot.i** 'sunrise' (but **hay ka tot.a** 'the sun rises'), /mītaci/ for **mī-tat.i** 'sliding door' (but **mīlko tat.e** 'pushes and closes').

⁴ Many southern speakers treat noun-final **c, ch,** and **th** as if s: /nasey/ instead of /nacey/ for **nac ey** 'in the daytime', /kkosi/ instead of /kkochi/ for **kkoch i** 'the flower [as subject]', /pasi/ instead of /pachi/ for **path i** 'the field [as subject]' − and the pronunciation /pathi/ is heard in the north.

The reduction of the excess is as follows. A string of more than one consonant simplifies to one, by dropping all consonants in excess of the first, with the exception of certain cases involving the liquid and an obstruent. The strings **ls** and **lth** act like most clusters, dropping all but the l. The string **lp** also acts this way for the one noun example: **yetelp** reduces to /yetel/. Noun-final **lk**, however, reduces to k, so that **talk** becomes /tak/. For verb stems the strings **lk, lm, lp,** and **lph** are given both treatments as competing variants. The standard variant seems to treat the liquid as excess, so that **ilk-, kwūlm-, pālp-,** and **ulph-** are reduced to **ik-, kwūm-, pāp-,** and **up-** before adding an ending that begins with a consonant, such as **-ta** or **-sup.nita**. But some people retain the liquid, so that the reduction is to **il-, kwul-, pāl-,** and **ul-**. Those who use the compound adjective **yělp-pulk-** 'be light red' seem to pronounce it /yělpulk-/. Stem-final **lk** is most commonly treated in the standard way (with the l dropping) except when attached to endings that begin with k, where the other treatment seems more common: **ilk.ko** and **ilk.ki** are pronounced /ilkko/ and /ilkki/ rather than the /ikko/ and /ikki/ that (automatically compressed from **ik-kko** and **ik-kki**) we would expect as consistent with /ikcci/ ← **ilk-ci** and /ingnun/ (← **ik-nun**) ← **ilk-nun**. The proper analysis of these forms is **il-** + /kko/ (etc.), the reinforced (-q) allomorph of **-ko**, rather than **ilk-** + **-ko**, since endings regularly reinforce after a liquid reduced from a cluster. Compare the unexpected treatment of **salk** 'leopard cat' + **kwāyngi** 'cat' → **salk kwāyngi** /salkkwāyngi/ 'leopard cat' where we expect /sakkwāyngi/ as consistent with **talk koki** /takkoki/ 'chicken meat'. In overprecise speech, a theoretically dropped liquid sometimes reappears, giving anomalous syllable-final clusters, as in /talktto/ for /taktto/ = **talk to** 'chicken too'. That is somewhat similar to the retention, or reimposition from spelling, of /l/ by certain English speakers in words such as "palm" and "calm".

After dropping any excess, if what remains is not a permissible syllable-final consonant (**p t k l m n ng**), as with **s ss c ch**, or if it is an l which is the last phoneme of a consonant stem (§8.1.4), but not an l reduced from a cluster, that remaining consonant is treated as the phoneme /t/ with whatever reflex would be appropriate to t. (But historically the l of the -T/L- stems is a lenited form of *t*.)

Below is a fairly complete list of examples for each extrasyllabic final. But instead of s, for which there are a large number of examples (as there are for **p k m n ng l**), those examples ending in a basic t are listed, since their number is much smaller. In each list, all the nouns are grouped at the end.

EXAMPLES OF EXTRASYLLABIC EXCESS

t
        et- < ¨et- 'obtain', it- 'be good', ket- < ket- 'fold up', kot- < kwot- 'be straight', kwut- < kwut- 'be hard, firm', mit- < mit- 'trust, believe in', mot- [obsolete] < mwot- 'gather up', mut- < mwut- 'bury', mut- < mwut- 'stain, color', nat- / nath- [obsolete] < nat- / nath- = nathana- < na˙tha ˚na- 'appear', pat- < pat- 'receive', pet- < pet- 'stretch out (like a road)', ppet- 'extend, stretch out (an arm or a leg)', ssot- < ˙swot- 'pour out', tat- < tat- 'close', tit- (a truncation of titi- < tu˙tuy-) 'tread, step on', tot- < twot- 'sprout, bloom; (sun / moon) rise', ttut- < ˙ptut- 'bite, snatch, graze';
        kot < ˙kwot 'immediate, direct; to wit', ˙kwot > kwos 'place', mat < mot 'senior, eldest', nāt < ¨nat 'grain', ¨pet > pēs 'friend', ˙tet > tes 'a while'.

th
        cith- < tith- 'be saturated, (liquid) thick, (color) dark', ˙heth- 'get disarrayed / scattered', huth- < ˙huth- 'get dispersed, scatter out', kath- < ˙koth- < ˙kot ˚ho- 'be like; be together', kith- 'remain', math-1 < math- 'smell, sniff (it)', math-2 < mast- 'take charge of', nath- / nat- [obsolete] < nath- / nat- = nathana- < na˙tha ˚na- 'appear', path- < path-1 'sift, drain; (liquid) dry up', payth- < path-2 'spit out', puluth- (truncation of puluthu- < pulu˙thu-) 'get swollen', puth- < puth- ˙'stick, be attached', yath- / yeth- < yath-/yeth- < nyeth- 'be shallow';
        hoth < hwoth 'single', keth < kech 'surface, shell', khongphath < khwong˙phoch 'kidney', koputh (= koputhangi) 'outside fold of a bolt of cloth', kkuth < (~ s) ˙kuth 'end' (but kkuthu in kkuthu-meli 'butt-end'), kyeth < kyeth 'side', melimath < (me˙li math) 'head (of bed or grave)', mith < mith 'bottom, underside', muth < mwuth 'land, shore', nāth < ¨nath 'piece, unit', pakkath < pas[k] kyeth 'outside', path < path 'dry field, garden', phath < ˙phoch 'a kind of red bean', pyeth < pyeth '(sun)light', sath < sath 'crotch', soth < swoth 'pot', swuth < (?*)swusk (CF Kim Thaykyun 323b) 'quantity, bulk (as of hair)', toth [obsolete] < twoth 'boar'.

ss
        iss- < is(i)- 'exist, stay', -(ᵉ⁄ₐ)ss- (past) < -ᵉ⁄ₐ is(i)-, -keyss- (future) ? < -˙ke ˙ys(i)˙ta. There is also ssāyss- 'be plentiful', contracted from ssah.ye iss- 'be piled up', which lacks the expected modifier form (*ssāss.un), replacing it with ssāyn, contracted from ssah.in. The modifier form of iss- is relatively uncommon but it occurs: see the entry iss.un in Part II.

c
        aykkwuc- ? < *¨ay s kwuc- 'be undeservedly misfortunate', cac- '(wind) ease up, calm down', cac- < coc- 'be frequent, incessant', cac- / cec- 'lean back', cec- < cec- 'get wet', cic- < cuc- '(dog) bark, bay', ccic- < ˙pcuc- 'tear it', ccoc- 'twist (a pigtail)', cīs-kwuc- 'be annoying', chac- < choc- 'look for, find', ic- < nic- 'forget', ic- 'wane; get chipped', kac- < ˙koc- 'be prepared' (rare except in the causative kac.chwu- < ko˙chwo- = koc-˙hwo- 'make ready'), kac- (a truncation of kaci- < ka˙ci-) 'possess', kkoc- < kwoc- 'insert', kkwucic- < kwu˙cic- / kwu˙cit- 'scold (a child)', kwuc- 'be bad, vile; (weather) be threatening', (nwun i) kwuc- 'go blind', mac- < mac- 'be suitable, appropriate', mac- < mac- 'meet; face', mayc- < moyc- 'bind, tie', mec- [dialect?] < mec- = memchwu- < me˙chwu- = memul(u)- (< me˙mul-) 'stop', mec- 'be bad', nac- < nac- 'be low', nuc- < nuc- 'be late', peluc- 'scatter, dig out', pic- < pic- 'brew, ferment, make', putic- 'bump into', pulu-cic- 'cry out, shout', seluc- < selec- 'discard' (obsolete), selkec- < selGec- (obsolete) = selkeci ha- 'do dishes', tac- (truncation of taci- ? < [dialect] tati-) 'harden by stamping, press, mince';
        cec < ˙cyec 'milk', coc 'penis', i˙su˙lac '(wild) cherry' > isulach = isulac(h)i [dialect], kac' (truncation of kacwuk < kach, used as adnoun) 'leather', kalac (truncation of kalaci < kalati ?1834˙) 'foxtail (plant)' (= kangaci phul), kic 'coat collar; portion', kwoc1 (> kkoc.i) 'skewer', koc < kwoc2 'cape, promontory' (postnoun), koc' (truncation of kocang 'place', CF kos < ˙kwot 'place'), mec 'cherry', nac < ˙nac 'daytime', nuc 'late' (adnoun), nuc [obsolete] > nuch 'sign, portent, omen', ōn-kac' < ˙won-˙kas (truncation of ōn kaci < ˙won ka˙ci 'all kinds'), pām-nuc (= pām-nucengi) 'chestnut blossoms', pec (= pecci) 'cherry', pic < pit 'debt', pon koc' (truncation of pon kocang) 'native place' (= pon kos <

pwon kwot).

ch   **coch-** < *cwoch-* 'follow', **ccoch-** < *pcwoch-* 'pursue', *kech* = **kecwuk** 'surface, exterior', *kich-* (? truncation) = *kichi-* 'cough', *ich-* 'get tired', **mich-** < *mich-* (? truncation of **michi-**) 'attain, reach', **nwiwuch-** < ˝*nwuyGuch-* (truncation of **nwiwuchi-** < ˝*nwuyGuchi-*) 'regret', **sich-** (truncation of **sichi-**) 'sew a quilt', **ssich-** [dialect] = **ssis-** 'wash' < *sis-*, **takuch-** (truncation of **takuchi-**) 'bring nearer';

      ʾ*ach* 'reason', ʾ*cich* > **kis** 'feather(s)', **isulach** = **isulac(h)i** (dialect) < *iˑsuˑlac* '(wild) cherry', **kach** < *kach* 'skin, hide', **kkoch** < *(~ s) kwoc* 'flower', **meych (myech)** < ʾ*myech* 'how much / many', **mich** [literary] 'and', **nach** < *noch* 'face', **nuch** < *nuc* [obsolete] 'sign, portent, omen', **pich₁** < *pyeth* 'sunshine', **pich₂** < ʾ*pich* 'color; sign, mark; scene(ry)', ʾ*such* 'time interval, while', **swuch** < *swusk* 'charcoal', **tach (tech)** 'anchor', **tech** (dialect **tek**) 'snare; small drum' < **tesk*, **toch** < *twosk* 'sail', **yuch** ?< **nywusk* 'Four Sticks (a Korean game)'. NOTE: The noun **och** 'sumac, lacquer' was attested as *woch* in 1608 Thaysan 53a (*wo.ch ol*) but earlier it appeared as *wos* in 1463 Pep 1:219a (*woˑs iˑla*).

ph   **ciph-** < *tiph-* 'lean (hands) on, feel (pulse)', **eph-** < *eph-* 'overthrow' (rare except in compounds and **twicipe eph-** 'turn inside out or upside down'), *iph-* = *ulph-* > **ulph-** 'chant', **kaph-** < *kaph-* 'reward, repay', **kiph-** < *kiph-* 'be deep', **noph-** < *nwoph-* 'be high', **siph-** < *sikpu-* 'be inclined toward, be desirous', **teph-** < *teph-* 'cover with, use as a cover', **tunoph-** 'be lofty', **thoph-** 'search everywhere for; soften and spread hemp tufts (to make rope)', ? **puph-** (= **puphu-l-**) in **puph-tāy-** and **puph-tā-l-** (but the aspiration could not be realized here, so this seems to be a purely orthographic or historical example).

      aph < *a(l)ph* 'front' (and compounds such as **ocil-aph** 'front of an outer garment'), **ciph** < ʾ*tiph* 'straw', **hēngkeph** < *hengˑkes* < ˝*hen* (< **heˑ[l-o]n*) *kes* 'piece of cloth' [···**ph** unexplained], **iph** < ʾ*niph·*'leaf', ʾ*iph* 'gate', **keseph** 'a levee reinforcement; a weed potcover; vegetables for **pipimq pap**', **muluph** < *mwulwuph* 'knee', **nuph** (dialect **nwuph**) 'marsh, swamp', ʾ*pwuph* > **puk** 'drum', **seph** < *syeph* 'kindling, firewood; gusset; prop', **swuph** < ʾ*swuph* 'forest', **yeph** (/ ~ **nyekh**) < *nyeph / nyekh* 'side, flank'.

ps   **ēps-** < ˝*eps-* (?< **e-ʾp[i]s[i]-* or **eʾpV is[i]-*) 'be nonexistent' and certain stems derived from it: **kā.yeps-** 'be pitiful', **mayk-ēps-** 'be despondent', **sil-ēps-** 'be frivolous, unsubstantial', **silum-ēps-** 'be absentminded, vacant', **sokcel-ēps-** 'be futile, hopeless', **yel-ēps-** 'be timid, cowardly';

      kaps < ʾ*kaps* 'price'.

kh   – ;

      puekh < *puzek / puzep* ?< *ʾpu[l] s(y)ep[h]* 'kitchen', ··· **nyekh** 'direction' (see **yeph**).

kk < *sk   **kkakk-** < *kosk-* 'cut, shave, pare', **kkekk-** < *kesk-* 'break off', **kyekk-** < *kyesk-* 'experience, undergo', **mukk-** < *mwusk-* (?< **mwu[l] sk~*) make into a bundle', **nakk-** 'fish' from **naks-** < *naksk-* (CF **naks-i** spelled **nakk-si** 'fishing'; SEE **-si** in Part II), **pokk-** < *pwosk-* 'roast', **sekk-** < *sesk-* 'mix it', **sokk-** (dialect **sokkwu-**) < *swosˑkwo-* (?= *swos-ˑkwo-* 'raise') 'weed out', **takk-** < *task-* 'polish', **tekk-** 'get dirty / rusty', **yekk-** < *yesk-* 'knit, weave';

      pakk < *pask* 'outside'; *pusk* (?< **pu[l] sk~*) 'moxacautery', *swusk* > **swuch** 'charcoal', *twosk* > **toch** 'sail', *twosk* > **tos(-cali)** 'mat'.

ks   – ;

      moks < *mwok* 'portion' (···**s** unexplained; blended with *mwus* 'bundle' < *mwusk-*?), **neks** < *neks* 'spirit', **saks** < *saks₁* 'charge, fare', *saks₂* > **ssak** 'sprout', **seks** 'surge of emotion (especially anger); a mooring', ʾ*syeks* 'reins', **ches-paks** [dialect] 'first', **mayks** [dialect] = **mayk** 'pulse'; ʾ*naks* 'fish hook' (> **nakk.si**).

h   (For MK ···*h* nouns, see p. 109.) ? **ccah-** [dialect] = **cca-** < *pco-* 'weave', **ccih-** < *tih-* 'pound, ram', *ceh-* 'fear' – also (1465 Wen 1:2:3:40a) *cyeh-*, *cih-* 'affix', **cŏh-** < ˝*tywoh-* 'be good / liked', ʾ*cwoh-* 'be clean', **eh-** < *[p]eh-* 'get cut' (mistakenly treated as "*eth-*" in

LCT 558a, the correct analysis is LCT 1971:22) − CF *e ˙hi-* < *[p]e ˙hi-* 'cut it', **nah-** < *nah-* 'be born', **neh-** < *nyeh-* 'put in', **noh-** < *nwoh-* 'put', *peh-* 'get cut', *pih-* 'sprinkle, sow' (? < *˙pi* 'rain' + *˚ho-* 'do'), **ppāh-** 'grind', **ssah-** < *(s)sah-* 'pile / heap up, build', *spih- / spyeh-* = *pih-*, **tah-** < *tah-₁* 'touch; arrive', **ttah-** < *tah-₂* 'braid'. (SEE §8.2.2.)

mh	(For MK *--mh* nouns, see p. 109.)
nh	(For MK *--nh* nouns, see p. 109.) **anh-** (< *a˙ni ho-*) 'not do/be' (negative auxiliary) and compounds that contain it, **hunh-** < **hun ha-** < *hun ˚ho-* 'be common, plentiful, easily had, cheap', **kkonh-** 'mark, grade, rate', **kkunh-** 'break / cut off; stop', **mānh-** < *˝manh-* < *˝man ˚ho-* 'be much / many'. (SEE §8.2.2.)
lh	(For MK *--lh* nouns, see below.) **alh-** < *alh-* 'ail', *halh-* > **halth-** 'lick, taste', **helh-** = **hel ha-** < *˙hel ˚ho-* 'be easy, undemanding', **ilh-** < *ilh-* 'lose', **kolh-** < *kwolh-* 'be unfilled, half-empty', **kolh-** < *kwolh-* 'rot', **kkulh-** < *kulh-* 'boil', **kkwulh-** 'bend knees (to kneel)', **olh-** < *˙wolh-* 'be right', **silh-** < *˙sulh-* 'be disliked', **ssulh-** < *sulh-* 'polish (grain)', **talh-** 'wear away; boil dry', **ttwulh-** < *˝tulw-(/ tolw-)* 'pierce'. (SEE §8.2.2.)
ls	− ;
	kols '(water-)course, (fixed) direction', *˝kwols* > **kol(ay)** 'hypocaust flue', **ols** 'compensation, reparation', **tols** < *twols* 'cycle, postnatal year of age'.
lth	**halth-** < *halh-* 'lick, taste', **hwulth-** 'tear off something stuck to the surface, rinse out something stuck inside a bowl; thresh';
	− .
lk	**elk-** < *elk-* 'wrap, tie up, fasten', **kalk-** < *kolk-* 'scratch with a sharp point', **kulk-** < *kulk-* 'scratch', **kwulk-** < *kwulk-* 'be burly', **malk-** < *molk-* 'be clear', **mulk-** < *mulk-* 'be thin, watery', **nalk-** < *nolk-* '(thing) be old', **nulk-** < *nulk-* '(person) get/be old', **olk-** 'trap, ensnare', **palk-** < *polk-* 'dawn; get/be bright', **(p)pulk-** < *pulk-* 'be red';
	chilk < *˙chulk* 'arrowroot; striped', **holk** (variant of **hol**) 'a growth', **hulk** < *holk* 'earth, soil', **katalk** (= **katak**) 'strip, piece, strand', **kkatalk** 'reason', **kisulk** (= **kisulak**) 'edge, border', **selk** < *selk* [obsolete] = **selki** 'wicker trunk', **salk** < *solk* 'leopard cat', **siwulk** (variant **siwul**) < *si˙Gwulk* 'edge' [old-fashioned] (= **kacang-cali**), **talk** < *tolk* 'chicken'. [1]Yi Yuncay also gives the pre-separable intransitive verbal noun inseparable **wulk** (**ha-** 'get rash / hasty') but I am unable to find evidence that the l is ever pronounced; the spelling may be historical or based on an association, morphemic or dialectal, with the stem **olk-** or with the stem **pulk-**. ([1]Yi Yuncay was mistaken in labeling the word adjectival.)

IG / lᵁ⁄o < **lᵁ⁄ok* SEE §3.3.1.

ll / lᵁ⁄ol < **lᵁ⁄ol* SEE §3.3.1.

lm	**cēlm-** < *cyelm-* (1775) < *˝cyem-* 'be young', **cilm-** 'bundle up to carry, pack on back', *˝kalm-* 'store/hide it', **kōlm-** < *[˝]kwolm-* 'fester', **kwūlm-** < *[˝]kwulm-* 'go without food', **pālm-** 'measure off by the arms; guess', **sālm-** < *˝solm-* 'boil', **tālm-** 'resemble' < *˝talm-* 'spread (disease)', *˝telm-* 'get dirty / dyed', **ōlm-** < *˝wolm-* 'move' (= **olm.ki-**) and 'be infected by, catch (a disease)';
	sālm 'life', **ālm** 'knowledge', and all other regular substantives from the l-extending vowel stems (§8.2.2, §9.5)
lp	**ccalp- / ccelp-** (< *cyelp-*) < *tyalo- / tyelᵁ⁄o-* < *tyelG-* < **tyelW-* ? < **tyalop- / tyelup-* 'be short, fine', *˝kolW-* 'line up, array; compete', **nelp-** < *nelᵁ⁄o-* ? < **nelup-* 'be wide', **pālp-** < *˝polW-* 'tread on', **sēlp-** (= **sēlw-** [obsolete] = **sēlew-**) < *˝syelW-* 'be sad', **ttēlp-** < *˝ptelW-* 'be astringent', **yalp- / yelp-** < *˝yelW-* 'be thin, faint, light';
	˙kolp 'layer; time', *˙salp* > **sap** 'shovel', **yetelp** (dialect **yatul, yatap, yatak**) < *ye˙tulp / ye˙tolp* (< **yotolp*) 'eight' (see below).
lph	**ulph-** < *ulph- / iph-* 'chant'; **aytalph-** < *˝ay ˙tolp-* 'feel pity', **kotalph-** [lit.] = **kotalphu-** 'be tired' (< *kwo˙tol˙ph-a* 'with great effort');
	− , **alph** = *aph* > **aph** 'front'.
nc	**anc-** < *a(n)c-* 'sit down', **enc-** < *enc-* < *yenc-* 'place, put up/on', **kki-enc-** 'shower

oneself';

— .

nk / nu < *nuk SEE §8.3.1.
mk / mo < *mok SEE §8.3.1.
mk / mwo < *mwok SEE §8.3.1.
mk / mwu < *mwuk SEE §8.3.1.
zG / z^uo < **s^uok* SEE §8.3.1.

Not included in the list are the names for letters of the Korean alphabet. These are rather artificial concoctions, usually pronounced according to a common variant: **tikut / tikus** 'the letter T', **thiuth / thius** 'the letter TH', **chiuch / chius** 'the letter CH', **phiuph / phiup** 'the letter PH', **khiukh / khiuk** 'the letter KH'. There is also **hiuh**, the only known case of noun-final **h** in the standard orthography. The **h** is treated as /t/ before pause or consonant, and should be either /h/ or dropped before the copula or a particle beginning with a vowel, but in fact this word nearly always gets the variant treatment represented by the basic shape **hius**. The bound preparticle **pa.yah** (§5.2.9) is written together with its particle **ulo** as an unanalyzed word: **pa-ya-hu-lo**. The verb stems with final ···**lph**- carry a literary flavor; they seem to be truncated from vowel stems ending in ···**lphu**-, as shown by the third example.

An example of ···**nth** is found in Khun sacen, which lists **panth** as a variant of **pān** 'half'. I am told that /**panthun**/ is South Cenla dialect for **pān un** 'as for half'. [1]Yi Yuncay lists **panth** as Kyengsang dialect. The **th** is etymologically unexpected and its origin is unknown (? < **hatun**).

When followed by a vowel that is NOT the beginning of an ending, a particle, or the copula, syllable excess is reduced just as before a consonant, so that the common noun-final ···**s** is pronounced **t** and articulated as the onset of the vowel-initial syllable to which it is attached. Examples:

s → t: **os an** 'inside the garment' /**otan**/, **kulus an** 'in the plate' /**kulutan**/, **ches atul** 'first son' /**chetatul**/, **ches insang** 'first impression' /**chetinsang**/, **ches umcel** 'first syllable' /**chetumcel**/, **kis os** 'a kind of mourning robe' /**kitot**/, **has os** 'padded garment' /**hatot**/, **wus os** 'outer garment' /**wutot**/, **wus akwi** 'crotch between thumb and index finger' /**wutakwi**/, **ūypus atul** (emi, epi) 'step-son (-mother, -father)' /**ūputatul**/ (/**ūputemi**/, /**ūputepi**/), **yēys wang** 'ancient kings' /**yēytwang**/, **swus ūmsik** 'fresh food' /**swutūmsik**/, **hes wus.um** 'empty smile' /**hetwusum**/, **pelus ēps-** 'lacks manners' /**pelutēpss-**/, ...

c → t: **cec emeni** 'wet-nurse' /**cetemeni**/, ... Compare **cec hyeng** 'older nursemate ("milk-brother")' /**cethyeng**/.

ch → t: **kkoch ahop songi** 'nine flowers' /**kkota(h)opssongi**/, **kkoch alay** 'under the flower' /**kkotalay**/, **hayq-pich ani 'myen** 'unless it is sunshine' /**hayppitanimyen**/, **och olu-** 'get lacquer-poisoned' /**otolu-**/.

t: **mat atul** 'eldest son' (but **mat ita** 'is the eldest' Seoul /**macita**/), ... Compare **mat hyeng** 'the eldest brother' /**mathyeng**/.

th → t: **soth an** 'in the pot' /**sotan**/, **path alay** 'below the field' /**patalay**/, **path wi** 'above the field' /**patwi**/ (compare **path twī** 'behind the field' /**pattwī**/), **hoth os** 'single-layer garment' /**hotot**/, **kkuth ani 'ta** 'it is not the end' /**kkutanita**/, **pith ēps-** 'lack color' /**pitepss-**/, **puth-an-** 'hug' /**putan-**/, **sath-sath-i** 'in every corner, exhaustively' /**sassachi**/.

ps → p: **kaps echi** 'worth' /**kapechi**/, **kaps ēps-** 'lack value' /**kapepss-**/ (compare **kaps ci-** 'be of value' /**kapcci-**/).

ph → p: **aph.aph-i** 'in front of each' /**apaphi**/, **iph wi** 'on the leaf' /**ip(w)i**/ (CF §2.7.4), **muluph wi** /**mulup(w)i**/ 'on the knee'. Compare **noph-tala(h)-** 'be sort of tall' /**nopttala(h)-**/.

kh → k: **puekh an** 'in the kitchen' /**puekan**/.

ks → k: **neks ēps.i** 'absentmindedly' /**nekepssi**/.

ls → l: **tols an ey** 'within the first year of life' /**tolaney**/.

The following cases involve reinforcement (-q, CF §1.5.): **alayq i** 'lower teeth' /**alaynni**/, **aphq**

ima 'forehead' /amnima/, cipq īmca 'householder' /cimnīmca/, hothq ipul 'single quilt' /honnipul/, kyepq ipul 'double quilt' /kyemnipul/, pamq isul 'evening dew' /pamnisul/, sōkq iph 'the inside leaf' /songnip/, ttekq iph 'seedleaf' /ttengnip/, wiq ip-swul 'upper lip' /winnipsswul/ 'upper lip'. For certain examples the reinforcement may be optional: pathq ilang 'field ridge' /pannilang/ is also reported as path ilang /patilang/. The orthographically identical path ilang 'field and the like' with the colloquial particle ilang / lang is pronounced /pachilang/, and many speakers say /pasilang/.

In a few expressions, contrary to what we expect, the syllable excess persists, as in yetelp hay 'eight years' /yetelphay/ where we would expect (?*)yetel(h)ay. The word for 'eight' has been restructured as yetel(q) for most speakers, who say yetel ita and not yetelp ita for 'they are ten'. In causatives and passives, the derived stems preserve as much of the excess as can be pronounced: palp-hi- 'get trodden on' /palphi-/ is the passive of pālp- 'tread on', but kolm-ki- 'has it fester', the causative of kolm- 'fester', must be reduced to /komki-/. And most derivatives are like compounds and reduce the excess: noph-talah- 'be sort of tall' /nopttala(h)-/, nelp-tala(h)- /nelttala(h)-/ 'be sort of wide', kwulk-tala(h)- 'be sort of burly' /kwukttala(h)-/ or /kwulttala(h)-/.

[1]Yi Ungpayk 454 calls our attention to the rule by which compounds are spelled phonemically rather than morphophonemically if the last consonant of a double-consonant pat.chim is not pronounced:

kolmak / kwulmek ha- 'be almost full' from kolh- / kwulh- 'be not yet full' (but notice kwūlm- 'go without food, starve');

kolpyeng 'deep-seated disease; fatal blow' from kolh- 'rot' + pyēng 'illness';

halccak halccak 'in little licks' from halth- 'lick' + -cak (diminutive suffix < cāk- 'little');

silccwuk / saylccwuk ha- 'be sullen' from silh- + suffix -cwuk;

malsswuk / melsswuk ha- 'be neat' from malk- 'clear' + suffix -swuk;

malccang / melcceng ha- 'be intact, perfect' from malk- 'clear' + suffix -cang/-ceng;

olmu 'snare' from olk- 'bind, lay a snare' + ?; one proposed etymology has olk.a kam- > *olk.a kam-i > olkami 'snare' > *olkamu > *olk'mu > olmu. It is unclear just why silh-cung (= silhq-cung) 'ennui' is not spelled according to its pronunciation /silccung/.

Moreover, there are examples of phonemic spelling even when the syllable excess is pronounced:

yalphak ha- 'be thin-surfaced' from yalph- 'be thin' (with syllable excess retained) + suffix -ak, or (with syllable excess suppressed) + the mimetic phak 'deflated, flat; soft', probably unrelated to Chinese loanmorph pak < ˙PPAK 'thin';

silkhum ha- 'be dislikable' from silh- + suffix -kum (CF silh.ko 'disliking' /silkho/).

The structure of malkkum / melkkum ha- 'be clean' can be explained as a reduction of malk- → mal-before attaching the suffix, which then reinforces its initial, as it does in malk-ko and malk-ci when pronounced /malkko/ and /malcci/ rather than the competing version /makko/ ← mak-ko and /makcci/ ← mak-ci.

Some confusion exists over whether there are two versions of 'rather wide': /nepttala(h)-/ = nelp.talah- and /nelttala(h)-/ = nelttala(h)- (spelled nel.tala(h)- in North Korea). NKd lists both versions and suggests that the latter comes from nelu- 'be broad'; most South Korean authorities prefer the second version (nel⋯ not nep⋯) but derive it from nelp-. A similar problem: /nepccik/ and /nelccik/. The South Korean authorities seem to prefer the latter and spell it phonemically. NKd lists nelp.cik (presumably to be pronounced /nepcik/) but refers it to the entry nel.cik for which the pronunciation is explicitly stated as /nelccik/; there are entries for /nepccek/ spelled both nelp.cek and nep.cek, and similarly for /nepccwuk/.

Finally, we should keep in mind the ongoing tendency to restructure the basic forms of most nouns bearing syllable excess. Even Seoul speakers often simplify noun-final ⋯ps to just ⋯p; the pronunciation /kap/ for kaps 'price' in ūmsik kap[s] ey nun in drill 3.7 of KBC 24 is not a slip of the tape or the tongue, but a variant of what is heard as /kapss/, a more formal version, in mulken kaps ey nun in drill 3.9. In everyday speech people quite often say /kapun/ and /kapulo/ (for kaps un, kaps ulo) instead of /kapssun/ and /kapssulo/, even though they may well say /kapssi, kapssita/ for

kaps i, kaps ita. The liquid in **talk** 'chicken' is widely ignored, so that **tak i** and **tak ul** are the commonly heard nominative and accusative forms; the liquid is retained in a derivative **talkyal** 'egg'. In modern usage **moks** 'portion' and **kols** 'course, channel' are generally just **mok** and **kol**: **Ku ttang un nay mok[s] ip.nita; ney mok[s] un ...** 'That land is my share; your share ... '; **Kol[s] ul kiph.key pha la** 'Dig the channel deep!'. We can treat **puekh** 'kitchen' as an obsolescent version of the widely used **puek** (also **pĕk**); but **pakk** 'outside' persists unsimplified. The noun **muluph** 'knees' is heard either with the simplified basic form **mulup** or in a derivative **muluphak(-i)**, which preserved the syllable excess when the diminutive suffix **-ak** was added. But **aph** 'front', **yeph** 'beside', and **iph** 'leaf' (also **iphali, ipsakwi**) commonly retain the older basic shapes. Modern Seoul speech is in flux on the question of merging noun-final ···**th**, ···**ch**, and ···**c** with ···**s**. The four-stick game is generally treated as **yus** rather than the older **yuch**; **och** 'lacquer; sumac' is treated just like **os** 'garment'; and **path** is more often heard with final **s** than with the traditional **th** or (before **i**) **ch**. But both **meych** and **meys** are common for the orthographic **myech** 'how many', and only the affricate is heard in **nac ey** 'in the daytime / afternoon', though you may notice an allophone of that which is articulated as a voiced sibilant [z]. There are no good examples of noun-final ···**t**, since **nāt** of **nāt-al** 'grain' is no longer a free noun, and earlier cases of noun-final ···**t** merged with ···**s** over two centuries ago, so that ˙*mwot* 'nail' and ˙*mwos* 'pond' are now both **mos**. Despite these remarks on colloquial usage, this book follows the traditional spellings and we treat syllable excess as basic to those nouns that began simplifying it relatively late.

Earlier forms of the language had a wider array of extrasyllabic finals, including stems ending in ···*sk*- (> ···**kk**-) and ···*st*- (> ···**th**-). There were even a few nouns without vowels: see in Part II the entries *psk* 'time', *s* 'fact', *t* 'fact'. The reduction of the excess was similar to what it is today, but in the 15th century there was no need to reduce ···*s* since it was a syllable-final consonant. Stems ending in ···*(n)c*- such as *a(n)c*- 'sit' reduced to ···*s*-, as did those ending in ···*z*- (lenited from ···*s*···) and those ending in ···*sk*- and ···*st*-. The doublet *wumchu-/wumchi-* 'huddle, shrink' contracted to a reduced stem *wums*- in a few examples. The noun *poych* 'oar' must be the result of truncating an unattested phrase ˙*poy* ˙*chi* 'boat rudder'.

In the modern language final ···**h**, ···**nh**, and ···**lh** occur only for verb stems, but in Middle Korean there were nouns that had these basic codas (and also ···**mh**), which surface as the aspirating of a voiceless consonant that begins a following particle, though the /h/ was suppressed when the noun was in isolation, i.e. before pause. As mentioned above, there is evidence for some of these noun-final h's in such modern compounds as **am-khay** < **amh kāy** 'female dog' and **swu-khay** 'male dog' < **swuh kāy**. The spellings of 1898 Tayshin show final *h* for a number of nouns with the particle *i* (or incorporated -*i*) attached: *ttahi, tta* 'earth'; *patahi, pata* 'sea', *twuihyi* 'behind' (= Seoul **twī ey**); and even one case of final *h* in isolation, *narahi, narah*. (1874 Putsillo gives 'behind' as *twui, twuhe*.) All these nouns had a basic final -*h* in Middle Korean. The standard noun **nai** 'age' must have developed like the Tayshin *nahi*, by incorporating -*i* to the MK noun that had the basic shape ˙*nah* and survived in its "free" shape as **na** in modern dialects (e.g. the South Hamkyeng version used by 1936 Roth 197); CF **naq sal** 'age, years [often derogatory]' (KEd). 1894 Gale writes (48) *hon.a.hun* 'as for one' (< MK *hona˙hun*), and (148) *hon.a* (< MK *hona[h]*) with an unexpected syllable break perhaps reflecting the allomorph *hon*··· but missing in *hona.hi* (80); also (82) *pata.hi* and *pata.hul* for the nominative and accusative of 'sea' (< MK *pa˙tah*), and (64) *chol.ha.li* for **chalali** 'rather' (< MK *chol˙hali*).

Some of the stems ending in the final aspirate seem to have incorporated the pro-verb ˚*ho*- > **ha**- 'do/be', which was prone to elide its minimal vowel, leaving the **h** behind to fend for itself. Although *ilh*- is the only MK version for 'lose', 1898 Tayshin attests both *ilhata* (with palatalized [l]!) and *iltha* ("˚irta" with [r]!). ¹Yi Congchel 1983 clearly writes **mān ha**- (with the reference Chinese character MYRIAD) for **mānh**-; the basic stem in the earliest Hankul texts is sometimes ˚*man* ˚*ho*-, sometimes ˚*manh*-. The basic form of MK word for 'above' was *wuh*; the final *h* was suppressed when the noun preceded juncture (that is, when it was not followed by a closely attached particle or copula form), and it is that form which survives as the standard North Korean **wu**, while Seoul has standardized **wi** < **wu[h]** +

incorporated -i, a development more common as a northern characteristic. (1894 Gale 133 writes *mwul wu.huy* 'in the water'.) NKd lists a dialect form **wuthi**, not in the Hamkyeng dictionary nor in Choy Hak.kun (though he has "uge" = **wukey**), which may reflect the earlier **h**, but the derivation is unclear. There are two examples of ··*ngh*: *stang.h ay* (1617 Sin-Sok ¹Yel 4:64) 'on the land' seems to be a hybrid of earlier *sta῾h ay* and *stang* (id. Hyo 1:1), but *syang῾h ay* 'regularly' (1518 Sohak-cho 8:9b) is not so easily explained.

   In the following lists of MK nouns ending in ··*h* a few of the examples occur as doublets, with or without the *h* in the basic form. That means there are competing phrases without the *h* where we would expect it. (Of course, all the nouns suppress the *h* when they occur as free forms.) The two versions of the doublets are separated by a slash.

   MK nouns with final ··*mh*: ῾*amh* 'female', ῾*wumh* 'cave'.

   MK nouns with final ··*nh*: ῾*anh* 'inside'; ῾*enh* 'dike'; ῾*kinh*, ῾*skinh* 'string'; *twuy-anh* (1576 ¹Yuhap 2:28b, 1632 Twusi-cwung 6:50a) = ῾*wuy-῾anh* 'garden'.

   MK nouns with final ··*lh*: ῾*alh* 'egg' ῾*cholh* 'source' (CF ῾*stolh*); *ha῾nolh / ha῾nol* 'heaven'; ῾*kalh / ῾kal* 'knife' (῾*kal ῾lwo* 1465 Wen 3:2:2:10a = ῾*kal.h o[῾]lwo* 1462 ¹Nung 6:109b; ῾*kal ῾Gwa* 1462 ¹Nung 6:28b = ῾*kal῾khwa* 1459 Wel 9:43b); ῾*kilh* 'path'; ῾*ko(῾)nolh / ῾ko(῾)nol* 'shade'; *kowolh* 'district' (= *kowolkh, koWol*); *kozolh / kozol* 'autumn'; *kye῾zulh / kye῾zul* > *kye[z]ol(h)* winter; ῾*malh* 'stake'; ῾*milh* 'wheat'; *mozolh* 'village'; ῾*nolh*₁ 'blade'; ῾*nolh*₂ 'warp (threads)'; *nomolh* 'greens'; *polh* > *pholh* > *phol* 'arm'; *poyzolh / poyzol* (< *poy solh) 'entrails' (*poyzol ῾tol῾h ol* 1463 Pep 2:105b); ῾*ptulh / ῾ptul* 'garden' (῾*ptul ῾Gwa* Twusi 25:39a); *pyelh* 'cliff'; ῾*solh* 'flesh'; ῾*stolh* 'origin, source' (CF ῾*cholh*); ῾*sukwulh* 'rural area' (= ῾*sukwol*, ῾*sukowol*, ῾*sukoWol*); *su῾mulh* 'twenty'; ˝*syewulh / ˝syewul*, ˝*syeWul[h]* 'capital' (˝*syewul ῾lwo* 1481 Twusi 24:45b, ˝*sye῾wul ῾se / ῾two* ?1517- Pak 1:53b [accent unexplained]); ῾*tolh* 'group' (plural); ˝*twolh*₁ 'bridge'; ˝*twolh*₂ 'stone'; ˝*twulh* 'two'; *wolh* 'this year'; ῾*wulh* 'fence'; ῾*yelh* 'ten'; *yelh* 'hemp seed'.

   MK nouns with postvocalic final ··*h*: ῾*cah* 'foot'; *cwoh* 'millet'; *honah* 'one'; *kuluh* 'root'; ῾*kwoh* 'nose'; ῾*mah* 'yam'; *mah / ma* 'monsoon' (= *tyang-ma[h]*), 'south, south wind (= *mah polom > **maphalam**); ῾*moyh* 'moor'; ˝*mwoyh* mountain'; *mwoh* 'corner'; *na῾cwoh* 'evening' = *na῾cwoy*; ῾*nah* 'age'; *na῾lah* 'land'; ˝*nayh* 'river'; ˝*neyh* 'four'; *ni῾mah* 'forehead'; ˝*nimcah / ˝nimca* 'master; you'; *nwoh* 'cord'; *pa῾tah* 'sea'; *pwoh*₁ 'beam'; *pwoh*₂ 'cloth'; ˝*seyh* 'three'; ῾*stah* 'ground'; *tuluh* 'hat brim' (?1517- ¹No 2:52a); *tu῾luh* 'moor'; ˝*twuyh* 'rear'; *tyeh* 'whistle'; ῾*swoh*₁ 'swamp'; ῾*swoh*₂ 'matrix, mold, die'; ῾*swuh*₁ 'male'; ῾*swuh*₂ 'forest' = ῾*swuph*; *sywoh* 'layman'; ˝*si[l]-˝nayh / -˝nay* (˝*si῾-˝nay lwo* 1481 Twusi 21:34a) 'stream'; ῾*theh* 'site'; *wuh* 'above'; *ye῾leh* 'several'; *zywoh* 'mattress'.

4.3. Treatment of yey.

   The phoneme string /yey/ occurs only after a pause; in other positions it is automatically replaced by /ey/, so that **pon yēysan** 'the main / original budget' is pronounced either /pon|yēysan/ or /ponēysan/. The string /ey/ itself begins the basic form of very few words (**eywu-** 'surround', **eyi-** 'cut', ... , and recent loanwords) so that it is infrequent after pause.

   Among the Chinese morphemes, the South Korean spelling writes **phyey** for /phey/ as in ph^yēy 'lungs', and **myey** for /mey/ in the bound noun m^yēy, which appears in ūym^yey 'sleeve', m^yēykwu 'sleeve opening', ¹yenm^yey '(in) company', and punm^yey 'parting (of people)'. Both North and South spell **hyey** for /hey/ in Chinese loans such as **hyēyseng** 'comet'. Certain elements beginning with /key/ are distinguished in Hankul by the spelling **kyey**, such as **kyēysi-** 'stay [honorific]', **kyēysi** 'revelation' (pronounced just the same as **kēysi** 'notice, bulletin'), but there seems to be no good reason for any of these spellings, except perhaps historical. The spelling conventions are that only South Korea writes the unpronounced distinction of **myey : mey** and **phyey : phey**, but both South and North write the unpronounced distinctions of **kyey : key, hyey : hey,** and **yey : ey**. (CF Mkk 1960:9:37-8.)

   Because of the automatic alternation of **yey** with **ey**, morphemes with the basic shape **lyey** (such as the common one meaning 'rite, ceremony') never actually occur in that shape at all; it is a fictive form based on the occurring alternants /ley/ (as in **sillyey** 'discourtesy' /silley/ and **kōlyey** 'ancient rites'

/kōley/) and /yey/, as in [1]yēypay 'worship'.

In addition to word variants like /··· ēysan/ for yēysan, which have to be caught on the fly and can be ignored for most purposes, we also observe the alternation of /ey/ and /yey/ in morphemes with the basic shape yēy, such as the one that means 'esthetic, art' and occurs initially in yēyswul 'esthetic techniques' and finally in mun.yey 'literature and art, humanities' = /muney/, hak.yey 'science and art = arts and sciences' = /hakey/, kongyey 'arts and crafts' = /kongey/, kiyey 'crafts' = /kiey/, swuyey 'handicraft' = /swuey/, etc. The dialect variants nēy (northern and modern-Seoul) and yēy 'yes' can be seen as a somewhat similar case, from a basic *nyēy.

4.4. Alternations of l and n.

Except in recent loanwords (latio 'radio', nyūsu 'news', nikheyl 'nickel'), in a few native oddities (see below), and in the grammarians' neologisms liul 'the letter L' and niun 'the letter N', the phoneme l does not occur after pause, nor do the strings ny and ni. In older loanwords l··· → n···: [1]Nwuka pok.um 'the gospel of Luke', nampho(-tung) 'lamp'. After pause, a morpheme whose basic allomorph begins with l appears in an alternant beginning with n. But those morphemes whose basic allomorphs begin with li, ni, ly, or ny appear in allomorphs which begin with i or y:

			BASIC SHAPE	SHAPE AFTER PAUSE
l	:	n	yōlo 'major road'	[1]nōpyen 'roadside'
n	:	n	sīnay 'city confines'	nāypu 'inside part'
ly	:	y	nolyek 'effort'	[1]yek.hayng 'exertion'
ny	:	y	swunye 'nun'	[n]yeca 'woman'
li	:	i	sāli 'reason'	[1]īyu 'reason'
ni	;	i	[1]nōni 'a kind of clay'	[n]iyok 'mud bath'

So far as the alternants after pause occur ONLY after pause, they can be called phonemically determined, provided we ignore the recent loanwords and a few native oddities such as nyesek 'rascal of a man', nyen 'rascal of a woman', nyen-nom 'men and women rascals', niun 'the letter N'. But in most words the "altered" allomorph occurs word-initially whether the word is preceded by pause or not: ku [n]yeca 'that woman', i [1]nōpyen, ... That is sometimes obscured by the "-q" phenomena discussed below.

Certain other cases must be specified in detail. The word for 'league' or 'Korean mile' has the shape /ī/ except after a numeral, where it has the shapes /lī/ or /nī/ (written li): il lī 'one mile', ī li 'two miles', sam lī /samnī/ 'three miles', etc. The Chinese word for 'two' always has the shape /ī/ except after the word il 'one': il-ī 'one or two' is usually pronounced /illī/. The word for 'reason' has the shape /ī/ (written [1]ī) except after the prospective modifier: -ul lī ēps- 'not stand to reason that ··· '. The Chinese word for 'six' has the shape /yuk/ (spelled [1]yuk) except after a numeral: sip [1]yuk = sip-lyuk /simnyuk/ '16', [1]yuk-sipq [1]yuk /yukssimnyuk/. See §5.5.

A number of words beginning with i··· or y··· have alternants beginning with ni··· or ny··· (or reflexes of those strings) which appear in certain environments; these are best treated as cases of reinforcement (-q): cipq īl /cimnīl/ or cip īl /cipīl/ 'housework', halq īl /hallīl/ 'things to be done'. In the case of the noun īl the MK form had an oral beginning, but certain other nouns that nowadays behave the same way were spelled as ni··· or nye···: i 'tooth' was MK ˙ni and iph 'leaf' was ˙niph (in contrast with ˙iph 'gate') but ip 'mouth' was MK ˙ip. We are tempted to write "alayq ni" for 'lower teeth', and that would be historically correct, but we have no way of keeping that situation apart from /alaynnipsswul/ 'lower lip' where "alayq nip-swul" would be historically incorrect. For the modern language we will treat all cases alike and write not only alayq ip-swul but also alayq i, letting a rule interpret "q i" as /nni/ and "q y" as /nny/ in examples such as hanq yeph = /hannyeph/ 'one side'. For Chinese words, the historical ny-, ly-, and li- are in general so written in the North Korean orthography, and the initial nasal is preserved in the spoken dialects, with loss of the -y- (except in [1]Yukcin). The initials of those strings are represented by superscript [n] and [1] in the Yale Romanization:

ettenq ⁿyeca /ettennyeca/ 'what sort of woman', ponq ⁿyento /ponnyento/ 'this year period', musunq ˡĭyu lo /musunniyulo/ 'for what reason', kulenq ˡyek.hayng /kulennyekhayng/ 'such exertion'; yang ˡyoli /yangnyoli/ 'western food', Cwungkwukq ˡyoli /cwungkwungnyoli/ 'Chinese food'; sampaykq ˡyuksip-o il /sampayngnyukssipoil/ '365 days'. The behavior of these is not distinguishable from that of the historically correct y⋯ and i⋯: musunq yoil /musunnyoil/ 'what day of the week', nolanq yangmal /nolannyangmal/ 'yellow stockings' (KBC), kulenq ilmyen /kulennilmyen/ 'such a side (to it/him)', Pusanq yek /pusannyek/ 'Pusan station', Sewulq yek /sewullyek/ 'Seoul station', sīcheng-aphq yek /sīchengamnyek/ 'City Hall Station'; sonnimq-yong siktang /sonnimnyong∣sikttang/ (KBC 2:24) 'guest dining room', chaykq yenkwu /chayngnyengkwu/ 'book research'. For certain strings the reinforcement is optional: kkoch(q) ilum 'fower name' can be said either /kkotilum/ or /kkonnilum/. The poetic noun im 'beloved' (so spelled in the north as well as the south) was earlier nim and is probably the same morpheme as the honorific postnoun ⋯ nim < MK ˝nim 'esteemed ⋯'; the noun īmkum < MK ˝nim-ˈkum 'king' probably contains the same etymon.

Almost all verbs beginning with i⋯ or y⋯ have the reinforced form, but only after prefixes or the negative adverbs mŏs and an: mŏsq ic.e /mŏnnice/ 'can't forget', mŏsq il.e na /mŏnnilena/ 'can't arise', mŏsq ilk.e /mŏnnilke/ 'can't read', mŏsq ik.e /mŏnnike/ 'can't ripen', mŏsq ip.e /mŏnnipe/ 'can't wear', mŏsq yel.e /mŏnnyele/ 'can't open'; anq ic.e /annice/ 'doesn't forget', anq il.e na /annilena/ 'doesn't arise', anq ilk.e /annilke/ 'doesn't read', anq ik.e /annike/ 'doesn't ripen', anq ip.e /annipe/ 'doesn't wear', anq yel.e /annyele/ 'doesn't open'. For the stem iss- 'stay, be' the q seems to be optional for mŏs but usual for an (because of pervasive n-epenthesis): mŏs(q) iss.keyss.e /mŏtikkeysse/ or /mŏnnikkeysse/ 'can't stay', anq iss.keyss.e /annikkeysse/ 'won't stay'. The Middle Korean source of iss- was spelled without an initial nasal, isi-, but almost all the other relevant stems were spelled ni⋯ or ny⋯. For those verbs the non-reinforced treatment is sometimes heard (mŏs ic.e /mŏtice/, mŏs yel.e /mŏtyele/), but not commonly. An example with a prefix is cisq-iki- /cinniki-/ 'knead; mince'. When the accusative particle is omitted in the phrase os ul ipko 'wearing clothes' the phrase can be pronounced either /otipkko/ = os ipko or /onnipkko/ = osq ipko. If only the juncture after the accusative particle is dropped, you may hear both /osulipkko/ with the flap [r] and /osullipkko/ = os ulq ipko.

There are also words which begin with /y/ but have alternants beginning with /ny/ in certain environments. The word ⁿyen 'year' after a numeral is pronounced /nyen/ (and that is automatically /lyen/ after l); the same pronunciation is common after ku 'that' and similar adnouns. The MORPHEME for 'year' has the shape /yen/ spelled ⁿyen when word-initial, but elsewhere it is nyen (including /lyen/ after l) elsewhere: ˡnaynyen 'next year'; mal.nyen 'the later (closing) years'; ⁿyenkam 'yearbook'; ⁿyento 'year period'; ⁿyen-nyen 'year after year', CF ˡyennyen 'successive years' and yennyen 'prolonging one's years (= life)'.

For a few words, such as those cited on p. 41, history has gone awry and confusion is rife. Some Koreans treat ⋯n-n⋯ the same as ⋯n-l⋯ and ⋯l-l⋯, namely as /ll/, and say Allyeng hasimnikka for Annyeng hasip.nikka 'How are you?'. The words kwannyem 'idea' and kŏnnan 'difficulty' are often treated as if kwan.lyem /kwallyem/ and kŏn.lan /kŏllan/, and those spellings are included in some of the dictionaries, and we have taken account of a few of these by writing such Romanized versions as kŏn.ˡnan. (The word /kwēllyen/ 'cigarette' is usually spelled phonemically, though etymologically it is kwēn.yen.) Somewhat similar cases are kilyem for kinyem 'memory, souvenir' and kīlung for kīnung 'talent, ability'. Double /ll/ sometimes appears for no good reason where a single /l/ is expected; such forms are usually to be regarded as dialect variants. Occasionally, reinforcement (-q) is involved: /mullyak/ 'liquid medicine' is best treated as mulq yak. That is perhaps the best way, too, to treat 'one or two': ilq-ī.

Dialects of the northwest dispalatalized the older initial ty thy ny, while the southern dialects affricated t(h)y so that they merged with the affricates c(h)y and retained the glide but dropped the nasal of ny. (Only ˡYukcin preserves the original situation.) That is why for Seoul ⁿyeca 'woman' and chengke-cang 'station' (< tyengke-tyang) northerners are known to say neca [nədza] and tengke-tang.

These phenomena were noticed by [1]Yu Huy in 1824 Enmun-ci (p. 7): "In Korean pronunciation **tya, tye** have become **cya, cye; thya, thye** have become **chya, chye**. Only in Phyengan province do people not equate **thyen** 'heaven' with **chyen** 'thousand' and **ti** 'earth' with **ci** 'arrival'." There are examples of *c* for *ty* and *ch* for *thy* in the 1632 edition of Twusi enhay (CF An Pyenghuy 1957). Seoul irregularly has **neh-** < *nyeh-* 'put in' where we would have expected **yeh-** (as in various dialects), reflecting the MK variant *neh-* attested in 1466 Kup (see p. 47) and perhaps influenced by the initial of **noh-** 'put'. 1898 Tayshin writes *nyetta* (?= /nyetha/) 'lay, stow'. (Tayshin *nipsiuely* 'lips' must be a back formation, for MK had *ip si˙Gwul* without the nasal initial.) The northern tendency to dispalatalize has weakened in the 20th century, and the southern palatalizations in loanwords such as **latio** > **lacio** 'radio' and **tisuthoma** > **cisuthoma** 'distoma' are now common in the north, as well (Mkk 1960:9:39).

For more on **ny-** and **ni-** see §1.2. For further discussion of alternations involving l see §5.1, §8.1.4, §§8.2.1-3; §4.7, §4.8; §1.6; §2.6. CF. Thak Huyswu 1956:160-7.

4.5. Shape types of Chinese vocabulary.

The table on pp. 114-5 shows all the shape types that occur in "normal" basic readings of Chinese characters. With the exception of those queried with question marks, which were included out of deference to Korean dictionaries, I believe examples can be found of real words containing morphemes with shapes to justify the inclusion of each of the entries in the table. Distinctions of vowel length are ignored. Certain shapes (such as **lye**) are always short, regardless of the particular morpheme represented, and certain shapes are always basically long (like **thē**, which represents a single morpheme). But other shapes are distinctively short or long depending on the morpheme. The long vowel in these shapes usually corresponds to the Middle Chinese "rising" and "falling" tones, but there are many exceptions. Parentheses enclose marginal or special shapes.

Although there are characters that are to be read with the syllables **cum, cwul, nin, nwal, nyek, nyep,** and **phik**, they are not used in loanwords found in modern Korean, so those have been left blank in the table. There are no characters read with the syllables **cwang, hi** (as distinct from **huy**), **kul, kya, mam, non, nyak, nyang, nyey, op, phyu,** or **pik**; these, too, are blank in the table. Among the filled slots in the table, several shapes appear in only a few loanwords and some of the n··· shapes do not appear in environments critical for deciding the initial. For kh··· the only shape is **khway**.

A few of the rarer shapes, with examples:

hyul	kwūhyul 'relief (of the poor)', **hyulkum** 'relief fund'
kyak	kyak.kum 'collecting funds'
nīm	[n]īmkum 'pay', [n]īmtay 'lease'
nwul	nwul.en 'stammering speech', **mok.nwul** 'innocence and lack of eloquence'; but ēnwul 'inarticulate' is commonly said as /ēlwul/
nwūn	nwūn.cho 'fresh grass', nwūnhan 'mild cold', nwūn.lok 'light green'
nyel	[n]Yelpan 'Nirvāṇa'
nyuk	[n]yuk.hyel 'nosebleed'
phyak	phyak hata 'is snippy', **koyphyak hata** 'is fussy'
thum	thum.ip 'trespassing'

The shapes **kkik, ssang,** and **ssi** are anomalous in beginning with reinforced consonants, but the North Koreans standardize **kkik** 'ingest' as **kik**, and **ssi** was spelled **si** in earlier times. The reading **ssang** 'pair' first appeared in 1677, but the reading **ssi** 'clan' seems to be fairly new, and is probably the result of truncation from compounds (···q si 'the clan of ·· '), just as the initial reinforcement of a few nouns such as **kkoch** 'flower' are to be accounted for. The noun **thāl** 'mishap, ... ' is associated with a Chinese character that has the traditionally assigned reading i, but both the sound and the meaning are peculiarly Korean, so the word is not to be taken as part of the Chinese vocabulary. The origin seems to be unknown but it is probably the same as the word **thāl** 'karma' attested (¨tha˙l ol) in 1462 [1]Nung 8:78b, of unknown etymology. The modern meaning is attested from 1785.

4.6. Chinese characters.

To write most words of the Chinese vocabulary the Koreans have traditionally used Chinese characters, called **Hānqca** or **Hānmunq-ca**. For each syllable of a Chinese word there is an appropriate traditional character, so that knowing the characters is often a help in finding out what morphemes make up the word. The bulk of the Chinese vocabulary consists of binoms − two-morpheme (hence two-syllable) words. You can suspect that you are hearing a Chinese word, and accordingly that the word can be written in Chinese characters, whenever you hear a word that consists of any two syllables listed in the shape-type table. Sometimes, of course, you may be wrong, especially if one of the syllables (such as **ka** or **sa**) is of a very common type anyway. You would be mistaken to think that **salang** 'love' should be written with Chinese characters. And **sayngkak** 'thinking', despite its definitely Chinesey flavor (and perhaps even a Chinese etymology), is not written with characters.

The Chinese characters are listed in dictionaries, and the dictionaries are usually organized according to a somewhat arbitrary system that analyzes the structure of each character so as to find a "radical", traditionally the element that gives the character its category of meaning, and a residual part that is often called the "phonetic" because it hints at the pronunciation. The 214 Radicals are ordered according to the number of strokes originally made in writing them (some are now written with fewer strokes than the order implies), and each of the characters is listed according to its Radical number + the number of residual strokes. For example, the character 梅 **may** 'plum' is listed under Radical 75 (the Tree or Wood Radical), in the subgroup of characters that have a residual-stroke count of 7, so that we can designate its general location as "75.7". The radical, as so often, is on the left and by itself is a character that means 'tree'. The part on the right is the phonetic; by itself it is the character **may** 'every' 每, which is listed under Radical 80, while the bottom part of that character by itself is **mo** 'mother' 母. It sometimes happens that a character has a residual-stroke count of zero; that is, the character is a radical itself, like 木 **mok** 'tree' 75.0. When there are several characters with the same residual-stroke count, the order is usually determined by an arbitrary tradition that follows earlier dictionaries. Most Korean dictionaries of Chinese characters also have an index by "total stroke count", which is useful if the radical is not readily ascertainable, and an index by Korean readings arranged according to the Hankul alphabet, with the order under each reading determined either by the radical or by the total stroke count. A list of the names by which Koreans call the 214 Radicals will be found in Appendix 5. (Some of the names, like the radicals they represent, are rare.)

When we look up a character in a Chinese character dictionary, called **Hānqca sacen** or (after the name of a dictionary famous in ancient China) **okphyen** "Jewel Book", we are given only scanty information, usually just a Korean "reference tag" which tells us the appropriate pronunciation and something of the meaning. If there are several meanings or readings, each is given, usually following the traditional entries of large Chinese dictionaries, so that the information is often archaic and not always relevant to real loanwords that are used in Korean today. The typical form of a reference tag for a noun is the Korean translation (as a noun or noun phrase) + the reading: 人 **sālam in** 'the **in** that means **sālam** "man"'. The reference tag for a verb typically gives the Korean translation in the form of a prospective modifier (or a phrase that ends in one) + the reading: 見 **polq kyēn** 'the **kyēn** that means **pol** "to see"'. The prospective modifier is also used for the adjectives, but a few of the adjectives are tagged with the simple modifier, to differentiate them from processive use of the same stem: 大 **khun tāy** 'the **tāy** that means **khun** "big"' < *khun tay* (1576 [1]Yuhap 2:47b) vs **khulq tāy** (Kim Sepcey 1957:59) 'the **tāy** that means "to grow"'; 長 **kīn cang** 'the **cang** that means "long"' < *[¨]kin tyang* < *TTYANG* (1576 [1]Yuhap 2:48a) vs *[¨]kilq [¨]tyang* < *¨TTYANG* (ibid.) 'to grow' (replaced by **cala-**). Notice that while often a comma sets off the reading from the gloss ("**sālam, in**", "**pol, kyēn**", "**khun, tāy**") it is usual to pronounce the tag without a pause, and the prospective modifier regularly carries the reinforcing **-q**.

The table on the next two pages is a continuation of §4.5. from the preceding page.

[continuation of §4.5]

SHAPES OF CHINESE MORPHEMES

a	ya	wa	e	ye	-	ay	way	ey	-	yey	o	yo	oy	wu	yu	-	uy	i	wi
ang	yang	wang	-	yeng	-	ayng	-	-	-	-	ong	yong	-	wung	yung	ung	-	ing	-
ak	yak	-	ek	yek	-	ayk	-	-	-	-	ok	yok	-	wuk	yuk	-	-	ik	-
am	-	-	em	yem	-	-	-	-	-	-	-	-	-	-	-	um	-	im	-
ap	-	-	ep	yep	-	-	-	-	-	-	-	-	-	-	-	up	-	ip	-
an	-	wan	en	yen	wen	-	-	-	-	-	on	-	-	wun	yun	un	-	in	-
al	-	wal	el	yel	wel	-	-	-	-	-	ol	-	-	wul	yul	ul	-	il	-
ka	-	kwa	ke	-	-	kay	kwa	key	kwey	kyey	ko	kyo	koy	kwu	kyu	-	-	ki	kwi
kang	-	kwang	-	kyeng	-	-	-	-	-	-	kong	-	koyng	kwung	-	kung	-	-	-
kak	kyak	kwak	-	kyek	-	-	-	-	-	-	kok	-	koyk	kwuk	-	kuk	-	(k)kik	-
kam	-	-	kem	kyem	-	-	-	-	-	-	-	-	-	-	-	kum	-	(kim)	-
kap	-	-	kep	kyep	-	-	-	-	-	-	-	-	-	-	-	kup	-	-	-
kan	-	kwan	ken	kyen	kwen	-	-	-	-	-	kon	-	-	kwun	kyun	kun	-	kin	-
kal	-	kwal	kel	kyel	kwel	-	-	-	-	-	kol	-	-	kwul	kyul	-	-	kil	-
-	-	-	-	-	-	-	khway	-	-	-	-	-	-	-	-	-	-	-	-
ha	-	hwa	he	-	-	hay	hway	-	hwey	hyey	ho	hyo	hoy	hwu	hyu	-	huy	-	hwi
hang	hyang	hwang	-	hyeng	-	hayng	-	-	-	-	hong	-	hoyng	hwung	hyung	hung	-	-	-
hak	-	hwak	-	hyek	-	hayk	-	-	-	-	hok	-	hoyk	-	hyuk	huk	-	-	-
ham	-	-	hem	hyem	-	-	-	-	-	-	-	-	-	-	-	hum	-	-	-
hap	-	-	-	hyep	-	-	-	-	-	-	(hop)	-	-	-	-	hup	-	-	-
han	-	hwan	hen	hyen	hwen	-	-	-	-	-	hon	-	-	hwun	-	hun	-	-	-
hal	-	hwal	hel	hyel	-	-	-	-	-	-	hol	-	-	hwul	hyul	hul	-	hil	-
ma	-	-	-	-	-	may	-	-	-	myey	mo	myo	-	mu	-	-	-	mi	
mang	-	-	-	myeng	-	mayng	-	-	-	-	mong	-	-	-	-	-	-	-	
mak	-	-	-	myek	-	mayk	-	-	-	-	mok	-	-	muk	-	-	-	-	
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
man	-	-	-	myen	-	-	-	-	-	-	-	-	-	mun	-	-	-	min	-
mal	-	-	-	myel	-	-	-	-	-	-	mol	-	-	mul	-	-	-	mil	-
-	-	-	-	-	-	pay	-	-	-	-	po	-	-	pu	-	-	-	pi	
pang	-	-	-	pyeng	-	-	-	-	-	-	pong	-	-	pung	-	-	-	ping	
pak	-	-	-	pyek	-	payk	-	-	-	-	pok	-	-	puk	-	-	-	-	
-	-	-	pem	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
-	-	-	pep	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
pan	-	-	pen	pyen	-	-	-	-	-	-	pon	-	-	pun	-	-	-	pin	-
pal	-	-	pel	pyel	-	-	-	-	-	-	-	-	-	pul	-	-	-	-	
pha	-	-	-	-	-	phay	-	-	-	phyey	pho	phyo	-	-	-	-	-	phi	
-	-	-	-	phyeng	-	phayng	-	-	-	-	-	-	-	phung	-	-	-	-	
-	phyak	-	-	-	-	phayk	-	-	-	-	phok	-	-	phuk	-	-	-	-	
-	-	-	-	phyem	-	-	-	-	-	-	-	-	-	phum	-	-	-	-	
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	phip	-
phan	-	-	-	phyen	-	-	-	-	-	-	-	-	-	(phun)	-	-	-	-	
phal	-	-	-	-	-	-	-	-	-	-	phil	-	-	-	-	-	-	-	

```
na    -     -     -   mye  -  nay  -    -   -    -    no   nyo  noy  nwu   -    -    -   ni   -
nang  -     -     -   nyeng  -   -   -  -   -    nong  -    -    -    -    -   nung  -    -   -
nak   -     -     -   ?nyek  - -   -  -   -     -    -    -    -   nyuk  -    -   nik  -
nam   -     -     -   nyem -  -  -   -   -    -    -    -    -    -   nim  -
nap   -     -     -   ?nyep - -  -   -   -    -    -    -    -    -    -    -
nan   -     -     -   nyen -  -  -   -   -    -    -    -    -   nwun  -    -    -   -
nal   -   ?nwal   -   nyel -  -  -   -   -    -    -    -    -   nwul  -    -    -   nil  -


la    -     -     -   lye  - lay  -   -   -  lyey  lo   lyo  loy  lwu  lyu   -    -   li   -
lang lyang  -     -   lyeng - layng -  -   -   -   long lyong -    -   lyung lung -    -   -
lak  lyak   -     -   lyek - -   -  -   -     -   lok   -    -    -   lyuk  luk  -    -   -
lam   -     -     -   lyem - -  -   -   -     -    -    -    -    -    -   lum  -  lim  -
lap   -     -     -   lyep - -  -   -   -     -    -    -    -    -    -    -    -  lip  -
lan   -     -     -   lyen - -  -   -   -     -   lon   -    -    -   lyun  -    -  lin  -
lal   -     -     -   lyel - -  -   -   -     -    -    -    -    -   lyul  -    -   -   -


ta    -     -     -    -   - tay  -   -   -    -    to   -   toy  twu   -    -    -   -   -
tang  -     -    tek   -   - -   -  -   -     -   tong  -    -    -    -   tung  -    -   -
 -    -     -     -    -   - -   -  -   -     -   tok   -    -    -    -   tuk   -    -   -
tam   -     -     -    -   - -   -  -   -     -    -    -    -    -    -    -    -    -   -
tap   -     -     -    -   - -   -  -   -     -    -    -    -    -    -    -    -    -   -
tam   -     -     -    -   - -   -  -   -     -   ton   -    -   twun  -    -    -    -   -
tal   -     -     -    -   - -   -  -   -     -   tol   -    -    -    -    -    -    -   -


tha   -     -    the   -   - thay -  -   -    -   tho   -   thoy thwu  -    -    -    -   -
thang -     -     -    -   - thayng - -   -   thong -    -    -    -    -    -    -    -   -
thak  -     -     -    -   - thayk - -   -    -    -    -    -    -   thuk  -    -    -   -
tham  -     -     -    -   - -   -  -   -     -    -    -    -    -   thum  -    -    -   -
thap  -     -     -    -   - -   -  -   -     -    -    -    -    -    -    -    -    -   -
than  -     -     -    -   - -   -  -   -    thon  -    -    -    -    -    -    -    -   -
thal  -     -     -    -   - -   -  -   -     -    -    -    -    -    -    -    -    -   -


ca    -    cwa   ce    -   - cay  - cey  -    -    co   -   coy  cwu   -    -    -   ci   -
cang  -     -   ceng   -   - cayng - -   -    -   cong  -    -  cwung  -   cung  -  cing  -
cak   -     -   cek    -   - -   -  -   -     -   cok   -    -  cwuk   -   cuk   -  cik   -
cam   -     -   cem    -   - -   -  -   -     -    -    -    -    -    -  ?cum   -  cim   -
cap   -     -   cep    -   - -   -  -   -     -    -    -    -    -    -   cup   -  cip   -
can   -     -   cen    -   - -   -  -   -     -   con   -    -  cwun   -    -    -  cin   -
 -    -     -   cel    -   - -   -  -   -     -   col   -    -  ?cwul  -    -    -   -    -


cha   -     -   che    -   - chay chway chey - -  cho   -   choy chwu  -    -    -  chi chwi
chang -     -   cheng  -   - chayng - -   -   -  chong  -    -  chwung -   chung -  ching -
chak  -     -   chek   -   - -   -  -   -     -  chok   -    -  chwuk  -   chuk  -  chik  -
cham  -     -   chem   -   - -   -  -   -     -    -    -    -    -    -    -    -  chim  -
 -    -     -   chep   -   - -   -  -   -     -    -    -    -    -    -    -    -  chip  -
chan  -     -   chen   -   - -   -  -   -     -  chon   -    -  chwun  - (chun)  -  chin  -
chal  -   chwal chel   -   - -   -  -   -     -    -    -    -  chwul  -    -    -  chil  -


sa    -     -   se     -   - say sway sey   -    -    so   -   soy  swu   -    -    -  si,ssi
sang,ssang  -   seng   -   - sayng - -   -   -   song  -    -  swung  -   sung  -    -    -
sak   -     -   sek    -   - sayk - -   -    -    sok   -    -  swuk   -    -    -  sik   -
sam   -     ,   sem    -   - -   -  -   -    -     -    -    -    -    -    -    -  sim   -
sap   -     -   sep    -   - -   -  -   -    -     -    -    -    -    -   sup   -  sip   -
san   -     -   sen    -   - -   -  -   -    -    son   -    -  swun   -    -    -  sin   -
sal   -     -   sel    -   - -   -  -   -    -    sol   -    -  swul   -   sul   -  sil   -
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4.7. Characters with multiple readings.

For each Chinese character there is usually one basic "reading" (= pronunciation). This means that each character represents one loanmorph in the Chinese vocabulary; of course the pronunciation is subject to the same sort of automatic alternations as any other element in Korean (···p becomes ···m before m···, etc.). But some characters have two, and rarely three, readings that cannot be predicted except by knowing the particular words in which they are used. There are two types of multiple readings. In the one type, difference of meaning goes with the difference in shape, and we have two loanmorphs represented by a single Chinese character with usually a single etymological origin. In the other type, there is no difference in meaning; we have variant versions of the same loanmorph. There are a few cases that are simply variants that have been spawned for the whole word, and those we have not listed below: **phyengphung** for **pyengphung** assimilated the first syllable to the aspiration of the second; **¹nachim-phan** for **¹nachim-pan** 'compass', where the aspiration of the last syllable comes from assimilating to the preceding syllable, is the standard form in the North Korean dictionary. Nor have we included **khan**, which seems to be a nonstandard variant of **kan** 'interval'.

In the list of the first type of multiple readings, the reference tag is shown for each reading and critical examples are given. In the second list, the meaning of the character is given on the left; then critical examples are listed and the relevant morph shapes are presented in small capital letters, with the more common shape given first. There follows a third list of a few morphemes with unpredictably varying shapes that begin with basic l··· or n··· (CF §4.4, §4.8).

4.7.1. Multiple readings: list one.

CHARACTER	SHAPES	TAGS	EXAMPLES
1.3 丑	chwuk / chwu	so chwuk 'sign of Ox'	chwuk-si 'Hour of the Ox'
		ilum chwu (in names)	Kong Songchwu (person)
3.3 丹	tan / lan	pulk.ulq tan 'red'	tanswun 'red lips'
			tansim 'sincerity'
		molan (uy) lan 'peony'	molan 'peony'
5.10 乾	ken / kan	hanul ken 'Heaven (as divination symbol)'	ken-kon 'Heaven and Earth'
		malulq kan 'be dry'	kanco = kenco 'drying'¹
9.7 便	phyen / pyen	phyen-hal phyen 'comfortable'	phyen.li 'comfort'
		tăysopyen (uy) pyen 'easing nature'	tăypyen 'defecating'
			sŏpyen 'urinating'
18.7 則	cuk / cik	kot cuk 'id est'	yencuk 'if so'
		pepchik chik 'rule'	pepchik 'rule'
			kyuchik 'regulation'
19.2 分	pun / phun	nanwulq pun 'divide; minute'	punswu 'fraction'
			pun swŭ 'no. of minutes'
		tōn phun 'farthing'	il-phun 'one farthing'
21.3 北	puk / pay	puk-nyekh puk 'north'	nam-puk 'North and South'
		phăy-halq pay 'suffer defeat'	phaypay 'defeat'
28.9 參	cham / sam	chamka hal cham 'participate'	chamka 'participation'
		pyēlq ilum sam (constellation)	samseng '21st of the 28 Constellations'
30.3 合	hap / hop	hap-hal hap 'join'	haptong 'combination'
		hop hop (measure)	il-hop 'one hop (a third of a pint)'

30.4 否	pū / pī	ani pū 'not'	pūkyel 'voting down'
		mak.ulq pī 'clog up'	pīsayk 'frustrated by fortune'
30.6 咽	in / yel	mok-kwumeng in 'throat'	inhwu 'throat'
		mok-meyilq yel 'choke'	o.yel 'sobbing'
32.10 塞	sayk / say	mak.ulq sayk 'block, stop up'	cēnsayk 'obstruction'
			cilqsayk 'disgust'
			saykchayk 'sidestepping responsibility'
		pyenpang say 'fort'	sengsay 'fortress'
			yosay 'fortress'
37.6 契	kyey / ke	kyēyyak kyēy 'contract'	kyēyyak 'contract'
			kyēyki ha- 'reach deadline'
		Kelan (uy) ke (phonetic)	Kelan 'Khitan Tatars'
38.8 婆	pha / pa	nulk.un kyēycip pha	[1]nōpha 'old woman'
		Sapa-sēykyey pa	Sapa 'Saha; This World'
40.8 宿	swuk / swu	cam-calq swuk 'stay overnight'	swukpak 'lodging'
		pyēl swu 'constellation'	sengswu 'the stars'
			īsip-phalq swu 'the 28 Constellations'
50.2 布	phō / pō	pellil phō 'spread'	phōko 'decree, proclamation'
		tōn pō 'alms'	pōsi 'Buddhist almsgiving'
53.6 度	to / thak	pep to 'law; degree'	[n]yento 'year period'
			cengto 'degree, extent'
		heyalil thak 'estimate'	[1]yōthak 'conjecture'
			yothak 'mental telepathy'
			chōnthak ha- 'surmise'
53.11 廓	kwak / hwak	tey-twuli kwak 'enclosure'	sengkwak 'castle walls'
		pīl hwak 'empty'	hwakcheng 'purification'
60.6 率	sol / lyul SEE §4.8 (p. 125).	kenulilq sol 'command'	thōngsol 'general command'
			insol 'leading (people)'
			kwēnsol 'the family one heads'
		pī[1]yul [1]yul 'ratio'	pī[1]yul 'ratio'
			nung.lyul 'efficiency'
60.9 復	pu / pok	tasi pu 'again'	puhwal 'resurrection'
			puhung 'revival'
		hoypok-halq pok 'recover'	wangpok 'round trip'
			pok.kwu 'restoration'
60.12 徵	cing / chi	puluq cing 'recruit'	sangcing 'symbol'
			cingpyeng 'conscription'
		um.ak chi '4th note of pentatonic scale'	
61.8 惡	ak / o	mōcil ak 'bad'	sēn-ak 'good and/or bad'
			ak.han 'villain'
		miwe hal o 'hate'	cungo 'hatred'
			hō-o 'likes and dislikes'

64.8 推	chwu / thōy	kalul chwu 'discriminate'	chwutan 'judgment'	
		ssah.ul thōy 'accumulate'	thōycek 'accumulation'	
64.9 提	cey / li	pachilq cey 'offer'	ceychwul 'presentation'	
		Poli (uy) li (phonetic)	Poli 'Bodhi, Buddhahood'	
66.11 數	swū / sak / chok	sēym swū 'number'	swūqca 'numeral'	
			···(-q) swū 'number of ·· '	
		cacwu sak 'frequent'	pinsak ha- 'be frequent'	
			saksak 'constantly'	
			sakchey 'constant shifting of personnel'	
		ppaykppayk hal chok 'dense'	chok.ko 'fine mesh'	
72.4 易	yek / i	pakkwulq yek 'change'	mu.yek 'trade'	
			Yekse 'the Book of Changes'	
		swiwulq i 'easy'	yongi ha- 'be easy'	
73.3 更	kăyng / kyĕng	tasi kăyng 'again'	kăyngsin 'renovation'	
			kăyngsayng 'rebirth'	
		kochilq kyĕng 'change'	pyĕnkyeng 'change'	
			kyĕngcil 'change (in structure)'	
75.11 樂	lak / ak	culkil lak 'rejoice'	¹nak.wen 'paradise'	
		um.ak (uy) ak 'music'	um.ak 'music'	
79.6 殺	sal / swāy	cwuk.ilq sal 'kill'	sal.in 'murder'	
		sangsway (uy) swāy 'attack'	sangsway 'counter-balancing'	
			swāyto 'onslaught'	
			kămsway ha- 'impair'	
85.4 沈	chim / sim	camkil chim 'sink'	chimmol 'sinking'	
		ilum sim (name)	Sim ssi 'Mr Shim'	
85.5 沸	pi / pul	kkulh.ulq pi 'boil'	pitung 'boiling'	
		sēym sos.ulq pul 'jet'	pul.yen ha- 'be quick-tempered'	
85.10 滑	hwal / kol	mikkulewul hwal 'slippery'	hwalqsek 'talcum'	
		iksal kol 'humor'	kolkyey 'humor'	
94.4 狀	sang / cang	mo.yang sang 'appearance'	sangthay 'state, condition'	
			hyengsang 'form'	
		kulq-cang cang 'document'	sāng(q-)cang 'citation of merit'	
			kongkayq-cang 'open (public) letter'	
94.7 狹	hyep / hap	cop.ul hyep 'narrow'	hyepchak 'narrowness'	
		ilum hap (in names)	Hapchen (place)	
102.7 畫	hwā / hoyk	kūlim hwā 'drawing'	hwāka 'artist'	
		kul-ssi hoyk 'brush stroke'	hoyk swū 'stroke count'	
106.0 白	payk / pay	huyn payk 'white'	paykpal 'white hair'	
		Paychen pay (name)²	Paychen onchen 'Paychen hot springs (spa)'	

109.4 省	seng / sayng	salphilq seng 'investigate'	sengchal 'reflection' sengmyo 'visiting ancestral tombs' kwuk.mu seng 'State Department' Santong seng 'Shantung (Shāndōng) Province'
		tēlq sayng 'lessen'	kāmsayng 'curtailment' sayng.lyak 'abbreviation'
120.4 索	sayk / sak	chac.ulq sayk 'seek'	swusayk 'search' mosayk 'groping' sasayk 'speculation' sayk.in 'index'
		ssulssul-halq sak 'lonesome'	sak.yen hata 'is lonesome'
		cwul sak / sayk	chelqsa(y)k 'cable'
140.9 著	ce / chak	ciulq ce 'create'	cese 'written works' ceca 'author'
		putic.chil chak 'hit'	chak.lyuk 'landing' chakswu 'putting one's hand to, beginning'
140.9 葉	yep / sep	iph(-sakwi) yep 'leaf'	ci-yep 'branches and leaves; minor details'
		ilum sep (in names)	Sep ssi 'Celcius' Kasep(-wen) 'Kāśapa (plain)'
144.0 行	hayng / hang	tanil hayng 'go; do; market'	[1]yehayng 'travel, a trip' unhayng 'bank' ... hayng 'bound for ... ' hayng.lyel[3] 'procession'
		hang.lyel hang 'degree of relationship'	hang.lyel[3] 'degree of relationship'
145.4 衰	soy / choy	yak-halq soy 'weak'	soyyak 'debilitation'
		sangpok choy 'mourning garb'	chamchoy (a kind of mourning garb)
147.0 見	kyēn / hyen	polq kyēn 'see'	kyēnhay 'opinion, view'
		nathanal hyen 'appear'	alhyen 'royal audience'
149.7 説	sel / sey / yel	māl-halq sel 'speak'	selhwa 'narration; sermon'
		tallaylq sey 'coax'	yusey 'electioneering'
		ilumq yel (in names)	Kim Sam.yel (person)
149.15 讀	tok / twu	ilk.ulq tok 'read'	tokse 'reading (books)'
		kwicel(q) twu 'phrase'	kwutwu 'punctuation' [1]ītwu 'Idu'[4]
157.5 跛	pha / phī	celttwuk-pal.i pha 'lame'	phahayng 'limping'
		kiwul.ye sul phī 'lean to one side'	phīlip 'standing on one leg'
167.0 金	kum / kim	hwangkum kum 'gold'	(hwang)kum 'gold'
		ilum kim (in names)	Kim ssi 'Mr Kim' Kimhay (city)

170.6 降	**kăng / hang**		**naylilq kăng** 'descend'	**kăngha** 'descent'
				sungkang-ki 'elevator'
			hangpok hang 'surrender'	**hangpok** 'surrender'
213.0 龜	**kwi / kyun / kwu**		**kepuk kwi** 'tortoise'	**kwisen** 'tortoise-shaped boat'
			son thĕ-cilq kyun 'chapped'	**kyun.[1]yel** 'fissure'
				[1]Yi Cengkwu (person)
			ilum kwu (in names)	**Kwupho** (place)

[1] Popularly **ken** in the meaning 'dry' too, as in **ken-cĕnci** 'dry battery' (Ceng Insung 225).
[2] See also **paynge** < **pay-nge** 'whitebait' (§3.6).
[3] Identical morpheme **lyel**; minimal contrast of **hayng** and **hang**.
[4] Chinese characters once used to write Korean particles, endings, and the like.

4.7.2. Multiple readings: list two.

CHARACTER	SHAPES	MEANING	EXAMPLE 1	EXAMPLE 2
1.4 不	**pul / pu[1]**	not, un-	**pulphyen** 'discomfort' **pul-kongphyen** 'unfair'	**putang** 'injustice' **puceng** 'uncertainty'
9.2 什	**cup / cip**	ten, some	**cupki** 'furniture'	**cip.mul** 'furniture'
9.5 佐	**cwă / că[2]**	assist	**pŏcwa** 'assistance to superior'	**căpan** 'salted fish or caviar'
11.2 内	**năy / nă**	inside	**năyoy** 'in and out'	**năin** 'court lady'
12.0 八	**phal / pha[3]**	eight	**phal-wel** 'August'	**(să-wel) pha-il** 'Buddha's birthday'
12.2 六	**[1]yuk/[1]yu/nyu**	six	**[1]yuk.il** '6th day' **ŏlyuk.il** '5th or 6th day'	**[1]yu'-wel** 'June' **ŏnyu'-wel** 'May or June'
18.2 切	**cel / chey**	cut	**celqtan** 'amputation' **kăncel** 'eagerness'	**ilchey** 'altogether (< one cut)'
18.6 刺	**că / chek**	stab	**căkuk** 'stimulation' **căkayk** 'assassin'	**cheksal** 'stabbing to death'
24.0 十	**sip / si'**	ten	**sip-il** 'eleven'	**si'-wel** 'October'
29.2 反	**păn / pen**	reversal	**păntay** 'opposition'	**pentap** 'turning it into rice land' **pencen** 'converting rice land back'
30.2 句	**kwu / kwi**	sentence	**kwutwuq-cem** 'punctuation mark'	**kwicel** 'couplet'
40.3 宅	**thayk / tayk**	house	**kathayk** 'domicile' **cwŭthayk** 'residence'	**tayk** 'your house' **si-tayk** 'husband's house'
48.7 差	**cha / chi**	difference	**chai** 'difference'	**chamchi(-pucey)** 'lack of uniformity'
50.5 帖	**chep / chey**	document	**swuchep** 'notebook, album'	**cheyci, (cheymun)** 'document of appointment'
64.8 掣	**chel / chey**	restrain	**chelqcwu** 'hindrance'	**?cheyli[4]** 'restraint'

68.9 斟	cim / chim	guess	cimcak 'conjecture'	chim.lyang (same)
72.11 暴	phok / phŏ	violent	phoktong 'riot'	hoyngpho 'tyranny'
			phokphung 'tempest'	phŏhak 'tyranny'
			phokto 'rioters'	(phŏto 'rioters')
				phŏki = capho-(caki) 'despair'
72.15 曝	phok / pho	expose	phok.yang 'burning sun'	phopayk 'bleaching in the sun'
75.0 木	mok / mŏ	tree, wood	mok.kun 'tree root'	mŏkwa 'papaya' (< mok-kwa)
85.6 洞	tong / thŏng	alley; clear	tongkwu 'village'	thŏngchal, thŏngchok 'discernment'
107.0 皮	phi / pi	skin	phipu 'skin'	[1]nokpi 'deerskin'
115.5 秤	phyeng / ching	balance	chenphyeng 'balance, scales'	chingchwu 'balance weight'
119.10 糖	tang / thang	sugar	tangpun 'sugar content'	selthang 'granulated sugar'
			photo-tang 'glucose'	sathang 'sugar; sweets'
140.6 茶	ta / cha	tea	tapang 'teahouse'	(hong)cha '(black) tea'
			takalq-sayk 'light brown'	(chaq-pang, chaq cip) → tapang 'tearoom'
149.7 誓	sē / sey	swear	sē.yak 'oath'	mayngsey 'pledge'
149.12 識	sik / ci	knowledge	cisik 'knowledge'	phyoci = phyosik 'mark, signal'
159.0 車	cha / ke	vehicle	cha 'vehicle, car'	cacen-ke 'bicycle'
			kicha 'train'	cengke-cang 'rail
			catong-cha 'auto'	station'
161.0 辰	cin / sin	Sign of the Dragon	cin-si 'Hour of the Dragon'	thānsin 'birthday'
184.0 食	sik / sa	eat	ūmsik 'food'	tansa 'lunch-basket rice'
187.4 馱	thay / tha	stupid; burden; ...	thaycak 'worthless work'	si-tha 'load'[5]

[1] The ···l drops regularly before t or c (CF §3.5).

[2] CF §2.7.4.

[3] CF §3.5.

[4] [1]Yi Ungpayk 571. I cannot find the word in any dictionary, nor can I find ?cheycen 'lightning-fast', a purported example that comes from an unknown source.

[5] But usually pronounced si-thay. In fact, does anybody say /sitha/? I assume (perhaps wrongly) an etymology that involves both sīt-/sil- 'load' and the Chinese loanmorph: si[t]-tha(y). The final -y is etymological and not a reduction of the incorporated i that is common for nouns in certain northern dialects. The si-tha version is not found in the major dictionaries; is it a ghost? Kim Minswu and Hong Wungsen treat thaycak as nonstandard for thacak, a version that I have not found in the other dictionaries.

4.7.3. Multiple readings: list three.

CHARACTER	SHAPES	MEANING	EXAMPLE 1	EXAMPLE 2
40.11 寧	nyeng / lyeng < NYENG	calm	annyeng ha-[1] 'be in good health' cengnyeng 'for sure'	milyeng 'illness, indisposition'
61.5 怒	no / lo < ˝NWO	anger	no ha- 'get angry' pūnno 'indignation' kyek.no 'wild rage'[2]	tăylo 'great anger'
149.8 論	lon / non /([1]non) < LWON	discussion	[1]īlon 'logic' īlon 'dissent' en.lon 'discussion' mullon[4] 'of course'	uynon 'discussion'[3] [1]nonmun 'treatise, dissertation'
149.9 諾	?nak / lak < ˙NAK	acquiesce	sungnak[5] 'consent'	helak 'permission' khwaylak 'ready assent'

[1] But those speakers who say /allyeng/ are treating this as a single-reading character **lyeng**. F⸢
them **cengnyeng** is properly to be analyzed as **ceng.lyeng**.

[2] From this form alone we would not know whether the appropriate spelling of the second eleme⸢
in /kyengno/ is **lo** or **no**. The practice is to write **lo** only when /l/ is pronounced. Notice th⸢
/pūnno/ could not be "**pūn.lo**" for that would be pronounced /pūllo/.

[3] [1]Yi Ungpayk draws a distinction between **uynon** 'discussion' and **uylon** 'argument' and on th⸢
both NKd and LHS agree, but KEd puts the two words together as **uy**[1]**non** and gives **uylon** as⸢
variant pronunciation of **uynon**, a shape that is unanticipated, in any event, though attest⸢
from at least the late 19th century: *uynwon ho.ye la* (1893 Scott 4) 'consult!'.

[4] This could, of course, be from "**mul.**[1]**non**" but we decide on **lon** for reasons of history and t⸢
relative infrequency of [1]**non** in environments where it would be distinguishable.

[5] I see no reason we cannot write **sung.lak** and say the character has only the reading **lak** wi⸢
/nak/ as an automatic alternant. If some speakers say (?)**khwaynak**, however, that is anoth⸢
matter.

4.7.4. Index to the lists of multiple readings.

ak / lak	75.11	II	hyen / kyēn	147.0	I
ak / o	62.8	II	hyep / hap	94.7	I
cā / chek	18.6	II	i / yek	72.4	I
cā / cwā	9.5	I	in / yel	30.6	I
cang / sang	94.4	I	kan / ken	5.10	I
ce / chak	140.9	II	kang / hang	170.6	I
cel / chey	18.2	I	kāyng / kyēng	73.3	I
cey / li	64.9	II	ke / cha	159.0	II
cha / chi	48.7	II	ke / kyēy	37.6	I
cha / ke	159.0	II	ken / kan	5.10	I
cha / ta	140.6	I	kim / kum	167.0	I
chak / ce	140.9	I	kol / hwal	85.10	I
cham / sam	28.9	II	kum / kim	167.0	I
chek / cā	18.6	II	kwak / hwak	53.11	I
chel / chey	64.8	II	kwi / kwu	30.2	II
chep / chey	50.5	II	kwi / kyun / kwu	213.0	I
chey / cel	18.2	II	kwu / kwi	30.2	II
chey / chel	64.8	II	kwu / kwi / kyun	213.0	I
chey / chep	50.5	II	kyēn / hyen	147.0	I
chi / cha	48.7	I	kyēng / kāyng	73.3	I
chi / cing	60.12	I	kyēy / ke	37.6	I
chik / cuk	18.7	II	kyun / kwi / kwu	213.0	I
chim / cim	68.9	I	lak / ak	75.11	I
chim / sim	85.4	II	lak / ?nak	149.9	III
ching / phyeng	115.5	I	lan / tan	3.3	I
chok / swū / sak	66.11	I	li / cey	64.9	I
choy / soy	145.4	I	lo / no	61.5	III
chwu / chwuk	1.3	I	lon / [1]non	149.8	III
chwu / thōy	64.8	I	lyeng / nyeng	40.11	III
chwuk / chwu	1.3	II	mō / mok	75.0	II
ci / sik	149.12	II	mok / mō	75.0	II
cim / chim	68.9	II	nā / nāy	11.2	II
cin / sin	161.0	I	?nak / lak	149.9	III
cing / chi	60.12	II	nāy / nā	11.2	II
cip / cup	9.2	I	no / lo	61.5	III
cuk / chik	18.7	II	[1]non / lon	149.8	III
cup / cip	9.2	I	nyeng / lyeng	40.11	III
cwa / ca	9.5	II	nyu / [1]yuk / [1]yu	12.2	II
hang / hayng	144.0	I	o / ak	61.8	I
hang / kang	170.6	I	pa / pha	38.8	I
hap / hop	30.3	I	pan / pen	29.2	II
hap / hyep	94.7	I	pay / payk	106.0	I
hayng / hang	144.0	I	pay / puk	21.3	I
hop / hap	30.3	I	payk / pay	106.0	I
hoyk / hwā	102.7	I	pen / pan	29.2	II
hwā / hoyk	102.7	I	pha / pa	38.8	I
hwak / kwak	53.11	I	pha / phal	12.0	II
hwal / kol	85.10	I	pha / phī	157.5	I

phal / pha	12.0	II	sep / yep	140.9	I
phī / pha	157.5	I	sey / sě	149.7	II
phi / pi	107.0	II	sey / sel / yel	149.7	I
phŏ / phok	72.11	II	si / sip	24.0	II
pho / phok	72.15	II	sik / ci	149.12	II
phŏ / pŏ	50.2	I	sik / sa	184.0	II
phok / pho	72.11	II	sim / chim	85.4	I
phok / pho	72.15	II	sin / cin	161.0	II
phun / pun	19.2	I	sip / si	24.0	II
phyen / pyen	9.7	I	sol / ¹yul	60.6	I
phyeng / ching	115.5	II	soy / choy	145.4	I
pi / phi	107.0	II	swāy / sal	79.6	I
pī / pū	30.4	I	swū / sak / chok	66.11	I
pi / pul	85.5	I	swu / swuk	40.8	I
pŏ / phŏ	50.2	I	swuk / swu	40.8	I
pok / pu	60.9	I	ta / cha	140.6	II
pū / pī	30.4	I	tan / lan	3.3	I
pu / pok	60.9	I	tang / thang	119.10	II
pu / pul	1.4	II	tayk / thayk	40.3	II
pul / pi	85.5	I	tha / thay	187.4	II
pul / pu	1.4	II	thak / to	53.6	I
pun / phun	19.2	I	thang / tang	119.10	II
puk / pay	21.3	I	thay / tha	187.4	II
pyen / phyen	9.7	I	thayk / tayk	40.3	II
sa / sik	184.0	II	thŏng / tong	85.6	II
sak / sayk	120.4	I	thŏy / chwu	64.8	I
sak / swū / chok	66.11	I	to / thak	53.6	I
sal / swāy	79.6	I	tok / twu	149.15	I
sam / cham	28.9	I	tong / thŏng	85.6	II
sang / cang	94.4	I	twu / tok	149.15	I
say / sayk	32.10	I	yek / i	72.4	I
sayk / sak	120.4	I	yel / in	30.6	I
sayk / say	32.10	I	yel / sel / sey	149.7	I
sayng / seng	109.4	I	yep / sep	140.9	I
sě / sey	149.7	II	¹yu / ¹yuk / nyu	12.2	II
sel / sey / yel	149.7	I	¹yuk / ¹yu / nyu	12.2	II
seng / sayng	109.4	I	¹yul / sol	60.6	I

4.8. Chinese morphemes with basic l···.

A number of problems arise with morphemes which had a basic l··· initial in Middle Chinese. In South Korea the standard practice is to spell these morphemes in two ways: with n··· (or zero before i, y) if they are at the beginning of a word, with l··· elsewhere. In North Korea the morphemes are spelled with initial l··· in all positions. Our Romanization writes ¹n··· (or ¹··· before i, y) for these cases where the two systems diverge. There are a few morphemes which, despite an etymological l···, are standardized to n··· in both Koreas: no = ¹no 'oar', nwu = ¹nwu 'loft, pavilion', nwū = ¹nwū 'frequent' (CF nwūnwūi = ¹nwū¹nwū-i 'frequently'), nwūki = ¹nwūki 'dampness'. In the word sil¹yen 'disappointment in love', we find an unusual shortening of the expected sillyen, ignored in the North Korean spelling, but indicated in South Korea by writing sil.yen. A similar case should be no¹yey /no(.y)ey/ 'slave' (CF hālyey 'male slave', kwan.lyey 'official slave', ¹yēysok 'subordination'), but the North Korean spelling seems to be no.yey, like that of the south.

A small group of morphemes have the shapes **lyul** and **lyel**. These morphemes follow a special pronunciation rule: after a vowel or **n**, the **l** unexpectedly drops. The liquid actually appears only after **l** or some consonant other than **n** (when it appears in the reflex /n/), so that we would not know that these morphemes begin with a basic **l** (rather than **n**) without additional information from their history or from dialect pronunciations. The alternation is ignored in North Korean spelling, but noted by the South Koreans, so we mark it by ···**¹y**··· in our Romanization. Examples:

	CHARACTER	AFTER VOWEL	AFTER ···n	AFTER ···l	ELSEWHERE
LYUL < ʼLYWULQ	60.6 律 rule	kyu¹yul /kyuyul/ 'discipline'	sen.¹yul /senyul/ 'rhythm'	illyul /illyul/ 'uniformity'	pep.lyul /pemnyul/ 'law'
	95.6 率 ratio	pi¹yul /pīyul/ 'ratio' ¹ī¹yul /īyul/ 'interest rate'	hwān.¹yul /hwānyul/ 'exchange rate'	kwulqcel-lyul /kwulccellyul/ 'index of refraction'	nung.lyul 'efficiency'
	75.6 栗 chestnut	phi¹yul /phiyul/ 'unshelled chestnut'	san.¹yul /sanyul/ 'Japanese chestnut'	hallyulq-sek /hallyulssek/ 'stones cut to chestnut size'	hwang.lyul /hwangnyul/ 'dried peeled chestnuts'
LYEL < ʼLYELQ	19.4 劣 inferior	wu¹yel /wuyel/ 'superiority and inferiority' pi¹yel /piyel/ 'baseness'	chen.¹yel /chenyel/ 'lowly, humble'	collyel /collyel/ 'clumsiness'	yong.lyel /yongnyel/ 'inferiority'
	18.4 列 rank, order	¹na.¹yel /na.yel/ 'array'	pan.¹yel /panyel/ class rank'	illyel /illyel/ 'a line'	hayng.lyel /hayngnyel/ 'procession'
	86.6 烈 fierce	uy¹yel /u.yel/ 'heroism'	sen.¹yel /senyel/ 'veteran patriot'	yellyel ha- /yellyel(h)a-/ 'be ardent'	mayng.lyel /mayngnyel/ 'fury'
	145.6 裂 rip	phā.¹yel /phā.yel/ 'explosion'	kyun.¹yel /kyunyel/ 'fissure' pun.¹yel /punyel/ 'disruption'	kyellyel /kyellyel/ 'rupture'	cak.lyel /cangnyel/ 'explosion'

4.9. Tongkwuk readings.

Tongkwuk Cengwun ("*TWONG-'KWUYK* "*CYENG-'NGWUN*)

	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
vol 1																							
1. -ung	+		+	+	+		+	+	+		+	+	+		+				+	+	+		+	+
"-ung		+			+																	
'-ung	+			+	+		+				+	+	+		+				+	+		+	+
'-uk	+	+	+	+	+	+	+		+		+	+	+	+	+				+	+	+		+
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'-ing						+			+			+	+			+	+						+
'-ik					+	+	+		+				+			+	+	+			+	
-oyng	+	+			+	+	+	+	+	+	+	+	+	+	+	+		+		+		+
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'-oyng	+				+	+	+		+			+	+			+				+		
'-oyk	+	+			+	+	+	+	+	+	+	+	+	+	+	+		+		+		
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"-woyng	+																		+			
'-woyng																			+			
'-woyk	+																	+	+	+		
3. -wuyng	+																			+		
'-wuyk	+																					
4. -wong	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+	+		+
"-wong	+	+			+	+	+	+	+	+	+	+	+			+		+	+	+		+
'-wong	+	+	+		+	+	+		+	+	+	+	+	+		+		+	+	+		+
'-wok	+	+		+	+	+	+		+	+	+	+	+	+	+	+		+	+			+
-ywong						+					+	+	+	+	+	+					+	+	+
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'-ywok					+		+				+	+		+		+	+				+		+
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'-ang	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+			+
'-ak	+	+	+	+		+	+	+	+	+	+	+	+	+	+		+	+	+			+
-yang					+	+	+	+					+	+	+	+	+	+	+		+	+	+
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'-yang					+	+	+						+	+	+	+	+	+	+		+	+	+
'-yak					+	+	+	+					+	+	+	+	+	+	+		+	+	+
-wang	+	+	+	+	+	+	+						+	+	+		+	+	+			+
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'-wak	+	+		+	+	+			+				+		+	+		+	+	+		+
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"-wung																						
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'-wuk	+	+	+															+				
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'-ywung						+						+							+			
'-ywuk			+	+	+	+	+	+				+			+	+		+		+	+	+	+

| | k | kh | kk | ng | t | th | tt | n | p | ph | pp | m | c | ch | cc | s | ss | q | h | hh | - | l | z |

(vol 2)	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
7. -yeng	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+
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9. -won	+	+			+	+	+		+	+	+		+	+	+	+	+	+	+	+		+	
"-won	+	+				+	+		+			+	+	+	+	+	+	+	+			+	
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'-walq	+	+	+		+	+	+	+		+	+				+	+	+	+				+	

vol 3

11. -wun	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
-wun	+		+	+				+	+	+	+					+	+						
"-wun	+	+	+					+	+	+	+					+							
'-wun	+		+	+				+	+	+	+					+	+						
'-wulq	+	+	+	+				+	+	+	+					+	+						
-ywun	+	+		+	+	+	+						+	+		+	+	+			+	+	+
"-ywun		+	+	+									+	+		+	+			+		+	+
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12. -en	+	+	+	+				+	+	+									+			+	
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'-yelq	+	+			+	+	+	+	+	+	+	+	+	+	+	+		+			+	+	+
-wen		+	+	+												+	+			+			
"-wen	+	+	+	+												+	+			+			
'-wen	+	+	+	+												+	+			+			
'-welq	+	+	+	+												+	+						
	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z

(vol 3, 12)	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
-ywen	+						+						+	+	+	+		+	+	+		+	+
"-ywen	+	+	+		+		+						+	+	+	+		+	+	+		+	+
'-ywen	+				+		+						+	+		+	+	+	+	+		+	+
'-ywelq	+	+			+								+	+	+	+		+	+	+		+	+
13. -om													+	+	+	+							
"-om														+									
'-om													+			+							
'-op													+			+							
-um	+	+	+	+												+	+				+		
"-um	+		+	+				+	+							+	+						
'-um	+		+	+												+	+						
'-up	+	+	+	+												+	+				+		
-im					+	+	+	+					+	+		+	+					+	+
"-im						+	+						+	+		+	+					+	+
'-im					+	+	+	+					+	+		+	+					+	+
'-ip					+		+						+	+	+	+	+					+	+
-am	+	+			+	+	+	+	+				+	+	+	+	+		+	+	+		+
"-am	+	+			+	+	+						+	+	+	+	+		+	+	+		+
'-am	+	+			+	+	+						+	+	+	+	+		+		+		+
'-ap	+	+			+	+	+	+					+	+	+	+	+		+	+	+		+

vol 4

15.	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
-em						+					+							+	+				
"-em	+		+	+							+	+						+	+				
'-em	+	+		+					+		+							+	+				
'-ep	+	+	+	+					+		+							+	+				
-em	+	+			+	+	+	+	+		+		+	+	+	+	+		+		+	+	+
"-em		+			+	+	+	+	+				+		+	+	+		+		+	+	+
'-em		+			+	+		+	+				+	+		+	+		+			+	+
'-ep	+	+	+	+	+	+	+	+	+				+	+	+	+	+		+	+	+	+	+
16. -woW	+	+		+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+	+	+	
"-woW	+	+			+		+	+	+	+	+	+	+	+	+		+		+	+	+		+
'-woW	+	+		+	+	+	+	+	+	+	+	+	+		+		+		+	+	+		+
-ywoW	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+	+	+	+
"-ywoW	+	+		+	+	+	+	+	+	+	+	+	+		+	+		+	+	+	+	+	+
'-ywoW	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+	+	+	+	+	+	+
17. -wuW	+	+	+	+	+	+	+		+	+	+	+	+	+		+	+		+	+	+		+
"-wuW	+	+	+	+	+	+	+		+	+	+	+	+	+		+			+	+	+		+
'-wuW	+	+	+	+	+	+	+		+	+	+	+	+	+		+			+	+	+		+
-ywuW	+		+			+	+	+	+	+	+	+	+	+		+	+		+	+		+	+
"-ywuW	+					+	+	+	+				+	+	+		+	+		+	+		+
'-ywuW						+	+	+	+				+	+	+		+	+	+	+	+		+

vol 5

18.	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
-o													+	+	+	+	+						
"-o													+	+		+	+						
'-o													+	+	+	+	+						
-i		+			+	+	+	+	+	+	+	+	+	+		+	+		+	+		+	+
"-i		+			+	+	+	+	+	+	+	+	+	+		+	+		+			+	+
'-i		+			+	+	+	+	+	+	+	+	+	+		+	+		+			+	+
-oy					+	+		+	+	+	+	+	+	+		+	+		+	+	+		+
"-oy					+			+		+	+	+	+	+					+	+	+		
'-oy					+	+	+		+	+	+	+	+	+		+			+		+		+

| | k | kh | kk | ng | t | th | tt | n | p | ph | pp | m | c | ch | cc | s | ss | q | h | hh | - | l | z |

(vol 5, 18)	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
-uy	+	+	+	+									+	+				+	+				
"-uy	+	+	+	+									+					+	+				
'-uy	+	+	+	+									+	+				+	+				
19. -woy	+	+		+	+	+	+	+					+	+	+	+		+	+	+		+	
"-woy				+	+	+	+						+	+				+	+	+		+	
'-woy	+	+		+	+	+	+	+					+	+	+			+	+	+		+	
20. -ay	+	+		+	+	+		+	+		+	+	+	+	+	+		+	+	+			
"-ay	+	+		+		+	+	+	+		+	+	+					+	+				
'-ay	+	+		+			+	+	+	+	+	+	+	+	+	+		+	+	+			
-way	+	+																+	+				
"-way	+																						
'-way	+	+		+								+							+				
21. -wuy	+	+	+	+														+	+	+			
"-wuy	+	+	+	+														+	+	+			
'-wuy	+	+	+	+	+													+	+	+			
-ywuy	+	+	+		+		+	+					+	+		+	+		+		+	+	+
"-ywuy	+	+	+			+							+	+		+	+				+	+	+
'-ywuy	+	+											+	+	+	+	+	+	+			+	+

vol 6

(vol 6)	k	kh	kk	ng	t	th	tt	n	p	ph	pp	m	c	ch	cc	s	ss	q	h	hh	-	l	z
22. -yey	+	+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+
"-yey		+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+			+
'-yey	+	+	+		+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	+
-ywey	+	+																+	+	+			
"-ywey																							
'-ywey	+				+								+	+		+	+	+	+	+	+	+	+
23. -wo	+	+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	
"-wo	+	+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	
'-wo	+	+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	
24. -a	+	+			+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		+	
"-a	+	+			+	+	+	+	+	+	+	+	+	+		+	+	+	+	+		+	
'-a	+	+			+	+	+	+	+	+	+	+	+	+		+	+	+	+	+			
-ya	+	+	+										+	+		+	+		+				
"-ya													+	+	+	+	+		+				
'-ya													+		+	+	+		+				
-wa	+	+	+	+	+	+		+				+		+	+	+	+	+				+	
"-wa	+	+			+	+	+						+	+	+	+	+	+	+	+		+	
'-wa	+	+					+	+					+	+	+	+	+	+	+	+		+	
25. -wu	+	+	+	+					+	+	+	+	+	+	+	+	+					+	
"-wu	+	+	+	+					+	+	+	+	+	+		+	+					+	
'-wu	+	+	+	+					+	+	+	+		+		+	+					+	
-ywu					+	+	+						+	+		+	+					+	+
"-ywu					+		+						+	+	+	+	+					+	+
'-ywu					+		+						+	+	+	+	+					+	+
26. -e	+	+	+	+														+	+				
"-e	+	+	+	+															+				
'-e	+	+	+	+														+	+				
-ye					+	+	+	+					+	+		+	+				+	+	+
"-ye					+	+	+	+					+	+	+	+	+				+	+	+
'-ye					+	+	+	+					+	+		+	+				+	+	+

k kh kk ng t th tt n p ph pp m c ch cc s ss q h hh - l z

5.0. Forms: nouns.

The noun typically enjoys a certain independence. Unlike verb stems, which require that some ending be attached, a noun may appear unaccompanied by a particle or other marker. In the broadest sense, the noun is a kind of default category comprising many subcategories which are defined by combinatorial restrictions. A pure noun typically can occur as a nominative-marked subject and/or as an accusative-marked object, while a pure adverb does not attach a case marker. But a word that names a time or a place functions sometimes as a pure noun and sometimes as an adverb, and there are other cases where a single word is described as belonging to two or more parts of speech.

5.1. One-shape and two-shape elements.

Certain particles have one shape after a word ending in a consonant and a different shape after a word ending in a vowel. There are certain inflectional endings, too, which have one shape when attached to a stem with a final consonant and a different shape when attached to a stem with a final vowel. (For the purpose of defining vowel-stem and consonant-stem conjugations, the basic ···w- of our analysis, in origin a lenited **p**, counts as a consonant, and the basic ···-l-, originally part of the stem, is treated as an extension of the vowel.) There are other particles and endings, some of which have but one shape and some of which have more than one but do not select the shape on the basis of the final phoneme of the element to which they are attached. Particles and endings of the first type can be called TWO-SHAPE, and those of the second type can be called ONE-SHAPE, even though elements of either type may surface in additional shapes due to other factors, such as the automatic reinforcement of a voiceless obstruent after a voiceless stop (§2.6). In colloquial Korean the stem of the copula belongs with the two-shape elements, but our Romanization takes the zero shape as an abbreviation: **tangsin ita** 'it's you', **na 'ta** 'it's me'. Examples of one-shape particles are **ey** 'to, at', **uy** 'of' (for which the pronunciation is /ey/, too), **kkaci** 'all the way up to, even', **to** 'even, also', **se** 'at, from', **man** 'just, exactly', **mata** 'each, every', **puthe** '(starting) from', ... Here are examples of two-shape particles, with the postconsonantal shape (as elsewhere in this book) cited first: **i/ka** (nominative), **ul/lul** (accusative), **iya/ya** 'only if it be', **un/nun** (subdued focus), **kwa/wa** 'with, and', **iyo/yo** (polite style). The particle **ulo/lo** (manner, direction, state or change of state, means, reason, ...) is peculiar in that the postvocalic form **lo** is used also after the consonant ···l, as in **yenphil lo sse** 'writes it in pencil'; contrast **yenphil ul sse** 'uses a pencil'. Examples of the one-shape and two-shape endings will be found in §9.

5.2. Nouns.

A noun, in the broad sense, occurs in at least one of four environments:

(1) before a particle: **achim i wass.ta** 'morning has come';

(2) before the copula **i-** as a complement: **achim ita** 'it's morning';

(3) before a noun or noun phrase which it modifies: **achim hayq-pich** 'morning sunlight';

(4) in absolute constructions, which may be interpreted in any appropriate role, including adverbial: **achim wass.ta** 'morning has come' (= **achim i wass.ta**) or 'arrived in the morning' (= **achim ey wass.ta**).

In normal speech, nouns are never followed by pause in environments 1 and 2; in environments 3 and 4, pause is more frequent, especially in 4. The English obligatory categories of singular/plural, definite/indefinite, and general/specific are essentially absent from Korean nouns. Without special marking, as by a numeral or by an element such as ··· **tul** '(as) a group', we are not told whether **chayk** means '(a) book', 'the book', '(some) books', or 'the books'. Specific words are intrinsically singular or plural, notably such pronouns as **na** 'I/me' and **wuli** 'we/us', but the intrinsic meaning may be overridden by semantic extensions, just as the English royal or editorial "we" is often used as a singular. According to Seok-Choong Song (Song Sekcwung) "plural marking in Korean individuates, whereas the unmarked category categorizes its referent"; he notes that plural marking is obligatory for nouns that have "specific reference", and that is borne out by pronouns, proper names, and the like.

5.2.1. Quasi-free nouns.

A quasi-free noun has great freedom of combination but it is always preceded by an element such as **i** 'this', **ku** 'that', or **ce** 'that (yonder)', or by an adnominalized phrase 'which (is/does) ... ' or a modifying noun phrase. (In contrast, the quasi-adnouns, §5.3.1, are always followed by a noun or a noun phrase.)

The following list of quasi-free nouns includes some that are often called "imperfect nouns" (**pulwancen myengsa**) or "dependent nouns". I refer to some of these as postnouns and postmodifiers. What a given quasi-noun may be preceded by is an individual property of the word. Some of the words are occasionally free under highly restricted circumstances: **thek** need not be modified when it is followed by **ěps.ta** or **ěps.i**. But idiomatic expressions of that sort deserve separate entries in the lexicon.

<div align="center">LIST OF QUASI-FREE NOUNS</div>

··· **ca** 'person'	··· **kkan (ey)** 'by one's own account'
··· **ccak** (= **ccok**) 'direction';	··· **kos** 'place'
= **kkol** 'appearance'	··· **mulyep** 'time'
··· **ccok** 'direction'	··· **nolus** 'job, role'
··· **cek** 'time'	··· **ppal** 'manner' (rare)
··· **chi** 'stuff, thing; guy, one'	··· **pun** 'esteemed person'
··· **chuk** 'side'	··· **tey** 'place, ... '
··· **chwuk** 'group'	··· **thas** 'fault' (also verbal noun
··· **cīs** 'act, motion'	transitive 'blame')
··· **cuum (cium)** 'approximate time'	··· **thek** 'reason, limitation; resources; ... '
··· **hay** 'possessed thing, one's'	··· **ttolay** 'of (that) age or size'
··· **i** 'person'	··· **ttan (ey)** '(by) one's own kind
··· **ilsswu** 'constant (bad) habit'	judgment'
? ··· **keli** 'material, ... '	? ··· **ttawi** 'of the sort, and the like'
··· **kes** 'thing, one, fact, ... '	? ··· **tūngci** 'vicinity'
··· **key** 'one's place, home'	··· **tūngtung** 'et cetera'

Restrictions on the occurrence of the quasi-free nouns vary. Some are severely limited, as shown by the individual entries in Part II. Certain postmodifiers and postnouns that can perhaps be regarded as quasi-free have not been included here for various reasons. A few words that others have included in this category are omitted because I have found them in sentence-initial position and decided to treat them as free nouns: **ttaymun** 'reason; the sake of ·· ' is omitted only because a sentence can begin **Ttaymun ey ···** 'Therefore -- ' and we might well consider that usage an abbreviation of **Kuleh.ki ttaymun ey ···** 'Because of its being that way -- '. See also the entries **chwuk, nom, nyen**, and **nyesek** in Part II. And notice the uncommon use of **palo** (3 in the entry of Part II).

In contrast with the quasi-free nouns, BOUND NOUNS (§5.2.8) occur only in very limited types of compound (like the "cran-" of English "cranberry"). Most are here treated as bound adnoun = prenoun (or prefix), bound postnoun (or suffix), and bound preverb (bound adverb or prefix). There appear to be several BOUND PREPARTICLES, as listed in §5.2.9.

5.2.2. Free nouns.

A noun that is further unspecified is simply a free noun. At present I do not break the category down into as many subclasses as might be desirable for various purposes. I fail to distinguish COUNT nouns, MASS nouns, ABSTRACT nouns, etc., though the distinction can surely be drawn on the basis of the selection of counters; nor do I here distinguish between ANIMATE and INANIMATE, but see §10.8.8 for a useful correlation of distribution with the corresponding verb classes, in that there are verbs that have only animate subjects or only animate objects (or both). A more refined classification will emerge

from further syntactic analysis. For purely practical convenience, I set up the subclass of PROPER NOUNS and that of DEICTICS, which includes pronouns and indeterminates (interrogative-indefinites). There are also deictic verbs and adjectives (**kule-** 'do that way', **kuleh-** 'be that way'). Verbs of motion can also be described as deictic, since the choice of **o-** 'come [to where I am]' and **ka-** 'go' depends on the position (location or psychological involvement) of the speaker and the hearer: **o-** "move toward me / here / now" is the semantically marked form, and **ka-** is the default. On the subtleties of choosing one or the other of this pair of verbs, see [1]Yi Cenglo 1985. (Standard Japanese uses the corresponding pair of verbs in a similar fashion. There may be dialects in both Japan and Korea that differ from the standard usage.) [1]Yi Kitong 1988 describes the semantic difference between **o-** and **ka-** as moving TOWARD or AWAY FROM the "deictic center", which includes not only "me / us, here, now" but also "the normal / desirable state, proper shape / conditions".

5.2.3. Proper nouns: names and titles.

Personal names are often of two syllables, and one of the syllables is sometimes used as a generation reference, so that brothers may be named **Sengen** and **Cwuen**, or **Cengkil** and **Cengmin**. The Chinese character for the common syllable is called the **tollimq ca** or **hang.lyelq ca**. Female names often take as a second syllable the suffix **-huy** (a Chinese loan meaning 'princess'), and in rapid pronunciation **-huy** sounds like **-i**, the common hypercoristic suffix that is added only to names ending in a consonant and is not to be confused with the nominative marker **i / ka**: **Chwunhyang-i (ka / lul)** 'Little Chwunhyang [as subject/object]', **Chwunhyang (i / lul)** 'Chwunhyang [as subject/object]', **Chwunhuy (ka / lul)** 'Chwunhuy [as subject / object]'. A girl who is called /swuni/ may bear the straightforward name **Swunhuy**, incorporating the suffix **-huy**, but she may write her name with a spelling variant **Swuni**; or, she may write it **Swun-i**, especially when it is a short form for names like **Pokswun(-i)** or **Cengswun(-i)**. Similar short forms are heard for other names, such as **Swuk-i** for **Yengswuk-i**, **Tong-i** for **Poktong-i**, ... Either the family name or the given name may be of one or two syllables − rarely, even three − so that a full name may have as few as two or as many as four syllables: **He Wung, Payk [1]Nakcwun, Sen.wu Wung, Ulqci Muntek, He Nanselhen**. The three-syllable type is the most common in Korea, as it is in China. Given names of three syllables are unusual and typically of non-Chinese origin, though the syllables may sound like Chinese elements, and characters are sometimes assigned to them on a phonetic basis. Korean names are usually said with the family name first, as in Chinese, Japanese, and Vietnamese. When the personal name has two syllables, some people like to Romanize it as two words, with or without a hyphen. A man named **Kim Cen.il**, for example, may want to write his name as Kim Cen Il or Kim Cen-Il and in English call himself C.I. Kim. Some Koreans have "foreign" names, either in addition to Korean names, or in place of them; the name is often Biblical. When the family name is Korean it is probably better to write that first: **Kim Phollin** (= Pauline), **Cen Tawis** (= David). If the name is that of a foreigner (other than Chinese or Japanese), it is best to leave the name in the foreign order even in Hankul, and to let it revert to the foreign spelling when Romanizing: "Samuel E. Martin" not "Martin Samuel-E.". In English texts Koreans usually try to follow the foreign order, so that the late [1]Yi Sungman is referred to by the English spelling he preferred "Syngman Rhee" and the educator **Payk [1]Nakcwun** writes in English under the name "George L. Paik".

A name, either a surname or a full name, is often followed by a TITLE: **sensayng** (or with varying connotations **ssi, kwun, sepang**, ...) 'Mr' (ssi can sometimes mean 'Mrs' according to Roth 281), **puin** or stylishly **samo (nim)** or **sensayng (nim) samo** or **sensayng samo nim** 'Mrs', **yang** 'Miss', **sayngwen** 'Mr' or ' -- Esquire', **cwusa** 'director; petty officer', **paksa** 'Dr' (Ph.D.), **uysa** 'Dr' (medical), **moksa** 'Reverend', **sinpu** 'Father', **kyoswu** 'Professor', **kak.ha** 'His / Your Excellency', **cenha** 'His / Your Royal Highness (Prince --)', **sengha** 'His / Your Holiness (the Pope)', **sengsang** 'His / Your Majesty (the King)', **phyeyha** 'His / Your Imperial Majesty', etc. Most of the titles can be followed by the postnoun **nim** 'esteemed', and **nim** sometimes follows a name directly: **Yeyswu nim** 'Jesus', **Sek.ka-yelay nim** 'Buddha', **Kongca nim** 'Confucius', **Mayngca nim** 'Mencius'. In bookish style contemporary names occur this way, too: **Kim nim** '(Mr) Kim', **Sen.wu nim** '(Mr) Sen.wu'.

There is an adnoun title **Sēng** ··· 'Saint ·· '. In addition, two adnouns are in current use as titles in South Korea: **Misu** 'Miss' (of a young unmarried professional woman or office colleague), **Misuthe** 'Mr' (of a male colleague): **wuli cicem ey se īl hanun Misu Kim hakwu Misuthe Pak un** 'Miss Kim and Mr Pak who work in our branch office'. In North Korea, the postnoun title **tongci** 'comrade' is in vogue: **Kim tongci** 'Comrade Kim'. Placenames have a basic form (like **Phyengyang, Payktwu, [1]Naktong, Cēycwu,** etc.) which can be considered a free noun, even though frequently the more common version includes a following category designator to specify the kind of place: **Phyengyang si** ('city'), **Payktwu san** ('mountain'), **[1]Naktong kang** ('river'), **Cēycwu to** ('island'). Other common designators are **tō** 'province', **kwūn** 'county (prefecture)', **myēn** 'township', and the somewhat less productive **[1]yelqto** 'archipelago', (-)**man** 'bay', (-)**hāy** 'sea', (-)**yang** 'ocean', (-)**hāng** 'port', (-)**lī** 'village', (-)**kwu** 'ward', (-)**kwung** 'palace', (-)**sa** 'temple', (-)**yek** 'station', (-)**sen** 'line', (-)**to** 'ferry'. And to the list we can add (-)**mun** 'gate' as in **Kwanghwa mun** (the main gate of Kyengpok Palace), (-)**cwa** 'constellation' as in **Kolay cwa** 'the constellation Cetus'. As remarked earlier, Koreans show a marked tendency to take any monosyllabic word and tack it on to an adjacent word, so that a name like **Nam san** 'South Mountain' or **Hān kang** 'Han River' is often taken to be a single word. For consistency, it seems better to Romanize the more productive category designators as separate words, even though they are monosyllables and even when they are attached to other monosyllables. Notice that **to** 'island', **to** 'ferry (point)', and often (§2.7.2) **tō** 'province' are homonyms. Some of the provinces are divided into North and South (like the Dakotas): **Phyengan puk to** 'North Phyengan (province)', **Phyengan nam to** 'South Phyengan (province)'. When writing, Koreans often treat **puk-to** and **nam-to** as units. A list of the Korean provinces will be found in Appendix 3. In Appendix 4 you will find lists of Japanese placenames with their Korean readings. It must be kept in mind, however, that Koreans often use phonetic approximations to the Japanese pronunciation for many Japanese names, and especially for those which are not of Chinese origin, such as Nagasaki (**Nakasakhi**). For other foreign names there are sometimes two forms: **Mikwuk** or **Ameylikha** 'America'. In general the "foreign" forms are more modern and sophisticated, but those based on Chinese characters are more succinct and often better known. (They are also easy to abbreviate: **Mi-Han** ··· 'American-Korean ·· '.)

Other proper names are book titles, corporation names, and the like. These are often characterized by abbreviation and ambiguity, sometimes intentional, so that it is not always easy to figure out the appropriate word division for the Romanized form. Such a proper noun will frequently have a final category designator that functions like those for places mentioned above: (-)**sa** 'company', (-)**sā** 'history', (-)**cen** 'tale' or 'biography', etc.

5.2.4. Deictics.

Deictics are those elements which alternate in reference depending on who is speaking. To be consistent we would have to include as deictics the honorific marker -(u)si-, which marks the subject of a verb as someone other than the speaker because it is someone toward whom the speaker is showing special esteem; the honorific particle **kkey** 'to someone esteemed'; personal names; and perhaps a few other things that, for various reasons, we will treat separately. Notice that names and titles are very often used as pronominal substitutes. Perhaps the most common polite way to say 'you' is **sensayng nim** or **sensayng**. Without going into all the details of usage, we can assemble the following lists.

<div align="center">PRONOUNS</div>

I / me	na (/ nay)	we / us	wuli
I / me [formal]	ce (/ cey)	we / us [formal]	cē-huy
you	ne (/ ney)	you all	ne-huy
you [familiar]	kutay	you all [familiar]	ku (ney) tul
	caney		caney tul / kkili
	i sālam[1]		i(-i) tul / kkili
you [impersonal]	tangsin	you all [impersonal]	tangsin tul / kkili

you [to inferior]	ce (/cey)	you all [to inferiors]	ce tul/kkili
		you all [disrespectful]	keyney[2]
you [formal]	sensayng (nim)	you all [formal]	yele pun
'Sir'	sensayng (nim)		
'Madam, Ma'am'	puin/samo (nim)		
oneself	caki, ce,	themselves	caki tul, cĕhuy
	casin, cachey		
itself	cachey		
he/him, she/her	ku ⋯ (i, sălam,	they/them	ku ⋯ tul,
	pun, nom, ca, ...)		ku ⋯ ney (tul)
	ce ⋯ (i, sălam,		ce ⋯ tul,
	pun, nom, ca, ...)		ce ⋯ ney (tul)
it ('this')	i (kes)	they/them	i (kes) tul
('that')	ku (kes)		ku (kes) tul
('that')	ce (kes)		ce (kes) tul

¹ Also: 'my spouse (he/she)'.   ² ?< keki ney; ?< ku ai ney (CF kaytul < ku ay tul)

CORRELATIVES

Indeterminate	Generic	Proximal	Mesial	Distal
enu	ămu	i/yo	ku/ko	ce/co
'which, some'	'any(one)'	'this (one)'	'that (one)'	'that (one) yonder'
eti	(ămu tey)	yeki/yoki	keki/koki	cĕki/coki
'what/some place'	'any place'	'this place'	'that place'	'that place yonder'
ecci	ămuli	ili/yoli	kuli/koli	celi/coli
'what/some way'	'any way'	'this way'	'that way'	'that way yonder'
ette (ha-)	ămule	ile/yole	kule/kole	cele/cole
'how, somehow'	'anyhow'	'thus'	'so'	'so, yea'

Notice that **eccay = ecc' 'ay** is contracted from **ecci hay** 'is/does what way', and **etteh-, ămuleh-, ileh-, kuleh-,** etc., are from **ette ha-, ămule ha-, ile ha-, kule ha-,** etc.

The word **eti** can be regarded as from **etey**, a dialect variant of **enu tey** 'what place' (CF p. 25). And **ĕncey** 'what/some time, when' is contracted from **enu cek (ey)** '(at) what time'; it is unclear just how the related words **i(n)cey** 'now', **ecey** 'yesterday', and **kucey/kucekkey** 'day before yesterday' were derived. Other indeterminates are **nwukwu** (but **nwu** before the nominative marker **ka**) 'who/someone', **mue(s)** 'what/something' (obsolete **musum/musam**), **musun** 'which/some ⋯ ', **meych < myech** 'how much/many, some amount/number', **elma** 'what/some quantity' (< ⁻en ⁻ma < *e⁻nu ⁻ma), and **way** 'for what/some reason, why', which has the shape **wĕyn** when adnominal, as in **wĕynq îl in ya** 'what's the matter?' (with falling intonation) or 'is something the matter?' (with rising intonation). The word **etten** ⋯ 'what sort of ⋯ ' is the modifier form of **etteh-**, thus ultimately an abbreviation of **ette han** ⋯ ' ⋯ that is what way'. Although I am unable to offer examples of early sentences that use the indeterminates in a non-interrogative way, I presume that the language of the 15th century did not differ from the modern language in that respect.

There are a few paradigmatic gaps in the use of the deictics. As Cang Sekcin observed, you can say **i ttay** 'this time' and **ku ttay** 'that time' but not *ce ttay 'that [distant] time'. The derived forms **ipttay** 'up to now' (= **yethay**) and **cĕpttay** 'not long ago' are not paralleled by *kupttay 'up till then'.

The proximal and mesial deictics can also be used anaphorically, but not the distal. In that respect, Korean differs from Japanese, where the corresponding (k)a- words can be used to mean 'that obvious

-- [known to both you and me or to all]'. For Korean anaphora there is only a two-way distinction of i and ku (Pak Hwaca 1982). In i kes ce kes 'this and that; something or other' the distal deictic is not anaphoric though it is indeed metaphoric, for the 'that' is not visible.

The connotations of personal pronouns are apt to change through time. The anaphoric designator ku 'that one' is used as a third-person pronoun only in rather formal writing, for it is impersonal as compared with ku sālam/i/nom/... . When used, it has a masculine orientation, but it can also refer to females. A fairly new (post-1945?) pronoun ku-nye (perhaps modeled on Japanese ka'no-zyo) is used consistently by some authors for references to 'she/her' while others refer to females by using ku and ku-nye interchangeably. 1880 Underwood says i, ku, and ce are "disrespectful when referring to people". These days it is quite popular to use terms with the honorific ··· nim for pronominal reference. Intimates sometimes use caki 'oneself' to refer to either the first or the second person. For the second person, polite usage calls for a title or name + title: sensayng nim, Kim sensayng 'you(, Mr Kim)'. Informal words for 'you' include i sālam, which can also be used to mean 'this person; he/him, she/her'. And i phyen can refer either to 'you (all)' or (= i ccok) to 'I/me; we/us', in addition to the basic meaning of 'this side'.

5.2.5. Adverbs.

An adverb is a noun that occurs typically (and a few of them perhaps exclusively) in absolute position, i.e. as an ADVERBIAL PHRASE. There are also unusual cases where the adverbial phrase modifies an entire copula sentence: Pelsse chwulkun ip.nikka 'Are you leaving for work already?'; Pelsse Taycen ita 'It's already Taycen' (on a train trip); Tayk i palo Kim Pok.il ssi 'sey yo? 'Are YOU, then, Kim Pok.il?'; Enu-tes kaul iess.ta 'It was autumn before we knew it'; Acwu yātan tul ita 'What a fuss!' (CM 2:52); Kkok machan-kaci 'ta 'They are exactly the same' (CM 2:52); I ttang un ōn-thong tōl-path iess.ta 'This land was all a field of stones' (CM 2:52).

One step removed is the still more unusual case where the adverbial phrase is adnominalized (§11.9) by position only: kas sumul (ita) '(he is) just 20', palo ku chayk 'that very book'; tan hana (lul) 'just one', kyewu twūl (in ya) 'only two?' This is especially common with time and place nouns: te alay 'farther down', cokum aph 'a little ahead', acwu chôykun (ey) 'quite recently'. One case is especially interesting: Kkway yele chayk tul i iss.ta 'There are quite a lot of books', in which the adverb kkway apparently modifies the adnoun yele despite Kkway chayk i iss.ta '(he) has quite a lot of books', in which kkway modifies the sentence chayk i iss.ta 'books exist', because we can say Kkway yeles i iss.ta 'There are quite a lot of them'. CF (CM 2:56) kkway say kēnmul 'quite a new building', acwu yele sāqken tul 'very many incidents'. (For a somewhat different interpretation of these structures, see CM 1:453-4.) Adverbs, especially those of degree, can modify other adverbs: acwu ppalli 'very quickly'.

Most adverbs can be followed by either the particle un/nun or the particle to, and the ubiquitous particle tul sometimes attaches to an adverb: Phyen hi tul hasey yo 'Take it easy (you people)!' The only clear exceptions seem to be mōs 'definitely not, cannot' and an(i) 'not', and certain conjunctional adverbs (mich, cuk, ko lo, ...); KEd carries one example of an tul V: An tul mek.nun ya? 'Aren't you folks eating?' It has even been suggested that, after all, to may just be possible with both an(i) and mōs as these examples indicate: Ku nun kongpu lul ani to halye 'n' i wa meli to napputa 'On top of not studying, he has a poor head, too'; Ku nun kongpu lul mōs to halye 'n' i wa nung.lyek to ēps.ta 'In addition to not studying, he is lacking in ability, too'; Cham mōs to sayngkyess.ta 'How ugly he is!'. In Middle Korean a'ni could be followed by 'two and 'non and sometimes an adverb or adverbial phrase intervened before the verb; see Part II. What is more, a'ni can appear directly before the accusative, locative, and comitative markers as if it were a noun. Such structures are the result of a direct nominalization of a noun predication with the copula form (we expect 'i'lwom or 'i'ywom) ellipted and the particles attached to a'ni itself:

"twul[h] a'ni 'lol cwo'cha 'SSYWUN 'hosya'm i'la (1465 Wen 1:1:2:57a) 'it is that he follows pursuing what is not two [but one]'.

"*twul*ʾh i "*twul*[h] aˑni ˑlol ilˑhwuˑm i KHWONG-ˑSYANG ˑiˑla ˑhoˑsi.n i ˑˑla (1464 Simkyeng 38a) 'said the name for two not being two is "unreality"'

swon s kalak ˑ*kwa swon s kalak aˑni* ˑ*yey* "*naˑmoˑn i* ˑ*Gwa aˑni* ˑ*Gway* "*twul*ˑ*hi* "*ep.suˑmol nilo*ˑ*si.n i* ˑˑ*la* (1462 ¹Nung 2:61b) 'said that to the finger and the non-finger, the remaining and the non-remaining there are no two of them'.

Ani is used alone before the copula (**Ani 'ta** 'It is not') and as an interjection meaning 'No!'; **mõs** is sometimes followed by the versatile particle **tul**. The only other occurrence of the morpheme **mõs** not directly followed by a verb seems to be in the word **calmos** 'mistake', derived from **cal mõs** ··· 'can't ·· very well'; **calmos** is also used in absolute position, as an adverb, so that **calmos hayss.ta** can mean either 'made a mistake' (= **calmos ul hayss.ta**) or 'did it wrong' (= ··· **calmos hayss.ta**). CF **cal (l̥) mõs hayss.ta** 'did (or could) not do it well'

Among the other adverbs those which seldom, if ever, occur with focus particles such as **un / nun** or **to**, can usually be followed by the plural marker **tul**, which is the ultimate test for separability. Examples of adverbs marked by **un / nun, to, man**, etc., will be found under the entries for individual particles in Part II. Most adverbs of time can also take the ablative **puthe** '(starting) from' and/or the allative **kkaci** '(continuing) all the time till': **Ilccik puthe al.ess.ta** 'I knew it from early on'; **Akka puthe kitalyess.ta** 'I've been waiting for some time; I started waiting a while ago'. CF **pelsse puthe** 'for some time now'.

If we were to regard the adverb as a noun that has dropped its marker (a handy but inaccurate concept), the appropriate particle would be **ulo / lo** or, especially with time words, **ey**. Sometimes we find parallel or competing expressions, with and without the particle: **põthong (ulo)** 'usually', **onul (ey)** 'today', **ili (lo)** 'this way', ...

The following lists are not exhaustive, but ample. To make the lists more useful, I have divided the adverbs into rough semantic categories, in lieu of the more rigorous groups that will have to await further study: (1) adverbs of time, (2) adverbs of degree, (3) adverbs of contingency, (4) adverbs of assertion, (5) conjunctional (connective) adverbs, (6) adverbs of manner. There is overlap among the lists and with other lists; **way**, for example, is also listed as a deictic. Usually the English translations are enough to indicate which items are used frequently in other than absolute position (e.g. **onul** 'today'). With a few exceptions, I have included neither phrases nor the large number of derived adverbs such as **ppalli** 'fast' and the phrases with ··· **hi** (< **ha-**). Notice also the regular inflectional category **-key** called adverbative (§9).

(1) ADVERBS OF TIME

Many of these words are pure nouns that are directly adverbialized. We know they are pure nouns because they can be used as subjects and objects: **Cikum i palo nala lul wi hay se il ul hay ya halq ttay 'ta** 'Now is the time we should work for the nation'. But some of the words in the list (**kot** 'immediately', **pelsse** 'already', ...) are not pure nouns, for they cannot be so used.

ēncey 'when; sometime'	**tangkum** 'at present'
(t)tãyttum 'at once'	**tangpun-kan** 'for the time being'
mak 'just (at the moment); just now'	**say lo** 'newly'
pelsse 'already'	**kas** 'just (+ ages by tens), barely, freshly,
pelsse puthe 'for some time now'	newly (born)'˙
imi 'already'	**onul (nal)** 'today'
icey, incey 'now; from now on'	¹**nayil** 'tomorrow'
cikum 'now'	**ec(ekk)ey** 'yesterday'
sipang [? lit] 'now'	**kuc(ekk)ey** 'day before yesterday' (Kyengsang
pangkum 'just now (= a bit ago)'	dialect ālay)
kumpang 'just now (= shortly)'	**ku-kkuc(ekk)ey, samcak-il** 'three days ago'

moley 'day after tomorrow'

kulphi 'three days from now, the day after the day after tomorrow'

ku-kulphi 'four days from now'

kumnyen 'this year'

cak.nyen, cīnan hay 'last year'

kulekkey, cāycak.nyen, ci-cinan hay 'year before last'

ku-kkulekkey, samcak-nyen 'three years ago, the year before the year before last'

[1]naynyen, myengnyen 'next year'

[1]nay[1]nay-nyen, hwūnyen, cāymyeng-nyen 'year after next'

[1]nay-hwūnyen, hwū-hwūnyen 'three years from now'

hwūq-nal 'someday (in the future)'

cangcha 'in the future'

aph ulo 'in the future'

iilkan 'in a few days'

taum 'next'

chacha, chachum 'gradually'

cēmcha lo 'gradually'

cēmcem 'more and more, gradually'

tangcho'y = tangcho (ey) 'at first, originally'

ponti, wen.lay, wenak, wenchey, a.ye(y) 'from the beginning'

ponsi 'originally, formerly'

nul, hangsang, hangyong 'always'

nosang 'constantly'

[1]yensok 'continually'

cwul-kot 'continually'

yēng(yeng) 'forever'

cina-sayna 'night and day' (< cīna sāyna)

cacwu 'often' (< cac-wu, derived adverb)

māyil 'every day'

māypen, māyyang 'every time'

māywel 'every month' (= tal mata)

māynyen 'every year' (= hay mata)

cāmsi, cāmqkan 'for a little while'

olay '(for) a long time' (< adjective infinitive)

twuko-twuko 'for a long time' (< vt gerund)

tangcang 'then and there, on the spot'

kot 'immediately'; 'id est' → (5)

kot-cang 'right away'

samus 'right away'; 'quite (different)' → (2)

inay 'immediately (after)'

elph^u/is 'at once'

nallay, nayngkhum / nuyngkhum 'promptly, lickety-split'

phettuk 'in a flash'

enu-tes 'before one realizes it, in no time'

enttus 'suddenly (seeing)' (? < enu-tes)

chēnchen hi 'slowly'

ppalli 'quickly' (derived adverb < ppalu-)

ellun 'at once'

ese 'right away'; 'please' → (3)

akka 'a (little) while ago'

coman-kan 'sooner or later'

iss.ta (ka) 'after a while, presently, shortly'

elma an ka (se) 'soon, before long'

mē(l)ci anh.e 'soon, before long'

kumsay = kumsey (< kumsi ey) 'any minute (now)'

mīkwu ey 'shortly, soon'

mence 'first of all'

mili 'in advance'

ciley 'in advance, beforehand'

piloso 'initially'

cheum (ulo) 'for the first time'

ilccik 'early'

ilqtan '(when) once; for the moment'

[1]imsi (lo) 'temporarily'

(kkuth-)kkuth-nay 'to the last, to the end'

olay kan man ey 'at long last'

mo chelem 'at long last; with great effort'

tutie, machim-nay 'at last'

nācwung (ey) 'finally'

ttay-ttay lo 'occasionally; now and then'

kakkum 'occasionally'

ittakum 'occasionally, now and then' (< iss.ta + -kum)

tele 'occasionally'; 'somewhat' → (2)

com chelem + NEGATIVE 'seldom'

(ttay) machim 'just in time'

twī-miche 'soon after'

miche '(not) yet' (< michye, vi infinitive)

acik, acik to 'still, yet'

han-kkep(en) ey, tan-swum ey, tan-khal ey 'at one time, at a stretch'

ilkē ey 'at one stroke, at the same time'

hamkkey 'together'

kath.i 'together'; 'like' → (6), derived adverb < adjective kath-

iuk.ko 'in a short while', abbr < iuk (= isuk) hako

(2) ADVERBS OF DEGREE (and QUANTITY)

A few of these words (tā, motwu, ...) also function as pure nouns and can be marked as subject (··· i / ka) or object (··· ul / lul).

phek, phek una 'very'
kkway 'very; relatively; fairly well'
ssek 'very'
ocwuk 'very; indeed'
maywu 'very' (derived adv < adj māyw-)
tāytan hi 'very' (derived adverb)
sīm hi '(does) very much' (derived adverb)
(ci)kuk hi 'very' (derived adverb)
nung hi (··· **halq swu iss.ta**) 'nicely, easily (able to do)' (derived adverb)
kkumccik 'i 'exceedingly' (derived adverb)
hako 'muchly' (gerund of obsolescent adj **ha-** 'great; much, many')
ha to 'indeed' (infinitive + particle)
sangtang hi 'relatively, comparatively, rather' (derived adverb)
cham 'real, very'; 'truly' → (4)
yekan 'to (no) usual degree'
cak-cak 'moderately, not too much'
tā 'all'
cōy(-ta) 'all'
motwu(-ta) 'all' < **mot-wu**, derived adverb < vt **mot-** (+ adv **tā**)
mot'-ta 'all' (abbreviation of **motwu-ta**)
kac.chwu(-kac.chwu) 'all' (derived adverb < vt **kac.chwu-**)
(ōn-)thong 'totally, completely, all'
mocoli 'entirely'
cen-hye 'totally' (< **cen ha.ye**)
yēng 'totally, completely, quite' (NKd 4628b); (= **yēngyeng**) 'forever'
kkang-kuli 'wholly' (derived adverb < vt **kkang kuli-** 'finish')
nemu 'too, overly, to excess' [+ adj or verb] (< **nem-wu**, derived adverb < vi **nēm-**)
humssin, humppek 'thoroughly, to the fullest (measure)'

cinthang 'to one's fill'
tamppᵃ/ᵤk, temppᵉ/ᵤk 'overflowing'
hānsa kho 'to the bitter end'
oloci 'mainly'
haphil 'of all things (persons, places)'
kocak 'at most' (= **mānh.e to**)
cēng 'very'; 'truly' → (4)
mopsi 'terribly'
acwu 'extremely; quite'
te 'more'
tewuk, tewuk(.)i, tewuk te 'still more'
com te 'a little more'
han-kyel 'much more; especially'
han-chung 'all the more'
tēl 'less'
tele 'somewhat'; 'occasionally' → (1)
ke(ci-)pan 'over half, nearly (all)'
yepuk 'how very much'
hwelssin by far, overwhelmingly'
kacang 'most; very'
camos 'highly, exceedingly'
samus 'completely (different); ? very hard'; 'right away' → (1)
muchek 'exceedingly'
mulye (+ NUMBER) 'no more than ··· '; CF **pulkwa** (adnoun, p. 148)
mulus (+ NUMBER) ' ··· or so'
taman 'just'
ocik 'only'
tanci 'merely'
cokum, com 'a little'; 'please' → (4)
ceypep 'fairly, tolerably, passably'
yak.kan 'some; somewhat'
keuy, kecin 'almost'
kyewu 'hardly' (derived adverb < ··· **kyew-**)
kansin hi 'barely'
pyel lo '(not) particularly'

(3) ADVERBS OF CONTINGENCY

mān.il < ¨**man'il** < ˙MEN-˙QILQ 'if' (~ ··· -**umyen**, -**ess.tula 'myen**; ~ ·· **kyengwu ey nun**)
mān.yak < ˙MEN-˙ZYAK 'if (perchance)'
sellyeng, selhok, selqsa 'if (mayhap)'
kālyeng, kāsa 'if (say)'

pilok < *pi'lwok* 'even if' (~ ····-**ci man**, -**e to**, -**ulq ci 'la to**, -**una**, -**kena**, -**ko to**; ~ ··· **ila to**)
ām' man 'however (it may be)'
āmuli 'however (much)'
machi 'like, as, if'

(4) ADVERBS OF ASSERTION

ama (to) 'perhaps; likely, probably'
kulssey 'maybe; well ... '
ha.ye-kan 'anyway, at any rate'

hamulmye 'all the more / less (so)'
molumciki 'by all means, necessarily' (< **molum cik hi**, derived adverb)

ha.ye-thun 'anyway, at any rate' (< ha.ye
    hatun)
kwā.yen, kwāsi 'sure enough'
ttan un 'now that I come to think of it, as for
    that, to be sure'
cengnyeng '(for) sure, certain(ly)'
(cin)sil lo, sil un 'truly'
cěng 'truly'; 'indeed, very' → (2)
cham (ulo) 'truly'; 'very' → (2)
cěng-mal 'truly'
cinceng (ulo) 'really'
cham-mal 'truly'
sāsil (lo / un) 'in truth'
ccacang 'for a fact, truly'
mīsangpul 'indeed'
ttok 'exactly'
palo 'right, precisely'
cuk 'precisely'; 'id est' → (5)
an(i) 'not'
mōs 'definitely not; cannot'
toce-hi 'cannot possibly'
selma (< hyelma < hyen-ma, CF elma)
    'by no means, surely (not)'
ilwu '(cannot) possibly' (derived adverb <
    ilu- 'reach')
kyel kho 'absolutely (not)' (< ··· hako)
cokum to '(not) even a little'

thel-kkuth mankhum to '(not) even a bit (a
    "hair-end")'
tom(uci) + NEGATIVE 'not at all'
hwaksil hi 'certainly' (derived adverb)
mattang hi 'by rights' (derived adverb)
ttopaki 'without fail; completely'
mullon, mulon 'of course'
pitan + NEGATIVE 'not only'
kwuthay(e) '[not] making a special effort
    (troubling oneself to do so)' [usually spelled
    kwuthayye]
cěypal 'please, hopefully, I hope'
pūti 'please'
ese 'please'; 'right away' → (1)
āmu-ccolok 'by all means; please' (? < āmu
    ecci ha-tolok)
u^{y}lyey (hi / lo) 'as usual; as a matter of
    course; without fail; for sure'
ungtang 'for sure'
kkok 'for sure'
pantusi 'certainly' (? < pantus 'i 'straight')
kiphil kho 'by any means, at all costs'
kie-(h)i 'by all means'
tāy-kwancel, to-taychey '(wh···) on earth?!'
tāypem 'on the whole, in general'
tāykay 'on the whole, in general'
mulus 'on the whole, in general'

(5) CONJUNCTIONAL (CONNECTIVE) ADVERBS

mich [literary] 'and' (also particle)
nāyci (nun) [literary] 'and'
tto-nun 'and/or'
tto 'and, moreover, further'
tto-han 'too, also, as well; either'
yeksi 'too, also, as well'
hok(-un) 'or else, or again'

tasi 'or, again, further'
kot 'id est'; 'immediately' → (1)
cuk 'id est, namely, to wit'; 'precisely' → (4)
tekwu(nta)na 'moreover, in addition'
tolie 'instead, rather, on the contrary'
ohilye 'rather, preferably, more likely'
ko lo 'therefore, so'

+ various forms of kule (kuli) ha-, etc., such as kulemyen 'then', kuliko 'and', etc.
+ "sentence connectors" (§13)
NOTE: kyem 'and, as well as' is treated as a postnoun.

(6) ADVERBS OF MANNER

ecci 'how; why'
way 'why'
cal 'well, nicely'
tul 'plurally, as a group' (also other parts of
    speech; see Part II)
kak-kak 'each, every; respectively';
    ~ ulo 'from moment to moment'
cey-kak.ki, cey-kakkum 'each one,
    severally'
selo 'mutually; together'

ta-cca ko-cca lo 'without the least warning,
    unexpectedly, suddenly, directly' (§5.2.9)
mōllay, nam mōllay 'unbeknownst to others,
    secretly' (< molu- + -ay)
musim kho 'unintentionally, innocently'
naypta 'violently, suddenly'
tul(.)ipta 'forcefully'
hampu (lo) 'recklessly' (§5.2.9)
makwu, mak' 'carelessly, at random; hard,
    much' (? derived adverb < mak-)

honca 'alone' (also a pure noun: ~ ka)
honca se 'alone, by oneself' (CF twul-i se
  'as a pair')
(il)pule 'on purpose, intentionally,
  deliberately',
cimcis 'on purpose, intentionally,
  deliberately'
puci-cwung (ey) 'unawares'

cikcep (ulo) 'directly; personally'
kāncep ulo 'indirectly'
sonswu 'with one's own hands' (< son +
  so, variant of se)
kosulan hi 'intact' (§5.6.1)
kaman hi 'quietly' (§5.6.1)
nalan hi 'in a row' (§5.6.1)
canttuk 'till full, to capacity; fully, intently'

+ impressionistic adverbs of movement and appearance (phonomimes, phenomimes − §14)
+ X hi, XY hi, X-yen hi (see entry hi in Part II)
+ N_1N_1-i (see entry -i in Part II)
+ N_1N_1, in which N_1N_1 = cōsim cōsim 'cautiously', kwuntey kwuntey 'in (various) places',
    pangwul pangwul 'in drops', ...
+ derived adverbs from inflected stems (see entries -i, -wu / -o in Part II)
+ adverbative forms (see entry -key in Part II)
+ a few infinitives (such as samka 'respectively') and miscellaneous inflected forms
+ deictic adverbs of manner and direction (ili, kuli, celi, ... ; §5.2.4) and derivatives
    (kulek celek, ... ; see Part II)
+ deictic adverbs of degree (i-taci, ku-taci, ce-taci, ... ; i man, ku man, ce man, ... ; see Part II)
+ many adjectival nouns + ··· cek with ulo: celqtay, mīswul, ...
+ many nouns with ulo: ekci, han kaci, him, īm.uy, kong, maum, macimak, pāntay, yelqsim, ...
+ many nouns with the temporal-locative particle ey: īcen, īhwu, achim, nac, pam, ...

I have not listed a category of adverbs of place. Except for a few adverbs derived from adjectives, such as mĕlli 'in the distance' and kakkai 'nearby', and adverbs derived from iterated nouns (kos.kos-i 'everywhere', cipcip-i 'in every house') expressions of place are usually phrases of noun + particle − typically ey, (ey) se, ulo, but also other particles − or place nouns used in absolute position. But this is true also of many of the adverbs of time listed above (though not all of them); the classification obviously needs refinement. The principal criterion to indicate an adverb rather than a pure noun is that the word will not occur as subject (marked by i / ka) or direct object (marked by ul / lul). There are rare exceptions, under unusual circumstances, as in Mence ka te cŏh.ass.ci? (Icey n' kulen kihoy ka olq kes kath.ci anh.a) 'Don't you wish you'd done it first? (It's unlikely there'll be another such opportunity now.)' (CM 2:120).

There are also deictic adverbs of direction (ili, kuli, celi, ...) and deictic place nouns (yeki, keki, cĕki; eti); see §5.2.4. Compare, too, phrases with the postnouns kkili and kkes (Part II). A few strings of two adverbs are spoken together as a simple phrase, and these are often treated as lexical compounds: com-te 'a little more', tto-tasi 'yet again', tewuk-te 'still more', motwu-ta 'all', cŏy-ta 'all'. CF Mkk 1960:7:34.

5.2.6. Bound adverbs (preverbs, verb prefixes).

The few morphemes that are prefixed to inflected stems are here called bound adverbs or PREVERBS, but they are usually treated as verb prefixes. Eleven attach to verbs of the processive type only, but es- and hes- function also as bound nouns with the postnominal adjective toyta:

  cat- 'small, fine' (as adnoun, see p. 150)
  cis- 'hard, severely, roughly'
  es- 'crooked, ... ' (also adnoun)
  hes- 'vain, mistaken; mis-··· ; open' (also adnoun; = heq- < he < HE 'empty')
  hwi- 'round and round; enveloping; thoroughly, completely; recklessly'
  pi-, pis- (just a spelling alternant?) 'crooked, ... ' (also adnoun)
  toy- 'back, again; in reverse'
  twi- 'back(wards); extremely; recklessly; thoroughly, completely'
    (< twī < ˉtwuyh 'behind; excrement')

> **tes-** 'additionally' (also adnoun; = **teq-** < **te** 'more')
> **tey-** 'incompletely, partially, unsatisfactorily'
> **tul-** 'hard, violently, thoroughly'
> **tul.i-** 'hard, extremely, recklessly, suddenly; into, inward'

Three preverbs attach to descriptive verbs (adjectives) only:

> **say(s)-** / **si(s)-** 'vivid, deep, intense'
> **tu-** 'very' (emphatic)
> **yāl-** 'despicably'

The extended forms of **say(s)-** / **si(s)-** are treated as **sayq-** / **siq-** by the North Korean spelling system. I suspect that the final **-s** of **es-**, **pis-**, and perhaps **cis-** are also ⋯**q** (as that of **tes-** more obviously is), although they are written with ⋯**s** in the North Korean system, too. The ⋯**s** of **mōs** 'cannot' could also be from ⋯**q** (CF **mō-cala-** 'be insufficient'), despite the noun **calmos** 'mistake', which is a later formation (see §4.2, §5.2.5), and the earlier spelling ¨*mwot*. (That is, the earlier final ⋯*t* in some instances may be another form of the same marker of subordination as the ⋯*s* that is ancestral to most cases of ⋯**q**.)

There are several pseudo-preverbs of transparent derivation:

> **yes-** 'on the sly' (obsolete stem 'spy on')
> **chi-** 'upward' (obsolete stem 'ascend')
> **che-** 'abundantly, thoroughly, extremely, severely, at random, without permission or cause'
> (< **chye** = **chie**, vt infinitive 'hit, ⋯ ')
> **ēy-** 'surrounding' (< **eywu-**, vt 'surround')
> **kala-(anc-)** 'sinking' (a bound infinitive, perhaps < **kal.e** 'plow [under]'?)
> **kule-** 'pulling; clutching' (variant of **kkul.e**, vt infinitive)
> **salo** 'alive, awake' (derived adverb < **sā-l-** 'live' + suffix **-o** = **-wu**)
> **elwu** 'caressing' (derived adverb < **elu-** 'pamper' + suffix **-wu**), not to be confused with
> the archaic adverb *e'lwu* 'possibly' (see Part II)

As an adverb **il** 'early' seems to be limited to the expression **il kkay-** 'wake up early' but **il** also occurs as an adnoun, and 'early' is usually expressed by the adjective **ilu-** or the adverb **il-ccik**. Some of the regular monosyllabic adverbs (**cal** 'well', **mōs** 'definitely not, cannot', **tēl** 'less', ⋯) might be taken to be preverbs, but they are saved from the tag "bound" because of their wide distribution: they freely occur in new formations, and most of them can be separated from the verb by focus particles or the like. Certain compound verb stems (verb + verb) might be misviewed as adverb + verb, especially those with obscure etymologies such as these: **pulu-cic-**, **pulu-cwī-**, **pulu-thu-**, **pulu-pttu-**; **ppom-nāy-** (< **ppop-māy-**); **tha-ilu-**; **ce-peli-** (< **cie peli-**); **momc(y)e-nwuw-** (**mom ul cie nwuw-**). CM 1:421 lists **(p)pet-** as the equivalent of a bound adverb which means 'out(wards), mistakenly, mis-' in **(p)pet-ka-**, **pet-na-**, **pet-noh-**, **ppet-titi-**, **ppet-chi-**, **ppet-su-**; also **sel-** (< **se-l-**) with the meanings 'half-cooked, raw; unfamiliar' in **sel-teychi-**, **sel-salm-**, **sel-ik-**, **sel-talwu-**, **sel-mac-**, **sel-capcoy-**.

A few other bound elements attach to the beginning of verb stems, such as **alo-** in **alo-sayki-** and **ek-** in **ek-nwulu-** and other verbs; each poses special problems. The bound element **ēpsin-** in **ēpsin-yeki-** 'disdain, slight, neglect' obviously comes from **ēps.i** + **yeki-**, thus 'treat as nonexistent'. The Hankul spelling pins the irregularity on the first element, but historically it is properly placed with the second, and I would prefer to write **ēpsi(-)nyeki-**. The LHS dictionary implies that the pronunciation is /⋯**nny**⋯/; if that were true, we would have to write **ēpsinq yeki-** but no other sources confirm that pronunciation. Some sources (Cosen-e so-sacen, Kwuk.e say sacen, ⋯) give the initial vowel as short. The first element in **hu-nukki-** 'sob' seems to be a truncation of the phonomime **huk** (**huk**) 'sob (sob)!'. Somewhat obscure elements: **to-** in **to-math-**; **tong-** in **tong-calu-**; **hol-** / **hwul-** in **hol-kapun ha-** and **hol-potul** / **hwul-putul ha-** (see entries in Part II). The **cen** in N **ey cen kkam-kkam hata** 'is completely ignorant of N' is a shortening of **cen-hye** < **cen ha.ye**.

For other "prefixes" see the bound adnouns of §5.3.3.

5.2.7. Interjections.

An interjection is a subclass of adverb that typically occurs by itself as a minor sentence, often with the exclamation-point intonation (§2.8) and special voice qualifiers (not treated in this book), sometimes with expressive length (§2.7.2) or abrupt end − the glottal catch, Romanized as final ···q. I have not made a special study of this part of the lexicon, so that the words given below (mostly without translations) are largely taken from the works of others, notably Choy Hyenpay 1959:581-2 and Kim Pyengha 1:266 ff. Among the items are a few words that are transferred bodily from other parts of speech: **cŏh.ta** 'it is good' = 'fine!'. The interjections are arrayed in semantic categories; a closer study would probably lead to a rearrangement. Notice that the particle **una / na** is often used to emphasize adverbs and interjections; examples will be found in Part II.

(1) calling people	**yeposipsio!**, **yeposey yo!**, **yeposio!**, **yepo!** (in descending order of politeness)
	i p(w)a!
	i ay!
	ana! 'hey!' (S. Kyengsang dialect)
	i! 'hey look out!'
	ungya! [ǔya] (friendly, women to women)
	swi(-swi)!, **swis!** [swiq] 'psst!', 'hush!'
(2) calling animals	**kwukwu!** (chickens)
	weli! (dogs)
	olay olay! (pigs)
	ile! (< **il.e**) 'giddyap!' (to horse or ox)
	nĕymi! 'here calf!' − also (13)
(3) shooing animals	**i kăy!** 'get, dog!'
	i kwăyngi, i kŏy! 'get, cat!'
	swĕ!, **hwei!** 'shoo, birds!'
(3a) shooing people	**ya ya!** 'out of the way, you kids!'
	yaytula! pīkhyela! 'get out of the way!'
(4) YES to call	**ney!** (**yey!**), **nay!**; **kulay!**, **ung!**; **way!**, **mue!** (in descending order of politeness)
(5) YES to command	**ney!** (**yey!**), **nay!**; **kulay!**, **ung!**; **onya!**, **o!**, **ī!** [i̅ː] 'all right! OK!' (in descending order of politeness)
(6) YES to question[1]	**ney!** (**yey!**), **nay!**; **kulay!**, **ung!**
(7) 'Yes of course'	**ăm** (**mullon ici, kuleh.kwu malkwu**)!; **ămulyem!**
(8) NO to question[1]	**ani olssita!**, **ani (ey) yo!**, **ani!**
(9) 'Not sure'	**kulssey olssita!**; **kulssey yo!**; **kulssey!**
	cham 'uh; oh!'
(10) hesitation	**um** 'hmm'
	ce, ca; **cĕki** 'uh'
	ka se (**nun / llang / llang un**) 'and uh'
	mue (**'la ko / 'la 'nun / 'la 'n' / 'la 'lq ka**) 'uh'
	māl ita, māl ia, māl ya 'I mean, you see, you know'
(11) urging, inviting	**ca!**
(12) encouraging	**wiye!**
	pethye la! 'hold out!'
	ppop-nay la! 'be proud!'
	i-nom!, ku-nom!, ce-nom!
(13) damning	**nĕyncang!**, **yĕyncang!**, **cĕyncang** (**mac.ul / chil**)!
	nĕyki!, **cĕyki!**, **nĕymi!**[2]

(14) disgust,	on!; ey!
dissatisfaction	chi!; si!; ēysi!
(15) censure	atta!; aytta!; eytta! − also (16)
	aykay(kay)!
	eti l'!
(16) sneer	eytta! − also (15); eyla!
(17) snicker	he(he)!; phi!; phu!; hwu!
(18) rejection	pikhye la! 'out of the way!'
(19) effort	ai(kwu)!; chwi!
	i(y)echa!, i(y)engcha!, iungcha!, yēcha!, e.yecha!,
	ekiyacha!, iyessa!, e.yessa!
(20) pain	ayko!, aiko!, aykwu!, aikwu!, eykwu!, ei(kwu)!, aywu!
(21) fright	ii!, wuwu!
	eypi(ya)!, eyttukela!
	ikki (na)!, ikhi (na)!
(22) anger	ey!, eys! [eyq], eyik!, eyk(.)ki; wen!
(23) disappointment	e(ng)!
	apulssa!, eppulssa!
	acha!, echa!
(24) pity	aacha (aikwu)!, aikya!, aykay!, eyku!
	celen!; haha! − also (30)
(25) denial	eti!, etten!; wēyn ke l'!
	chenman ey (yo)! '[not] in ten million = not at all'
(26) recall	eyla!; as.a la!
(27) recognition	cham!; cēng-mal!
	kuleh.ci!; kulem!
	āmulyem, ām
(28) surprise	a(a)!; ak! [aq]; ai!; yaa!
	ayko!, aiko!; aykwu!, aikwu!; eykwu!, eikwu!
	ema (na)!, eme na!; eykwumeni!
	ikki (na)!, ikhi (na)!, ikhu!
	atta!, eytta!; wātta!
	celen!; ke!
(29) sigh	he(he)!, ha(ha)!, hwu!, hwuyu!
(30) laughter	he(he)!, ha(ha)!, hi(hi)!, ho(ho)!
(31) delight	aa!; yaa!
	eyla!; eyla cōh.kwun a!; eyla manswu!
	mānsey!
	cōh.ta! − also (32)
(32) approval	cōh.ta! − also (31)
	cal hanta!
	olh.ta!, olh.ci!
	elssa! − also (33); elssikwu (na)!
	ikhi!, ikhwu!, ikhu!
	aykhay!
(33) sarcasm	eyttwu eytta! (dialect?)
	a(c)cwu! 'and how!'
	elssa! − also (32)
	khayssāmey! (Kyengsang; < hakey hay ssamyen se)

ĕlepsyo! (< ĕlim ĕps.e yo)
yongyong!
allangchong!

(34) ingratiation   aii!
(35) other   uak! 'boo!; puke!'
u(ng)a! 'bawl!' (of baby)
(kaychiney) sswĕy! (said after sneezing)
koswuley! (kosiley!, kkosiley!, kosiney!)[3]

[1] As in many languages (but not English) the reply to a negative question accords with the surface structure ("Yes, we have no bananas") rather than the underlying meaning, unless the negativization is merely rhetorical, as in an invitation.

[2] Some of these words have vivid etymologies: **nĕymi** comes from **ne uy emi** ⋯ 'your mother ⋯ '.

[3] This is said: (1) when performing a shaman rite; (2) when eating in the open country; (3) shortly after leaving a house from which food is taken. Kosi was the legendary teacher of farming.

To the lists can be added mimetic adverbs like **kkaok** 'caw!' and other phonomimes like **swī! swiya!** 'tinkle-tinkle!' (sound of child urinating), and occasionally some of the phenomimes (§12).

5.2.8. Bound nouns.

We will call certain elements bound nouns and bound compound nouns (CF §5.2.1). Of these, many are bound adnouns (§5.3.3) and bound postnouns (§5.4.5). Others are bound as subjects or objects (**pal-petwungi** in **pal-petwungi chi-** 'stamp one's foot'), and some are of doubtful classification (**cheng** 'membrane', **pho** 'quantity' − see Part II). There are also bound adjectival nouns, or "postadjectivals" (§5.6.5); CF the bound postverbs (§7.1.3). The word **mangceng** 'although' occurs as a postmodifier (§5.4.3) and also, probably as a reduction of **-ki ey 'l mangceng**, after the summative form **-ki** + particle **ey**; it, too, is a kind of bound noun. Notice also the quasi-adnouns (§5.3.1) and the bound preparticles (§5.2.9).

Other bound elements of obscure etymology include the "pre-postnominals" **alum** in **alum-tapta** 'is worthy of **alum** = is beautiful' (perhaps from **alam** 'tree ripe' < **al pam** 'shelled chestnut') and **alis** (or **aliq**) in **alittapta** 'is worthy of **ali(s)** = is charming' (< ?); the **-thi** in **kokay-thi** 'a steep twisting road over a mountain ridge' (CF Japanese [mi]-ti 'road' and ti-mata 'crossroads').

The morpheme **tes** 'interval of time' is treated as a bound noun (rather than, say, a quasi-free noun) because it occurs only in the compounds **enu-tes** 'before one knows it' and **tes-ĕps.ta** 'is ephemeral' (no particle permitted to intrude). Possibly similar is **nacel** 'half-day', which seems to be limited to the expressions (1) **han nacel** 'one / a half-day', **pān nacel** 'quarter-day'; (2) **achim / cenyek nacel** 'in the course of the morning / afternoon'; (3) **nacel kawus** 'the better part of a day'.

Certain bound nouns (suffixes) are limited to one or just a few nouns, as is true of the many vulgarizers, the constituents of mimetics, and categorizers like ⋯ **cin(i)** 'falcon'. Such elements are often of obscure etymology: **can satali** (= **can sāsel** = **can māl**) 'small talk'; **kācis- / kēcis-puleng(i)**, **-puli** = **kācis / kēcis mal** 'lie, falsehood'; **kho-mayngnyengi / -mayngmayngi** 'one who speaks with a nasal twang'; **pola** in **nwūn pola** 'snowstorm' and **mul pola** 'spray of water'; **sal** in **mom sal** 'general fatigue'; **sali** = **coki** 'yellow corvina' in **polum sali** 'a coki caught at midmonth (high tide)' and **kumum sali** 'a coki caught at the end of the month'. Some nouns are probably the result of lexicalizing a phrase: **pal ssasim** 'fidgeting' perhaps < 'foot (deigning to) be swift'? Probably a variant (or special use) of a Chinese verbal noun: **yak sisi** 'administering medicine'. The noun **kophayngi** has three meanings, and there may be more than one etymology: 'coil; round trip' ? < **ko** 'loop' + **-phayngi**; 'the critical moment, the climax' = **kop(-)i** < **kop-** 'bend, turn' + **-phayngi** or **-h-ayngi**.

Sometimes the second element seems to be an obscure noun that is being explained by the first element: **ip-swul** < **ip siwul** < *ip si Gwul* 'the edges (line) of the lips' (? < 'bowstring'); **nwunq sep** (**nwun-ssep**) 'eyebrow'; **sin-pyena** 'the stitched part of a shoe'; **soy-sulang** 'a forked rake'; **pyen-cwuk** 'rim, brim'; **twī-thongswu** 'the back of the head'; **thopq yang** 'saw blade' (probably a diminutive

*ni-ang < ˙ni 'tooth'); mith celmi 'basis, foundation'; ōymyen swusay 'flattering'; ocwum sothay 'diuresis, a weak bladder' (CF sothayk 'swamp'). The expression tamq pyelak = tamq pyek 'wall; blockhead' seems to contain either an expanded variant of pyek < ˙PYEK 'wall' or a variant of pyelang < pyelh 'cliff'; CF sonq pyek "hand wall" = 'the flat of the hand'. Sometimes an obsolete noun is found: nwun-sselmi < nwunq selmi 'a quick eye (for learning things)' < selmuy = sulki < sulkuy 'sagacity, good sense'. The second element of ip sim 'boldness / brazenness of words; eloquence' and payq sim 'impudence, nerve, chutzpah' is a dialect variant of him 'strength, power'.

The second element of cho-sung 'first days of the month; newborn', i-sung 'this world', and ce-sung 'the other world' is a variant of (sayng <) SOYNG 'life, ... '. The second element of ssi-as 'seeds' (not attested before 1775) is probably a lenition -- Gas from ka˙c[i] 'variety'. The noun namnye-chwuni 'hermaphrodite' may have a variant of -chwungi = -cwungi or (directly) of cwung < CYWUNG 'middle' + i 'person'. The second element of pic-cisi 'intermediary party to a loan' looks like a derived noun *cis.i (dialect < ci˙zi; the standard version should have been *cii) from cīs.ta 'makes'. But it might be cīs 'act, gesture' (probably the stem of cīs.ta used as a noun) + i 'person'. The noun meyali 'echo' can be traced back to moy-ali < ˙˙mwoy-˙zali, a compound of ˙˙mwoy 'mountain' + probably either a variant of swo˙li 'sound' or the particle s + a variant of *wu˙l-i 'sound' (and not sa˙l-i 'living'). The ccim of mokchim ccim 'hitting one with a wooden pillow' and mongtwungi ccim 'clubbing' looks to be a variant of chim, substantive of chita 'hits'. The -tha(y)ki of homtha(y)ki 'crotch' may be a variant of (t)tayki 'stick' attached (presumably) to hom 'groove'. The -han(-i) of wentwu-han(-i) 'melon planter / farmer' seems to be limited to that term alone, and han is usually treated as a Chinese loan. The noun pok-cheli 'an unlucky person' is perhaps better pokchel-i < pokchel '(repeating another's) failure' (< ˙PWOK-˙THYELQ 'rut left by a capsized carriage') + i 'person'. The expression namu cicekwi 'wood chips' is a variant of (dialect) namu kicekwi, according to KEd, but the composition of that is unclear; CF cice-kkaypi 'wood chip', namuq kaypi 'piece of wood, splinter', ccic- 'tear, rip'. The noun humcileki 'stringy ends of meat' probably has a suffix, but just where to cut is a problem: humcilek-i, humcil-eki, hum-cileki? There is no clear source for the first part; the best candidate is hūm ci- 'get scarred, marred, flawed' (< *˙˙HUM / *˙˙KEM 'deficiency'). The relationship of kkoli < skwo˙li and kkolang(c)i 'tail' with kkongci 'tail of bird' is unclear; kkongci is probably a contraction of kkolangci, from kkol-ang[i] + ci (bnd n) 'stuff, thing'. The second element of cāng-acci 'dried radish or cucumber slices seasoned with soy sauce' is of unknown origin but may contain ci 'stuff, thing' (CF achi, -aci, chi). Variants of chay-ccik 'whip' have -ccwuk and -ccok, and the last is probably the source, perhaps identical with ccok < (p)cwok 'piece'. How kkun and kkunapul '(piece of) string' are connected is unclear.

In Part II we treat -so of mom-so 'in person' and -swu of son-swu 'with one's own hand' as variants of a bound particle.

5.2.9. Bound preparticles.

The bound preparticle mo occurs in mo chelem 'like mo = taking great pains, with much trouble / effort; at long last'; this appears to be the only preparticle followed by chelem. The etymology is unclear. Perhaps it is the noun mo that refers to a difficult and desirable arrangement of the four sticks in a game of yuch; or perhaps it is somehow related to mōs 'cannot'. But most likely it is an abbreviation from āmo = āmu 'any'; CF mō-ccolok from āmu-ccolok.

Several bound preparticles precede the particle ulo / lo and the resulting structures are treated as unanalyzed adverbs by Korean grammarians:

sinap in sinap ulo (dialect variant sinam ulo) 'at odd moments' (with the earmarks of a Chinese binom si + nap / nam but the actual etymology is obscure)

susu lo 'of itself, spontaneously; oneself' < susa < sa-sa < SO SO ('private private')

kakkas in kakkas ulo 'barely'

pa.yah (note the rare final h) in pa.yah ulo 'nearly, on the verge of; in full swing'

no-pak.i (< no(sang) 'constant') in no-pak.i lo (= puth-pak.i lo) 'fixedly'

Here we can include the first element of the following expressions, too:

ol[h] ulo 'to the right' (< adjective olh-; not *ol lo!)

ōy lo 'to the left' (< adjective ōy-)

muth ulo 'in a lump, at one time' (< ?; CF mus 'all')

thong ulo 'all, wholly' (CF ōn-thong)

ken ulo = kenseng (ulo) 'in vain' (etymologically identified with the adnoun 'dry, dried')

nal in nal lo 'raw' (also an adnoun, and perhaps etymologically derived from nal 'to be born', the prospective modifier of na-)

hol lo 'alone' (also an adnoun)

pyel lo 'specially' (also adjectival noun, pre-postnominal + na-)

sayng ulo 'raw; unreasonably' (also adverb and adnoun; a bound Chinese morpheme 'birth')

cel lo, ce(y)-cel lo 'automatically, without effort' (apparently from ce 'oneself')

ta-cca ko-cca lo 'unexpectedly, without any warning, suddenly, directly' (< ?)

maynani lo 'empty-handed' (? < adnoun māyn + derived adverb anh.i)

We may wonder whether to include also ka( )lo 'horizontally', sēy( )lo 'vertically', and se( )lo 'mutually'. But kalo may be a derived adverb from kalu- 'cut across', as palo is from palu- 'be straight, right'. And (k)kᵉakkwu(-)lo 'upside down' is to be connected with (k)kᵉakkwule (ci-) 'tumble'. (For the purely orthographic distinction of ka ulo 'toward the edge' from kalo, and of se ulo 'toward the west' from selo 'mutually', see the entry ulo in Part II.)

The nouns hoth 'single(-ply)' and mat 'eldest' are limited to occurrences before the particle ulo, before the copula ita, and before the postnominal verb ci-; each is also an adnoun. There are probably other precopular nouns, and perhaps some also occur with ulo, but they have not come to my attention. One interesting case is tahayng, which is usual only with ulo (tahayng ulo 'luckily') and ita (tahayng ita 'is fortunate'). The word does not normally occur with other particles, but the nominative i / ka will be present when the copula is negativized: tahayng i ani 'la pulhayng ita 'it isn't fortunate, it's unfortunate'. Tahayng is mistakenly used for yohayng 'good luck' in tahayng ul palanta = yohayng ul palanta 'gazes on (= receives) good luck'; and tahayng also occurs as an adjectival noun 'be fortunate' but only in the forms tahayng hakey (to) 'fortunately (indeed)', tahayng hi 'fortunately', and tahayng han(q īl) 'a fortunate (matter)' − CF §5.6.1. We might wish to consider as a precopular noun the ani of the negative copula ani 'ta 'it is not' (ani also occurs as an interjection); see the discussion in §11.7.1.

5.3. Adnouns and pseudo-adnouns.

One of the environments of the noun is before another noun (or noun phrase) which it modifies. Some words occur exclusively or typically only in that position. These we call ADNOUNS; they can also be called PRENOUNS. Often included by Korean grammarians are the PSEUDO-ADNOUNS, some of which are derived from reinforced forms of nouns (hays 'new, of the year; sunny, of the sun' < hayq ··· < hay 'year; sun') and some of which are modifier forms of a verb that have come to emphasize some special meaning a little more than other forms of the verb do. Korean grammarians prefer to spell 'right (in direction)' as olun to distinguish it from 'right (in correctness)', which they spell as olh.un. I am inclined not to call most of these forms adnouns, but they are included in the lists below. In a sense, any modifier can serve as a pseudo-adnoun, but those that are so treated by the Korean grammarians are usually distinguished by some kind of parallelism with single morphemes elsewhere in the vocabulary: hēn 'old' (< hē-l- vi 'get old, wear out') is the antonym of say 'new' and a synonym of the Chinese bound adnoun kwū- 'old'; sēn 'half-done = immature' (< sē-l- 'be half-done') is a synonym in some contexts of the adnoun sayng, a single morpheme of Chinese origin. Certain nouns have special, and usually shorter, shapes in adnominal position (kac' ··· = kacwuk 'leather', 'mak ··· = macimak 'last'); I have not listed these as pseudo-adnouns. Notice also the adjective construction X-una X-un 'that is ever so X', limited to adnominal use (see -una in Part II).

There are three lists of adnouns: (1) those that seem to occur only as adnouns, (2) those that have some other uses (briefly noted in parentheses), and (3) pseudo-adnouns, for which the etymological

sources are indicated. There are numerous constraints on the occurrence of individual adnouns; these have not yet been explored in any systematic fashion, but hints as to their nature can be found in both the examples and the translations in the entries of Part II. Some adnouns, we will see, can be separated from the following noun by other modifying phrases; others, more like the bound adnouns (or prefixes) in this respect, cannot be separated. In the lists below, those adnouns which are clearly separable are marked "+", those clearly inseparable are marked "−", and the intermediate or questionable cases are marked "(+)".

LIST 1: ADNOUNS (EXCLUSIVE)

−	**ches** 'first'
−	**cēy** '−th' ordinalizer (with Chinese numerals) (< `TTYEY`)
+	**ku−/ko-kkacis** 'such a − as that'
+	**i-/yo-kkacis** 'such a − as this'
+	**ce-/co-kkacis** 'such a − as that'
+	**ney-kkacis** 'the likes of you'
	cey-kkacis 'the likes of himself/herself/themselves' (not 'the likes of me'!)
(+)	**yĕys** 'old, ancient' (< yĕyq ··· < ¨nyey s; CF noun yēy < ¨nyey)
(+)	**yenu(y), yeni** 'usual; (most) other'
(+)	**ŏn** 'whole, entire' (CF the Chinese bound adnoun **cen-**)
+	**ŏn kac'** 'all'
+*	**han** 'one (← hana); the whole; the peak, extreme, most, very; about, approximately'
	*In the meanings 'one − ; a certain − '.
−	**han, hal** 'large, great; proper' (modifier and prospective modifier < **ha-** obsolescent adjective 'much, many')
−	**hān** 'outdoors, outside'
+	**ku-/ko-man** 'that little − '
?	**ku-/ko-mas** 'that little − '
−	**al** 'bare, ... '
+	**swun** 'pure; net' (< `SSYWUN`)
−	**swus** 'pure, innocent' (? < swu[n] s)
−	**ūypus, ēpus** 'step-(relative)'
−	**itum (nal, tal, hay)** 'the ensuing/next (day, month, year)'
(+)?	**kwūn** 'extra, uncalled-for, excess'
−	**has** 'cotton-padded; with spouse'
(+)	**tan** 'only; single' (but usually an adverb) (< `TAN`)
+	**ttan** 'another, different'
+	**yak** 'about, approximately' (< `·QYAK`)
−	**yāng (atul, ttal, pumo)** 'adoptive/foster (son, daughter, parents)' (< `·YANG`)
(+)?	**kēkum** (+ TIME PHRASE) 'ago, earlier, back (from now)' (< `·KE-KUM`)
−	**tol** 'wild, rough; untutored; inferior' (? variant of **tūl**, below)
(+)?	**māy** 'quite, much (the same)'
(+)?	**māy** 'each' (< ¨`MOY`)
(+)?	**kak** 'each, every' (< `·KAK`)
(+)?	**mŏ** '(a) certain' (= āmo = āmu; but from **mo** < ¨`MWUW`)
+	**oman** [? dialect] 'whole, all, every, many' (? < **ŏn** + **mānh-**; ? < ŏ-man '50,000')
(+)	**mus** < `·mwu[l] s` 'many, all sorts of'
+	**musun** 'what; some one − '
+	**enu** 'which; any'
(+)?	**tong** 'the same; the said' (< `TTWONG`)
(+)	**pon** 'this; main; real' (< ¨`PWON`)

(+)   hyĕn 'the present (existing, actual)' (< ˙HHYEN)
(+)   wen 'the original' (< NGWEN)
−   cāy 'resident in' (< ˙CCOY)
−   tok 'by oneself, alone' (< ˙TTWOK)
−   pay-nāy(q) 'newborn' (< noun + vc. 'expel [from] belly')
−   si 'one's husband's (relatives)' (< SSI)
−   soy 'a small one' (Chinese bound adnoun so- < ˝SYWOW + particle uy)
−   sŏy 'of cattle' < ˝sywoy < syw[o] ˙oy (§2.12.3) < *˙sywo ˙oy.
−   (k)kamak 'black' (< adjective (k)kam- + -ak)
−   ŏng, ongtal 'small and sunken'
−   (p)palkan, (p)pelken 'utter, downright' (< adjective modifier)
−   ppetuleng 'out-turned': ppetulengq (n)i = petq-(n)i = tesq (n)i 'buck teeth',
         ppetuleng i 'person with buck teeth'
−   kalang 'fine, tiny, shriveled'; (= kalangi) 'forked'
−   yang 'foreign, western, Occidental-style' (abbreviation < se.yang < SYEY-YANG)
−   ⁿye 'woman, female' (abbreviation < ⁿyeca < ˝NYE-˝CO)
−   nam 'man, male' (abbreviation < namca < NAM-˝CO)
−   mok 'wood(en)'; (= mok.myen) 'cotton' (< ˙MWOK)
−   ho 'of foreign origin, especially from ancient China' (< HHWO)
−   tang 'of Chinese origin' (< noun 'Tang dynasty') (< TTANG)
−   pĕm 'pan-, all-' (< PPEM)
(+)   ˡyāng 'both' (numeral) (< ˝LYANG)
−   ˡnāyng 'cold, iced': ˡnāyng khephi 'iced coffee', ˡnāyng saita 'chilled cider', ˡnāyngq kwuk
         'cold soup' (< ˝LOYNG/LYENG)

LIST 2: ADNOUNS (NON-EXCLUSIVE)

+   i / yo 'this' (noun + particles)
+   ku / ko 'that' (noun + particles)
+   ce / co 'that' (noun + particles)
(+)   say 'new' (noun + lo, + low-)
−   oy 'only, single' (noun + lo, + low-; bound adverb + ttĕ-l-)
(+)   āmu 'any' (as noun 'any person')
−   mat 'first-born, eldest' (noun + ulo, + ita)
(+)   cen 'former' (also noun, postnoun; < CCYEN)
−   'mak-nay 'last-born, youngest' (? noun)
−   cho 'of the first ten days of the month; early' (also postnoun; < CHWO)
−   ay 'the very young; (= a.yey) the very first' (also noun, abbreviated < ai 'child'; bound noun
         in ayq toyta)
−   tūl 'wild' (as noun 'prairie, moor')
−   cin 'deep (in color)' (also adjectival noun 'be deep or thick'; < CIN)
−   yĕn 'light (in color)' (also adjectival noun 'be light or soft'; < ˝ZYWEN)
−   kāy 'wild, ⋯ ' (noun 'dog')
(+)   kŏ 'the late (deceased)' (also noun and postmodifier 'reason'; < ˙KWO)
−   phus 'green, unripe, ... ' (also bound noun in elyem-phus; ?< ˙phu[l] s)
−   ŏl, ŏ' 'early-ripening' (also noun 'vigor, ... ')
−   il 'early' (also adverb; CF ilu- 'be early', ilccik < ilq-cik)
−   nuc 'late, belated' (< adjective nuc-; also adverb?)
−   tes 'additional' (also bound adverb) (< teq ⋯ < te 'more')
−   cap 'mixed; poor; ... ' (also bound noun + toy-; < ˙CCAP)

–	**pi(s)** 'crooked, ... ' (also bound adverb)
–	**es** 'crooked, ... ' (also bound adverb)
–	**mey** 'nonglutinous' (also bound noun in **mey ci-** 'be nonglutinous', **mey-malu-** 'be fallow')
–	**cha(l)** 'glutinous' (also bound noun in **cha' ci-** 'be glutinous'; < **cha-** 'sticky')
–	**thong** 'whole, intact, untouched' (also adverb, bound noun)
–	**hoth** 'single' (also noun + **ulo**)
–	**mac'** 'facing, ... ' (also adverb; abbreviation of derived adverb **macwu** < **mac-wu**)
–	**sang** 'common, ordinary, ... ' (also bound noun; < *SSYANG*)
+	**yele** 'numerous' (= numeral **yeles**)
–	**pān** 'half' as in **pān pengeli** 'half-mute' (also numeral 'half', postnoun 'and a half'; < ˙*PAN*)
–	**nal** 'raw' (also noun + **lo**; ? < **nalq** prospective modifier < **na-** 'be born')
(+)?	**sayng** 'raw; crude; live; real; arbitrary; utter' (also noun + **ulo**, adverb + **mek-**; < *SOYNG*)
–	**emci** 'main, principal' (also noun = **emci kalak** 'thumb')
–	[1]**yen** (prenumeral) 'continuing through, running' (also noun 'continuation', vnt 'connect, continue'; < *LYEN*)
–	**kang** 'forced; unadulterated, plain; dry' (also bound adverb + **malu-**; < ˙*KKANG*)
–	**ken** 'dry, dried' (also bound preparticle, adjectival noun; < *KKEN*)
–	**hes** 'false' (also bound noun; < **heq** ... < *HE s*)
–	**swu(h)** 'male' (also bound noun 'convex, external, protruding')
–	**am(h)** 'female' (also bound noun 'concave, internal')
–	**kayk** 'uncalled-for' (also bound noun; noun 'guest' < ˙*KHOYK*)
(+)?	**kūn** 'about, nearly' (also bound noun?; < ¨*KKUN*)
–	**cham** 'real, true, genuine' (also adverb, interjection, ? noun)
–	**pyel** 'special' (also bound noun; < ˙*(P)PYELQ*)
+	**pulkwa** 'only, merely' (+ QUANTITY) (also adjectival noun; < ˙*PWULQ-˙KWA*)
–	**sen** 'first, prior' (also noun 'first move'; < *SYEN*)
?	**sĕng** 'Saint' (also noun; < ˙*SYENG*)
(+)	**chin** 'sharing blood ties': **chin apeci** 'blood father' (also adjectival noun 'intimate'; < *CHIN*)
–	**ŏy** 'maternal': **ŏy hal-'meni** 'maternal grandmother' (also bound adnoun 'external', noun = **pakk** 'outside, ... '; < ˙*NGWOY*)
(+)	**tang** 'the said; the appropriate; (age) at a time' (also postnoun 'for each', vnt 'undergoes, confront; copes', vni 'confronts', adjectival noun 'is reasonable, appropriate'; < *TANG*)

<div align="center">LIST 3: PSEUDO-ADNOUNS</div>

(+)	**taum-taum** 'next but one' (noun + noun)
+	**pyel-pyel, pyel-uy pyel** 'special' (bound noun + ...)
–	**cĕy-il** 'first, prime', **cĕy-ī** 'second', ... (see Numbers, §5.5)
+	**nay** 'my' (abbreviation < **na uy**)
+	**ney** 'your' (abbreviation < **ne uy**)
+	**cey** 'one's own' (abbreviation < **ce uy**)
?	**i-nay** 'this my ... ; my'
–	**hay, hays** (< **hayq** < ˙*hoy s*) 'new, of the year; sunny, of the sun'
–	**wi(q), wis** 'upper' (< noun **wi** 'above'). The variant **wu(q)**, found in only a few set phrases nowadays, is treated as an adnoun **wus** in both North and South Korea. The NK dictionary treats **wi** as dialect, **wu** as standard. CF Mkk 8:42 (1960): "**wi** is used as the noun in the central area but **wus/wis** when it is the prefix [or adnoun]". The NK dictionary standardizes the spelling **wus** (as do the South Koreans) where one would expect the apostrophe to write the -q, and that spelling indeed turns up in CM 1:226, where **wuq meli** ("**wus-me-li**") 'upper

head' is cited along with **alayq meli** 'lower head', which is spelled with the apostrophe in NKd, as well. The Middle Korean form was *wu[h] s*.

-     **alay(q), alays** 'lower'
-     **phalang / pheleng** 'blue' (noun)
- (+)?   **(k)kemceng** 'black' (noun)
-     **nolang / nwuleng** 'yellow' (noun)
-     **ppalkang / ppelkeng** 'red' (noun)
-     **com** 'petty' (noun, abbreviation < **cokum**)
- ?   **tǎymo han** [rare] 'important, main' (defective adjectival noun)
- ?   **ǎymen** [uncommon] 'off-the-point, extraneous, devious (remarks), vague' (abbreviation < **ǎymay hen = ǎymay han** ' ⋯ that is vague'
- (+)   **ěps.nun** 'impoverished, needy' (< ' ⋯ that lacks')
- +   **hanta 'nun, hanta ko (ha)nun** 'admitted to be capable (strong)'
-     **sěn** 'half-done = immature' (modifier < **sě-l-** vi)
- +   **hěn** 'old; worn out' (modifier < **hě-l-** vi)
-     **palun** 'right' (modifier < **palu-** adjective)
-     **olun** 'right' (variant of **olh.un**, modifier < **olh-** adjective)
-     **ǒyn** 'left' (modifier < **ǒy-** adjective)
- (+)?   **can** 'small, fine, thin' (modifier < **ca-l-** adjective)
- (+)   **talun** 'other' (modifier < **talu-** adjective)
- +   **kac.un** 'all' (modifier < **kac- = kaci-** 'hold')
- +   **mōtun** 'all' (< **mot.un = moin** 'gathered')
-     **ongkun** 'whole; intact, original; untouched' (modifier < **onku-l-** adjective)
- (+)?   **mǎyn / mǐn** [also with short vowel] 'nothing but, unadulterated, bare' (modifier < **mǐ-**)
-     **mǎyn** 'all the way, the very, the extreme' (? from preceding entry)
- (+)   **kǐn-kin** 'long long ⋯ ' (iterated modifier < **kǐ-l-** adjective)
- (+)?   **mak-talun** 'dead-end' (modifier < **mak-talu-** 'come to an impasse', compound vi)
-     **hethun** 'silly' (< **heth.un** modifier < **heth- = huth-** 'scatter')
-     **ol** 'this, the present; next, the coming' (prospective modifier < **o-** 'come')
-     **wang** 'big, king-size' (noun 'king'; < *NGWANG*)
-     **mal** 'big, large-size (animal or plant)' (< noun 'horse')
- ?   **mu'** 'light, watery' (< noun **mul** 'water'; CF **mulk-** 'thin, watery')

Certain morphemes that might be thought to fall in the category of adnouns we will treat as free nouns: **cheng** 'green or blue', **hong** 'red', **huk** 'black', **payk** 'white'; **cěng** 'real, true; center, ⋯ '; ⋯ . See also **omphak / wumphek** in Part II.

CM 1:212 lists **cas** 'small, fine' with two examples: **cas cwulum** 'crease' and **cas cing** 'small shoe-nail'. South Korean dictionaries treat this element as **cat-**, a variant from **ca-l-** 'be fine'. It could also be viewed as a shortening of **cati can** ' ⋯ that is quite fine indeed'; as < **calq** 'to be fine'; or < **caq** (= **ca-l-**). The spelling with **t** is supported by **cat-talah.ta** 'is rather fine'.

The words **kas** 'just (+ ages by ten)' and **tan** 'only' are usually adverbs; see §5.2.5.

5.3.1. Quasi-adnouns.

Some of the Chinese nouns which have the earmarks of freedom, being of two or more syllables, are nonetheless restricted to positions modifying a noun or noun phrase, and occasional examples in other positions are to be dismissed as awkward at best. Among these "quasi-adnouns" are the defective verbal nouns (§5.6.2) that have only the modifier form: **tǎymo han** 'prominent', **mōmo han** 'celebrated', ⋯ . For 'unique' we find both **yuil han** and **yuil uy** (as in ~ **mokcek** 'unique goal'); also **yuil mui han** (less commonly **yuil mui uy**) 'unique and unmatched'.

Other quasi-adnouns are listed below in several groups:

(1) Quasi-adnouns with uy

> pulhwu uy 'undying, immortal'   mīcung-yu uy 'unprecedented'
> pulphay uy 'unvanquished, unconquerable'   pul.yo pulkwul uy (? pul.yo uy,
> cisang uy 'supreme, sublime'   ? pulkwul uy) 'indomitable'
> celqsey uy 'peerless'   pulka-pun uy 'indivisible'

(2) Quasi-adnouns without uy

> kwukcey (mūncey) 'international (problems)'   kanay (kongep) 'domestic (industry)'
> wensi (sāhoy) 'primitive (society)' ^{n}yelyu (cak.ka) 'woman (writer)'
> coki (chilyo) 'early (treatment)'   ilqtay (cangkwan) 'grand (sight)'

(3) The bound postnoun **cek** '--ic' produces compounds which are somewhat like quasi-adnouns that do not take **uy**, but they can also occur:

before **ulo**, as in **kwahak-cek ulo** 'scientifically';

before forms of the copula especially the modifier, as in **kwahak-cek (in) thāyto** 'a scientific attitude' and **thāyto ka kwahak-cek ita** 'has a scientific attitude';

before the nominative marker **i / ka** when followed by a negativized copula expression: **thāyto ka kwahak-cek i ani 'ta** 'does not have a scientific attitude'.

(4) The bound postnoun **sāng** '---wise, with respect to' (the basic vowel length of the morpheme is usually suppressed when it functions this way) creates compounds that are often used like adnouns, but they may be separated from the modified noun by the copula modifier **in** or (more commonly) by the particle **uy**, as in **I ke n' kyengcey-sāng (uy) mūncey 'la ko polq swu iss.ta** 'This can be looked at as a question relevant to economics'. (Contrast the behavior of **cek** '--ic', which never occurs with **uy**.) The compounds also occur before various particles, but usually the particles are present because they are required by later elements of the sentence. The **sāng** compounds, unlike the **cek** compounds, do not occur as predicate complement with ··· **ita** 'it is ··· ', nor with most conversions of the copula other than the adnominal **in** (and substitution by **uy** is more common) and such adverbial conversions as **ina** and the negative **ani 'la**. See the entry in Part II for examples.

Why are **sāng** and **cek** treated as "bound" postnouns, rather than free? Mainly because in general they do not attach to non-Chinese elements, though there are numerous contrary examples, and **sāng** may be more versatile than I have allowed, as is its Japanese counterpart (·· zyoo). The compounds that result from attaching the bound postnoun are special kinds of quasi-adnoun.

5.3.2. Numerals. See §5.5.1.

5.3.3. Bound adnouns (prefixes).

The occurrence of specific adnouns is restricted in various ways. In general, I have treated as free all those adnouns that are not of Chinese origin and in addition those Chinese adnouns which are widely used to modify nouns of non-Chinese origin as well as those that are Chinese. Some of the free adnouns are restricted to a rather small group of partners they can modify, others are quite productive. I have set up only one non-Chinese bound adnoun: **yel-** 'young, new' (of unclear etymology, see the entry in Part II). But there are a lot of Chinese bound adnouns and they are quite productive, though they combine almost exclusively with Chinese vocabulary. When one of them occurs widely also with non-Chinese vocabulary it is included in the list of free adnouns (for example **sayng**). But certain fairly free nouns, such as **cen** 'before', **hwū** 'after', and **cwung** 'midst, middle' will be found included, for in putting the list together I have been more concerned with convenience than with consistency.

The list of Chinese bound adnouns is arranged alphabetically, in order to display homonyms; examples are given to illustrate just why each morpheme deserves the treatment as an adnoun. The examples are all of occurrences with free two-syllable Chinese nouns; when the same morpheme is followed by a bound morpheme I do not treat it as an adnoun. Accordingly **sin-** 'new' is an adnoun in **sin-sĕykyey** 'new world' because **sĕykyey** 'world' is a free noun, but not in **sinmun** 'newspaper' because **mun** is not a free noun (at least in this meaning). When a one-syllable bound adnoun is combined with a one-syllable free noun of the Chinese vocabulary, it is difficult to decide whether to treat the string as one word or two, for often the two-syllable string is more common and older than the free occurrence of the noun, which is sometimes based on a special meaning or a shortening of a longer equivalent. When in doubt we can always use a hyphen. In fact, I prefer a hyphen for all cases of bound adnouns, at least within texts: **sin-sĕykyey** despite say **sĕykyey** which means virtually the same thing 'a new world'. The problem of freedom or bondage of Chinese morphemes is quite vexing and requires further study. (See the discussion in §5.4.5.) The bound adnoun **pi-** 'un-, non-', for example, is largely limited to Chinese nouns, but it can be found for a few recent loanwords of English origin, such as **pi-Kaythollik(-)kyĕy se nun** 'in non-Catholic circles', where the bondage of **-kyĕy** 'world' is also in question. Similar problems of free versus bound occur in **cho-inkan(-)cek** 'superhuman' (CF §5.3.1), **cho-inkan(-)hwa** 'superhumanization', and perhaps **pi-yĕyswulq-cek** 'unesthetic'.

List of bound adnouns

SHAPE	CHARACTER	MEANING	EXAMPLES
ak-	惡	bad	~ **sencen** 'bad propaganda', ~ **insang** 'bad impression', ~ **phyengqka** 'bad evaluation'
cak-	昨	preceding; yesterday	~ **hŏykyey-nyen** 'the last fiscal year', ~ **swuip-sey** 'the last income tax', ~ **sipsam-il** 'yesterday the 13th'
căy-	再	again, re-	~ **chwulpal** 'restart', ~ **ipkwuk** 'reentry (into a country)', ~ **hwal.yak** 'reactive, active again'
cang-	長	long	~ **kĕli** 'long distance', ~ **hayng.lyel** 'long parade (procession)', ~ **sikan** 'long time'
cĕ-	低	short; low	~ **sokto** 'low speed', ~ **kiap** 'low (air) pressure', ~ **cwupha** 'low frequency', ~ **hyel.ap** 'low blood pressure'
cen(-)₁	前	the former, ex-	~ **puin / mănwula** 'ex-wife', ~ **swusang** 'ex-premier', ~ **năykak** 'former cabinet', ~ **namphyen** 'former husband', ~ **su' nim** 'a former priest'
cen(-)₂	全	the entire (CF ŏn)	~ **(ca.yu) sĕykyey** 'the entire free world', ~ **(Mikwuk) inmin** 'the entire (American) people'; ~ **Sewulq-Cangan (ul cĕnmang hanta)** '(has a panoramic view of) the whole city of Seoul'
cĕng-	正	regular, full	~ **kyŏswu** 'full professor', ~ **kyŏwen** 'regular teacher', ~ **hŏywen** 'regular member'
cey-	諸	various, several, the [plural]	~ **palmyeng** 'various inventions', ~ **mincok** 'the (several) nationalities', ~ **mŭncey** '(the) various problems', ~ **pangmyen** '(the) several directions'
cĕy-	帝	imperial; imperialist	~ **cengpu** '(the) imperial government', ~ **cengchayk** 'imperial(ist) policy'
cha-	此	this	~ **săsil** 'this fact', ~ **săhoy** 'this society', ~ **sĕykyey** 'this world'
chin-	親	1 blood-related 2 pro-	~ **hyengcey** 'blood brother', ~ **pŭmo** 'the genetic parents' ~ **cengpu** 'pro-government', ~ **Yengkwuk** 'pro-Britain', ~ **Puk-Han** 'pro-North Korea'

cho-	超	super, ultra	~ **sokto** 'superspeed', ~ **ca.yen** 'supernatural', ~ **umpha** 'ultrasonic(s), supersonic', ~ **inkan** 'super(hu)man' (CF **choin** 'superman')
chŏng-	總	overall, general, total	~ **kŏngkyek** 'general offensive', ~ **sayk.in** 'general index', ~ **sacik** 'mass resignation', ~ **tŏngwen** 'general mobilization', ~ **sănchwul** 'mass production'; ~ **maliq swu** 'total number of animals', ~ **Mikwuk (uy) huk.in inkwu** 'the total black population of the United States'
chŏy-	最	most, extreme(ly)	~ **wutung** 'most excellent', ~ **sinsik** 'ultra-modern', ~ **chemtan** 'spearhead'
ci-	支	branch	~ **kongcang** 'branch factory', ~ **sen.lo** 'branch rail line'
cik-	直	direct	~ **swuchwul** 'direct exportation', ~ **kŏpayk** 'true confession', ~ **hyĕnsang** 'true circumstance'; ~ **kwuk** 'undiluted liquor, sauce, ... ', ~ **kkwul** 'pure honey'
con-	尊	the honored; your	~ **hŏysa** 'your firm', ~ **philqcek** 'your handwriting', ~ **ceyan** 'your suggestion'
cŏng-	終	final, last	~ ¹**yelcha** 'the last train', ~ **cĕncha** 'the last streetcar (or train)', ~ **(p)pesu** 'the last bus'
cwu-	主	main, principal	~ **sănmul** 'the main crop / product', ~ **săn.ep** 'the principal industry', ~ **pĕm.in** 'the chief culprit', ~ **sengpun** 'the main ingredient', ~ **umco** 'leitmotif'
cwūn-	準	quasi-, acting	~ **hŏywen** 'associate member', ~ **sawen** 'junior employee', ~ **kyŏwen** 'teaching assistant'
cwung(-)	中	middle	~ **kĭep** 'medium(-size) enterprise', ~ **hak.kyo** middle school', ~ **sĕyki** 'medieval centuries'
cwūng-	重	heavy	~ **kongep** 'heavy industry', ~ **kumsok** 'heavy metal', ~ **kikwan-chong** 'heavy machine-gun', ~ ¹**notong** 'heavy labor'
ĕ- *	御	the esteemed; your	~ **kaceng** 'your home', ~ **kwuk.ka** 'your nation', ~ **ceyan** 'your suggestion / proposal', ~ **puin** your wife'

* Japanese usage, sarcastic in Korean.

hă(-)	下	bottom, lower; last, later, ...	SEE Part II, p. 514.
hay-	刻	the said	~ **hak.kyo** 'the said school', ~ **săqken** 'the incident in question', ~ **inmul** 'the said person'
he-	虛	false; sham (CF **hes**)	~ **phungsel** 'false gossip', ~ **yengsang** = **hesang** 'virtual image (in optics)'
hŏ-	好	good	~ **hyelqsayk** 'good complexion', ~ **inmul** 'good person', ~ **insang** 'good impression', ~ **kihoy** 'good opportunity'
hwal-	活	living, live	~ **hwăsan** 'live volcano', ~ **mŭtay** 'legitimate stage' ~ **sintek** 'active grace'
hwŭ(-)	後	the later	~ **pănki** 'second term', ~ **sĕyki** 'later centuries', ~ **hayng.lyel** 'after-column'
ĭ-	異	different	~ **punca** 'foreign element', ~ **incong** 'different (alien) race', ~ **pun.ya** 'different field', ~ **mincok** 'alien race'
¹in-	隣	neighboring, nearby	~ **chŏnka** 'neighboring cottage', ~ **pulak** 'neighbor community', ~ **wŭpang** 'nearby friendly nation'

kă-	假	1 false, pretend, fake	~ **hyengsa** 'fake detective', ~ **munse** 'false document', ~ **cwūso** 'false address', ~ **uysa** 'quack doctor', ~ **sacang** 'phony company-head'
		2 makeshift, temporary, provisional	~ **kěnmul** 'temporary building', ~ **kyōsa** 'temporary instructor', ~ **tōlo** 'temporary road', ~ **sisel** 'makeshift facilities', ~ **cengpu** 'interim government', ~ **ip.hak** 'provisional admission (to a school)'
kang-	強	hard, tough	~ **ōykyo** 'firm diplomacy', ~ **tǎychayk** 'strong policy', ~ **cengpu** 'strong government'
ko-	高	high, tall	~ **cwupha** 'high frequency (wave)', ~ **hyel.ap** 'high blood pressure', ~ **kiap** 'high (air) pressure', ~ **sokto** 'high speed'
kong-	公	official; public	~ **saynghwal** 'public life', ~ **māymay** 'public transaction', ~ **hōytang** 'public meeting place'
kwī-	貴	1 the worthy; your	~ **pōko** 'your report', ~ **puin** 'noble lady', ~ **kwuk.ka** 'your nation', ~ **hōysa** 'your firm', ~ **chwulphan-sa** 'your publishing house'
		2 valuable, precious	~ **kumsok** 'valuable minerals', ~ **tongca** 'one's precious son'
kwū-	舊	old	~ **sāhoy** 'old society', ~ **sitay** 'old times', ~ **sěykyey** 'the old world', ~ **cěyto** 'the old system', ~ **hwāph^{y}ey** 'the old currency'
kyeng-	輕	light(weight)	~ **kikwan-chong** 'light machine-gun', ~ **kongep** 'light industry', ~ **kumsok** 'light metals', ~ **mūcang** 'light armaments', ~ **pěm.in** 'minor offender', ~ **phok.kyek** 'light bombardment'
kum-	今	the present; this month's	~ **cwumal** 'this weekend', ~ **hayngsa** 'this event', ~ **sěyki** 'the present century'
kup-	急	abrupt; express	~ **cěnhwan** 'sudden turn', ~ **yōngmu** 'urgent business', ~ **cīnpo** 'rapid progress'
mal-	末	end, last	~ **hak.ki** 'the final term (of three school terms), the last trimester', ~ **kwicel** 'the last verse', ~ **sěytay** 'the last generation', ~ **^{l}yelcha** 'the last train'
man-	滿	fully, a full	~ **cangsik** 'full decoration', ~ **kihan** 'full time limit, full term', ~ **ō-nyen** 'a full five years'
mang-	亡	the late, deceased	~ **kyōcang** 'the late principal', ~ **puin** 'one's late wife', ~ **swukpu** 'one's late uncle'
mī-	未	not yet, un-, in-	~ **hwūn.lyeng** 'untrained', ~ **kyelqsan** 'unsettled (accounts)', ~ **kyōyuk** 'uneducated', ~ **punmyeng** 'indistinct, unclear', ~ **wǎnseng** 'incomplete'
mol-	沒	devoid of, --less, eliminating	~ **chwīmi** 'tastelessness', ~ **inceng** 'inhumanity', ~ **sangsik** 'devoid of common sense'
myeng-₁	名	noted, famed	~ **paywu** 'eminent actor', ~ **sōsel** 'well-known novel', ~ **thamceng** 'famous detective'
myeng-₂	明	the coming; next year's	~ **hōykyey-nyen** 'the coming fiscal year', ~ **sayngil** 'one's next birthday', ~ **^{l}yu'-wel** 'June of next year'
mu-	無	lacking, --less, without	~ **cengpo** 'without information', ~ **kwankyey** 'irrelevance', ~ **uymi** 'meaningless(ness)'

nan-	難	difficult	~ **ceymok** 'hard topic', ~ **sãep** 'difficult business', ~ **mūncey** 'tough problem'
[1]**nay-**	來	the coming; next year's	~ **cwumal** 'next weekend', ~ **hak.ki** 'next term', ~ **hayngsa** 'the coming event, coming events', ~ **sēngthan-cel** 'the coming Christmas'
nãy-	內	1 internal; secret	~ **chwulhyel** 'internal hemorrhage', ~ **kwungceng** 'inner palace', ~ **punpi** 'internal secretion'
		2 female	~ **cwucang** 'petticoat government'
õy- *	外	external	~ **chwulhyel** 'external bleeding', ~ **Mongko** 'Outer Mongolia', ~ **punpi** 'external secretion', ~ **swuwi** 'outer guard', ~ **yuseng** 'outer planets'

* As free adnoun 'maternal'; as noun = **pakk** 'outside, ... '.

pãn-	反	anti-; counter-	~ **cak.yong** 'reaction', ~ **hyek.myeng** 'counter-revolution', ~ **kwahak-cek** 'anti-scientific', ~ **S(s)olyen** 'anti-Soviet'
pay-	背	anti-	~ **cengpu** 'anti-government', ~ **Ilpon** 'anti-Japan(ese)', ~ **Yengkwuk** 'anti-Britain, anti-British'
phi-	彼	that	~ **kyēngkwan** 'that policeman', ~ **kyōsa** 'that teacher', ~ **sawen** 'that employee'
phī-	被	suffering, undergoing	~ **ap.pak** 'oppression, suffering', ~ **sēnke** 'undergoing an election'
phyeng-	平	ordinary	~ **hõywen** 'ordinary member', ~ **sawen** 'ordinary employee', ~ **sīmin** 'ordinary citizen'
ph^yēy-	弊	unworthy; my	~ **hak.kyo** 'my school', ~ **kaceng** 'my home', ~ **kwuk.ka** 'my country'
pi-	非	not (being); non-, un-	~ **cēnthwu-wen** 'non-combatant', ~ **hõywen** 'non-member', ~ **hyēnsil** 'unreality', ~ **kongsik** 'unofficial', ~ **mãyphum** 'an article not for sale'
pū-	副	1 assistant, vice-	~ **hõycang** 'vice-chairman', ~ **kyõcang** 'assistant principal', ~ **putay-cang** 'assistant commander'
		2 side, by-, subsidiary	~ **cak.yong** 'side effect', ~ **sãnmul** 'by-product'
pul- / pu-	不	not, un-	PUL-: ~ **chincel** 'unkind(ness)', ~ **hwal.yak** inactive(ness)', ~ **phyengtung** 'inequality' PU-: ~ **ca.yen** 'unnatural(ness)', ~ **ca.yu** 'discomfort', ~ **cektang** 'unsuitable(ness)', ~ **totek** 'lack of virtue'; CF **putong-san** 'real estate'
sa-	私	private, personal	~ [1]**lik** 'private interest', ~ **saynga** 'bastard', ~ **saynghwal** 'private life'
sãng-	上	first of 2 or 3; earlier	SEE Part II.
sin-	新	new	~ **kilok** 'new record', ~ **palmyeng** 'new invention', ~ **sēykyey** 'the new world'
sõ-₁	小	small, little	~ **cicwu** 'small landowner', ~ **kwuk.ka** 'small nation', ~ **kyumo** 'small scale'
sõ-₂	少	few, scanty	~ **inq-swu** 'small number of people', ~ **pyengqswu** 'small number of soldiers', ~ **sõmay-cem** 'few retail stores'

ta-	多	many	~ **chwīmi** 'many hobbies', ~ **hayngsa** 'many activities', ~ **pangmyen** 'many quarters; versatile', ~ **umcel** 'polysyllable'
tān-	短	short	~ **kēli** 'short distance', ~ **siil** 'a short length of time', ~ **swumyeng** 'a short span of time'
tāy-₁	大	great, big, major	~ **cengke-cang** 'major rail station(s)', ~ **cēnthwu** 'major battle', ~ **hayngsa** 'big event', ~ **hwal.yak** 'great activity', ~ **kyēngki-cang** 'large stadium'
tāy-₂	對	against, toward, versus	~ **Cwungkwuk** 'against/toward China', ~ **Mikwuk** 'toward America', ~ **ōykwuk** 'toward foreign countries'
tha-	他	other	~ **cwūso** 'other address', ~ **panghyang** '(the) other direction', ~ **pānmyen** 'the other half side'
uy-₁	疑	pseudo-, false	~ **sengtay** 'false vocal cords', ~ **yangphi-ci** 'false parchment'
uy-₂	儀	adopted, foster	~ **camay** 'foster sister', ~ **hyengcey** 'foster brother', ~ **pep.lyul** 'adopted law', ~ **pumo** 'foster parents'
yēn-	軟	soft	~ **ōykyo** 'soft diplomacy', ~ **phipu** 'soft skin', ~ **tāychayk** 'soft policy', ~ **tokse** 'light reading'
¹yeng-	令	the esteemed; your	~ **hyengcey** 'your (or his) brother', ~ **kacok** 'your family', ~ **puin** 'your (or his) wife', ~ **swukpu** 'your uncle'

5.4. Postnouns.

A postnoun occurs exclusively or typically after a noun; in our analysis the noun modifies the postnoun, which functions as the head of the phrase. In a sense, the postnoun is a further restricted type of quasi-free noun (§5.2.1). The quasi-free noun **hay** 'possessed thing, one's' would be considered a postnoun if it were not for the fact that it occurs after **nay** 'my' rather than **na** 'me'. Some of the postnouns are taken from inflected forms; a number are also used as other parts of speech, and those are separately listed below. Some of the items given are much more limited in occurrence than others and they would perhaps be better listed as bound postnouns; it is hard to draw the line. Good cases could be made for including here the following items, treated as Chinese suffixes in §5.4.5.2: **-ce** 'authored by', **-ci** (periodical titles), **-cok** 'tribe', **-hwa** 'flower', **-kyēy** 'world' (see §5.3.3), **-kyo** 'religion', **-phyen** 'compiled by'. Compare these with **hayng** 'bound for', which is included here. The word **ccay** could be set up as a separate subcategory "postnumeral" since it nearly always follows a numeral, just as its Chinese counterpart **cēy-** could be set up as a separate category "bound prenumeral"; but **ccay** also occurs with the adnouns **ches** 'first' and **mal** 'last' (**mal ccay** is entered in LHS 920a), and it can occur after a NUMBER phrase as well as after a numeral: **sēy pen ccay** (or **sēy ccayq pen**) 'third time' (in a more literary form **sam-hoy ccay**); **ttek ul nēy kay ccay mek.nunta** 'I'm eating my fourth rice cake', CF **nēy pen ccay ttek i cēy-il khuta** 'the fourth rice cake is the biggest'. For the postcounter (···q) **swū** 'number of - ', see §5.5.1.

    (1) Postnouns (exclusive)
      achi₁ 'person'
      achi₂/echi 'worth'
      awus see (k)awus
      ca(y)ngi 'doer, -er, one, ... '
      ccali 'worth; amount; a person wearing'
      ccay '-th' (ordinalizer of non-Chinese numerals and number phrases)
      ceng kkey 'around, about (a certain time)'

chi₁ 'a fixed quantity'
chi₂ 'a general sense, a feel'
chwungi / chongi 'one, person, thing'
ciki 'a guard, a keeper'
cil 'act, behavior' (CF noun cīs 'gesture', cī(s)- 'make, do')
(···q) cwung(-payki) vulgarizer (spelled -ccwung- in South Korea)
echi / achi SEE achi / echi
hayng 'bound for, dispatched to' [semi-literary]
he 'approximately (a certain quantity)' [semi-literary]
kal 'discrimination, division, branch, kind'; [neologism] branch of study, -ology'
kālyang 'approximately (so many), about' (follows number)
kāmali 'a person who is the butt of ·· '
kan 'an interval of ·· ; between, among'
(k)awus 'and a half'
(k)kayngi diminutive
kkal vulgarizer (? < ···q kal)
kkes 'to the full extent of'
kkey '(= ceng kkey) around, about (a certain time); near (a place)'
kkili 'separate group (of people)'
kkol 'at the rate of, ·· each, per unit'
kkwulek = ···q kwulek 'the act of'
kkwuleki 'an overindulger in' (? < ···q kwulek -i)
kkwun 'a man occupied with or noted for' (= ···q kwun; ¹Yi Ungpayk prefers -kkwun)
koc 'the Cape of ·· '
kwuni 'person' (? < ···(q) kwun + i): is pallok ~ 'idler' the only example?
kyĕng 'around, about (a certain time)'
may 'shape, form, cast'
nāy 'throughout, all through (a period of time)'
ney 'group (of people)'
ong 'the Venerable Mister ·· '
pachi 'a person with a vocation (dating from feudal days) that deals with ·· '
(···q) pal 'line, streaks, rays; impression'
(···q) palam 'without one's ·· on' (see also below)
panciki 'adulterated with'
pang 'in care of'
p(h)a(y)ki, p(h)e(y)ki 'person, thing, one; child'
pha(y)ngi 'person, thing, one; child' (see also payngi below)
phok 'of the same age group; approximately, about'
ppak vulgarizer
ppel 'the kin-relationship (standing) of ·· '
sang 'Mr, Mrs, Miss, Ms' (suffixed to Japanese names; < Japanese san)
soswu 'plus some (extra), ·· odd, a bit over ·· ' (< sŏswu 'a small number, minority')
ssi 'clan; Mr'
ta(k)ci '(this / that) extent, degree'
tepeki 'lots / heaps of'
theym (them, theymi, thek) 'as much as, all of'
thi 'the mark (looks, air, appearance, manner) of' (? < noun 'dirt'; ? Seoul dialect
    variant < thāy 'appearance')
thwungi / thongi 'one, person, thing'
thwuse(y)ngi 'covered or smea red with'

(t)tam 'latent power; wallop'
ttawi 'and the like, of the sort' (< ⋯q tawi, der noun < taw- 'be worthy of the name of')
ttayki, ttuki, te(y)ki, tek.kwungi 'one, person, thing' [vulgar]
tteli 'thing' [vulgar] − Does this occur only in **tung tteli** 'back'?
tūng 'and so on; the above several' [semi-literary]
tūngci 'and such places; and vicinity' (also quasi-free noun?)
yang 'Miss'

(2) Rhythmically misanalyzed compound nouns
  nwun-i 'a person with eyes such that ⋯ '   phal-i 'a person with arms such that ⋯ '
  pal-i 'a person with feet such that ⋯ '   son-i 'a person with hands such that ⋯ '

(3) Derived nouns (§9.6) that are used only as postnouns
  alh.i 'ache, illness'
  cap.i 'taking'
  kal.i 'changing; remodeling'
  keli 'at intervals of, skipping, jumping'
  kel.i 'gait'
  kel.i 'a hanger, a stand (for)'
  ket.i /keci/ 'collection, gathering up, harvest of'
  nah.i 'a weave. a yarn of'
  pak.i 'imprinted with, ⋯ '
  pat.i /paci/ 'receptacle for, ⋯ '
  phal.i 'selling'
  ppop.i 'an extractor (pull, pincer, claw) for'
  puli 'one who works (something); work, doing, act, trick'
  puth.i /puchi/ 'of the class of, made of'
  sal.i 'living, life; garb, clothes'
  ssi < (p)ssi 'the use (state, condition, quality, mode) of'
  tot.i /toci/ 'rising'
  ttut.i /ttuci/ 'thing stripped of ⋯ ' − Are **ppye** ∼ and **al** ∼ the only examples?
See also (cim) sil.i, (sil-kwup) tal.i, (sīpiq) cwup.i.

(4) Inflected forms (occurring also in other environments)
  chiki 'game of hitting ⋯ ' (kōng chiki 'ball hitting')
  mayc.ki 'concluding it' (kkuth mayc.ki 'final touches')
  naki 'being born in; a person from'
  nayki 'product; display; person displaying (= naki); a person from'
  pat.ki 'receiving; receiver of'
  sswuki 'a boiled dish of' (wen-pap sswuki 'soup with rice and rice cakes in it')
  ttāym 'warding off; mending'
See also -nam(.)un (pp. 164, 174, 704).

(5) Used also as free nouns, sometimes with a different meaning
  cen 'before; Dear – [in letter]' (as free noun 'earlier time', as adnoun 'former')
  chey 'style (of writing); body' (as noun, literary)
  cwuuy 'ism, doctrine'
  cwuuy-ca '-ist, ideologist, advocate of'
  ⋯q keli 'material, stuff for; basis; doing; appearance'
  meli vulgarizes nouns (as free noun 'head')
  nim 'esteemed person' (as obsolete free noun 'you; lover')
  nolus 'job, role'

pang 'shop, shopkeeper's, store' (as free noun 'room')
sik 'style'
taykali vulgarizes nouns (as free noun 'head [vulgar]')
ttakci vulgarizes nouns (as free noun 'crud')
ttaymun 'reason' (quasi-free noun?)

(6) Also particle, adverb
  tul 'group' (see detailed entry in Part II)

(7) Also postmodifier
  ccay 'and all, as it is'   nalum 'depending on'
  chay 'intact'   ppun 'only'
  ihwu 'after, from (the time when) ⋯ on'   tay (lo) 'original state'
  ilay 'ever since, after during the past ⋯ '   thong 'impetus, ⋯ '

(8) Also postmodifier, noun
  cwung < TYWUNG 'midst, middle of'   pakk 'outside (of)'
  (⋯q) kīm 'impetus' (as free noun 'steam')   (⋯q) palam 'impetus' (as free noun 'wind')
  (⋯q) kyel 'impetus' (as free noun 'wave')   CF nyekh (p. 739)

(9) Also postmodifier, postsubstantive
  (⋯q) seng < ˙SYENG 'quality'

(10) Also postmodifier, suffix (bound postnoun)
  payngi 'one, person'

(11) Also suffix (bound postnoun)
  tali 'one, fellow, guy'

(12) Also counter
  pun 'a portion for, enough for' (as counter 'minute')

(13) Also postnominal verbal noun intransitive
  chi, cha 'bad weather (around a certain day)'

(14) Also adverb
  kang 'strong; a little over ⋯ , ⋯ and a fraction'
  namcis, nek.nek 'fully, all of, at least' + number
  ppa-tus 'just under, a little short of, (falling) short' (ppa'-tus abbr < ppānun tus)
  yak 'weak; just under, a fraction less than' (< ˙ZYAK)

(15) Also verbal noun (transitive / intransitive)
  pal 'dispatch(ed)' [semi-literary]

(16) Also noun, adnoun, adjectival noun
  ⋯q cwūng ("˙ccwung") 'a weight of (⋯ nyang, ton, phun); weighty'

(17) Also adnoun, numeral
  pān (number +) 'and a half'; 'half'

(18) Pseudo-postnoun
  sim (dialect variant of him) in payq sim 'belly strength' = 'endurance' or 'greed' and in
    ip sim 'mouth strength' = 'volubility'
  -nyang (from ⋯ in yang) in i-/ku-/ce-nyang 'this/that/that way'

Notice also the place postnouns (§5.2.3). Some of those occur as free nouns: san 'mountain',
kang 'river', ⋯ . Others are more restricted: yang 'ocean', lī 'village', sil 'valley' (archaic for kōl in
Omey-sil). And some are free nouns only as abbreviations: hāng = hāngkwu 'port'.

5.4.1. Postnoun/postmodifier adjectival noun (= adjectival postnoun/postmodifier).

The morpheme **man** plays several grammatical roles. When predicated by **hata** it is an adjectival noun, but **man hata** is always preceded by a noun (**N man hata**) or by the prospective modifier (**-ul man hata**, §5.4.3.2). Elsewhere I have treated **man** and **hata** as inseparable (i.e. nothing can intervene), but for some speakers, at least, that is not quite true, for ··· **man to hata** is possible.

5.4.2. Postsubstantives.

There are four constructions that involve a substantive (**-um / -m**) followed by a morpheme. I treat the morphemes that can follow as a subclass of postnoun and call them postsubstantives: **-um a**, **-um sey**, **-um say**, and **-umq seng**. The last word (**seng**) also occurs as a postnoun and as a postmodifier. For the meanings and use of the constructions, see the entries in Part II.

5.4.2.1. Postsubstantive adjectival noun.

This formidably labeled subcategory is set up to account for the peculiar behavior of the morpheme **cik** in the construction **-um cik ha-**, for which the meaning and use will be found in Part II. Elsewhere I treat **cik** and **ha-** as inseparable, but for some speakers the focus particle **to** can intervene.

5.4.3. Postmodifiers.

A postmodifier occurs after the several modifier categories of inflected words (§9.3) typically, exclusively, or exclusively in a clearly distinct meaning. In the list below, the postmodifiers are divided into groups according to privileges of occurrence.

(1) Exclusively after modifiers

a 'question'
(-ulq) c^{e}aksimyen 'if'
ccok-ccok, cok-cok 'every occasion that'
ci$_1$ 'uncertain fact, ... '
ci$_2$ '(the time) since'
cince [obsolete] 'behoovement'
cintay [obsolete; colloquial] 'time when'
cuk(-sun) 'when'

i 'question'
ka, ko 'question'
nawi '(not) enough to, ... '
(-ulq) say [obsolete] 'since, while' (< ˙s oy)
swulok 'to the full extent that' (< ˙s o ˙lwo k)
twung) 'one of two conflicting states'
tul 'conceded fact' (< ˙t ol)
ya, yo 'question'

(2) Exclusively after modifiers in the relevant shape or meaning
cwul 'likely fact; way, ability'
īl 'definite fact; experience'
kes 'tentative fact, ... '
lī 'reason' (< ˙LI)
pa 'tentative fact; circumstance'
phok 'supposition; appearance; seeming'

phūm 'appearance; behavior'
tey 'circumstance, event'
the 'footing, standing, relationship;
   (= kyengwu) circumstance'
the, they 'intention or expectation'
ttalum 'only, just'

(3) Also postnoun
ccay 'and all, as it is'
chay 'intact, the original state'
nalum 'depending on'
ppun 'only'

seng 'quality'
tay (lo) 'original state, as is / was;
   in accordance with; as soon as'
thong 'impetus, ... '

(4) Also postnoun, noun
kīm, kyel, palam 'impetus, ... '

(5) Also postsubstantive
(-ulq) sey — see the entry in Part II

(6) Also postnoun, suffix
payngi 'one, person'

(7) Also bound noun (after summative, p. 685)
mangceng 'although'

(8) Also inflectional ending, ? particle
kwu(me)n, kwun a, kwulye 'oh I see ... '

(9) Also noun, adverb
han phyen 'in addition, and, but, ... '

(10) Also noun
kkuth 'the final consequence'
kyem 'at the same time' (SEE p. 672)

nameci 'excess, remainder'
sēym 'calculation, conjecture, speculation'

(11) Also particle
   (-ulq) son = s-un [obsolete] '[as for] the likely fact (that ‥)'

   A group of pseudo-postmodifiers, regular nouns (free or quasi-free), occur more widely:

cakceng 'intention, resolve'	mo.yang 'appearance'
cek 'time'	mulyep 'time'
(-tun) cha 'the course of'	nolus 'job, role, part'; (~ i 'but')
chām 'the point, the verge'	nyekh 'direction; toward'
chĕci 'situation, circumstance'	pakk 'outside of, except for'
hān 'extent, limit'	sai, say 'midst'
hwū 'after'	sesul 'force'
hyĕncang 'the very act / scene'	taum 'next'
hyengphyen 'process, circumstance'	tāysin 'substitute; instead of'
i 'person, one; fact, act'	tey 'place' (≠ tey 'circumstance')
kām 'feeling'	the 'site' (≠ the, they 'intention,
kes 'thing; one'	expectation')
kil 'way'	thek 'reason, grounds'
kkatalk 'reason'	(to)cwung 'midst'
ko (lo) '(for) the reason'	tong-an 'while'
kyengwu 'circumstance'	ttay 'time'
¹īyu 'reason'	twī 'after'
māl 'words, … '	yang 'pretense; appearance; intention'
matang 'instance, case'	yĕyceng 'intention'
mokcek 'aim, purpose'	¹yolyang 'plan, intention'

5.4.3.1. Postmodifier verbal nouns intransitive inseparable (= inseparable verbal postmodifiers).

This heavily labeled category is needed to account for **chey (chek)** 'pretense' and **ssa** 'appearance' in constructions of modifier + **chey** (or **ssa**) + **ha-**. These words are postmodifiers that are at the same time also verbal nouns. For examples, see Part II.

5.4.3.2. Postmodifier adjectival nouns inseparable (= inseparable adjectival postmodifiers).

There are four postmodifiers that are at the same time adjectival nouns inseparable:

ak / lak 'one of two alternating states'	‥q pen (or "ppen") 'on the verge of'
man 'worth ‥ing' (also particle, postnoun)	wu 'general appearance'

But at least some speakers allow the focus particle **to** between each of these and the following **ha-** (CF §5.4.1); for such speakers these words belong in the next group. (For examples, see Part II.)

5.4.3.3. Postmodifier adjectival nouns separable (= separable adjectival postmodifiers).

Each of two postmodifiers is at the same time an adjectival noun, like those in the preceding section, but differs from them in that it can be separated from the **ha-**, e.g. by the focus particle **to** 'even, also' (for examples, see Part II):

pep 'good reason to be, … '	tus 'the idea / feel of'

5.4.3.4. Pre-inseparable postmodifier.

The postmodifier **s^{e}ang** 'appearance' (< 'SYANG) is unique: in the standard language it is always followed by the postnominal adjective inseparable **siph-**. For examples, see p. 773.

5.4.4. Counters. See §5.5.2.

5.4.5. Bound postnouns (suffixes).

As with the adnouns (§5.3.3), some postnouns have quite stringent occurrence restrictions. Most which are of native Korean origin have been included as "free postnouns" above. Some of those also occur, as do a number of other morphemes, after bound elements such as verb stems, bound nouns of various sorts, etc. For that reason there is some overlap between the earlier list and the following lists. The suffixes in §5.4.5.1 are non-Chinese; they typically attach to native Korean elements. In the following section are the Chinese suffixes, which typically attach to Chinese elements. For the Chinese list, examples are provided to show why they deserve to be treated as suffixes. As with the adnouns we are again vexed by the problem of deciding freedom and bondage of Chinese morphemes; in fact, with the suffixes it becomes even more of a problem. Let's consider some examples. The free noun **hŏy** means 'meeting, ... ', the free noun **um.ak** means 'music'. Should we not consider **um.ak hŏy** 'concert' as simply a construction of two nouns, like **hak.kyo sensayng** 'school teacher' or **yeki koki-cap.i** 'the fishing in this place'? The noun **yak** 'drug, medicine' is free and **pang** 'shop' is a free postnoun; should we consider **yak pang** 'drugstore' as two words? Since **pyĕng** 'illness' is a noun and **phipu** 'skin' is a noun, is **phipuq pyeng** 'skin disease' a noun + noun construction? What about **pyĕng cwung** in the midst of illness'? In general, I have conservatively treated one-syllable Chinese elements as essentially bound, with their freedom apparent only when they are in construction with non-Chinese elements. So I have treated **pyĕng** as a free noun in expressions such as **kapyewun pyĕng** 'a light illness' and **palq pyĕng** 'foot-soreness', but as a bound element in **cwūngpyĕng** 'serious illness' where **cwūng-** is a bound adnoun, and in **pyĕngwen** 'hospital' where **-wen** is a bound postnoun. I am uncertain what to do with **phyĕyq pyeng** 'lung disease, TB', where **phyĕy** is a Chinese element that is the free noun meaning 'lungs', yet the occurrence of the reinforcement marker **-q-** argues for treating the combination as a construction of noun + noun. But **-q-** shows up within Chinese compounds that I would certainly not want to treat as two words (**sānqpo** 'walk', **munqca** 'written characters', **sāqken** 'incident'), and there are many cases where it would be impossible for **-q-** to surface, e.g. before **-wen**.

Perhaps further studies of frequency and distribution will resolve these problems. Meanwhile, the best we can say is as follows. Many Chinese morphemes sometimes appear, at least weakly, as free nouns; but all Chinese morphemes are at least sometimes bound. In compounds with other Chinese morphemes it is better to regard any one-syllable constituent as bound (bound adnoun, bound noun, bound postnoun) unless it is clearly proven otherwise. Dictionaries of Korean sometimes hyphenate obvious two-syllable compounds, especially when they were made up in Korea and have no counterparts in China.

I am inclined to make a special exception of free Chinese nouns and counters + (···q) **swū** 'the number of ··· ' because of the exceptionally wide range of distribution (CF §5.5.1). So I would write **chwulqsayngq swū** 'the number of births', **sāmangq swū** 'the number of deaths', **haksayngq swū** 'the number of students', **ceycak swū** 'the number of products'; **kwĕnq swū** 'the number of volumes', **sālamq swū** 'the number of people' − but **inq-swū** 'the number of people' because **in** 'person' is not normally used as a counter in Korean. I am also tempted to space off ··· **cek** '···ic' and ··· **sāng** '···-wise' for similar, but less compelling, reasons: see pp. 151, 440, 769. I prefer to hyphenate compounds of one-syllable synonyms or antonyms: **pok-tek** 'happiness and prosperity', **cen-hwū** 'before and after'.

5.4.5.1. Core suffixes.

The core suffixes can be divided into twelve groups:

    (1) diminutives
    (2) miscellaneous (pseudo-diminutives, vulgarizers, personalizers, ...)
    (3) deriving both adjectival nouns and impressionistic adverbs
    (4) deriving adjectival nouns
    (5) deriving adverbs
    (6) deriving adverbs from iterated nouns
    (7) deriving adverbs from processive verbs

(8) deriving adverbs from adjectives

(9) deriving nouns from adjectives or processive verbs

(10) deriving nouns from processive verbs or nouns

(11) pseudo-suffix -si deriving noun from processive verb

(12) deriving excess numeral from decimal numerals

Details on the individual items will be found in the entries of Part II.

(1) Diminutives

-k	-eni (? → 5)
-ak / -ek	-wuni [dialect]
-a(y)ki / -e(y)ki	-keypi (in tes-keypi)
-ang / -eng	-(k)kayngi
-a(y)ngi / -e(y)ngi	-khe(y)ngi
-a(y)ci	-che(y)ngi
-al / -el	-ma(y)ngi
-al.i / -el.i, (-oli / -ali)	-tayngi (in yeph-tayngi)
-ul^{e}a(y)ki / -l^{e}a(y)ki	-thayngi
-ul^{e}a(y)ngi / -l^{e}a(y)ngi	-the(y)ngi
-amchi (? → 5)	-sakwi, -say (in iph-sakwi/-say)

(2) Miscellaneous

-ttakci vulgarizes nouns (also postnoun, noun 'crud')

-ttakseni (?) vulgarizes nouns

-taykali vulgarizes nouns (also postnoun, noun 'head' [vulgar])

-meli vulgarizes nouns (also postnoun, noun 'head')

-pal vulgarizes nouns (? also noun 'foot')

-akw(un)i vulgarizes nouns

-ceng 'one' [vulgar]

-cengi 'stuff' [vulgar]

-tali 'one, fellow, guy' (also postnoun)

-takwu, -takw(un)i 'hard thing' (vulgarizes noun)

-(t)tayki 'thing, one'

-te(y)ki 'thing, one, guy'

-tek.kwungi 'thing, one, guy'

-ttuki 'thing, one, guy

-(t)twungi 'thing, one, guy'

? -cwungi 'one'

-chwungi 'one'

-chongi 'one' (?)

-cha(y)ngi 'one, thing, stuff'

-eci 'stuff'

-thong 'thing; part of body'

-(q-)po 'one, thing, person'

-potwu 'one, thing, person'

-payngi 'one, thing, person' (also postnoun, postmodifier)

-pangi, -pe(y)ngi 'one, thing, person'

-eng-payngi 'person' (diminutive + ...)

-khengi 'thing, person'

-kwangi 'person'

-swungi 'one, thing'

-songi 'person'

-soy 'person', makes informal names for boys

-tol(-i) 'stone', popular in boys' names

-tong(-i) makes names endearing names for children

-i '-y, -ie' (after consonant only) makes names endearing (children) or.jocular / derisive (adults)

-huy$_1$ makes female names

-huy$_2$ makes pronouns plural

-a(y)mi / -e(y)mi 'one, thing, person'; makes animal / fish / bird names

-a(y)pi / -e(y)pi makes animal / fish / bird names

-pak.i 'an inlaid one, one with something stuck in or attached'

-pat.i 'receptacle, ... '

(3) Deriving both adjectival nouns and impressionistic adverbs

-(c)cok / -(c)cwuk	-mak / -mek
-(c)cak / -(c)cek, -chak / -chek	-(p)pak
-(c)cang = -(c)cak	-ppuk
-(c)cik	-(s)sek
-(c)cimak	-sil
-cin	-sin
-(c)cum	-sul
-(c)cumak	-(s)swuk
-kkak / -kkek	-swung
-(k)kis	-ttak / -ttek
-(k)kul	-ttuk
-(k)kus	-(t)twuk

(4) Deriving adjectival nouns

-kom, -(k)kum (hata) (CF mankhum, ittakum)

(5) Deriving adverbs

-ccolok in the word ămu-ccolok and its synonym mŏ-ccolok (? < -tolok, ? < ecci ha-tolok)

-khwung

-ulu, -wulwu

(6) Deriving adverbs from iterated nouns

-i (CF 8, 9)

(7) Deriving nouns from processive verbs

-ay (variant -ey), -kay (variant -key) 'gadget, device, -er'

(8) Deriving adverbs from adjectives

-i / -li; -chwu, -wu

(9) Deriving nouns from adjectives or processive verbs

-i

(10) Deriving nouns from processive verbs or nouns

-wung

(11) Pseudo-suffix -si- (in nakk-si 'fishing' < naks- + -i = 9)

(12) Deriving excess numeral from decimal numerals

-nam.un (usually spelled -namun)

We might also add the suffix that makes approximate numerals out of numerals: -es / -e (with some irregularities). And there are suffixes like -(u)k, -(u)l, -(u)m, -(u)n, -(u)s, ... , involved in the derivation of impressionistic adverbs (§12).

5.4.5.2. Chinese suffixes.

The Chinese suffixes (or bound postnouns) are arranged alphabetically below. Compare the lists in Choy Hyenpay 651-2, Kim Pyengha 115-6, CM 1:218-31. Some of the morphemes could be said to be free nouns in literary uses or in special meanings, e.g. **hak** = **hak.mun** 'learning'. We might question whether **cung** 症 'ailment' and **sěng** 情 'nature' should not be treated as free nouns. Note that **sāng** 上 '—-wise' and **cek** 的 ' —ic' have particularly wide combinatorial privileges in forming quasi-adnouns (§5.3.1). Good cases could be made for including as free postnouns (§5.4) the following items: **-ci** 誌 'periodical', **-ce** 著 'authored by --', **-cok** 族 'tribe', **-hwa** 花 'flower', **-kyey** = **kyěy** 界 'world', **-kyo** = **kyŏ** 教 'religion', **-phyen** 編 'compiled by --', **-sen** 選 'selected by --'.

List of Chinese suffixes (bound postnouns)

SHAPE		MEANING	EXAMPLES
-a	兒	child	**cěnung** ~ 'feeble-minded child', **chencay** ~ 'child genius, precocious child', **hŏnhyel** ~ 'mixed-blood child, half-breed'; CF **koa** 'orphan', **sŏa** 'infant, child'
-an	岸	shore, littoral	**Sehay** ~ 'the West (= Yellow) Sea Coast', **Tonghay** ~ 'the East (= Japan) Sea Coast'
-ca	者	person, fellow	**āytok** ~ 'devoted reader', **ko.yong** ~ 'employee', [1]**notong** ~ 'laborer'; CF **hakca** 'scholar', **pyěngca** 'invalid'
-cang₁	長	head, chief	**wiwen** ~ 'the head / chairman of a committee', .. ; CF **sacang** 'company president'
-cang₂	場	place	**chwuk.kwu** ~ 'a football field', **kyěngma** ~ 'a race track', **sakyek** ~ 'a shooting ground / gallery, a firing range', **wūntong** ~ 'a playground, an athletic field'; CF **nongcang** 'farm', **kongcang** 'factory'
(q)-cang₃	狀	document, letter	**col.ep** ~ 'diploma, graduation certificate', **hyep.pak** ~ 'intimidation letter', **sokayq** ~ 'letter of introduction', **sīn.imq** ~ 'credentials', **wiimq** ~ 'letter of attorney', **kongkayq** ~ 'open letter', **chotayq** ~ 'letter of invitation'
-ce	著	authored by --, written by --	**Kim paksa** ~ 'written by Dr Kim', **kwahak-ca** ~ 'authored by a scientist', **ōykwuk-in** ~ 'by a foreigner'
-cek	的	--ic, --ical	SEE Part II, p. 440; CF p. 151.
-cel	節	festival	**ātong** ~ 'Children's Day', **kaychen** ~ 'Foundation Day [of Korea]', **sěngthan** ~ 'Christmas'
(q)-cem	點	point of	**chwulpalq** ~ 'starting point, point of departure', **tōchak** ~ 'arrival point', **wikiq** ~ 'point of danger'
-cey₁	齊	remedy (for --)	**sohwa** ~ 'a digestant', **sotok** ~ 'a disinfectant', **salkyun** ~ 'an antiseptic'
-cey₂	制	system	**kyōyuk** ~ 'educational system', [1]**yāngwen** ~ 'bicameral system', [1]**yuk-sam-sam** ~ '6-3-3 system (of schools)', **pŏngken** ~ 'feudal system'
-chayk	策	policy	**pānkong** ~ 'anti-communist policy', **pān-Mi** ~ 'anti-American policy', **yunghwa** ~ 'a policy of appeasement'; CF **cengchayk** 'policy'
-che	處	place, office, agency, bureau, large facility	**insa** ~ 'personnel office', **kongpo** ~ 'Office of Public Information', **kunmu** ~ 'place of employment', **kwūkup** ~ 'relief agency', **kwan.li** ~ 'administrative office', [1]**yen.lak** ~ 'liaison office'
-cheng	廳	government office, administrative center	**Cwungang** ~ 'the Capitol', **Ōyca** ~ 'Office of Foreign Supply'; CF **Sīcheng** 'City Hall'

-cho	草	grass, weed, plant	kumcam ~ 'dandelion' (= mintulley), mānpyeng ~ (a rhododendron), kumpul ~ 'elecampane (Inula japonica)', pullo ~ 'a herb of eternal youth'; CF [1]nancho 'orchid'
-ci[1]	地	place, land	kecwu ~ 'place of residence', cem.lyeng ~ 'occupied territory', cwūthayk ~ 'a residential area'; CF koci 'upland', phyengci 'flatland'
-ci[2]	祇	1 paper	insway ~ 'printing paper', panca ~ 'ceiling paper', hwāsen ~ (? hwā-senci) 'a thin rough paper', pyek ~ = topay ~ 'wallpaper' [toypay (CM 1:225) must be dialect]
		2 newspaper titles	Ppulawuta / Ppulaputa ~ 'Pravda', Icupeycciya ~ 'Izvestia', Thaimucu ~ 'the Times'
-ci[3]	誌	periodical	cwukan ~ 'a weekly', welkan ~ 'a monthly'; Thaimu ~ 'Time Magazine', Laiphu ~ 'Life Magazine'
-cok	族	tribe, group, people, nationality	Intian ~ 'Indian tribes', Thipeythu ~ 'Tibetans', [n]Yecin ~ 'the Ju(r)chen'
-cong	種	variety	kāylyang ~ 'improved variety', cāylay ~ 'native variety', ōylay ~ 'nonnative variety'
(q)-cung[1]	證	certificate	hapkyek ~ 'certificate of qualification (passing)', itongq ~ 'certificate of moving'
(q)-cung[2]	症	ailment	hyēnhwunq ~ = ecilq ~ 'vertigo, dizziness', kyelhayk ~ 'tuberculosis', pokchangq ~ 'swollen-belly ailment', sinkyengq ~ 'nerve disorder'; ēmseyq ~ ? 'depression; pessimism'; CF kalqcung 'thirst', hwā([?]q)cung 'anger, displeasure'. This element also occurs bound in silhq-cung /silccung/ 'displeasure' (< adj silh-) and kapkap-cung 'uneasiness' < adj-n kapkap (ha-).
-cwu	主	master, boss	kongcang ~ 'factory boss', kiep ~ 'boss of the enterprise'
-e	語	language, word(s)	Cwungkwuk ~ 'Chinese', Hānkwuk ~ 'Korean', Ilpon ~ 'Japanese', hōching ~ 'designation(s)', swusik ~ 'a modifier'; CF en.e 'language', Yenge 'English', kwuk.e 'vernacular'; cwue 'subject', swul.e 'predicate'
-ha	下	under	SEE Part II, p. 514.
-hak	學	science, study, ‑‑ology, ‑‑ics	sāhoy ~ 'sociology', kyengcey ~ 'economics', mulli ~ 'physics', en.e ~ 'linguistics'
-han	漢	person, guy, fellow	muloy ~ 'shifty loafer', mun.oy ~ 'layman', putek ~ 'unvirtuous fellow'; CF kōyhan 'suspicious-looking guy'
-ho	號	1 number	cēy sip-sa ~ (sil) '(Room) No. 14'
		2 issue, number	kinyem ~ 'commemorative issue / number'
		3 name, designation	Māsan ~ 'the S.S. Masan', Thōngil ~ 'the Unification Express' (a train); CF kwūho 'slogan'
-hoy	會	gathering, meeting	cwātam ~ 'a roundtable discussion', [1]nāngtok ~ 'a (gathering for) reading; a reading group', um.ak ~ 'a concert'; CF myēnhoy 'interview'
-hwa[1]	化	conversion, ‑‑ization, ‑‑ize	hap.li ~ 'rationalization, streamlining, reordering', kikyey ~ 'mechanization', kwuk.yu ~ 'nationalization', mincwu ~ 'democratization', tōngmul ~ 'brutalization', tosi ~ 'urbanization'
-hwa[2]	花	flower	hāytang ~ 'sweet briar', mukwung ~ 'the Rose of Sharon', chāysong ~ 'portulaca (rosemoss)', nungso ~ 'trumpet flower'; CF kwuk.hwa 'national flower'

-il	日	day (also counter)	konghyu ~ 'a legal holiday', kwukchi ~ 'National Humiliation Day', thānsayng ~ 'birthday (of a sage)'; CF sayngil 'birthday', kiil 'fixed date; death anniversary'
-in	人	person	ca.yen ~ 'a natural person, natural man', Hānkwuk ~ 'a Korean', munhwa ~ 'a person of culture'; CF siin 'poet'
-ka₁	家	professional	cengchi ~ 'politician', mīswul ~ 'artist', sap.hwa ~ 'illustrator', thamhem ~ 'explorer', yĕyswul ~ 'artist'; CF cak.ka 'writer'
-ka₂	歌	song	āykwuk ~ 'patriotic song', cacang ~ 'lullaby', nongpu ~ 'farmer song'; CF cŏka 'dirge', sŏngka / sĕngka 'hymn'
-ka₃	哥	quasi-title	affixed to surname (humble or pejorative)
-ka₄	街	street	cwūthayk ~ 'residential street', Cong.lo sam ~ 'Bell Street at Third Street' (an area once notorious for prostitution), pĕnhwa ~ 'busy street, thoroughfare'
-kam	感	a feeling	ap.pak ~ 'oppressive feeling', kincang ~ 'tense feeling', māncok ~ 'a feeling of satisfaction', pul.an ~ 'uneasy feeling'; CF chok.kam 'the sense of touch', yuk.kam 'sensuality', [1]yuk.kam 'sixth sense'
-kayk	客	guest, person	mangmyeng ~ 'an exile, a refugee', mōhem ~ 'an adventurer', wūntong ~ 'a sport spectator, fan'; CF hayngkayk 'tourist', sungkayk 'passenger'
-ki₁	器	device, instrument	kyĕylyang ~ 'ga(u)ge, meter', chuk.lyang ~ 'surveying instrument', chuk.wū ~ 'a rainfall ga(u)ge' pyĕn.ap ~ 'transformer', punto ~ 'protractor'; sohwa ~ (1) 'fire-extinguisher', (2) 'digestive organs'; CF hyungki 'lethal weapons, arms'
-ki₂	機	1 machine	apchak ~ 'press', cwuco ~ 'type-caster', insway ~ 'printing machine', palqtong ~ 'motor'
		2 (air)plane	phok.kyek ~ 'bomber', swusong ~ 'transport plane'
-ki₃	期	period of time	chochang ~ 'pioneer days', pun.lan ~ 'chaotic period'; CF choki 'early period', malki 'later period'
-kong	工	artisan	kīnung ~ 'technician', kumsok ~ 'metal worker', mōphi-cĕyphum cĕyco- ~ 'furrier', pangcik ~ 'textile worker', pelmok ~ 'lumberjack', swuk.lyen ~ 'skilled craftsman'; CF mok.kong 'woodworker', ⁿyekong 'factory girl'
(q)-kwa	科	1 course, class	kwuk.eq ~ 'Korean course', swūhak ~ 'mathematics course', Yengeq ~ 'English course'; CF hak.kwa 'course'
		2 taxonomic family	cangmiq ~ 'roses', cīntallayq ~ 'azalea'
		3 office, bureau, section	cengpoq ~ 'intelligence / information bureau (or section)', hayngcengq ~ 'administrative office', insaq ~ 'personnel division / office', pōkup ~ 'supply section'
-kwan₁	官	government official	cānghak ~ 'an inspector of schools', kĕmchal ~ 'public prosecutor', kĕm.yel ~ 'censor', sihem ~ 'examiner'
-kwan₂	館	place, building	mīswul ~ 'art gallery', pak.mul ~ 'museum', sīkong ~ 'public auditorium', sīmin ~ 'City Center', tāysa ~ 'embassy', yenghwa ~ 'movie theater, cinema'; CF hōykwan 'meeting hall', [1]yekwan 'hotel'
(q)-kwen	權	power, authority, (also noun)	hayngcengq ~ 'administrative authority', myĕng.lyengq ~ 'commanding authority', sapep ~ 'judicial power'; CF silqkwen 'real power', phāyqkwen 'hegemony'

-kwu₁   口   entrance, wicket, hole, opening, window — cepswu ~ 'reception window', chwul.ip ~ 'entrance (and exit)', chwul.nap ~ 'window/wicket for collections and disbursements', kăyphyo ~ 'the ticket (fare) adjustment window', pŭnhwa ~ 'a (volcanic) crater'; CF ipkwu 'entrance', chwulkwu 'exit'

-kwu₂   具   tool, implement — munpang ~ 'stationery supplies', pănghan ~ 'cold-weather gear', wŭntong ~ 'athletic goods'; CF kikwu 'utensil, appliance', tŏkwu 'tool'

-kwuk₁   國   country, state, nation — kŏnghwa ~ 'republic', mincwu ~ 'democracy', kwuncwu ~ 'monarchy'; CF ponkwuk 'homeland', cek.kwuk 'enemy country', ăkwuk 'our country'

-kwuk₂   局   agency, office — chelqto ~ 'railway station', sam.lim ~ 'bureau of forestry', wuchey ~ 'post office'; CF yak-kwuk 'pharmacy'

-kwun   軍   army — cengpu ~ 'the government forces', hyek.myeng ~ 'revolutionary army', hăypang ~ 'an army of liberation'; CF hăykwun 'navy', kongkwun 'air force'

-kyey₁   界   world, circles, kingdom, --dom, realm — chwulphan ~ 'publishing circles', sasang ~ 'the world of ideas', tŏngmul ~ 'the animal kingdom', um.ak ~ 'musical circles'; pi-Kathollik ~ 'non-Catholic circles'

-kyey₂   系   system; lineage; faction — tŏngmul ~ 'animalia, the animal kingdom', thăyyang ~ 'solar system'

-kyey₃   計   ga(u)ge, meter; scheme — ap.lyek ~ 'manometer, pressure gauge', cheyon ~ '(body) thermometer', han.lan ~ '(weather) thermometer', kiap ~ = chengwu ~ 'barometer', phungsok ~ = phung.lyek ~ 'anemometer'; miin ~ 'ensnaring with a beautiful woman'; CF sikyey 'timepiece'

-kyey₄   届   report — chwulqsek ~ 'attendance report', kyelqsek ~ 'report of absences', chwulqsayng ~ 'birth report', kecwu ~ 'report of residence'

-kyo   教   religion, teaching — Isullam ~ 'Islam', Kitok ~ 'Christianity', Molumon ~ 'Mormonism'; CF Pulkyo 'Buddhism'

-lo   路   street — Sēycong ~ 'Sēycong Street', Thayphyeng ~ 'Thayphyeng Street', Ulqci ~ 'Ulqci Street'; CF tŏlo 'roadway, street'

-lyo   料   charge, fee; materials — SEE Part II, p. 679.

-lyu   類   kind, sort, species — inkan ~ 'human species', nuktay ~ 'wolf species', phŏ.yu ~ 'mammalia', tŏngmul ~ 'animal species'; CF alyu 'adherent, follower; a second', cong.lyu 'kind, sort'

-mang   網   network — chelqco ~ 'barbed wire', cocik ~ 'organization(al) network', kyŏyang ~ 'cultural network', ¹yen.lak ~ 'communications network'

-mul   物   stuff, thing, matter — chwulphan ~ 'publications', insway ~ 'printed matter', paysel ~ 'excrement(s)'

-pay   輩   people, group [pejorative] — cengsang ~ 'petty politicians; politicos', kăngto ~ 'robbers', kansang ~ 'fraudulent merchants', moli ~ 'profiteers', sŏnyen ~ 'young people'

-pha   派   group, faction, clique — cĕnhwu ~ 'the après-guerre (postwar) group', insang ~ 'the impressionists', ¹năngman ~ 'the romantics'; CF sinpha/kwŭpha 'the new/old school'

-phum	品	goods	cāyko ~ '(goods in) stock', hapkyek ~ 'approved goods', kakong ~ 'processed goods', swuip ~ 'imported goods', wulyang ~ 'superior merchandise'; CF kyĕngphum 'a premium (free gift)', sangphum 'merchandise'
-phung	風	style, manner(s)	cangkwun ~ 'proud manner', căngpu ~ 'manly manner', se.yang ~ 'western (= Occidental) manners', sikol ~ 'country manners', Kwantong ~ 'Kwantong style'
-phyen	編	compiled by ‥ (abbr < phyen[chan] ham)	Hankul Hak.hoy ~ 'compiled by the Korean Language Society', Mīswul Hak.hoy ~ 'compiled by the Art Institute', Mun Seyyeng ~ 'compiled by Mun Seyyeng'; CF phyenca 'compiler'
-pi	費	expenditures for ‥	chilyo ~ 'medical expenses', kasel ~ 'construction costs', saynghwal ~ 'living expenses', swusen ~ '(expenditures for) repairs'; CF hŏypi 'membership fee / dues'
-pu$_1$	部	section; office; ministry	cayceng ~ 'ministry of finance', chĕyyuk ~ 'department of physical education', wisayng ~ 'ministry of public health'; CF ponpu 'headquarters'
-pu$_2$	夫	menial; workman	chengso ~ = sŏcey ~ 'cleaning man, janitor', chwīsa ~ 'cook', sĕythak ~ 'laundryman'; CF hwāpu 'fireman, stoker', kwāngpu 'miner'
-pyel	別	division, separation, classification	chwulqsin ~ 'classification by place of birth', cik.ep ~ 'breakdown by occupation', kyeykup ~ 'class division', namnye ~ 'separation by gender', sengcek ~ 'grouping by grades (achievement)', sengpun ~ 'classification by elements (components or ingredients)', [n]yen.lyeng ~ 'division by age'; CF phanpyel 'discrimination'
(q)-pyĕng	病	illness	phipuq ~ 'a skin disease', simcangq ~ 'heart trouble', wicangq ~ 'alimentary disorder'; CF phungqpyeng 'palsy, paralysis'
-sa$_1$	師	person, master	[l]īpalq ~ 'barber', maswulq ~ 'magician', senkyo ~ 'missionary'; CF kīsa 'technician', kyōsa 'teacher', uysa 'physician'
-sa$_2$	士	scholar, person	kikwan ~ 'engineer', pihayng ~ 'aviator', pyĕnho ~ 'lawyer'; CF paksa 'Ph.D.', haksa 'B.A., A.B.'
-sa$_3$	社	company, corporation	chwulphan ~ 'a publishing house, a publisher', sinmun ~ 'a newspaper (company)', thongsin ~ 'a news agency'; CF hŏysa 'company'
-sa$_4$	史	history of ‥	kĕnchwuk ~ 'the history of architecture', Mikwuk ~ 'American history', munhak ~ 'history of literature', se.yang ~ 'history of the west'; CF [l]yeksa 'history'
-sayng	生	1 student	chonyen ~ 'freshman', kăngsup ~ 'short-course student', silqsup ~ 'trainee', yĕnkwu ~ 'research student, student researcher'; CF haksayng 'student'
		2 birth	yūn.welq ~ 'born in a leap-month', īm-cin ~ 'born in the 29th year of the 60-year cycle'; CF chwulqsayng 'birth'
-se	書	writing, document	cungmyeng ~ 'certificate', [l]ilyek ~ 'a personal history, one's (career) resumé, vita', incung ~ '(a written) authentication', pocung ~ '(written) guarantee'; CF congse 'vertical writing', hoyngse 'horizontal writing'

-sel	説	theory, view	**pāntay** ~ 'opposite view', [1]**yenghon-pulmyel** ~ 'the theory of eternal life'; CF **haksel** 'scholarly theory'
-sen₁	線	line	**cēhang** ~ 'line of resistance', **Kyeng-Pu** ~ 'Seoul-Pusan line', **pāngwi** ~ 'defense perimeter', **samphalq** ~ 'the 38th parallel'; **Mayk-Āte** ~ 'the MacArthur line (along the [1]Naktong River)'; CF **congsen** 'vertical line', **hoyngsen** 'horizontal line'
-sen₂	撰	selection; selected by ‥	**Kim Caywen** ~ 'selected by Kim Caywen', **sīmsa wiwen** ~ 'selected by a judging committee'
(q)-seng	性	nature, quality	**chēnyeq** ~ 'virginity', **chwungsilq** ~ 'substantiality; loyalty, faithfulness', **pyēnthayq** ~ 'abnormality', **thuk.iq** ~ 'peculiarity', **wihemq** ~ 'dangerousness'; CF **phūmseng** 'quality of goods'. SEE Part II, p. 773.
-sil	室	room, office, lab, small institution	**cokak** ~ 'sculptor's studio', **mok.yok** ~ 'bathroom', **silhem** ~ 'laboratory', **tose** ~ 'the library (room)', **ungcep** ~ 'the drawing-room', **yēnkwu** ~ 'seminar (room)'; CF **kayksil** 'guestroom', **onsil** 'hothouse'
-so	所	place, institution, institute, facility	**chilyo** ~ 'infirmary', [1]**īpal(q)** ~ 'barber shop', **sāmu** ~ 'office', **yēnkwu** ~ 'research institute (facility, laboratory)', [1]**yoyang** ~ 'sanatorium (sanitarium)'; CF **cangso** 'place', **cwūso** 'residence'
-swu	手	hand, person	**kikwan** ~ 'locomotive engineer', **kyohwan** ~ 'switchboard operator', **wūncen** ~ 'driver'; CF **cōswu** 'assistant', **kiswu** 'assistant engineer', **sēnswu** 'athlete'
-swul	術	technique, art, trick	**insway** ~ 'the art of printing', **sakyo** ~ 'the art of social intercourse'; CF **maswul** 'magic', **swuswul** 'operation'
-tam	談	talk(s), tale, report (on ‥)	**kyenghem** ~ 'a story of personal experience', **mōhem** ~ 'an adventure story', **palkyen** ~ 'a tale of exploration', [1]**yehayng** ~ 'a travelog'; CF **hōyhwa** 'conversation'
-tay₁	隊	group, outfit	**kyēngkwan** ~ 'police squad, posse', **kyēngpi** ~ 'garrison', **thamhem** ~ 'expedition, exploration party', **ūngwen** ~ 'cheerers, rooters; reinforcements'; CF **putay** 'detachment', **kwuntay** 'troops'
-tay₂	帶	belt; zone	**hwāsan** ~ 'volcanic zone', **kwūco** ~ 'buoy, life preserver', **sam.lim** ~ 'forest zone'; CF **citay** 'zone, belt'
-thong	痛	pain, ache, ‥algia	**hyungpu** ~ 'chest pain', **sinkyeng** ~ 'neuralgia, nerve pain'; CF **chithong** 'toothache', **twuthong** 'headache'
-to₁	度	(year) period	**cak.nyen** ~ 'last year', **kumnyen** ~ 'this year', **1960-nyen** ~ 'the year 1960'; CF [n]**yento** 'year period' We could treat ‥nyen-to as a binom ‥nyento.
-to₂	圖	painting, drawing, view	**cokam** ~ 'bird's-eye view', **miin** ~ 'portrait of a beauty', **sanswu** ~ 'landscape', **tānmyen** ~ 'cross-sectional view'; CF **cito** 'map', **chwukto** 'reduced drawing'
-wen₁	院	institution	**koa** ~ 'orphanage', **Haksa** ~ 'the Scholars Institute (of Kolye times)', **swuto** ~ 'monastery', **tāyhak** ~ 'graduate school'; CF **hak.wen** 'the academy', **pyēngwen** 'a hospital', **sawen** 'a temple'
-wen₂	園	garden; park; institute	**kwāswu** ~ 'an orchard', **tōngmul** ~ 'a zoo', **yuchi** ~ 'kindergarten'; CF **kongwen** 'a (public) park'

-wen₃	員	clerk, member, employee	**cēnthwu** ~ 'combatant', **congep** ~ 'employee', **swukcik** ~ 'night-duty man', **tāyuy** ~ 'congressman'; CF **cĕm.wen** 'store clerk', **hŏywen** 'member', **īm.wen** 'staff member', **puwen** 'a member of the section', **sengwen** 'a constituent member'
-ye	餘	with excess, ... odd, over	Added to decimal and higher-unit Chinese numerals; see §5.5.2.
(q)-yem	炎	inflammation, ...itis	**kwancelq** ~ 'arthritis', **mayngcangq** ~ 'appendicitis', **¹nuk.makq** ~ 'peritonitis' On the irregular **phʸēyˡyem** 'pneumonia', see p. 16.
-yŏng	用	for the use of ...	**haksayng** ~ 'for students', **kaceng** ~ 'for household use', **kyŏsa** ~ 'for faculty', **namca** ~ 'for men', **philki** ~ 'for writing (purposes)', **sāmu** ~ 'for business (use)'

See also proper names, §5.2.3. Free nouns sometimes occur in compounds as if suffixes. It is not always easy to decide whether a single Chinese morpheme occurs alone as a free noun (other than as an abbreviation of a binom) or not. And some bound postnouns occur only in vocabulary that is highly circumscribed, e.g. -tam 潭 'lake' in **Payk.lok-tam** 白 鹿 潭 ("White Deer Lake"), the name of the crater lake on top of Mt Hanla on Ceycwu island.

5.5. Numbers.

Numbers are a way of quantifying things. Languages express quantification in various ways, often as adnominal modification of the noun ("two candies") or of a representative counter ("two pieces of candy"), and sometimes as a noun substitute ("I want two/lots [of them]"). Some languages are more rigid than others in the structures they permit. Korean is fairly flexible, but some of the possible constructions are more common than others, and when two or more structures are allowed each may have specific connotations.

5.5.1. Number constructions.

As in many languages, the number expressions in Korean introduce special problems. We recognize two important classes of words: NUMERALS, a subclass of noun, and COUNTERS, a subclass of postnoun. A counter occurs typically after a numeral, but it can also form a construction with the postcounter (···q) swū 'the number of ··· ': (chayk) kwēnq swū 'the number of books'. (Chayk swū is also said, but less commonly.) Notice that counters, as counters, are not modified by i 'this', ku 'that', kulen 'such', ··· . In i pen kaul 'this autumn', pen is a noun 'time'.

There are three kinds of counters: UNIT, MEASURE, and NUMERAL. A UNIT counter counts individual instances of a countable noun: chayk han kwĕn 'one book', kāy twū mali 'two dogs', pay sēy chek 'three boats', sengnyang-kaypi (= sengnyang) sēy kay 'three matches'. A MEASURE counter registers the amount of a measurable noun (chan han can 'one cup of tea', maykcwu twū pyeng 'two bottles of beer', sengnyang sēy kap 'three boxes of matches') or of units of time (han si 'one o'clock', han sikan 'one hour', han tal or il-kaywel 'one month', sam-nyen 'three years') or of money (chen wen 'a thousand wen'). A NUMERAL counter is a numeral that is itself being counted, and so functions as a counter after another numeral: sam-payk 'three hundred', sā-chen 'four thousand'. Many of the measure counters ('cupful, boxful', ···) and a few unit counters (sālam 'person' in haksayng han salam 'one student') could be labeled "temporary counters" since they occur also as free nouns, often counted by other counters: can han kay 'one cup' — but sālam han salam (or han myeng) 'one person'. Some of the other counters occur also in constructions other than numbers, for example chay (counter for buildings) in salang chay 'detached house', an chay 'main house'.

Among the countable nouns, there are some that have specific unit counters but many others lack specific counters and are counted simply by the numeral alone. The numeral without a counter CAN be

used to count any noun. The following sentences, meaning 'One book exists' = 'We've got one / a book', illustrate the constructions that occur with countable nouns that involve the nominative case particle (Pcl), numeral (Num), numeral + counter (Num-Count), and the adnominal particle (uy):

(1)	N Pcl Num-Count	Chayk i han kwĕn iss.ta.
(2)	N Num-Count Pcl	Chayk han kwĕn i iss.ta.
(3)	N Pcl Num-Count Pcl	Chayk i han kwĕn i iss.ta.
(4)	Num-Count uy N Pcl	Han kwĕn uy chayk i iss.ta
? (4a)	Num-Count N Pcl	? Han kwĕn chayk i iss.ta.
(5)	N Num Pcl	Chayk hana ka iss.ta.
(6)	N Pcl Num	Chayk i hana iss.ta.
(7)	N Pcl Num Pcl	Chayk i hana ka iss.ta.
? (8)	Num uy N Pcl	? Hana uy chayk i iss.ta.
(8a)	Num N Pcl	Han chayk i iss.ta.

Some nouns, however, do not occur in constructions of type (8a). You can say **thokki hana** 'a rabbit' and **talk (i) hana** 'a chicken' but not *han thokki or *han talk. Instead you say **han mali thokki** and **han mali talk**; CF CM 1:139. With a juncture between, it is possible to say **han | thokki** in the meaning 'a certain rabbit'. The juncture may be hard for the ear to catch in that phrase but it should be clear in similar phrases: **han | talk** 'a certain chicken' will have a slightly aspirated (and certainly voiceless) articulation of /t/, while the unacceptable *han talk would have the voiced allophone [d]. There is a distinction between **han | sālam** 'a certain person', where the length of the first-syllable vowel is maintained after the juncture, and **han salam** 'one person', where the lack of juncture leads to suppression of the vowel length, though there may be speakers who retain the length (CF **han kwĕn**, ...). Structure (8a) was quite common in the earlier language: ˝ney a˙to˙l i (1459 Wel 2:6b) 'the four sons'; ˝sey ˙sa˙l i (1445 ¹Yong 89) 'three arrows'; hon the˙li ˙lol (1447 Sek 6:27a) 'one hair'; ˝ney polo˙m ay (1447 Sek 24:20b) 'on the four walls'.

Tsukamoto 1986 seems to disallow (4a), the reduction of (4), but he is thinking of a different source for the surface structure: a preposing of the adverbialized number rather than a reduction of the adnominalized number. There are a few examples of the latter from earlier Korean: ˝twu ˝nas ˝twon ˙i˙Gwo (?1517⁻ Pak 1:52a) 'it is (= costs) two coins, and ... '; ˙na y syel˙hun lyang un ˙i i˙sye 'yla (?1517⁻ Pak 1:62a) 'I have thirty taels of silver (= money)'. And an example with an adnoun modifying the noun: na 'y ˝twu swang ˙say hwe˙l ul ta˙ka ˝ta ton˙nye ˙hoy˙ya po˙likwa ˙'la (?1517⁻ Pak 1:35a) 'I took my two pairs of new shoes and wore them both out getting about!' Corresponding to the unreduced (4) is the MK structure Num Count s N, as in hon ˙cwul s ˙kul (1481 Twusi 21:25b) 'a single line (of news)' and ˝ney ka˙ci s ˝ssʏwuw-˝ĸʜwo ˙lol (1447 Sek 6:4a) 'the Four Miseries'.

The most common structure in modern Korean is that of (2) and (5): N Num(-Count) Pcl. This seems to be an inversion of (4a), the questionable reduction of (4). Since the number word modifies the noun, we expect it to precede the noun, so that (4) is the logical starting point for deriving the other structures. In Japanese when the noun is subject or object the most common and least ˝marked˝ structure is (1), which adverbializes the quantifier. This structure also occurs in Korean, but it may be a modern innovation, perhaps taken from Japanese usage, since there are no Middle Korean examples. Japanese permits the adverbial to be preposed (put before the noun), in what Tsukamoto calls ˝quantifier forward floating˝, but Korean does not permit sentences like *Sĕy myeng chinkwu ka wuli cip ey wass.ta ← Chinkwu ka sĕy myeng wuli cip ey wass.ta 'Three friends came to my house'. Modern examples of structures (1) and (6), with the adverbialized number:

  Sacen ul han kwĕn mantulq yang ulo caylyo lul mouko iss.ta 'I am gathering data with a view to compiling a dictionary'.

  Namuq kaci lul hana kkekk.ess.ta ko yātan hana namuq kaci ka elma 'na khulq sey māl ici 'He is making such a fuss over the branch I broke, but I ask you, how big a branch is it anyway?!'

¹**Naynyen imyen catong-cha lul hana sakey ccum toylq key 'ta** 'Next year I'll be in a position to buy a car'.

Helum han cip ina-ma nay cip ul hana kacyess.umyen côh.keyss.ta 'I wish I had a house of my own, however humble it might be'.

The unusual structures of (3) and (7) above mark both the noun and the numeral(-counter) phrase with the nominative particle. The accusative particle, too, permits such structures (**chayk ul hana lul pwass.ta**) but they are not usually compatible with other particles, such as that marking the indirect object: ***chinkwu eykey twūl eykey cwuess.ta → chinkwu twūl eykey** (or **twū chinkwu eykey**) **cwuess.ta** 'gave it to two friends'. But when the dative phrase is optionally marked by the accusative particle (**ul/lul**) instead of the dative particle (**eykey** or **hanthey**) the structures are acceptable, at least to some speakers: **Emeni ka ai tul ul motwu lul sēnmul ul cwuess.ta** 'The mother gave a present to each of the children' (LR 24:174:n6). There are advantages to "copying" the nominative or accusative marker instead of letting the quantifier stand as an adverb, in that the reference of the adverbialized number could be either to the subject or to the object, so that (as Gerdts 1985 points out) **A ka B eykey C lul sēys cwuess.ta** is ambiguous as to whether three of the A or three of the C are involved, whereas **A ka B eykey C lul sēys ul cwuess.ta** is unambiguously 'A gave three of C to B' and **A ka B eykey C lul sēys i cwuess.ta** is unambiguously 'Three of A gave C to B'.

Numbers (whether numeral + counter or just numeral) are allowed to "float" away from the nouns they are counting when those nouns are subjects or direct objects. The float is normally not permitted if the noun has some other role in the sentence, unless that role is secondary to an underlying role as subject or object, as in the causative structure of **Nay ka haksayng eykey sēys tte-nakey hayss.ta** 'I let three of the students leave' ← **Haksayng i sēys (i) tte-nass.ta** 'Three of the students left'. A special case is found in **Nay ka haksayng eykey sēys i tte-nakey hayss.ta** 'I let the students leave in groups of three (or as a group of three)', where the nominative-marked quantifier is allowed to float although the underlying subject to which it refers has been converted from nominative to dative (**haksayng i → haksayng eykey**) under the causativization. We know that this is the nominative-marked quantifier (and not, say, a variant of **sē-i** 'three persons') because the suppletive alternant of the marker appears in **Nay ka haksayng eykey yel hana ka tte-nakey hayss.ta** 'I let the students leave in groups of eleven (or as a group of eleven)'. The underlying structure seems to be something like: "I let the students do it such that three [of them] leave". In a simpler sentence without the causativization you might get **haksayng i sēys i ...** or **haksayng ul sēys ul ...** 'three of the students [as subject or object]'. Perhaps these are just cases of a kind of pseudo-float using the multiple-case marking that is permitted for genitives, from an underlying structure ***haksayng uy sēys** 'three of the students', but that explanation seems disconfirmed by the fact that, unlike Japanese, Korean does not permit the structure ***N uy Num**. (CF Tsukamoto 1986. I find no examples of ***N s Num** in earlier Korean.)

The floating of the numbers is usually called "quantifier float", since in other languages (such as Japanese) there are quantifiers like 'all' and 'lots' that can behave the same way as the number words. It should be noted that Korean **tā** 'all' and **mānhi** 'much/many' are adverbs, unlike the number words, so that they will occur only in structure (1) as **N pcl tā/mānh.i** 'N entirely/muchly', and only that structure is therefore found for them in earlier Korean, too. Exceptionally the adverb **motwu** 'all; each, every' is also now (and perhaps newly) treated as a noun that can take the nominative and accusative markers. To say 'all N' or 'many/much N' you use the corresponding adnominal forms **mōtun** and **mānh.un**. The word **meych < myech** 'how many; a few', is a numeral, and like the other numerals it can stand as subject or object. The most frequent occurrence is before a noun or a counter: **meych tal(q tong-an)** 'how many months (time)', **meych salam/pun ina** 'about how many people', **meych pen** 'how many times'. But it can also occur alone without a counter: **Swu ka meych ina toysinun ci yo** 'May I know your age?' And, with or without the counter, it can occur in the various structures open to the numerals: **Thokki meych (mali) eykey punpay han sēym in ya** 'How many rabbits do you figure got their rations?'; **Son nim meych pun i osip.nikka** 'How many guests are expected?'; **Chayk**

meych kwēn ul ilk.ess.ta 'I read a few books'; **Ku ttolay lul meych kay te sa 'ta cwuo** 'Buy a few more of that size'; **Ko ttolay meych i chac.e wass.ess.ta** 'A group (of boys) of that age had been here to call'.

Once the quantifier is floated as an adverbial it has the freedom of other movable adverbs and may move away from the noun to which it refers. According to Gerdts (1985:55) **Ku cik.kong i sonq-kalak i kikyey ey sēys i callyess.ta** can be taken either as 'Three fingers of the workman were cut on [cut off by] the machine' or 'The fingers of three workers were cut on [cut off by] the machine'.

Although the plural particle **tul** can freely occur after just about any phrase, and can be inserted repeatedly to increase the emphasis, it is not quite the same as quantifier float, because the reference is only to the subject, and that may be implied rather than expressed. Notice that **(Wuli ka) chayk tul (ul) tul ilk.ess.ta** 'We read our books' only the second **tul** can be the plural-subject marker, the first must be the postnoun marking a noun as explicitly plural. The sentence **Chayk tul ilk.ess.ta** is ambiguously 'I read the books' or 'We read the book(s)' unless the accusative marker is explicitly located: **Chayk tul ul ilk.ess.ta** 'I (or we) read the books', **Chayk ul tul ilk.ess.ta** 'We read the book(s)'.

5.5.2. Numerals.

We could define a NUMERAL as any noun that answers the question **Meych in ya** 'How many is it?', but we want to include a few additional items. Not only does the numeral freely occur before the copula **ita** ('it is such-and-such a number') and before particles, both in arithmetic statements and as a substitute for constructions of numeral + counter, but it also occurs as an adnoun before a noun or a counter. And it appears in absolute constructions, as an adverbial phrase.

There are subclasses of numerals:

(1) quasi-numerals

> **elma** 'how much; some amount'
> **meych** < **myech** 'how many; some'
> [1]**yāng** 'both' (adnoun only)
> **swū** 'a number of; some, several'*

> *As an adnoun. In this use **swū** ⋯ is largely limited to Chinese counters, for the other counters prefer **yele** ⋯ 'several' (< **yeles** 'about ten'), but **swū** ⋯ is an option for certain common counters: **kāy swū / yele mali** 'several dogs'. The morpheme is also used as a postcounter 'the number of'.

(2) numerals proper, core

> **hana / han** < *honah / hon* 'one',
> **twūl / twū** < *˝twulh / ˝twu* 'two',
> **sēys / sēy / sēk / sē** < *˝seyh / ˝sek / ˝se* 'three', ⋯

(3) numerals proper, Chinese

> **il** 'one', **ī** 'two', **sam** 'three', ⋯ ;
> [1]**yeng, kong** 'zero'; **pān, celpan** 'half'

(4) approximate numerals, core
   (based on the bound counter **-es**)

> **twues / twue** < *˝twu˙zeh / ˝twu˙ze* 'about two'
>   ('two or more' 1887 Scott 97), ⋯ ;
> **yeles / yele** < *ye˙leh / ye˙le* 'ten or so; a
>   number (of), quite a few'

(5) approximate numerals, Chinese

> **il(q)-ī** 'one or two', **ī-sam** 'two or three', ⋯

(6) excess numerals, core
   (the tens + suffix **-nam.un** 'left
   over', often spelled **-namun**)

> **ye-nam(.)un / -nam(.)u** '10-odd' [dialect variant
>   yelamu(n)], ⋯ , **ahu-nam(.)un / -nam(.)u** '90-odd'

(7) excess numerals, Chinese
   (the tens and higher units +
   suffix **-ye**)

> **sip-ye** '10-odd', ⋯ , **payk-ye** '100-odd', ⋯ ;
>   CF **mulye payk** 'no less than 100', **mulus payk**
>   'a hundred or so'

Note that ⋯ **(k)awus** and ⋯ **pān** 'and a half' are postnouns that appear after the construction numeral + counter. CF the numeral **pān** 'half'.

The two sets of numerals proper, core and Chinese, are used with different sets of counters. Typically the core numerals are more ˝free˝ than their Chinese counterparts, e.g. in replacing

constructions of numeral + counter. But there are no core numerals for hundred, thousand, or ten thousand in modern Korean, so where we would expect a core morpheme the Chinese numeral is used instead:

99 people	ahun ahop salam	kwu-sip kwu-myeng
100 people	payk salam	payk-myeng
101 people	payk han salam	payk il-myeng
199 people	payk ahun ahop salam	payk kwu-sip kwu-myeng / -in
20,002 people	ī-man twū salam	ī-man ī-myeng

The Chinese morpheme **pān** 'half ... ; ... and a half' is also used where the core set is appropriate: **pān sikan** 'half an hour', **twū sikan pān** 'two hours and a half', **twū si pān** '2:30 o'clock'.

Some of the core numerals have shortened shapes when they are in modifying position: **chayk twū kwēn** but **chayk twūl** 'two books'. The full shape, however, usually appears before the postnoun (the "postnumeral") **ccay**, so that ordinarily in Seoul 'second' is **twūl ccay**, though less commonly (in dialects) you will hear the shortened shape: **twū ccay = twūl ccay**. There seems to be confusion over whether to use the shortened shape of a numeral before **ccay**. The full shape is more common for 'second' (**twūl ccay**), as we have just said, and the shortened shape is used for 'eleventh' (**yel han ccay** — similarly for '21st', '31st', ...) and for 'twentieth' (**sumu ccay**), but the longer forms are also found: **yel hana ccay** and **sumul ccay**. For 'third' and 'fourth' it is purely a spelling problem, since the pronunciation would be identical in either case, owing to the way the morphophonemic rules work. The prevailing spelling standard in South Korea favors the full forms: **sēys ccay** rather than **sēy ccay**, and **nēys ccay** rather than **nēy ccay**. But the North Korean grammar CM prefers the short forms. And Ceng Insung 1960:190-2 tries to set up a distinction between (1) **ches ccay, twū ccay, sēy ccay, ... , yel han ccay, ... , sumu ccay** and (2) **hana ccay, twūl ccay, sēys ccay, ... , yel hana ccay, ... , sumu(l) ccay**. In the meaning equivalent to ... **pen ccay** '...-th' he would use the first group, the shortened forms, and the second group would be used when ... **ccay** is a synonym of ... **chay** 'and all, the whole, intact'. But my informants say that it is awkward to make combinations of numeral + **chay** (or the **ccay** that is a synonym of it). Instead, they prefer to insert a counter: **yel han kay ccay** means either 'the eleventh (thing)' or (= **yel han kay chay**) 'all eleven (things)'. Yet you may run across **hana ccay / chay** in the meaning **han kay ccay / chay** 'one whole (thing)'.

This postnumeral element **ccay** makes the expected ordinals for all non-fractional core numerals, but where *han(a) ccay would be expected we find instead a unique compound of adnoun + postnoun: **ches ccay** 'first'. However, the string **han ccay** will turn up in **yel han ccay** '11th', **sumul han ccay** '21st', **payk han ccay** '101st', ... We also find **payk ccay** '100th', **chen ccay** '1,000th', ... Moreover **ccay** occurs also with **meych** ('how-manyeth') and with some of the approximate numerals (CF Choy Hyenpay 1959:566).

The Chinese numerals are made ordinal by the adnoun **cēy** ... '...-th': **cēy-il** 'first', **cēy-i** 'second', **cēy-sam** 'third', ... And we find **cēy payk** (etc.) as well as **payk ccay** for '100th'; notice that 'hundred and first' is either **cēy payk-il** or **payk han ccay**.

The core numerals for '3' and '4' have the special shapes **sēk** and **nēk** before certain counters (usually beginning with t... or c...) and **sē** or **nē** before certain others. For some of the counters there is variation between the several alternants — as, for some, there is a choice between using Chinese or core numerals. The numerals **yel** 'ten' and **yetel(p)** 'eight' are treated as **yelq** and **yetelq** before counters that begin with a plain obstruent (p t c s k): **yelq kay** '10 things', **yelq tay** '10 machines (or vehicles)', **yelq cang** '10 sheets', **yelq pen** '10 times' (CF **il-pen** 'number one'), **yelq pun** '10 people' (CF **phal-pun** 'eight minutes'), **yetel[p]q pam** 'eight nights', **yetel[p]q si** '8 o'clock'. The shape **yelq** also appears in **yelq-twul / -twu** 'twelve'.

Many of the odd forms of the numerals are regularized by younger speakers; sometimes there is a difference of meaning or nuance. Or the irregular form is heard in set phrases: a person who says **sēy tal(q tong-an)** 'three months (long)' — and, being young, counts ten days as **sip-il** — may nonetheless

say sĕk-tal yel.hul '3 months and 10 days = 100 days' but only because that is a lexicalized phrase with special significance.

The following lists are designed for convenient reference. Theoretical problems of inclusion, arrangement, and the like, are passed over in silence. The morphemic structure of the core numerals involves various alternations of shape; the alternants are shown in the right column of the first list as "bound core elements".

(1) LIST OF CARDINAL NUMERALS

Chinese numerals	Core numerals	Bound core elements
0 [1]yeng, kong		
1/2 păn, celpan	··· (k)awus[1]	
··· păn		
1 il	hana / han	hanak[2], ha
2 ī; [1]yāng 'both'	twūl / twū	it
3 sam	sĕys / sĕy / sĕk / sĕ	sen, sa, sel
4 sā	nĕys / nĕy / nĕk / nĕ	net, na, ma
5 ŏ	tases	tāys, tăy, tas, ta, swī
6 [1]yuk	yeses / yes[3]	yes, yeys, yey
7 chil	ilkop	il, nil, nilkop[4]
8 phal	yetel(p) / yetel[p]q[5]	yetul, yet
9 kwu	ahop	ahu
10 sip	yel / yelq[6]	(un, hun, n, wun)
11 sip-il	yel-hana / -han	
12 sip-i	yelq-twul / -twu	
13 sip-sam	yelq-seys / -sey / -sek / -se	
14 sip-sa	yel-neys / -ney / -nek / -ne	
15 sip-o	yelq-tases	
16 sip-lyuk (sipq-[1]yuk)	yel(q)-yeses	
17 sip-chil	yel(q)-ilkop	
18 sip-phal	yel(q)-yetel(p)	
19 sip-kwu	yel-ahop	
20 ī-sip	sumul / sumu	
21 ī-sip il	sumul hana / han	
22 ī-sip ī	sumulq twūl / twū	
23 ī-sip sam	sumulq sĕys / sĕy / sĕk / sĕ	
24 ī-sip sa	sumulq nĕys / nĕy / nĕk / nĕ	
25 ī-sip ŏ	sumulq tases	
26 ī-sip(q) [1]yuk*	sumul(q) yeses	*/īsimnyuk, īsip⏐yuk/
27 ī-sip chil	sumul(q)	
28 ī-sip phal	sumul(q) yetel(p)	
29 ī-sip kwu	sumul ahop	
30 sam-sip	sel(h)un[7]	
33 sam-sip sam	sel(h)un sĕys / sĕy / sĕk / sĕ	
40 sā-sip	mahun	
44 sā-sip sā	mahun nĕys / nĕy / nĕk / nĕ	
50 ŏ-sip	swīn, [dialect] swīhun	
55 ŏ-sip ŏ	swīn tases	
60 [1]yuk-sip	yeyswun	
66 [1]yuk-sipq [1]yuk	yeyswunq yeses	
70 chilq-sip	ilhun	
77 chilq-sip chil	ilhunq ilkop	

80 phalq-sip	yetun, [dialect] yatun
88 phalq-sip phal	yetunq yetel(p) / yetel[p]q
90 kwu-sip	ahun (but ahu before -nam.un)
99 kwu-sip kwu	ahun ahop
100 payk, (il-payk)	− (obsolete on < ˙won)
101 payk il	payk hana / han
115 payk sip-o	payk yelq-tases
144 payk sǎ-sip sǎ	payk mahun nēys/nēy/nēk/nē
200 ī-payk	−
300 sam-payk	
306 sam-payk(q) [1]yuk*	*/sampayngnyuk/ or
400 sǎ-payk	/sampayk|yuk/
500 ǒ-payk	
600 [1]yuk-payk	
700 chil-payk	
800 phal-payk	
900 kwu-payk	
1000 chen (il-chen)[8]	− (obsolete cumun < ˙cu˙mun)
2000 ī-chen	
3000 sam-chen	
4000 sǎ-chen	
5000 ǒ-chen	
6000 [1]yuk-chen	
7000 chil-chen	
8000 phal-chen	
9000 kwu-chen	
10 000 mǎn (il-man)	− (? kol, kkol)[9]
100 000 sip man	− (? cal)
1 000 000 payk man	− (? wul)
100 000 000 ek (il-ek)	
1 million million co (ilq-co)	

[1] Fairly limited: **sek ca kawus** 'three and a half **ca**', **twū mal kawus** 'two and a half **mal**', **toy kawus** 'one and a half **toy**'. As the last example shows, **han** ⋯ is usually not expressed when **kawus** is added.

[2] Hanak is an occasional free variant of hana before ssik.

[3] The shape yes occurs before nyang, toy, mal, pāl.

[4] The shape is il in iley '7 days', nil in yey-niley '6 or 7 days', and nilkop in yey-nilkop '6 or 7'.

[5] Dialect yatal, yatul, yetup. In Seoul (and widely) the ⋯p surfaces only in yetelp hay 'eight years'; in dialects it will also be heard in yetelp-i 'eight people' (not currently used in Seoul).

[6] But ye ⋯ before -nam.un.

[7] The form without the h is preferred.

[8] The version il-chen is used only in arithmetic or meticulous listing. If a counter follows, il- is not used: sēnswu chen-myeng 'a thousand athletes'.

[9] SEE CM 1:307. Is this (as suggested by Sin Kichel 1958:117), based only on the set expression kol payk pen 'many many times' and the synonymous (k)kol chen pen? There are few (if any) examples of the last three numerals, which are said to be archaic.

(2) LIST OF ORDINAL NUMERALS

		Chinese	Core
	1st	cēy-il	ches ccay; uttum ('top'); [dialect] han ccay
	2nd	cēy-i	twūl ccay (less commonly twū ccay; "it-ccay, is-ccay" seem to be artificial)
	3rd	cēy-sam	sēys ccay (also spelled sēy ccay)
	4th	cēy-sa	nēys ccay (also spelled nēy ccay)
	5th	cēy-o	tases ccay
	6th	cēy-[1]yuk (/cēyyuk/ only!)	yeses ccay
	7th	cēy-chil	ilkop ccay
	8th	cēy-phal	yetel(p) ccay
	9th	cēy-kwu	ahop ccay
	10th	cēy-sip	yel ccay
	11th	cēy sip-il	yel-han ccay
	12th	cēy sip-i	yelq-twul ccay
	20th	cēy ī-sip	sumu ccay (less commonly sumul ccay)
	100th	cēy-payk	payk ccay
	133rd	cēy-payk sam-sip sam	payk sel(h)un sēys ccay
how-manyeth		–	meych ccay < myech ccay

(3) LIST OF APPROXIMATE CARDINAL NUMERALS

	Chinese	Core
1-2	il(q)-ī /il-ī, il-lī/	han(a)-twul, han-twu
		han-twues / -twue '1 or 2'
2		twues / twue 'about 2'
2-3	ī-sam	twū(l)-seys / -sey / -sek / -se
		twū-senes / -sene 'about 2 or 3'
3		senes / sene 'about 3'
3-4	sam-sa	sene-netes / -nete 'about 3 or 4'
4		netes / nete 'about 4'
4-5	sā-o	nete-tays 'about 4 or 5'
5		tāys 'about 5'
5-6	ō-[1]yuk /ō.yuk, ōlyuk, ōnyuk/	tāy-yeses 'about 5 or 6'
6-7	[1]yuk-chil	ye(y)-nilkop 'about 6 or 7'
7		–
7-8	chil-phal	il(ko)-yetel(p) 'about 7 or 8'
		–
8-9	phal-kwu	yet-ahop 'about 8 or 9'
		–
9-10	–	yeles / yele 'about 10; several, many'
10+	sip-ye	ye-nam(.)un / -nam(.)u '10-odd' [dialect yelamu(n)]
10-20	il(q)-ī sip	–
20+	īsip-ye	sumu-nam(.)un / -nam(.)u '20-odd'
20-30	ī-sam sip	–
30+	samsip-ye	sel(h)un-nam(.)un / -nam(.)u, sel(h)un namcis '30-odd'
30-40	sam-sa sip	–
40+	sāsip-ye	mahun-nam(.)un / -nam(.)u, mahun namcis '40-odd'

...	...	...
...	...	...
90+	kwusip-ye	ahu-nam(.)un / -nam(.)u,
		ahun namcis '90-odd'
90-100	–	–
100+	payk-ye	payk namcis '100-odd'
110+	payk sip-ye	–
120+	payk īsip-ye	–
130+	payk samsip-ye	–

Notice also: **swū-sip** 'several tens (of)', **swū-payk** 'several hundred', **swū-chen** 'several thousand', **swū-man** 'tens of thousands (of)', **swū-ek** 'hundreds of millions (of)'.

(4) LIST OF APPROXIMATE ORDINAL NUMERALS

	Chinese	Core
2nd or so	–	twue ccay
2nd or 3rd	cěy ī-sam	twū-sey ccay
		twū-sene ccay 'about 2nd or 3rd'
3rd or so	–	–
3rd or 4th	cěy sam-sa	sene-nete ccay 'about 3rd or 4th'

Other such forms seem awkward, especially **ches-twu ccay** and **yele ccay**. But **yele(s) ccay** can be used as an abbreviation of **yele pen ccay**, as in the following exchange: **I pen ey nah.un Kim ssi ney ai ka ches ayki 'n ka yo? – Kulssey olssita; ama yele(s) ccay toylq ke l' yo** 'Is this the first child for the Kims? – I don't think so, it must be one of several'.

(5) LIST OF EXCESS ORDINAL NUMERALS

	Chinese	Core
10th or so	sip-ye ccay	ye-nam(.)u ccay
20th or so	īsip-ye ccay	sumu-nam(.)u ccay
...	...	...
90th or so	kwusip-ye ccay	ahu-nam(.)u ccay
100th or so	payk-ye ccay	–
1,000th or so	chen-ye ccay	–
10,000th or so	măn-ye ccay	–

5.5.3. Counters.

The following list of counters is not quite exhaustive, but it is fairly representative. There are three columns: the first lists the typical units counted, the second shows an example with core numerals, the third shows an example with Chinese numerals. In general, the examples are given with the numeral '3' in order to show which counters take the shapes **sēk** or **sē** (and for '4' **nēk** or **nē**). If there is a blank in the core or Chinese column, the counter does not normally occur with those numerals. However, the Chinese numeral must be used when there is no core numeral ('100', ...).

LIST OF COUNTERS: GROUP ONE

Units counted	with core numerals	with Chinese numerals
things, items, matches, pencils	(mulken sēy) kay '3 objects'	
units, items, bits, grains, beans	(khong sēy) nath '3 beans'	
books, magazines; 20 sheets of Korean paper	(chayk sēy) kwēn₁ '3 books'	
animals, birds, fish	(kāy sēy) mali '3 dogs'	

animals (horse, ox)	(so sēy) phil '3 oxen'	(kwunma sam)-phil '3 army horses'
		(nongwu sam)-twu '3 farm oxen'
honored persons	(son nim sēy) pun '3 guests'	
persons, people	(sālam sēy) salam '3 people'	
persons [formal]	(haksayng sēy) myeng '3 students'	
flat things, sheets, papers, newspapers, letters	(sinmun sĕk) cang '3 newspapers'	
sheets, mats	(cali sēy) ttwayki '3 mats'	
buildings	(cip sēy) chay '3 houses'	(cwūthayk sam)-ho / -tong$_1$ '3 dwellings'
vehicles, machines	(catong-cha sĕk) tay$_1$ '3 automobiles'	(catong-cha sam)-tay '3 automobiles'
long objects with handles (bushes, brooms, guns, scythes); pencils (but kay is more common)	(pus sĕk) calwu '3 writing brushes'	
cigarettes; pipefuls	(tămpay sēy / sĕk) tay$_2$ '3 cigarettes'	
slaps	(ppyam sĕk) tay$_3$ '3 slaps (on cheek)'	
suits of clothes, garments; sets of dishes / tableware; copies of a set of documents	(yangpok sēy) pel '3 suits'	
ten garments / dishes	(cekoli / kulus sĕk) cwuk '30 vests/plates'	
(menu) dishes	(Cwungkwukq ^{1}yoli sēy) cepsi '3 Chinese dishes'	
pairs of footwear or gloves	(sin-pal sēy) khyel(l)ey '3 pairs of shoes'	
cannons, big guns		(tăypho sam)-mun '3 guns'
trees, shrubs	(namu sēy) kulwu '3 trees'	(namu sam)-cwu '3 trees'
places, institutions		(kongcang sam)-kayso '3 factories'
places, locations, spots	(thullin tey sēy) kwuntey '3 errors'	
fields	(non sēy) paymi '3 fields'	
boats	(pay sēy) chek / chay '3 boats'	
small round things (berries, nuts, beads, bullets, lenses)	(photo / păm sēy) al '3 grapes / chestnuts'	
poems	(si sēy) swu '3 poems'	(si sam)-swu '3 poems'
written characters, letters	(kulqca sĕk) ca '3 letters'	
chapters (of text)	(kul sĕk) cang '3 chapters'	
pieces of sewing thread	(sīl sēy) nim '3 pieces of thread'	
skeins of thread	(sīl sēy) they '3 skeins of thread'	
pairs of chopsticks	(ceq-kal sēy) may '3 pairs of chopsticks' More commonly just ceq-kal sēys.	
hung pictures (any kind); scrolls	(kūlim sēy) phok '3 pictures'	
agenda items, assembly bills	(sēy) ken '3 items / bills'	(sam)-ken '3 items / bills'
kinds, sorts	(os sēy) kaci '3 (kinds of) garments'	

LIST OF COUNTERS: GROUP TWO

Units counted	with core numerals
bunches (of vegetables / firewood)	(namul sĕk) tan '3 bunches of greens'
bunches (of flowers, plants)	(kkoch sēy / sēk) tapal '3 bouquets'
bunches, clumps (of false hair, seaweed)	(myĕk sēy) kkokci '3 clumps of seaweed'
sheaves, tied bunches; strings of tobacco	(pye sĕk) cwul '3 sheaves of rice'
sheaves of straw	(ciph sēy) mus$_1$ '3 sheaves of straw'
bundles of chopped firewood	(cangcak sēy) mus$_2$ '3 bundles of firewood'
loaves	(ppang sēy) tengeli '3 loaves of bread'
pinches, dashes (of spice / herbs)	(yangnyem sēy) capam '3 dashes of spice'
fist(ful)s, handfuls	(molay sēy) moswum '3 handfuls of sand'
mouthfuls, sips	(mul sēy) mokum '3 sips of water'
bottle(fuls)	(maykcwu sēy) pyeng '3 bottles of beer'
cup(ful)s	(cha sĕk) can '3 cups of tea'
bowl(ful)s	(pap sēy) kulus '3 bowls of rice'
box(fuls), small	(sengnyang sēy) kap '3 boxes of matches'
box(fuls), large	(kwaca sēy) sangca '3 boxes of cakes'
cratefuls	(sakwa sēy) kwĕy-ccak '3 crates of apples'
packet(ful)s	(yak sēy) pong '3 packets of medicine'
packs (of herbal remedies)	(yak sēy / / sēk) chep '3 packs of herbs'
20 packs (of herbal remedies)	(yak sēy / sēk) cey '60 packs of herbs'
bag(fuls)	(ssal sēy) kama$_1$ '3 bags of rice'
cakes, blocks, squares	(twupu sēy) mo '3 cakes (squares) of bean curd'
(human) backloads	(namu sēy) cim '3 (back)loads of wood'
(pack)loads	(koksik sēy) pali '3 (pack)loads of grain'
loads, bundles, packs, pieces of luggage	(cim sēy) ccak '3 pieces of luggage'
bolts of cloth	(philyuk sēy) phil '3 bolts of cloth'
bolts of cloth; heads of cabbage, gourds	(kwāngmok / paychwu sēy) thong '3 bolts of cloth / cabbages'
letters, telegrams	(cĕnhwa sēy) thonghwa '3 calls'
24 needles	(panul sēy) ssam '3 dozen needles'
100 raincovers or tobacco-pouches	(kalmo/ssamci sēy) kama '300 raincovers / pouches'
tied bundles of 10 flat dry edibles	(kwulpi sēy) kas '3 bundles of dried corvina'
10 eggs in a straw wrapper	(talkyal sēy) kkwule(y)mi '3 wrappers of eggs'
bundles of 50 cucumbers or eggplants	(oi / kaci sēy) keli '150 cucumbers / eggplants'
reams (500 sheets) of paper	(congi sēy) [1]yen '3 reams of paper'
20 sheets of Korean paper	(congi sēy) kwĕn$_2$ '60 sheets of paper'
200 sheets of Korean paper; a roll of paper; 20 almanacs	(congi sēy) chwuk '600 sheets of paper'
100 fruits, radishes, cabbages, bulbs of garlic	(kām sĕk) cep '300 persimmons'
plants, heads (of cabbage)	(pāychwu sēy) phoki '3 heads of cabbage'

a bundle (of 10 brushes **pus**,
  50 bolts of cloth **pey**,   (... sēk) **tong$_2$** '30 (brushes), 150 (bolts),
  200 herring **piwus**)   600 (herring)'
fish (as a commodity)   (mulq-koki sēy) **kay** '3 fish'
handfuls of fish
  (2 large, 4-5 small fish)   (kotunge / coki sēy) **son** '6 mackerels / corvinas'
10 fish   (mulq-koki sēy) **mus** '30 fish'
20 fish   (mulq-koki sēk) **tulem** '60 fish'
20 cuttlefish   (ocinge sēy) **chwuk** '60 cuttlefish'
20 pollacks [rare]   (myengthay / puk.e sēy) **khway** '60 pollacks /
                        dried pollacks'

2000 fish   (mulq-koki sēy) **pali** '6000 fish'
bunches of barley   (poli sēk) **tan** '3 bunches of barley'
30 bunches of barley   (poli sēy) **haci** '90 bunches of barley'
1500 bunches of barley   (poli sēk) **tong$_3$** '4500 bunches of barley'
2000 tiles   (kiwa sēy) **wuli** '6000 tiles'

LIST OF COUNTERS: GROUP THREE

Units counted	with core numerals	with Chinese numerals
(hours) o'clock	(sēy) **si** '3 o'clock'[1]	
hours	(sēy) **sikan** '3 hours'	
nights	(sēy) **pam** '3 nights'	
weeks	(sēy) **cwukan / cwuil** '3 weeks'	(sam)-**cwukan / -cwuil**
months (See separate list.)	(sēk) **tal** '3 months'	(sam)-**kaywel** '3 months'
years	(sēy) **hay** '3 years'	(sam)-**nyen** '3 years'
years old	(sēy) **sal** '3 years old'	(sam)-**sēy** '3 years old'
spells, periods (of activity)	(sēy) **cham** '3 spells'	
seconds		(sam)-**cho** '3 seconds'
minutes		(sam)-**pun** '3 minutes'
parts, fractions		(sam)-**pun** '3 parts'
ten-percents		(sam)-**hal** '30 percent'
degrees		(Sep-ssi sam)-**to** '3° centigrade'
		(wito / kyengto sam)-**to** '3° longitude / latitude'
times	(sēy) **pen** '3 times'	(sam)-**hoy** '3 times'
moves (in chess / checkers)	(sēy) **swu** '3 moves'	
(gun)shots	(sēy) **pāng** '3 shots'	(sam)-**pal** '3 shots'
rounds (esp. of 5 arrows shot)	(sēy) **swun** '3 rounds'	
floors, stories	? (sēy) **chung** '3 floors'	
(...th) floor / story	? (sēy) **chung** '3rd floor'	(sam)-**chung** '3rd floor'
wen, yen, yuan, dollar		(sam)-**wen** '3 wen'
hwan [obsolete = wen]		(sam)-**hwan** '3 hwan'
cen, sen, cents		(sam)-**cen** '3 cen'
(old copper coin)	(sēy) **niph** '3 coppers'	
(old coin) taels	(sēk) **nyang** '3 taels'	
(old coin) **yepcen**		(yepcen sam)-**mun** '3 yepcen'

(old dime = 10 phun)	(sē) **ton** '3 old dimes'	
(old Korean penny)	(sē) **phun** '3 pennies'	
dollars		(sam)-**pul** '3 dollars'
marks		(sam)-**malukhu** '3 marks'
rubles		(sam)-**lwupul** '3 rubles'
pounds		(sam)-**phauntu** / -**pang** '3 pounds'
shillings		(sam)-**silling** '3 shillings'
liras		(sam)-**lila** '3 lira'
francs		(sam)-**phulang** '3 francs'

[1] Also (sēk) **cem**, said to be used by "the uneducated".

LIST OF COUNTERS: GROUP FOUR

Units counted	with core numerals	with Chinese numerals
(1) Linear measure		
.0303 mm		(sam)-**mo**
.303 mm		(sam)-**li**
3.03 mm = .119 in	(sēk / sē) **phun**	(sam)-**phun**
3.03 cm = 1.193 in	(sēy) **chi**	(sam)-**chon**
.303 m = 0.994 ft	(sēy / sēk) **ca**[1]	(sam)-**chek**
1.818 m = 1.988 yd	(sēy) **kan**	(sam)-**kan**
109 m = .542 furlongs		(sam)-**ceng**
3.927 km = 2.44 m		(sam)-**lī**[2]

   [1] **Yeses ca** '6 ca' is often said as **ye(y) ca**.
   [2] But this counter is generally used only in multiples of five. Traditionally it refers to several different lengths; the best overall translation is the equally vague English "leagues".

Units counted	with core numerals	with Chinese numerals
(2) Square measure		
330.7 sq cm = .355 sq ft		(sam)-**cak**
33.07 sq cm = 3.556 sq ft	(sēy / sē) **hop**	
3.307 sq m = 3.952 sq yd	(sēy) **phyeng**	
91.15 sq m = 3.92 sq rods		(sam)-**mu**
9.915 ares = .245 acres		(sam)-**tan**
(3) Liquid and dry measures		
.018 liters = .152 gills		(sam)-**cak**
.18 liters = 1.524 gills	(sēy / sē) **hop**	
1.805 liters = 3.81 pints	(sēk / sē) **toy**	(sam)-**sung** [rare]
18.05 liters = 19.04 qt	(sē) **mal**	(sam)-**twu** [rare]
180.5 liters = 47.6 gal	(sēk) **sem**	(sam)-**sek**; (sam)-**kok** [rare]
(4) Weight measures		
.003759 gram		(sam)-**mo**
.03759 gram		(sam)-**li**
.3759 grams	(sē) **phun**	
3.759 grams = 2.117 drams		
= .13228 ounces	(sē) **ton**	
.601 kg = 1.323 lb	(sēy / sē) **kun**	
3.759 kg = 8.27 lb	(sēy) **kwan**	
1.803 kg = 3.969 lb = 30 kun		(sam)-**kyun**[1]

   [1] Rare, except in **chen-kyun pota mukepta** 'is ever so heavy'.

The interrelationships of the measure units can be displayed as follows:

(1)	10 mo	=	1 li		(3)	10 cak	=	1 hop
	10 li	=	1 phun			10 hop	=	1 toy
	10 phun	=	1 chi			10 toy	=	1 mal
	10 chi	=	1 ca			10 mal	=	1 sem
	6 ca	=	1 kan					
	10 kan	=	1 cang					
	6 cang	=	1 ceng					
	36 ceng	=	1 lĭ					
		=						
(2)	10 cak	=	1 hop		(4)	10 mo	=	1 li
	10 hop	=	1 phyeng			10 li	=	1 phun
	30 phyeng	=	1 mu			10 phun	=	1 ton
	10 mu	=	1 tan			160 ton	=	1 kun
	10 tan	=	1 ceng			1000 ton	=	1 kwan

LIST OF COUNTERS: GROUP FIVE

Units counted	with core numerals	with Chinese numerals
fathoms (8 or 10 ca; 5 ca)	(sēy) kil	(sam)-cang
grams	(sēy) kulam	
kilo(gram/watt/meter)s	(sēy) khillo	
spans	(sē) pāl	
(double-)span of rope;		
10 handspans of rope	(saykki sēy) pāl '3 pāl of rope'	
handspans of rope	(saykki sēy) ppyem	
	'3 handspans of rope'	
50 pāl of rope	(saykki sēk) tong$_4$ '150 pāl of rope'	
spans (of thread / string / rope)	(sīl / no-kkun / saykki sēy) palam	
double armspans (around)	(sēy) alum	
inches	(sēy) inchi	
feet	(sēy) phīthu	
yards	(sēy) yātu, mā	
miles		(sam)-mail
"miles, leagues" (? = lĭ,		
when less than ten)	(sēy) macang	
ounces		(sam)-aunsu
pounds		(sam)-phauntu
tons	(sēy) thon	(sam)-thon / -ton
generations, the ··th		(Heyn.li sam)-sey 'Henry III'
sizes of rice field	(sēy) ma'-ciki;	
(in terms of the yield)	(sēy) toy-ciki	
meals	(sēy) kki	
wins (at wrestling)	(sēy) heli	
times (as much)	(sēy) kopcel[1] '3 times as much'	
(dawn) cock-crows	(sēy) hway (ccay) '3 cock-crows	
	(3rd cock-crow)'	
shoe-sizes		(sam-)mun 'size 3'

dozens	(sēy / sēk) thā
(male-female) pairs	(sāy sēy) ssang '3 pairs of birds'
(thread weave density)	(mumyeng sēk) say
	'3-thread cotton cloth'
one of a pair	(sin-pal sēy) ccak
(CF **han-ccak** 'a set')	'3 odd (unmatched) shoes'

[1] The word **kapcel** usually means only 'two-fold'; 'double' is **kop** or **kop-cayngi**.

5.5.4. Irregular counting.

A few units are counted in irregular ways: days, years, months; people; cattle and horses (of certain ages).

(1) DAY; DAY OF MONTH	NORMAL	FORMAL
how many days; what day (of the month)	meych nal	meychil (myechil); meychit nal
1 day; 1st of month	halwu; halwuq nal	il-il
2 days; 2nd of month	ithul; ithut nal	ī-il
3 days; 3rd of month	sahul; sahut nal	sam-il
3 or 4 days	sanāl	sam-sa-il
4 days; 4th of month	nahul; nahut nal	sā-il
4 or 5 days	natāl	sā-o-il
5 days; 5th of month	tassa; tassayq nal	ō-il
6 days; 6th of month	yessay; yessayq nal	[1]yuk-il
6 or 7 days	yey-niley	[1]yuk-chil-il
7 days; 7th of month	iley; ileyq nal	chil-il
8 days; 8th of month	yetuley, [dialect] yatuley; yetuleyq nal	phal-il[2]
9 days; 9th of month	ahuley; ahuleyq nal	kwu-il
10 days; 10th of month	yelhul, yelhul nal	sip-il
11 days; 11th of month	yel halwu; yel halwuq nal	sip-il il
12 days; 12th of month	yel ithul; yel ithut nal	sip-i il
13 days; 13th of month	yelq sahul; yelq sahut nal	sip-sam il
14 days; 14th of month	yel nahul; yel nahut nal	sip-sa il
15 days; 15th of month	yelq tassay; yelq tassayq nal	sip-o il
the midmonth (day = the 15th)	polum (nal)	
16 days; 16th of month	yel yessay; yel yessayq nal	sipq-[1]yuk il
17 days; 17th of month	yel iley; yel ileyq nal	sip-chil il
18 days; 18th of month	yel yetuley; yel yetuleyq nal	sip-phal il
19 days; 19th of month	yel ahuley; yel ahuleyq nal	sip-kwu il
20 days; 20th of month	sumu nal	ī-sip il
21 days; 21st of month	sumul halwu	ī-sip il-il
22 days; 22nd of month	sumu ithul	ī-sip ī-il
23 days; 23rd of month	sumu sahul	ī-sip sam-il
24 days; 24th of month	sumu nahul	ī-sip sā-il
25 days; 25th of month	sumulq tassay	ī-sip ō-il
26 days; 26th of month	sumul yessay	ī-sip(q) [1]yuk-il
27 days; 27th of month	sumu iley	ī-sip chil-il
28 days; 28th of month	sumu yetuley	ī-sip phal-il
29 days; 29th of month	sumu ahuley	ī-sip kwu-il
30 days; 30th of month	(? selun nal)	sam-sip il
31 days; 31st of month	(? selun halwu)	sam-sip sip-il
the last day of the month	kumum (nal)	

From 1-31, the terms either count days or name the days of the month; but, unless it is the only form, the term with ··· **nal** usually just names. For **phal-il** the variant **phā'-il** means only the 8th of the month, and it is usually taken to refer to the 8th of April, Buddha's birthday.

For 21-31 the native forms are uncommon. They are usually replaced by the Chinese forms, and that may account for the unexplained choice by my sources of **sumu** or **sumul** in a given expression. In dialects more comfortable with the older forms the choice may be better motivated.

When the first ten days of the month are designated it is customary to attach the adnoun **cho(-)**: **cho halwu, cho ithul, ... , cho yelhul.**

To designate a quantified period of time ···**q tong-an** is often added: **yelhulq tong-an** '10 days' = **sip-ilq tong-an** 'ten days (duration)', **polumq tong-an** = **sip-o il(q) tong-an** 'fifteen days'. The postnoun (or suffix) **kan** 'interval' is often added to the terms for '21-31 days (duration)' (CF M 1:173): **sam-sip il-kan(q tong-an)** '(a period of) 31 days'.

<u>Naming days of the week</u>

what day	**musun nal, musunq yoil**
Sunday	**il.yo(il (nal))**
Monday	**wel.yo(il (nal))**
Tuesday	**hwā.yo(il (nal)**
Wednesday	**swuyo(il (nal))**
Thursday	**mok.yo(il (nal))**
Friday	**kum.yo(il (nal))**
Saturday	**tho.yo(il (nal))**

(2) YEARS

how many years	**meych hay**	**meych nyen**
what (which) year	**musun / enu hay** (of 60-yr cycle, ...)	**meych nyen** (of calendar)[1]
1 year	**han hay**	**il-nyen** (also Year 1)
2 years	**twū hay, ithay**	**ī-nyen** (also Year 2)
3 years	**sēy hay**	**sam-nyen** (also Year 3)
4 years	**nēy hay**	**sā-nyen** (also Year 4)
5 years	**tases hay**	**ō-nyen** (also Year 5)
6 years	**yeses hay**	**[1]yuk-nyen** (also Year 6)
7 years	**ilkop hay**	**chil-nyen** (also Year 7)
8 years	**yetelp hay** /yetelphay/	**phal-nyen** (also Year 8)
9 years	**ahop hay**	**kwu-nyen** (also Year 9)
10 years	**yel hay**	**sip-nyen** (also Year 10)
20 years	**sumu hay**[2]	**ī-sip nyen** (also Year 20)
100 years	**payk hay**	**payk-nyen** (also Year 100)

[1] Seki 1992 = Tanki 4325. (The myth says Korea began in 2333 B.C.)

[2] But ˙sumul ˙hoy (1481 Twusi 16:18a).

(3) MONTHS

how many months	**meych tal**	**meych-kaywel**
1 month	**han tal**	**il-kaywel**
2 months	**twū tal**	**ī-kaywel**
3 months	**sēk tal**	**sam-kaywel**
4 months	**nēk tal**	**sā-kaywel**
8 months	**yetel[p]q tal**	**phal-kaywel**
10 months	**yelq tal**	**sip-kaywel**

what month	musun tal	meych wel, musun wel
January		il-wel(q tal); ceng-wel
February		ĭ-wel(q tal)
March		sam-wel(q tal)
April		sā-wel(q tal)
May		ō-wel(q tal)
June		¹yu'-wel(q tal)
July		chil-wel(q tal)
August		phal-wel(q tal)
September		kwu-wel(q tal)
October		si'-wel(q tal)
November		sip.il-wel(q tal); tōngciq tal
December		sip.i-wel(q tal); sēt tal

(4) PEOPLE

In Seoul, people are usually counted regularly with **han salam, twū salam, ...** , or (more formal) **han myeng, twū myeng, ...** , and in compounds and set expressions also **il-in, ĭ-in, ...** , as in **il-in (ĭ-in) yōng pang** 'a room for one (two)'. In certain other areas, people are counted with the bound noun **i** 'one, person' as follows:

1 person	han(a)-i, hanq-i /hanni/
2 people	twūl-i, twū-i
3 people	sē-i
4 people	nē-i
5 people	tases-i, tasesq-i
6 people	yeses-i, yesesq-i
7 people	ilkop-i, ilkopq-i
8 people	yetel-i, yetelp-i
9 people	ahop-i, ahopq-i
10 people	yel-i, yelq-i
20 people	sumul-i

Ko Yengkun (1989 LR 25:102) gives the forms **myech-i** 'how many people' and **yeles-i** 'many people' but I have been unable to confirm them. Perhaps there is confusion with **myech i = meych i** and **yeles i**, in which **i** is the nominative marker and there is nothing referring to people, as such. Choy Hak.kun (1978:1048) lists the form **yelesi** as a dialect equivalent to **yeles** and not specifically meaning people; this is an example of the common incorporation of **-i** by nouns that is described in Part II.

(5) HORSES AND OXEN OF A CERTAIN AGE

1-year-old	hansup
2-year-old	twūsup
3-year-old	salup; [dialect] sēysup
4-year-old	nalup
5-year-old	tasup
6-year-old	yesup
7-year-old	ilop
8-year-old	yetup
9-year-old	asup, kwulup
10-year-old	yellup, tam(p)ul

There are also a few variant forms of the numerals with certain of the counters: **tay ca, ta(s) ca = tases ca** (CF **tāys ca** 'about 5 feet'), **yes ca = yeses ca**; **tas ton = tases ton, yes ton = yeses ton**. In the game of tag (**swullay capki**) the counting goes: 1 **hanalttay**, 2 **twualttay**, 3 **samacwung**, 4 **nalttay**, 5 – (?), 6 **¹yuk-nangkeci**, 7 – (?), 8 **phalttay**, 9 **cangkwun** 10 **kotulay-ppyong**.

5.5.5. Fractions.

Examples of numeral fractions and how they are read:

$1/2$	ī-pun uy/ci il; celpan
$1/3$	sam-pun uy/ci il
$2/3$	sam-pun uy/ci ī
$3/4$	sā-pun uy/ci sam
$5/6$	[1]yuk-pun uy/ci ō
$7/8$	phal-pun uy/ci chil
1.3	ilq-cem sam ("one-point three")
2.1	ī-cem il
(0).314	([1]yengq-)cem sam il sā

Some grammarians treat (-)punci as a unit (suffix or postnoun); the ci is a Chinese particle equivalent to the core adnominal marker uy.

5.6. Verbal nouns.

A VERBAL NOUN is typically followed by a POSTNOMINAL VERB. Many verbal nouns are PRE-SEPARABLE, in that they are followed by separable postnominal verbs such as ha- 'do/be', toy- 'get done', sikhi- 'cause to do', ka- 'go to do', (na-)o- 'come (out) to do', po- 'see to it, do', ... These verbs are called separable because they are sometimes separated from certain verbal nouns by the insertion of a particle − at least tul, to, man, or un/nun; and often ul/lul or i/ka. Those verbal nouns from which a separable postnominal can be separated are called SEPARABLE VERBAL NOUNS; CF Hankul 108:42 (1955). Most of the two-syllable verbal nouns are separable and most of the one-syllable verbal nouns are inseparable, but there are exceptions. Some of the verbal nouns are PRE-INSEPARABLE: they occur before inseparable postnominal verbs such as ha- 'behave, go (boom!, ...)' (a homophone of ha- 'do/be' and the same etymon), keli- 'behave repeatedly', tāy- = keli-, k(h)uli- 'behave', sulew- 'be, give the impression of being', ... These verbs are called inseparable because they do not allow a particle (not even to or un/nun) to intervene. (But certain speakers allow sulepta to be set apart in vivid contexts: Calang to sulewe haney! 'How proud he is!'; salang/iksal/yātan to sulepta 'is quite lovely/droll/irksome', ...) The inseparable postnominal verbs are sometimes attached to pre-inseparable verbal nouns, sometimes to separable verbal nouns, i.e. to verbal nouns that can occur with particles when in construction with separable postnominal verbs.

Some verbal nouns occur only in constructions of verbal noun (with or without particle) + postnominal verb. (But note that the postnominal verb hanta is sometimes dropped, especially when the forms ham and hako are used in headlines; see §10.2, 11b-d.) Other verbal nouns occur also as free nouns, for example kongpu 'study' in i kongpu ka elyepta 'this study is difficult'. We are dealing with three independent variables of the grammar:

(1) verbal noun only ≠ free noun also;
(2) pre-separable verbal noun ≠ pre-inseparable verbal noun;
(3) separable verbal noun ≠ inseparable verbal noun.

For each verbal noun in the lexicon, such three-way information should be sought. (See below for two more pieces of information that we require.) Most Korean dictionaries list as free nouns certain items that seem to be limited, in speech at least, to use as verbal nouns.

Just as the class of verbs divides into transitive and intransitive, the class of verbal nouns divides into verbal noun TRANSITIVE (vnt) and verbal noun INTRANSITIVE (vni); some are both, for example sīcak hanta can mean either 'begins it' or 'it begins'. A construction of vnt + postnominal verb can take a direct object: Yenge lul kongpu hanta 'studies English'. For separable verbal nouns transitive there is sometimes an alternative way to express the object: Yenge kongpu lul hanta 'does English study' (Yenge adnominal to kongpu) or 'studies − English' (Yenge adverbial, i.e. absolute, to the predicate kongpu lul hanta). The separable verbal noun may take the object marker, especially if no other object is present: kongpu lul hanta 'does some studying, studies'. Normally, if the verbal noun

is modified (by an adnoun or modifier construction) it cannot take another object and it is usually followed by the accusative particle: **elyewun kongpu lul hanta** 'does some difficult studying', **i kongpu lul hanta** 'does this studying'.

The class of intransitive verbs has a subclass of descriptive verbs (= adjectives), characterized by the lack of processive forms that are present for the processive intransitive (and all transitive) verbs. Similarly, the class of intransitive verbal nouns divides into the processive (vni proper) and the descriptive ones that we call ADJECTIVAL NOUNS (adj-n). (For a few adjectival nouns that appear in unexpected forms, see §7.1, p. 217.) The adjectival nouns form constructions with postnominal verbs that are descriptive; those we call postnominal adjectives. Apparently **ha-** is the only common postnominal adjective that is separable.

The lexicon should seek the following information about each verbal noun, in addition to the three variables mentioned above:

(4) vnt ≠ vni ≠ adj-n;

(5) the specific postnominal verb(s) a given verbal noun occurs with. For example, some but not all vnt that occur with **ha-** also occur in a passivizing conversion with **toy-** (see §5.6.6).

A construction that consists of vni + postnominal verb will not take a direct object. A separable vni is sometimes set apart from **ha-** by the particle **ul/lul** (as well as **to** and **un/nun**) or from **toy-** by the particle **i/ka**: **kyelhon (ul) hanta** 'gets married', **kekceng (i) toynta** 'gets worried'. And between VN **ul/lul** and **ha-** you may hear one of the adverbs **an** 'not', **mŏs** 'cannot', or **cal** 'well; lots; often': **kongpu lul an/mŏs/cal hanta**.

Among the verbal nouns, some are best treated as a subclass of the impressionistic (mimetic) adverbs, §12. Many of the other verbal nouns are from the Chinese vocabulary, but there are also verbal nouns in the core vocabulary: **kancik** 'keep', **kekceng** 'bother', **kyēnyang** 'aim', **kwi-ttwim** 'hint', **tacim** 'pledge', **melmi** 'feel nauseous', **pasim** 'plane', **pēl.im** 'earn', **son cis** 'gesture', ... And some are from the stock of modern English loans: **nokhu** 'knock, hit', **tulaipu** 'drive', **ssain** 'sign, signal', ...

It is difficult to decide whether to treat many of the verbal nouns borrowed from Chinese as transitive or intransitive. Often an etymological "object" is already incorporated in the Chinese expression (**kwēnnong** 'encouraging agriculture', for example, includes **nong** 'agriculture'), so that it seems pleonastic to add a separate object. Yet many of the verbal nouns listed by dictionaries as being intransitive are used colloquially with pleonastic objects: **nongsa lul kwēnnong hanta** '(farming-) promotes agriculture'.

5.6.1. Defective verbal nouns.

Defective verbal nouns are those which occur with only a few (or just one) of the expected paradigmatic forms of the postnominal verb:

DERIVED ADVERB:
mutan hi 'without reason/leave'
chŏng hi 'all, entirely, wholly'
kăm hi 'with daring'
kŏng hi 'alike'
kuk hi 'extremely'
kunkun hi = **kunkun** (= **kyewu**) 'almost'
kkun hi = 'tenaciously, persistently'
kiyen hi 'for sure'
congsok hi 'without delay'
kupke hi 'suddenly'
kosulan hi 'intact'
kaman hi 'quietly'
kkol-kkol hi 'sorrowfully (weeping)'
nalan hi 'in a row'

MODIFIER (CF §5.3.1):
yuil han 'unique'
mŏmo han 'prominent'
tăymo han 'main, important'

CONDITIONAL:
(k)elphis hamyen 'all too often'
tacik hamyen (= **kikkes hamyen**) 'at most'

INFINITIVE + PARTICLE:
tacik hay ya 'at most'

GERUND:
(... **un/nun**) **kosa hako** 'apart (from ...)'
kyel kho 'definitely (not)' < **kyel(qtan) hako**
cengnyeng kho (< **hako**) = **cengnyeng** 'definitely'
phil.yen kho (< **hako**) = **phil.yen** 'for sure'

Those with ··· **hi** are obviously adjectival nouns, since **hi** comes only from the postnominal adjective **ha-**, but it would be difficult to say for sure whether the other cases should be regarded as processive or descriptive verbal nouns. The cases with ··· **han** have already been treated (in §5.3.1) as quasi-adnouns, so we might do well to treat the others as types of quasi-adverb.

Certain verbal nouns occur in several but not all of the paradigmatic forms: **tangmyen** 'confront' appears only with **han, hakey,** and **hamyen,** as in **tangmyen han mūncey** 'the problem that confronts us', **ilen mūncey ey tangmyen hakey toymyen** 'if we come to confront such a problem', and **ilen mūncey tangmyen hamyen** 'if such a problem confronts us'. And **tahayng** 'fortunate' seems to appear only with **hakey, hi,** and **han;** see also §5.2.9 for its occurrence with **ulo** and **ita.** Most of the verbal nouns that occur in extended particle phrases (§6.3) are limited to infinitive (**ha.ye** or **hay se**) and modifier (**han**) forms, e.g. ··· **ulo in ha-** 'be due to'. But some have a few additional forms (e.g. ··· **ey uy ha-** 'rely upon' occurs at least in **uy hamyen, uy hanta, uy hako,** and **uy hamye**), and some occur only in the infinitive: ··· **ey cuum / cey hay (se)** 'on the occasion of'.

5.6.2. Transitive verbal nouns.

Most two-syllable transitive verbal nouns that occur with the separable verb **ha-** are themselves separable and occur as free nouns: **kongpu** 'study', **sayngkak** 'think', **kwūkyeng** 'view (for pleasure)', **taycwung** 'estimate', **salang** 'love', **mac.i** 'meet', ... But **hetak hanta** 'nibbles on what has been set apart' is an inseparable vnt. The monosyllables **wēn** 'desire', **māl** 'say', and **kum** 'appraise, fix the price of' are also separable and occur as free nouns ('desire', 'worth', and 'price'). Most monosyllabic vnt, however, are inseparable: **cen** 'convey, report' (related noun 'biography'); **tāy** 'face, relate to' (related noun 'pair; versus'); **cheng** 'invite' (as noun 'invitation'); **cey** 'subtract', **hap** 'add', **kam** 'deduct', **kwu** 'get, buy', **sang** 'harm', **tang** 'undergo', **thayk** 'choose', **pong** 'seal', **yo** 'need'.

5.6.3. Intransitive verbal nouns.

Most of the two-syllable intransitive verbal nouns that occur with the separable verb **ha-** are separable: **kyelhon** 'get married', **sānqpo** 'take a walk', ... Of the monosyllabic vni, only **īl** 'work' (of the core vocabulary) appears to be separable; all the others are inseparable: **kwan** 'be relevant, related', **sok** 'belong', **ung** 'agree, consent'.

For the inseparable verbal postmodifiers **chey / chek** and **ssa,** see §5.4.3.1.

5.6.4. Adjectival nouns.

Quite a few adjectival nouns (mostly of two syllables) serve also as free nouns and are separable from **ha-** by the particle **to:**

kanan 'poverty / poor'	**phikon** 'tiredness / tired'
kānung 'possibility / possible'	**pulhayng** 'misfortune / unfortunate'
kātang 'appropriateness / appropriate'	**sicang** 'hunger / hungry'
kēman 'haughtiness / haughty'	**yēngwen** 'eternity / eternal'
kwung 'destitution / destitute'[1]	

[1] As a free noun: **kwung ey ppā cin cip** 'a house fallen into destitution'.

For the separable adjectival postmodifiers **pep** and **tus** see §5.4.3.3, and the entries in Part II.

There are also quite a few two-syllable (or longer) adjectival nouns that do not occur as free nouns but are quasi-inseparable. In colloquial usage they are usually inseparable, but occasionally the constructions can be split by the multivalent word **tul** 'plurally' (here treated as a particle), and in written texts the particles **to** and **un / nun** sometimes intervene: **puncwu tul hata** 'are all busy', **puncwu to hata** = **puncwu haki to hata** 'is busy indeed / also'. A few of these quasi-inseparable adjectival nouns: **emaema** 'elegant', **kkaykkus** 'clean', **puncwu** 'busy', **thunthun** 'strong'.

Most adjectival nouns of one syllable are inseparable, even though a few of them occur also as free nouns or other parts of speech: **chēn** 'lowly', **mōs** 'be inferior' (not to be confused with the etymologically related adverb 'cannot, definitely not'), **sil** 'be substantial, ... ' (also bound noun, bound adnoun), **sok** 'speedy'. There are four inseparable adjectival postmodifiers. They are treated in §5.4.3.2 (p. 161) and in the entries of Part II.

5.6.5. Bound adjectival nouns.

Some adjectival nouns are inseparable (in that they are never separated from the following **ha-**) and are attached to adjective stems:

-**tama**, -**tala** (→ -**tama(h)-**, -**tala(h)-**) 'rather (of size)'
-**(k)kum** 'rather'
-**(c)cek**, -**(c)cak**, -**chek** 'rather ...ish'
-**(c)cek-cikun**, -**(c)cak-cikun**, -**chek-cikun** 'rather ...ish'
-**swuk** ' ...ish'
-**swuk(-)uley** ' ...ish'
-**cepcep** ' ...ish, slightly colored (tinged)'
-**(k)kulum** SAME
-**(u)tay-tay**, -**(u)tey-tey**, -**(u)tayng-tayng**, -**(u)teyng-teyng** SAME
-**(u)chwung-chwung** SAME
-**(u)chik-chik** SAME
-**(u)thoy-thoy**, -**(u)thwi-thwi** SAME
-**upsulum** ' ...ish, slightly colored (tinged); slightly characterized by'
-**us(ul)um** / -**s(ul)um** ' ...ish, slightly characterized by'
-**(u)m(-)uley** ' ...ish'
-**(u)s** (see §12 and Part II)
-**kkey** 'dull and ugly (colored)'

These could be called "adjectival postadjectivals"; compare the bound postverbs of §7.1.3. Examples will be found in Part II under -**usulum**. Shape alternations are discussed in §12.

5.6.6. Conversion constraints on verbal nouns.

In §11.6 we describe special passive conversions for those verbal nouns of more than one syllable: ··· **hanta** → ··· **toynta**, → ··· **tang hanta**, → ··· **pat.nunta**. These conversions are limited to specific transitive verbal nouns, which must be listed. Moreover, there are intransitive verbal nouns which also occur with **toynta**, perhaps as an abbreviation of ··· **hakey toynta**. CF **hōn.lan (hakey) toynta** from **hōn.lan hata** 'is disarranged', an adjectival noun. And a few verbal nouns do not occur with **hanta**, but only with **toynta**. We can make representative lists:

(1) ··· **hanta** → ··· **tang hanta**

    vnt **kēcel** 'refuse'

(2) ··· **hanta** → ··· **pat.nunta**

    vnt **cwūmok** 'watch'   **yōngse** 'forgive'
          hyep.pak 'threaten'   **sokay₁** 'introduce (people)'

(3) ··· **hanta** → ··· **toynta**

    vnt **kamkum** 'imprison'   [1]**noncung** 'prove'
          kilok 'record'   **sīcak** 'begin'
          kolye 'consider'   **sokay₂** 'introduce (ideas, culture, knowledge)'
          kyōyang 'educate'   **kwelki** 'be roused to action'

    vni **kāmtong** 'be emotionally moved'   **pensik** 'breed'
          cungtay 'enlarge, grow'   **tankyel** 'unite'
          hapkyek 'qualify'

(4) ⋯ **toynta** only (and no ← ⋯ **hanta**)

    vni ¹**iik** 'prove profitable'
        kāchayk 'get scolded'   **mapi** 'get paralyzed'
        kiceng 'be ready-made, established'   **moswun** 'be contradictory'
        koco 'reach a climax'   **sangchi** 'coincide'
        kyel.wen 'become enemies'   **sōtuk** 'be earned'

(5) ⋯ **hanta** only (and no → ⋯ **toynta**)

    vnt **kak.o** 'apprehend'
        kāngsup 'assault'   **pāngkwan** 'observe as bystander'
        kansep 'interfere'   **pokcong** 'obey'
        kyēngthan 'admire'   **taywu** 'treat'
        mulqsayk 'search out'   **tokchang** 'create'

    vni **kyekcen** 'battle'   **panghwang** 'wander'
        mūntap 'quiz'   **pihayng** 'fly'
        myēnto 'shave'   **puncayng** 'dispute in factions'
        nampok 'dress as a man'   **tamhwa** 'chat'
        nolyek 'endeavor'   **tapcang** 'answer (in writing)'
        pakswu 'applaud'   ¹**yehayng** 'travel'

Most verbal nouns of more than one syllable can be used in the causative conversion ⋯ **hanta** → ⋯ **sikhinta**:

    vnt **chwucin** 'propel'
        hāypang 'liberate'   **hwaksin** 'be convinced of'

    vni **ciyen** 'delay'
        cungka 'increase'   **kyelhap** 'combine'
        hāysan 'disperse'   **mūcang** 'arm for war'
        kāmso 'decrease'   **yak.hwa** 'grow weak'

For the permissible dropping of (⋯ **hanta** →) **haci** in conversions of verbal-noun sentences, see §11.7.5, and for the stylistic dropping of (⋯ **hanta** →) **hako**, see p. 277. Dyads of like verbal nouns (vnt + vnt, vni + vni, adj-n + adj-n) occur in construction with the postnominal verb **ha-**; we might regard these as instances of an optionally omitted **hako**: vn₁ [hako] vn₂ **ha-**. Apparently both verbal nouns must be of two syllables. For examples, see §10.2.

6.0. Forms: particles.

Particles are words that mark grammatical relationships, focus, emphasis, attitude, and a variety of emotional meanings. A Korean particle follows the word or phrase which it is marking, so that the Korean particles (like those of Japanese and many other languages) may be called POSTPOSITIONS, by analogy with the prepositions of western languages, such as English. It is often difficult to translate a given particle from one language to another, just as it is difficult to translate prepositions, which serve a similar function in English. The translation of a Korean particle will sometimes be a preposition in English, but it may instead involve word order or the placement of sentence stress, the choice of definite or indefinite article, and other subtleties that are difficult to pinpoint.

6.1. Characteristics of particles.

All particles sometimes occur before pause, but it is unusual for a pause to occur before a particle, for the particle is normally attached to the preceding word in close phonological juncture, in spite of the fact that it is in construction with the entire preceding phrase, not just the preceding word. Most

particles sometimes occur (1) after a noun; certain particles also / instead occur (2) after various inflectional categories; and some of the particles also occur sometimes (3) after other particles. When particles occur in sequence, as in **wuli apeci** EYKEY SE POTA TO 'also / even than from our father', they peel off from the end, and each forms an immediate constituent with the entire preceding phrase:

> **wuli apeci eykey se pota + to** 'also / even'
> **wuli apeci eykey se + pota** 'than'
> **wuli apeci eykey + se** 'from / at'
> **wuli apeci + eykey** 'to / at a person'
> (**wuli** 'we / us' + **apeci** 'father')

Most of the common particle sequences are included as entries or as subentries in Part II. An attempt was made to elicit all conceivable sequences, including some which are merely "awkward", but not completely rejected. In general the focus particles (**un / nun, to, iya / ya**) come last in a string, but **man** 'just' occurs in several positions, as can be seen from the examples under the entry in Part II. The particles **i / ka** (nominative), **ul / lul** (accusative), **un / nun** (subdued focus), **to** (highlighted focus), and **iya / ya** (highlighted contingency) are mutually exclusive. But the nominative particle can occur after the other particles in certain hypostatic contexts, such as echo questions or denials ('it isn't [a matter of] " ⋯ "'), or expressions such as ⋯ **i / ka mūncey 'ta** 'the problem is [the matter of] " ⋯ "', into which a fragment is inserted from an assumed echo. These unusual situations are largely ignored here, but mention is made of particle sequences of nominative following other particles (such as **ey, eykey,** and **ulo**) under similarly limited circumstances, because those strings are more likely to be encountered than (*)**ul / lul i**, (*)**un / nun i**, (*)**to ka**, or (*)**iya / ya ka**. Although **Tōn ul [ ] i mūncey 'ta** is barely possible for 'The problem is [that he wants/...] money', there appears to be no comparable context that would permit **Tōn i [ ] lul ...** , except as a forced ellipsis: **"Tōn i" lul "tōn ul" lo kochyess.ta** 'I corrected [the phrase] "tōn i" to "tōn ul"'. Such special conditions would even allow an iteration of the same particle: **"Tōn ul" ul "tōn ulo" lo kochyess.ta** 'I corrected [the phrase] "tōn ul" to "tōn ulo"'; **"Wuli ka" ka mūncey 'ta** 'The problem is the [phrase] "wuli ka"'.

A particle particularizes and limits the grammatical relationship of the phrase to the rest of the sentence, places the word in perspective with respect to the rest of the sentence, or (if at the end of the sentence) shows how the sentence is regarded with respect to the discourse or the speech situation.

6.2. Quasi-particles.

Sometimes it is difficult to decide whether what we have is NOUN + PARTICLE or just NOUN + NOUN. There is one helpful test. The words **na** 'I / me', **ce** 'I / me' [formal], and **ne** 'you' have the alternant shapes **nay, cey,** and **ney** before a noun but not before a particle − with the exception, for special reasons (p. 196, note 1), of the nominative particle **ka**. What follows the pronominal reference in **nay sayngkak** 'my opinion' or 'thoughts of (= about) me' and (**ne wa**) **nay yeph** 'beside (you and) me' is a noun. For that reason we decide to treat **man** in **na man** 'just me' as a particle. And we can set up a class of QUASI-PARTICLE to take care of the extended use of phrases like **pakk ey** 'except for' in **na pakk ey** 'except for me' and **cip pakk ey ēps.ta**, which has two meanings 'there are none outdoors' and 'there's only the house' (= **cip man iss.ta**). The literary synonym **ōy ey** is to be treated the same as **pakk ey**. In a sense, perhaps **man** could be called a quasi-particle, too, since it also serves as an adjectival noun; but because we treat **man** as a particle it follows that **ku** is a noun, not an adnoun, in **ku man** 'just that'. Other quasi-particles are **kawuntey, cwungkan,** and **sai** 'midst': **ne wa na kawuntey / cwungkan / sai** 'between you and me'. In **na ttaymun** 'because of me' **na** is a noun and **ttaymun** a postnoun (not a particle because no "other" particle can be inserted before it − see below, §6.4), but in **nay ttaymun** 'for my sake' **ttaymun** is a noun.

In addition to noun quasi-particles, there are also quasi-particle verb forms which I choose not to call particles, but treat as specialized uses of the verb itself:

(1) **kath.i**, pronounced /kachi/, the derived adverb of **kath-** 'be like or with'. I regard **na kath.i** 'like me' as an abbreviation of **na wa kath.i**. The full form means either 'like me' (= **na chelem** with a particle) or 'with me' (= **na wa hamkkey** with an adverb in reciprocal valence 'together with'); the

abbreviated form means only 'like me'. Notice that the expression is inflected through all categories: **na kath.un ya** 'is it like me?', **na kath.ess.ta** 'it was like me'.

(2) **kaciko** 'with, ... ', the gerund of **kaci-** 'hold'. See the entries **kaciko** and **-e kaciko** in Part II.

(3) all forms of the copula, especially **ila / 'la, ila to / 'la to, in tul / 'n tul, ina / 'na, ita (ka) / 'ta (ka), iko / 'ko, imye / 'mye.**

(4) all forms of the verb **ha-**, notably **hako**. But this word I treat as a particle proper when optionally it substitutes for **wa / kwa** 'with, and'. That is for various reasons, primarily the great frequency of **hako** and its wider distribution than other forms of **ha-**.

(5) the abbreviation **tholok** (< **hatolok**). This functions like a postnoun of very limited distribution. See the entry in Part II.

(6) **mattana** 'according to (something said)' < **mac.ta hana** 'says it fits but'.

(7) **chiko** (vt gerund) 'considering as'.

(8) **mālko**, gerund of **mā-l-** 'refrain, desist'.

Perhaps all these quasi-particles could be regarded as transitional types or "particles in the making". The verbal origin of several of the particles proper is still transparent: **cocha, pota, puthe, mace, mankhum, ...** . Some Korean dictionaries list as a particle the uncommon use of **palo** marked "3" in the entry of Part II, but I prefer to treat it as a quasi-noun.

6.3. Extended particle phrases (phrasal postpositions).

In expository prose some of the verbs and verbal nouns are used as a way of extending and particularizing a particle. Most of these semi-literary clichés form two kinds of phrases: ADVERBIAL, with the infinitive or the infinitive + the particle **se** but occasionally with the gerund, and ADNOMINAL, with the plain modifier. (In the table "ha.ye / hay se" means both the literary **ha.ye** and the colloquial **hay se** are used.) The extended particle phrases function much like simple particles, so we call them phrasal postpositions.

	ADVERBIAL	ADNOMINAL	MEANING
(1)	ey kwan ha.ye / hay se	ey kwan han	'respecting, concerning, about'
(2)	ey tāy ha.ye / hay se	ey tāy han	'directed toward; treating, concerning, regarding; against, opposing'
(3)	ey pān ha.ye / hay se	ey pān han	'in opposition to, contrary to'
(4)	ey pī ha.ye / hay se	ey pī han	'compared with. relative to'
(5)	ey in ha.ye / hay se	ey in han	'in accordance with' CF 26
(6)	ey uy ha.ye / hay se	ey uy han	'depending on, based on'
(7)	ey ˡim ha.ye / hay se	ey ˡim han	'facing, confronting, meeting, in the presence of'
(8)	ey hān ha.ye / hay se	ey hān han	'limited / restricted to'
(9)	ey kung ha.ye / hay se	ey kung han	'throughout' (= ey kelchye)
(10)	ey pichwe	—	'in view / light of, according to'
(11)	ey ttalᶜa (se)	—	'consequent to'
(12)	ey iss.e (se)	—	'in, at, for'
(13)	ey cēy ha.ye	—	'on the occasion of'
(14)	ey cuum ha.ye	—	'on the occasion of'
(15)	ul pilos ha.ye / hay se	ul pilos han	'beginning with, (starting) from'
(16)	ul tang ha.ye / hay se	ul tang han	'facing, confronting'
(17)	ul hyang ha.ye / hay se	ul hyang han	'(facing) toward'
(18)	ul thong ha.ye / hay se	ul thong han	'through (= via or throughout)'
(19)	ul kyek ha.ye / ?hay se, ul kyek hako	ul kyek han	'separated by; with -- between; at intervals of'
(20)	ul wi ha.ye / hay se	ul wi han	'for the sake / purpose of, on behalf of'

(21) **ul ki ha.ye**	–	'at the time of'
(22) **ul kkiko**	–	'along(side), parallel to, following'
(23) **ul mak.lon hako**	–	'to say nothing of'
(24) **ul pulko / pulkwu hako**	–	'disregarding'
(25) **ulo malmiam.^{e}/a (se)**	**ulo malmiam.un**	'in accord(ance) with; owing to';
(26) **ulo in ha.ye / hay se**	**ulo in han**	'in consequence of';
		[with passive] = **ey(key)** 'by'
(27) **ulo ha.ye / hay se**	–	'on account of' (Part II; CM 1:165)
(28) **ulo ha.ye-kum**	–	'causing / letting' (Part II; CM 1:165)
(29) **kwa tepul.e (se)**	–	'together with, in common with'
(30) **kwa awulle (se)**	–	'in addition to'

An interesting fact about these expressions is that they are used after phrases that would not otherwise take the particle. We can say, for example, that the particle **ey** occurs after the postmodifiers **ka** and **ya** 'question', but only in such expressions as **olunun ka / ya naylinun ka / ya ey ttal^e/a (se)** 'depending on whether it is rising or falling'. In a number of other cases a particle called for by the following expression will occur after phrases that would not otherwise attach the particle:

(31) ··· **kwa / wa pāntay 'ta** 'it is in opposition to'
(32) ··· **kwa / wa pāntay lo** 'in opposition to'
(33) ··· **kwa / wa ilpan ita** 'it is the same as (the case of)'
(34) ··· **kwa / wa kath.i (kath.ta)** '(it is) the same as, like'
(35) ··· **kwa / wa hupsa hata** 'it closely resembles (the case of)'
(36) ··· **kwa / wa talli (taluta)** '(it is) different from'
(37) ··· **kwa / wa hamkkey** 'together with'
(38) ··· **kwa / wa tongsi ey** 'at the same time (together) with'
(39) ··· **ey to pulkwu hako** 'regardless of, despite'; CF (24) above
(40) ··· **i / ka mūncey 'ta** 'it is a question; the question is (one of)'
(41) ··· **i / ka ani 'ta** 'it is not (that), it is not a case of'
(42) ··· **ul mak.lon hako** 'to say nothing of'; = (22) above

Compare CM 1:165, 266-7.

I have not included ··· **ey kelchye** 'extending over (a period of time, ...)', for it is just the infinitive of ··· **ey kelchi-** 'extend over', which seems to occur freely in all forms. There are, of course, quite a large number of verbs which call for the dative particle **ey** rather than (or as well as) the accusative particle **ul / lul**. See §10.8.

6.4. Particles proper.

The list of particles that follows is partly ordered by semantic groups, but I have omitted tag translations since they would be misleading. The full range of meaning (often extensive) and use (often overlapping) will be found in the entry for each particle in Part II. I have indicated a few strings that are often treated as single particles by Korean grammarians, such as **ey se**. The sequences that have actually been found or elicited, together with further distributional limitations, are given in §6.5-6 and individually in Part II.

1. **i / ka**[1]
2. **ul / lul**[2]
3. **ulo / lo**
   ulo se / lo se
   ulo sse / lo sse
4. **ey**
   ey 'ta (ka)
5. **eykey**; [honorific] **kkey**
6. **hanthey**
7. **poko**

8. **tele**
9. **kkaci**
10. **se**
    ey se
    eykey se, hanthey se; kkey se
11. **puthe**
12. **iya / ya**
13. **man** (also adjectival noun)
14. **mankhum, manchi**
15. **khenyeng**

16. mata
17. ssik
18. ccum
19. un / nun[3]
20. to
21. cocha
22. mace (variant maca)
23. pota (also [written-style] adverb)
24. chelem
25. kwa / wa
26. hako
27. sekken
28. ilang / lang (= sekken; = kwa / wa)
29. ullang / llang (= un / nun)
30. ko (after verb forms in indirect quotations)

31. iyo / yo
32. kwulye (after verb forms)
33. kkwuna (as particle, only after -ca)
34. uy
35. ci (= uy in Chinese clichés)
36. a / ya
37. una / na (after interjections, -key, -ulyem)
38. la (only after -^{e}/a)
39. tul (also postnoun, adverb)
40. son (only after -ta; also postmod) [obsolete]
41. ppun (only after -ta; also postnoun, postmod)
42. nāyci (NUMBER$_1$ ~ NUMBER$_2$)
43. (-ulq ci) enceng
44. (-ki nun) sāylo (ey) / sāylye

[1] In the standard language i follows a consonant and the suppletive ka follows a vowel. But in some northern dialects i or its reduction y occurs after vowels, too, and that is the regular pattern found in the early Hankul texts. There are cases, especially in the north, of pleonastic ⋯ i ka (but no *⋯ ka ka or *⋯ ka i) which suggest that the ka may have been added for emphasis; the standard nay ka 'I' for na ka (a common dialect version) probably represents that formation, as do ney ka 'you' (dialect ne ka), cey ka 'I [formal]' (dialect ce ka) and dialect nwi ka for standard nwu ka 'who'. The 15th-century forms of these words were ˙nay (1447 Sek 6:14b, 6:19b, 6:24:29b) < ˙na ˙i, ¨ney < ne ˙i (1447 Sek 6:1a), ¨cey (1447 Sek 9:14a, 9:21a — correcting Martin 1988, which copied a misprint in NKW) < ce ˙i, and ¨nwuy (1449 Kok 36) < nwu ˙i.

[2] In Cincwu (South Kyengsang) lo is used for lul but ul is never said as ulo (Mkk 1960:3:31). In parts of the north people drop the final liquid and say lu for lul and u for ul. Some of the northern dialects use (u)lwu or (u)lu for (u)lo, so that for certain speakers the form used for the standard ul / lul may converge with that used for ulo / lo after a vowel or the liquid. The shape lul readily abbreviates to just l' and both versions coexisted in the first Hankul texts and apparently also in the language of the 12th century and earlier, if our interpretations of the hyangka orthography are correct. See note 3.

[3] The shape nun readily abbreviates to just n' and both versions coexisted in the first Hankul texts and earlier materials, as did l' and lul. For both these particles it is usually assumed that the short form represents the original morpheme and the full form iterates (reduplicates) that. CF Kim Wancin 1975.

The last three cases (42, 43, 44) are somewhat anomalous. Apparently they are always in close juncture with the preceding phrase, so they are treated by most Korean dictionaries as particles rather than, say, as bound nouns or adverbs. Compare the note on kot in Part II.

Nouns of relative location, such as wi 'atop, above', alay 'below', and yeph 'beside', are not treated as particles. In chayk-sang wi ey 'on top of the desk' only the ey is a particle, and the preceding expression is NOUN + NOUN for two reasons:

(1) we can say just wi ey 'on top' without a preceding noun (but of course 'on top' implies 'on top of SOMETHING'), and wi occurs in other positions as a free noun, though not modified by an adnoun or verb modifier (so that in ku wi 'on top of that' ku is a noun, as it is in ku man 'just that');

(2) 'above me' is nay wi ey not *na wi ey. The same is true of yeph (ey) 'beside': nay yeph (ey) 'beside me' shows that yeph is a noun even though tangsinq yeph 'beside you' and wuli yeph 'beside us' might leave one wondering whether it is not a postnoun or particle. There are dialects (such as that of Taykwu) in which na yeph, na wi, etc., are used instead of the forms with nay, but speakers of those dialects say na chayk for 'my book'. For such dialects, the fact that wi and yeph can begin a sentence is sufficient criterion to establish that they are not postnouns or particles. Nouns of relative location can be thought of as distilled from a kind of semantic predication that locates one noun with

respect to another. Other such nouns: **an** 'inside' (something rather empty), **sŏk** '(deep) inside' (something rather full), **kawuntey** 'inside; between, among', **sai** 'between, among; midst, during', **cwung** 'midst, among', **cwuwi** 'around (the periphery of)', **kyeth** 'beside, in the vicinity of', **mith** '(at) the base / bottom of; beneath', **aph** 'in front of; (= **cen**) before, ahead of', **twī** 'behind; (= **hwū**) after, later than', ... By their meaning ('between, among') some of these words locate a noun with respect to two or more other nouns.

Moreover each of the particles listed as occurring with nouns is sometimes preceded by at least one other member of the same list. That is the ultimate distributional fact that determines the list.

6.5. Particle sequences.

Particles occur in sequences of two (**eykey se**), three (**eykey se nun**), and even four (**ey se puthe uy**) or, rarely, more (**ccum ey se pota to**, ...). The longer sequences usually end with one of the particles **un / nun**, **to**, or **uy**. In my analysis the constituency cut is always between the particle on the right and the remainder of the phrase, so that each particle "peels off" in turn from the right. Yet even though this analysis does not treat the particles in sequence as in construction with each other, it is interesting to see what sequences can be found. I have looked for all possible shorter combinations and tried to elicit those which I could not find in texts. Some sequences alleged to exist (e.g. by CM) are rejected because I have been unable to elicit satisfactory examples. Among these are:

> ?* **chelem iya mal lo; (ey) se lul; (ey) se lo, ey wa; ina to,**
> **pota 'na, pota uy, pota chelem, pota kkaci, pota ya mal lo,**
> **man iya mal lo, tele 'na-ma to, tele uy, ulo lul, ulo wa.**

The sequences that have been found are supplied with substantiating examples in the entries of Part II. Here part of that information is recapitulated in a different form.

Ignoring for the moment certain synonyms, such as the colloquial synonym **hanthey** for **eykey**, and less interesting forms, such as **poko** and **tele** for only some of the uses of **eykey**, we will examine the sequences of particles that have been found to occur after nouns and include the copula forms **ila to, ina(-ma), in tul, itun ci,** and **(i)ta (ka)** as if they were particles. Some of the strings are rare, and some of the examples are extremely colloquial. Certain sequences could be elicited only in sentences that speakers considered "awkward". Undoubtedly there are sequences that have been missed; in particular, I would expect to find more with final **un / nun** and **to**, since I did not try to elicit all possible longer sequences with those two particles. Some of the sequences with **i / ka** as the last member are obtainable only with the copula negative construction ... **i / ka ani 'ta** (SEE remarks at end of §11.7.2) and these are marked "N". In the lists I have used the designations **eykey, (k)wa,** and **sekken** to include sequences that were actually found with the more common Seoul colloquial forms **hanthey, hako,** and **ilang / lang** (respectively). The more exact information given in Part II suggests that a few of the colloquial versions, because of the relative infrequency of the sequence, are rejected in favor of the less colloquial synonyms; see, for example, the notes on **man kwa** (→ **man hako**), **kwa kkaci** (→ **hako kkaci**). Although **hako** occurs more freely than **kwa / wa**, certain extended particle phrases (§6.3), because of their stiff and literary flavor, take only **kwa / wa**: you do not hear **hako** taking the place of the less colloquial particle in ... **kwa / wa tongsi ey** 'at the same time (together) with ... '.

In the two lists that follow, the sequences are given alphabetically: in the first list by the prior member, in the second by the latter member. Each particle is listed by its postconsonantal shape even though the other shape might be appropriate to the particular sequence, so that **eykey** + **(k)wa** = **eykey wa**, **eykey** + **i / ka** = **eykey ka**. Space within two-word units is here shown as "_".

It will be seen that virtually no other particle ever follows these markers:

> **i / ka** (But there are examples of **i / ka tul** in Part II. And see **-ta ka ka** in §6.6; this may be an
> argument against that analysis.)
> **ul / lul** (But there are examples of **ul tul** in Part II.)

uy
to (But there are examples of **to tul** in Part II.)
iya (mal lo)
ila_to
ina (But there are examples of **ina lul** and **ina tul** in Part II.)
ina-ma
ita_(ka) (But there is an example of **'ta ka tul** in Part II.) Contrast -ta (ka), which can be
       followed by (n)un, to, tul, (i)ya, and even ka.
itun_ci

The particle **un / nun** is followed only by **khenyeng** or by **tul**, and **khenyeng** is followed only by
un / nun or by **tul**. That means it is possible to get ⋯ **un / nun khenyeng un**, as in the following
(perhaps somewhat unlikely) sentence: **Cel.yak ulo ey ya māl lo nun khenyeng (un) hana to ēps.ta**
'Far from being a matter of economizing on them, I just haven't got a single one'. The particle **ssik** is
preceded only by **ccum**; the particle **mankhum** is preceded only by **chelem, eykey,** and **kkaci**. In older
usage, **mata** is preceded only by **ccum** but modern usage prefers the order **eykey mata, (ey) se mata,**
and **eykey se mata (kkey se mata)** to the older usage with **mata** first; and rather than **mata ey** the
modern usage prefers simply **mata**. That leaves **ssik eykey** and perhaps **ccum eykey** as the only
sequences with a particle preceding **eykey**.

Every particle that occurs after a noun is sometimes preceded by at least one other particle. That
criterion alone is sufficient to distinguish a particle from a postnoun.

The list of particles excludes the sequence **kkey se** (honorific oblique subject); it has the same
following partners as **se** alone, and additionally also **i / ka, mata,** and **sekken**. In Seoul **sekken** is
usually replaced by the synonym **ilang**; I have assumed that the distribution is the same in the same
meaning. (The particle **ilang** is also used as a synonym of **hako = kwa / wa** 'with'.) Like **eykey (se)**,
the sequence **kkey se** is preceded only by the particles **ssik** and **mata**, and modern usage refers **kkey se
mata**. Not included are strings with **ppun (man)** 'only' such as **ulo se ppun** and **ey se ppun man**,
which will be found in Part II. Notice also (in Part II) the unusual sequences **ulo sse (nun)** and **iya mal
lo**, as well as the written-style strings **ey iss.e se ('na, nun, uy)**.

There are pairs in contrasting or competing order:

cocha mace	:	(mace cocha)
ccum chelem	:	chelem ccum
ccum eykey	:	eykey ccum
ccum ssik	:	ssik ccum
ey cocha	:	cocha ey [rare]
ey kkaci	:	kkaci ey
ey man	:	man ey
eykey ccum	:	ccum eykey
se (k)wa	:	(k)wa se [rare]
ulo kkaci	:	kkaci lo
ulo man	:	man ulo
kwa man	:	man kwa (→ man hako)

We can add the cases with **mata** mentioned earlier:

eykey mata	:	(mata eykey)
ey se mata	:	(mata ey se)
eykey se mata	:	(mata eykey se)
kkey se mata	:	(mata kkey se)

There are longer sequences such as:

kkaci ey se mace	:	ey se kkaci mace.

6.5.1. List of particle sequences arranged by prior member.

ccum –	chelem	chelem iya		
	cocha	cocha to		
	ey	ey (i)na		
		ey se	ey se pota	ey se pota to
	eykey			
	i (/ka)			
	ila_to			
	ina			
	ina-ma			
	in_tul			
	iya			
	kkaci	?kkaci (i /) ka		
		kkaci (i)ya		
		kkaci man		
		kkaci (n)un		
		kkaci to		
	mace	mace to		
	man	man ila_to		
		man un		
	mankhum	mankhum ina		
	mata			
	pota	pota (n)un		
		pota to		
	puthe	puthe (i /) ka		
		puthe (n)un		
		puthe se		
	se	se pota	se pota (n)un	
		se puthe	se puthe (i /) ka	
			se puthe (n)un	
	ssik	ssik ila_to		
		ssik ina(-ma)		
		ssik man	ssik man ila_to	
		ssik ulo	ssik ulo to	
		ssik un		
	to			
	ul			
	ulo			
	un			
	uy			

chelem –	ccum	ccum ila_to	
		ccum ina(-ma)	
		ccum in_tul	
		ccum iya	
		ccum man	ccum man un
		ccum kkaci	ccum kkaci ka
			ccum kkaci (i)la_to
			ccum kkaci (i)n_tul

		ccum kkaci (i)ya	
		ccum kkaci man	ccum kkaci man un
cocha		ccum kkaci to	
ila_to			
ina(-ma)			
in_tul			
iya			
khenyeng			
kkaci	kkaci (i)ya		
	kkaci (n)un		
mace	mace to		
man	man ila_to		
	man to		
	man un		
mankhum	mankhum ila_to		
	mankhum ina(-ma)		
	mankhum in_tul		
	mankhum iya		
	mankhum man		
	mankhum to		
	mankhum un		
pota	pota (n)un		
puthe			
to			
un			

cocha —	ey [rare]	
	(i /) ka	
	ila_to	
	(i)na(-ma)	
	(i)ya	
	mace	
		?puthe (i /) ka
	to	
	(l)ul	
	(u)lo	
	(n)un	
	?uy	

ey —	chelem
	cocha
	(i /) ka
	(i)la_to
	(i)na(-)ma
	(i)n_tul
	(i)ta(_ka)
	(i)ya
	khenyeng
	kkaci
	(k)wa

mace			
man			
pota			
puthe			
se	se chelem		
	se cocha		
	se (i /) ka N		
	se (i)na(-ma)		
	se (i)n_tul		
	se (i)ya		
	se khenyeng		
	se kkaci	se kkaci mace	
	se (k)wa		
	se mace	se mace puthe	
	se man	se man ila_to	
	se mankhum		
	se mata		
	se pota		
	se puthe	se puthe (i /)ka	
		se puthe to	
		se puthe (n)un	
		se puthe uy	
	se sekken		
	se to		
	se tul		
	se (n)un	se (n)un khenyeng	
	se uy		
sekken			
to			
(l)ul			
(u)lo	(u)lo uy		
(n)un	(n)un khenyeng		
uy			
eykey −	ccum	ccum iya	
	chelem		
	cocha		
	(i /) ka N		
	(i)la_to		
	(i)na(-ma)		
	(i)n_tul		
	(i)ta(_ka)		
	(i)ya	(i)ya tul	
	khenyeng		
	kkaci		
	(k)wa		
	mace		
	man	man i(/ka)	
		man ila_to	
		?man to	
		?man un	
	mankhum	mankhum man	mankhum man un

	mata		
	pota	pota to	
	puthe		
	se	se chelem	se chelem man
		se cocha	
		se (i)ka	
		se (i)la_to	
		se (i)na(-ma)	
		se (i)n tul	
		(i)ta(_ka)	
		se (i)ya	
		se (k)wa	
		se mace	
		se man	se man to
			se man un
		se mata	
		se pota	se pota to
		se puthe	se puthe (i /) ka
		se to	
		se tul	
	sekken	se (n)un	
	to		
	tul		
	(l)ul		
	(u)lo	(u)lo puthe	
		(u)lo uy	
	(n)un		
	uy		
kkaci –	ccum	ccum un	
	cocha	cocha to	
	ey	ey se	
		ey (n)un	ey se mace
	(i /) ka		
	(i)la_to		
	(i)na(-ma)		
	?(i)n_tul		
	(i)tun_ci		
	(i)ya	(i)ya mal_lo	
	khenyeng		
	mace		
	man	man ila_to	
	se		
	to		
	tul		
	(l)ul		
	(u)lo		
	(n)un		
	uy		

kwa –	ccum		
	chelem	chelem man	
	cocha		
	ey		
	(i /) ka		
	(i)la_to		
	(i)na		
	(i)ya		
	kkaci	kkaci (l)ul	
	mace	mace to	
	man	?(man ulo)	man ulo (n)un
		man un	
	pota		
	puthe		
	se [rare]		
	to		
	tul		
	(l)ul		
	(u)lo [rare]	(u)lo nun	
	(n)un		
	uy		
mace –	(cocha)		
	(i /) ka		
	(i)la_to		
	(i)na-ma		
	(i)n_tul		
	?(i)ya		
	man		
	puthe	puthe (i /) ka	
	to		
	(l)ul		
	(n)un		
	uy		
man –	ey		
	i (/ ka)		
	ila_to		
	ina(-ma)		
	in_tul		
	iya		
	?kwa→hako		
	to		
	ul		
	ulo	ulo nun	
		ulo uy	
	un		
	uy		

mankhum –	(cocha)	
	i (/ ka)	
	ila_to	
	ina(-ma)	
	?in_tul	
	iya	
	man	man ila_to
	ssik	
	to	
	ul	
	un	

mata –	(ey)	(ey se)
	(eykey)	(eykey se)
	(*)(i /) ka	
	(i)na	
	(i)ya	
	khenyeng	
	kkaci	
	(k)wa	
	man	
	pota	
	puthe	
	se	
	(?)to	
	(l)ul	
	(u)lo	
	(n)un	(n)un khenyeng
	uy	

pota –	(i)la_to	
	?(i)na-ma	
	(i)ya	(i)ya mal_lo
	khenyeng	
	man	
	to	
	(n)un	
	uy	

puthe –	cocha	
	(i /) ka	
	(i)la_to	
	(i)na(-ma)	
	(i)ya	
	khenyeng	
	man	
	pota	
	se	
	to	
	tul	

	(l)ul	
	(n)un	
	uy	
se —	chelem	
	cocha	
	(i /) ka N	
	(i)la_to	
	(i)na(-ma)	
	(i)n_tul	
	(i)tun_ci	
	(i)ya	
	khenyeng	
	kkaci	
	(k)wa	
	mace	
	man	
	mankhum	
	pota	
	puthe	puthe (n)un
	sekken	
	to	
	tul	
	(n)un	(n)un khenyeng
	uy	

NOTE: Also found are **kkey se ka** and **kkey se sekken**.

sekken —	ccum	ccum iya
	cocha	
	iya	
	khenyeng	
	kkaci	
	mace	
	man	
	pota	pota to
	puthe	
	tul	
	ul	
	un	un khenyeng

ssik —	uy [rare]	
	ccum	
	chelem	
	cocha	
	eykey	
	i (/ ka)	
	ila_to	
	ina(-ma)	
	in_tul	
	iya	
	khenyeng	
	kkaci	kkaci (i)la_to
		kkaci (n)un

	kwa		
	mace		
	pota		
	puthe		
	to		
	ul		
	ulo		
	un	un khenyeng	
	uy		

ulo –	(i /) ka N		
	(i)la_to		
	(i)na(-ma)		
	(i)ya	(i)ya mal_lo	
	kkaci		
	mace		
	man		
	pota		
	puthe	puthe (i /) ka	
	se	se mankhum	
		se (i)ya	
		se (i /) ka	
		se pota	se pota to
		se to	
		se (n)un	
		se uy	
	sekken		
	to		
	(n)un		
	uy		

6.5.2. List of particle sequences arranged by latter member.

– ccum	chelem	
	eykey	
	kkaci	
	kwa	
	sekken	
	ssik	

– chelem	ccum	
	ey	
	eykey	
	kwa	
	mankhum	
	se	ey se
		eykey se
	ssik	

– cocha	ccum	
	chelem	

		ey		
		eykey		
		kkaci		
		kwa		
		(mace)		
		puthe		
		se	ey se	
			eykey se	
		sekken		
		ssik		
		ulo		
− ey				
		ccum		
		cocha [rare]		
		kkaci		
		kwa		
		man		
− eykey		mata		
		(ccum)		
		(mata)		
		ssik		
− i / ka				
		ccum		
		cocha		
		ey		
		eykey N		
		kkaci	?ccum kkaci	
		kwa		
		mace		
		man	eykey man	
		mankhum		
		mata		
		puthe	ccum puthe	
			(cocha puthe)	
			eykey puthe	
			mace puthe	
			se puthe	ey se puthe
				eykey se puthe
			ulo puthe	
		se N	ey se N	
		ssik		
		ulo N		

NOTE: Also found is **kkey se ka**.

− ila_to		ccum	chelem ccum	
		chelem		
		cocha		
		ey		
		eykey		
		kkaci	?ccum kkaci	chelem ccum kkaci

	kwa	
	mace	
	man	ccum man
		kkaci man
		mankhum man
		ssik man
	mankhum	
	pota	
	puthe	
	se	ey se
		eykey se
	ssik	ccum ssik
	ulo	
– (i)na	ccum	
	chelem	
	cocha	
	?ey	ccum ey
	eykey	
	kkaci	
	kwa	
	man	
	mankhum	ccum mankhum
	mata	
	puthe	
	se	
	ssik	
	ulo	
– (i)na-ma	ccum	
	chelem	
	ey	
	eykey	
	kkaci	
	mace	
	man	eykey man
	pota	
	puthe	
	se	ey se
		eykey se
	ssik	
	ulo	
– (i)n_tul	ccum	chelem ccum
	chelem	
	ey	
	eykey	
	?kkaci	ccum kkaci
	mace	
	man	
	?mankhum	chelem mankhum

	puthe		
	se	ey se	
		eykey se	
	ssik		
– (i)ta(_ka)	ey		
	eykey		
	ulo		
– (i)tun_ci	kkaci		
	se		
– (i)ya	ccum	chelem ccum	
		eykey ccum	
	chelem		
	cocha		
	ey		
	eykey	ccum eykey	
	kkaci	ccum kkaci	
	kwa		
	mace		
	man		
	mankhum		
	mata		
	pota		
	puthe		
	se	ey se	
		eykey se	
	sekken		
	ssik		
	ulo		
– khenyeng	chelem		
	ey		
	eykey		
	kkaci		
	mata		
	pota		
	puthe		
	se	ey se	
	sekken		
	ssik		
	un	ey (n)un	ey se (n)un
		mata (n)un	
		se (n)un	
		sekken un	
		ssik un	

– kkaci	ccum		
	chelem		
	ey		
	eykey		
	kwa		
	mata		
	se	ey se	
	sekken		
	ssik		
– (k)wa	ey		
	eykey		
	man		
	mata		
	se	ey se	kkaci ey se
		eykey se	
	ssik		
– mace	ccum		
	chelem		
	cocha		
	ey		
	eykey		
	kkaci		
	kwa		
	se		
		ey se	
		eykey se	
	sekken		
	ssik		
	ulo		
– mankhum	ccum		
	chelem		
	se	ey se	
		ulo se	
– mata	ccum		
	ey		
	eykey		
		ey se	
		ulo se	
– pota	ccum		
	ey		
	eykey		
	kwa		
	mata		
	puthe		
	se	ey se	
	sekken		

	ssik			
	ulo			
− puthe	ccum			
	ey			
	eykey			
	kwa			
	mace		ey se mace	
	mata			
	se	ey se		
	sekken			
	ssik			
	ulo			
− se	ccum			
	ey	ccum ey		
		mata ey		
	eykey			
	kwa [rare]			
	mata			
	puthe			
	ulo			
− sekken	ey			
	eykey			
	se	ey se		
	ulo			
− ssik	ccum			
− to	ccum			
	chelem			
	cocha	ccum cocha		
		kkaci cocha		
		mankhum cocha		
	ey			
	eykey			
	kkaci	ccum kkaci	chelem ccum kkaci	
	kwa			
	mace	ccum mace		
		kwa mace		
	man	eykey man	eykey se man	
	mankhum			
	mata			
	pota	ccum pota		
		se pota	ey se pota	ccum ey se pota
		sekken pota		
	puthe			
	se	ey se		
		eykey se		
		ulo se		

	ssik		
	ulo	ssik ulo	
– (l)ul	ccum		
	cocha		
	ey		
	eykey		
	kkaci	kwa kkaci	
	kwan		
	mace		
	man		
	mankhum		
	mata		
	puthe		
	sekken		
	ssik		
– (u)lo	ccum		
	cocha		
	ey		
	eykey		
	kkaci		
	kwa [rare]		
	man	?(kwa man)	
	mata		
	ssik		
– (n)un	ccum	chelem ccum	
		kkaci ccum	
	chelem		
	cocha		
	ey	kkaci ey	
	eykey		
	kkaci	ccum kkaci	
		ssik kkaci	
	kwa		
	mace		
	man	ccum man	eykey se man
		kwa man	
	mankhum		
	mata		
	pota	se pota	
	puthe	ccum puthe	
		se puthe	ey se puthe
	se	ey se	
		eykey se	
		ulo se	
	sekken		
	ssik	ccum ssik	

	ulo	kwa (u)lo	
		man ulo	kwa man ulo
– uy	ccum		
	cocha		
	ey		
	eykey		
	kkaci		
	kwa		
	mace		
	man		
	mata		
	pota		
	puthe	se puthe	ey se puthe
	se	ey se	
	sekken [rare]		
	ssik		
	ulo	ey (u)lo	
		eykey (u)lo	
		man ulo	

6.6. Sequences of ending + particle.

Some of the particles listed in §6.4 occur in quite limited environments, and a few are found only after verb forms. For example, **una / na** is found only after -**ulyem**, -**key**, and -**sey**; **ppun** and **son** (as particles) only after -**ta**; **kkwuna** only after -**ca**; **kwulye** (as particle) only after statement forms -**sup.nita** and -**ney** (and ilq sey = iney), suggestion forms -**upsita** and -**sey**, command forms -**usio** and -**key**; **la** only after the infinitive -ᵉ⁄ₐ. The particle that marks indirect quotation **ko** '(saying / thinking that ...)' is used after plain quotation forms -(**nun**)**ta** 'does / is', -**tula** 'was (doing it), I recall', -**ca** 'let's', -**la** 'do!'; after the intentive -**ulye** 'intending / wanting to do'; after the adjunctives -**nula** and -**ulla**; and after the postmodifier **ya** 'question' that appears in -**un ya**, -**nun ya**, -**tun ya**, ... Only a few verb forms are never followed by a particle, notably the sequential -**uni**, for the strings /-unipota/ and /-unimankhum/ represent -**un i pota / mankhum** with the particle attached to a modifier + the postmodifier **i** 'fact (that ...)'. Certain endings are followed by only a few particles or quasi-particles:

-**ule** / -**le** is followed by (**un /**)**nun**, **to**, **tul**, and (**ul /**)**lul**;
-**una** / -**na** is followed by **tul** and awkwardly by (**i**)**la to** and (**i**)**tun ci** (see also **ina tul** in Part II);
-**una-ma** is followed by **yo** and somewhat awkwardly by **to**;
-(**nun**)**ta** is followed by **ko**, **tul**, and **man**;
-**ney** is followed by **tul**, **man**, and **kwulye**;
-**so** / -**o** is followed by **tul** and **man**;
-**kwun** is followed by **a**;
-**keni** is followed by (**kwa /**)**wa**.

The particle **tul** '(acting) severally' can be inserted rather freely in verb phrases, but not even it can be inserted into the fixed sequences -**e la**, -**ta ppun**, -**ta kwulye**, and -**ca kkwuna**. Where **tul** goes is after the other particles in those cases, as well as in -**e yo** (**tul**) 'do / are severally' [polite] and -**ta ko** (**tul**) **hanta** 'says that they do / are'. Although -(**sup**)**nita tul** occurs, it cannot be quoted as such, even directly; there is no *-**ta tul hako** (or **ila ko**) **hanta**. And notice that it is NOUN **tul iyo** rather than *NOUN **iyo tul** in fragment sentences such as **Nwukwu tul iyo** 'Who all?' [polite].

Verb forms have not been found before the particles **eykey** 'to (a person)', **ssik** 'each', or **sekken** 'and the like', nor before the quasi-particle **ina-ma** 'at least, even'. Of these, **sekken** is the only one that is likely to turn up, if we keep looking. I was able to elicit the particle **mata** 'every' only after

-umye, and in an awkward example at that. The particle **uy** 'of' was elicitable only after the summative -**ki**; the particle **(k)wa** 'with' only after -**ki** or in extended particle phrases (§6.3) after the substantive ending -**um**. The poorer distribution of -**um** is unsurprising, for it is less colloquial than -**ki**.

The table on p. 215 shows the sequences found or elicited for most of the particles and quasi-particles after common verb endings. Sequences for which I have only awkward examples are indicated by "x" instead of "+". Sequences with the particle **i/ka** that seem to be available only when followed by the negative copula are noted by "N". The table is so arranged that the particles form a vertical axis, and are arrayed alphabetically by the postconsonantal shape as in earlier lists. The endings form the horizontal axis, and at the appropriate intersection each sequence discovered or elicited is indicated by a "+", those unfound by a "−". Notice that the list is largely limited to sequences of just ONE particle after an ending; there are longer sequences and they are not limited to those here shown in more detail for **se** only. We can find not only -**ki ey** but also -**ki ey to**, -**ki ey nun**, -**ki ey ya**, -**ki ey tul**, -**ki ey pota**, -**ki ey sekken**; not only -**ci yo** but -**ci yo man** and -**ci yo man un**. And many cases of ending + **man** can be followed by **un** or **to**.

6.7. Some consequences of particle distribution.

When we look at the particle sequences found after nouns and after verb forms, certain things come to our attention. The particle **se** is frequently preceded by the particle **ey** after nouns; often the same expression may be said with or without the intervening **ey**, the meaning unchanged. But in some cases, including the summative -**ki** and the substantive -**um**, the expression is awkward (or unheard of) without the intervening **ey**. In other cases, such as the verb forms -**e se**, -**ko se**, and -**umyen se**, it is the intervening **ey** that is unheard of. These facts, I think, are what leads the Korean grammarians (in disregard of **eykey se** and **hanthey se**) to set up a single particle **eyse** and treat **se** (after a noun) as an abbreviation of that particle. The **se** which occurs after verb endings is treated either as a separate particle or as part of an unanalyzed ending that is distinct from the form without the particle. (A case could be made that -**e** is an abbreviation of -**e se**, but no one has claimed that, so far as I know.) We can also see why the Korean grammarians would hesitate to accept **la** in -**e la** as a particle, since nothing can intervene between the infinitive and the particle, and **la** occurs as a particle only after the infinitive, which actually turns up in a variant "pre-**la**" shape after certain stems: **one la** for **wā la**, **kake la** for **ka la**, **iss.ke la** for **iss.e la**, ... (§8.3.6). In fact, -**e la** developed from MK -´(k)e-´la with the imperative ending attached to the bound stem that marked the effective aspect, and **one la** < ´wo-´na-´la contains a suppletive form of that aspect marker.

The grammarians' preferred treatment of some of the uses of -**ki ey**, -**ki lo**, -**um ey** (= -**umay**), and -**um ulo** as single unanalyzable endings, distinct from ending + particle, is supported by certain of the particle sequences. And their preference for treating the transferentive -**ta** as an abbreviation of an unanalyzed ending -**taka**, rather than analyzing that as the assertive -**ta** + particle **ka** (as it is here viewed), is perhaps supported by the recurrence of the particle **ka** in the sequence -**ta ka ka**, even though that is a by-product of the negative copula. (There are historical arguments against the analysis of -**ta ka**, too, but the matter remains open. See §9.8 and Part II; for MK accent evidence, see p. 71.)

The treatment of certain forms of the copula as particles is also supported by particle sequences. The "quasi-particles" included in the sequence tables occur freely in positions where other forms of the copula would be unusual or impossible. (We are, of course, here excluding from our discussions of distribution certain kinds of peripheral utterances, such as those that occur when talking ABOUT words.)

It will be noticed that certain "particles" after verb endings (**kwulye**, **kkwuna**, **una/na**, **la**, **son**, **ppun**) differ from particles after nouns in that no other particle is insertible, and that mutual insertibility was our ultimate criterion for being sure that an element after a noun really IS a particle. In a sense, what we do is to establish a class of noun particles on that basis, then we notice that some of these particles (**se**, **iya/ya**, **iyo/yo**, ...) also occur after verb endings, with greater restrictions, and finally we discover that a few other elements, still more restricted, seem to belong in the same class, because they occur after verb endings that are otherwise free.

TABLE OF VERB ENDINGS + PARTICLES AND QUASI-PARTICLES

	-ca	-ci	-e	-key	-ki	-ko	-ta_ka	-tolok	-tula	-ulye	-umye	-umyen	-um
ccum	–		+	+	+	X		+	–	–	–	–	–
chelem	–	–	–	–	+	–	+	–	–	–	–	–	–
cocha	X	–	+	+	+	X	+	+	–	+	+	–	+
ey	–	–	–	–	+	–	–	–	–	–	–	–	+
i / ka	N	+	–	+	+	+	N	N	–	–	N	N	+
(i)la_to	–	–	+	+	+	+	+	–	–	+	+	–	+
(i)na	–	+	+	+	+	+	+	+	–	+	+	+	–
(i)n_tul	–	?	+	+	+	+	+	+	–	+	+	+	+
(i)ta_ka	–	–	+	–	–	–	–	–	–	–	–	–	–
(i)tun_ci	–	–	+	–	–	+	+	+	–	+	+	–	–
(i)ya	+	+	+	+	+	+	+	+	–	+	+	+	–
(i)yo	–	+	+	+	+	+	+	–	–	–	–	–	+
khenyeng	+	–	–	+	+	+	+	+	–	+	+	+	+
kkaci	+	+	+	+	+	+	+	+	–	+	+	–	–
kwa / wa	–	–	–	–	+	–	–	–	–	–	–	–	–
mace	–		+	+	+	+	+	+	–	+	+	–	–
man	+	+	+	+	+	+	+	+	+	+	+	–	–
mankhum	–	–	–	–	+	–	–	+	–	–	–	–	–
pota	–	–	–	–	+	+	–	+	–	–	+	–	+
puthe	+	+	+	+	+	+	–	+	–	+	+	–	+
se	–	–	+	–	+	+	+	–	–	+	–	+	–[1]
se ka	–	–	N	–	–	+	–	–	–	–	+	N	–
se 'la_to	–	–	+	–	–	+	–	–	–	+	+	–	–
se 'na	–	–	+	–	–[2]	+	–	–	–	–	–	+	–
se 'n_tul	–	–	+	–	–[2]	?	–	–	–	–	–	N	–
se 'tun_ci	–	–	+	–	–[2]	+	–	–	–	–	–	–	–
se ya	–	–	+	–	–[2]	+	–	–	–	–	–	+	–
se man	–	–	+	–	–[2]	+	–	–	–	+	–	+	–
se puthe	–	–	+	–	–[2]	+	–	–	–	–	–	+	–
se to	–	–	+	–	–[2]	+	–	–	–	–	–	+	–
se nun	–	–	+	–	–[2]	+	+	–	–	–	–	+[3]	–
to	–	+	+	+	+	+	+	+	+	+	+	–	+
tul	+	+	+	+	+	+	+	+	+	+	+	+	–
ul / lul	–	+	+	+	+	+	–	–	–	+	–	–	+
ulo / lo	–	–	–	–	+	–	–	–	–	–	–	–	+
un / nun	–	+	+	+	+	+	+	+	–	+	+	+	+

[1] But -um ey se (···) occurs.

[2] Less awkward with ey inserted, but unlikely even so.

[3] Also -umyen se kkaci, -umyen se tul.

7.0. Forms: verbs.

In the following sections we examine various kinds of verbs (§7.1), bound verbs (§7.2), verbs with defective paradigms (§7.3), derived stems that are causative or passive (§7.4), auxiliary verbs (§7.5), and postnominal verbs (§7.6).

7.1. Kinds of verbs.

Each verb may be classed as transitive (vt) or intransitive (vi), though a few stems serve both functions: **kuchinta** (vi/vt) means either 'ends it' or 'it ends'. A verb that is sometimes preceded by a direct object is transitive. All transitive verbs are also processive so that the opposing category of descriptive is relevant only for intransitive verbs.

A semantic direct object may be marked by the accusative particle **ul/lul**, but that particle is also used to mark other roles. If we use the cooccurrence of an accusative-marked phrase to categorize "transitive" verbs, we will have to recognize what I have called PSEUDO-INTRANSITIVE verbs (pseudo-vi), which function like those intransitive verbs that are seldom, if ever, preceded by an accusative-marked phrase. The accusative phrase could still be treated as an object, but the object is limited to certain kinds:

(1) a noun showing the destination: **hak.kyo lul kanta = hak.kyo ey kanta** 'goes to school, attends school'.

(2) a noun showing the purpose: **kwūkyeng ul kanta = kwūkyeng ul hale kanta** 'goes to see it';

(3) as an object complement, the substantive form of the same stem (or other semantically and/or etymologically cognate objects): **cam ul canta = canta** 'sleeps (one's sleep)', **chwum ul chwunta = chwunta** 'dances (a dance)', **kel.um ul kēt.nunta = kēt.nunta** 'walks (one's steps)', **kkwum ul kkwunta** 'dreams (a dream)', **wus.um ul wūs.nunta** 'laughs (a laugh)' (CF **sālam uy musik ul wūs.nunta** 'laughs at a person's ignorance', with a transitive use of the verb); *kichom kis.kwo* (1608 Twu-cip 1:10b; < *kich(i)-*) 'coughing (a cough)'. But notice that **kūlim ul kūlinta** 'draws (a drawing), paints (a painting)' and **cim ul cinta** 'bears a burden' are transitive verbs + tangible objects. There are also a few cognate subjects: **noph.i ka noph.ta** 'is high (in height)', **kiph.i ka kiph.ta** 'is deep (in depth)', **nelp.i ka nelp.ta** 'is wide (in width)', **khi ka khuta** 'is big (in bigness) = is tall (in stature)', **kil.i ka kīlta** 'is long (in length)'.

(4) an expression of duration: **sahul ul onta** 'comes for three days'.

(5) an expression of order or number of times: **ches-ccay lul kanta** 'goes first', **sēy pen ul kanta** 'goes three times'.

(6) a place traversed or a path traveled: **kang ul kēnne kanta** 'goes across the river', **kil ul kel.e kanta** 'walks (along) the road', **unhayng ul cīna kanta** 'passes the bank'.

(7) a quantified distance traversed: **chen-li lul ttwinta** 'leaps a thousand leagues'.

(8) an affected part of the body: **tali lul cēnta** 'limps (in a leg)'.

(9) substituting for some other particle in an unusual paraphrase: **swul ul chwī hanta = swul ey chwī hanta** 'gets drunk on liquor'. (But many, I am told, reject **ul** and prefer **swul i chwī hanta**).

Quite a few intransitive verbs take accusative-marked objects in specialized figurative senses, such as **su-** 'stand' in **aph-cang ul su-** 'stand in the van (in the lead)' and **Keki l' susye ya toykeyss.nun ya** 'Must you stand there?' Usually we can say that **ul/lul** in these expressions is simply substituting for some other particle, typically **ey**, or for a larger construction.

A verb is INTRANSITIVE if it is never preceded by a (semantic) direct object: **nuc-** 'be late', **cwuk-** 'die', **anc-** 'sit down', **iss-** 'stay'. Each of the intransitive verbs falls into one of the following classes. A PROCESSIVE verb lacks the category of plain indicative assertive -**ta**, replacing it by the processive assertive -**nunta/-nta**, except in literary Korean and in set literary phrases used in the colloquial. All transitive verbs are processive, but some of the intransitives are DESCRIPTIVE verbs − here called ADJECTIVES (adj). The reference is not so broad as suggested by the corresponding English category, which includes not only predicated adjectives but also many attributive terms that are treated as nouns or adnouns in Korean.

An adjective lacks the following paradigmatic forms:

(1) processive forms – the processive modifier -nun, the processive assertive -nunta / -nta, and the processive adjunctive -nula;

(2) the intentive (-ulye / -lye) and purposive (-ule / -le) forms;

(3) subjunctive forms – the subjunctive attentive (= imperative) -ula, the subjunctive assertive (= hortative or propositive) -ca, ...

But the subjunctive assertive -ca occasionally occurs in the meaning 'as soon as' even with adjectives, as in **nal i ttattus haca** 'as soon as the weather is warm', and in the meaning 'as well as (being)' even with the copula (see **ica** in Part II). And adjective stems sometimes appear in the construction -e la, normally expressing a plain command, but here carrying an exclamatory meaning 'is indeed': **Ai komawe la!** 'Heaven be praised! Thank goodness!', **Cham ulo tal.e la!** 'How sweet it is!', **Ai koso hay la!** 'Serves you right!'. Compare the copula form **ila**. It is unclear whether the bound particle **la** in the two meanings of -e la is a single etymon or has separate origins, nor do we know whether it comes from a reduction of the copula form in one or both of these usages, to say nothing of the imperative ending -ula / -la itself. Moreover, a few adjectival-noun constructions appear as genuine commands (-e la) and propositions (-ca), and in the intentive -ulye and purposive -ule forms. Acceptable examples are given by CM (1:425, 428-9, 435) for **chwungsil** 'being faithful', **co'.yong** 'being quiet', **täytam** 'being bold', and **minchep** 'being alert'. Co Sek.yen tells me she will accept **chwungsil hay la**, **chwungsil halye hanta**, etc., but rejects such forms as **chwungsil hale kanta** 'goes for the purpose of being faithful', a situation more processive in nature than 'goes with the intention of being faithful'. These few exceptions can simply be handled as semantic extensions or as abbreviations of some processive structure (with the meaning of 'acting, behaving' rather than 'being').

The COPULA (cop) is a descriptive verb (an adjective) which almost never occurs after pause, for it predicates a noun or noun phrase, with the meaning of 'it is – ', 'it is a case (instance, kind) of – ', 'it is identified or specified as – ', or (after a nominalization) 'it's that – '. The stem is **i-** (defective literary variant **ilo-**, defective formal variant **iolssi-**) after a consonant. After a vowel the initial /i/ is usually shortened to zero, i.e. dropped, when a consonant follows, as in **pata 'ta = pata ita** 'it's the sea'; when a vowel follows, the stem vowel is reduced to y-, as in **pata yess.ta = pata iess.ta** 'it was the sea', **pata ye (se) = pata ie (se)** 'it's the sea (and ...)'. In written Korean the **i-** after a vowel may or may not be reduced or dropped, but a full vowel syllable is usually written in forms that would otherwise leave a single consonant stranded: **im** (substantive), **in** (modifier), **il(q)** (prospective modifier). CF Mkk 1960:5:27. In addition to the various limitations of the adjective with respect to inflectional endings, the copula also lacks the projective and adverbative forms: we find no occurrences of *itolok 'to the point where it is – ' or *ikey 'so that it is – ', though Middle Korean had the expected forms.

At least fourteen stems underlie complete paradigms as both processive and descriptive verbs:

cala- 'reach, grow; be sufficient, enough'	**mac-** 'tally; be correct'
etwuw-[1] 'get dark; be dark'	**mulu-** 'get soft; be soft'
ha- 'do; be'	**nä(s)-** 'get better; be better'
huli- 'get cloudy; be cloudy'	**nuc-** 'get late; be late'
khu- 'get big; be big'	**nulk-**[3] 'get old; be old'
kiph-[2] 'get deep; be deep'	**palk-** 'get bright; be bright'
kwut- 'get hard; be hard'	**pulk-** 'get red; be red'
kyëysi- 'exist; stay' [honorific]	**tëlew-**[1] 'get dirty; be dirty'

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[1] Some speakers reject **etwuw-** and **tëlew-** as processive verbs. Examples: **Nal i etwup.nunta – ppallay lul ketwe la** 'It's getting dark – gather the laundry up'; **Keki anc.ci mala – os i tëlep.nunta** 'Don't sit there – you'll get your clothes dirty'.

[2] Apparently **kiph-** is processive only in **pam i kiph.ess.ta** 'the night has deepened', perhaps by analogy with **nuc.ess.ta** 'it has gotten late'.

[3] For some speakers, at least.

With less predictable differences in meaning, certain SHAPES represent both processive verbs and adjectives: **kolu-** 'is even' or 'makes it even', **pet-** '(tooth) is protruding' or 'it stretches out; stretches it out', ... (See Appendix 1.)

The intransitive verbs **iss-** 'stay; exist, be located; have', **ēps-** 'not exist; not have', and tense markers deriving from **iss-** (the past **-ess-** and the future **-keyss-**) have all the processive forms EXCEPT the processive assertive, but **iss.nunta** occurs in the meaning 'stays' with the negative forms **mōs(q) iss.nunta** and **an iss.nunta** (see §11.7.3). For a plain-style statement 'exist, is (at); has' you use **iss.ta** not (*)**iss.nunta** and **ēps.ta** not *ēps.nunta. Yet in all meanings the processive modifier forms **iss.nun** and **ēps.nun** are more common than the simple modifiers **iss.un** and **ēps.un**, which they have largely replaced in standard speech. (But the simple modifiers are found in Phyengan; see Part II.) The preceding description is inadequate for modern Seoul speech ([1]Yi Tongcay 1990), which differentiates **iss-$_1$** 'stay' from **iss-$_2$** (the other meanings) and treats it as a regular intransitive verb that shares most but not all of its paradigmatic forms with the quasi-processive verb. To reconcile the two descriptions, we might suggest that there are speakers, or at least writers, who replace **iss.nunta** 'stays' with the shorter **iss.ta** (which also has the other meanings), perhaps obligatorily in certain situations, such as quotations, and optionally in others, such as negatives. For ¨eps- the MK texts attest both the modifier ¨ep˙sun and (more often) the processive modifier ¨ep˙non; the predication can be negativized as ¨ep˙ti a˙ni ˚ho-, but I have not found *a˙ni ¨eps-. For the stem is(i)- the modifier is isin, the prospective modifier is isil(q); the processive modifier is is.non and its modulated form is is˙nwon. The predication can be negativized as is˙ti a˙ni ˚ho-, but I have not found (?*)a˙ni is(i)-. Examples of the Middle Korean forms will be found under their entries in Part II.

The past is simply **-ess.ta** and the future **-keyss.ta**, irrespective of whether the stem is processive or descriptive. These stems and markers seem to lack any use of the subjunctive forms, the intentive, or the purposive, except for **iss-** itself in the meaning 'stay', and they are not common even for it. These verbs and bound auxiliaries (the tense markers) can be called quasi-processive in their behavior; we will label them quasi-verbs intransitive (qvi). Ceng Insung 1960:262-3 neatly describes **iss-** as "a verb that lacks the form *iss.nunta" (but that is not true of modern Seoul speech) and **ēps-** as "an adjective that has the extra form **ēps.nun**". He says that the honorific **kyēysi-** is like **iss-**, yet I find that both **kyēysita** and **kyēysinta** are used for the plain present. The stem **ēps-** occurs in the construction **-e cinta** 'gets to be', normally limited to adjective stems though there are a few cases with intransitive processive verbs (see the entry in Part II); *iss.e cinta does not occur. Notice that **ēps-** has the derived adverb form **ēps.i** (< ¨ep˙si) 'without', but (*)**iss.i** (*i˙si) 'with' occurs only in dialects (p. 584).

The stem **iss-** is particularly tricky; see p. 319 for evidence that it should be treated as three homonyms 'stays', 'is', and 'has'. In the meaning 'is' and 'has', the appropriate auxiliary for such nuclear focus conversions as V$_1$-ki nun ha- = V$_1$-ki nun V$_1$- is the descriptive **hata** (with the modifier **han** and not **hanun**), but in the meaning 'stays' the processive **hanta** (with the modifier **hanun**) is called for: **Cip ey iss.ula 'ni-kka iss.ki nun hanta man un ku sālam i olq ka?** 'Told to stay home, I do stay home but will he come?'; **Ku palam-cayngi ka cip ey kakkum iss.ki to hanun kes ul kkwum ey to mōllass.ta** 'I didn't even dream that playboy would stay home every now and then, too'. Japanese, on the other hand, uses the auxiliary <u>suru</u> (its counterpart of **hanta**) for a˥r- 'be' and 'have' as well as for [w]o˥r- or [w]i- 'stay': a˥ri / [w]o˥ri wa suru.

A CAUSATIVE verb (vc) is a transitive verb which is a member of a pair of stems that are related in shape. The other member of the pair is active: either transitive or intransitive, and if intransitive either processive or descriptive. The causative stem differs from the active stem by the suffixing of a causative formative, which has several different shapes (§7.4). Such verbs are LEXICAL causatives that must be listed in the dictionary; they are not freely derived. But most verbs can freely participate in a syntactic structure we will call the PERIPHRASTIC causative (**-key hanta**, etc.). On similarities and differences between these two kinds of causative, see §11.6.

A PASSIVE verb (vp) is a member of a shape-related pair, of which the active member is transitive and the passive member is usually an intransitive processive verb, but some passives take objects (see

§7.4, §11.6). The passive member is marked by a suffixed formative (§7.4). A CAUSATIVE verb is made by attaching a similar formative to the stem of an active verb, which may be intransitive or transitive. Reference here is to LEXICAL passive and causative verbs; they are listed in dictionaries, but you do not make up new ones. On the other hand, the periphrastic causative and passive structures are freely created as needed. See §11.6 for the voice conversions.

An AUXILIARY verb (aux) is used in close juxtaposition with some other verb, which is usually in the infinitive (-ᵉ⁄a) or gerund (-ko) form. The auxiliary conveys a somewhat different meaning from what its stem carries when it stands as an independent verb, if the stem can so be used. There are processive auxiliaries (= auxiliary verbs proper) and descriptive auxiliaries (= auxiliary adjectives). Some of the auxiliaries are SEPARABLE: a particle may intervene between the auxiliary and the verb form with which it is used. If nothing can intervene, the auxiliary is INSEPARABLE.

A POSTNOMINAL verb is a verb that is used in close juxtaposition with a verbal noun. SEPARABLE postnominal verbs (**ha-** 'be'; **ha-** 'do', **ka-** 'go', **sikhi-** 'cause', **toy-** 'become') are sometimes set apart from the verbal noun by a particle; INSEPARABLE postnominal verbs (**low-** 'be characterized by', **sulew-** 'be, give the impression of being', **taw-** 'be like'; **keli-** or **tāy-** 'behave so as to give the impression of') occur only right after the noun.

7.2. Bound verbs.

Certain verbs are always attached to some other verb, or to a noun. Among these BOUND VERBS, we can single out defective infinitives, bound adjectives, and bound postverbs (or verb suffixes).

7.2.1. Defective infinitives.

Most of the defective infinitives, recognizable by the characteristic infinitive ending -e⁄-a (§9.4), often preceded by -(u)l- (which seems to be some sort of formative), are inseparably attached to the auxiliary verbs **ci-** (vi) and **ttuli-** (vt):

ekule 'dislocate, go against'	**pekule** 'split, separate'
hay(e) 'wear (out)'	**pule** 'break'
hune 'demolish; collapse'	**pulke** 'bulge out'
kasule 'bristle'	**sakul**ᵉ⁄a 'collapse, wither'
(k)kopulᵉ⁄a 'bend'	**sosul**ᵉ⁄a 'frighten, startle'
okule, wukule 'curl up, warp; break'	**ssule** 'topple'
pasule, pusule 'break'	**thute / ttut.e** 'tear' [dialect] (= the < thu-)

But **(k)kiwul.e** (ci- / ttuli-) 'tilt' is the infinitive of an adjective **(k)kiwu-l-** 'tilted, aslant', and **mune** (ci- / ttuli-) 'demolish' is the infinitive of the transitive verb **mun(u)-** 'demolish'.

Five defective infinitives serve as verbal or adjectival nouns predicated by the postnominal verb/adjective stem **ha-**:

ile 'being / doing like this, so'	**ette** 'being / doing what way, how'
kule 'being / doing like that, so'	**āmule** 'being / ?doing any way'
cele 'being / doing like that, so'	

The verbal use ('doing') for the first four was not present for the corresponding MK forms ˙i˙le, ku˙le, ˙tye˙le, ˙̈es˙te, and ˙̈a˙mo˙la (which is attested in very few forms), and it largely went unnoticed until quite recently.

Only two defective infinitives seem to have other (also inseparable) attachments: **kule** 'dragging, pulling' — apparently from an unattested variant of **kkul.e** 'pulling' (coming from a formation made on the prospective modifier *ku[z]ul(q)* of MK *kuz-*), in **kule mou-** 'rake up', **kule tangki-** 'gather and pull', **kule cap-** 'grasp, clutch', ... ; and **wule** 'coming off and/or up', which is probably an abbreviation of **wulele** ← **wulelu-** 'lift one's head up', in **wule na-** 'soak out', and **wule na-o-** 'spring / well up'. We might want to include here certain elements of obscure or aberrant etymology such as **kala-**(anc- 'sink'); **kalma-**(tu-l- 'alternate'); **kelme-**(ci- 'shoulder, bear'); **kelthe-**(anc- 'sit astride', **tha-** 'mount astride', **tul.i-** 'bring it all in', **mek-** 'gobble it all up'); **p**ᵉ⁄**alke-**(pes- 'strip naked'); **cwuce-**(anc- 'slump, fall, cease').

The Hankul orthography treats none of these bound elements as infinitives, so it fails to set off the -^{e}a ending in any of them, and our Romanization neglects the boundaries, too.

7.2.2. Bound adjectives.

Certain elements, usually treated by Korean grammarians as suffixes, derive adjectives from inflected stems (and, in some cases, bound nouns). They are described in these entries of Part II:

> -ta(h)-, -tala(h)- 'be rather ··· '
>
> -a(h)- / -e(h)- 'be rather ··· '
>
> -tama(h)-, abbreviation of -tama ha- (bound adjectival noun, §5.6.5)
>
> -ep- (variants -up-, -ap-) / -p- = -ew- (-uw-, -aw-) / -w-
>
> -pu- (derives adjectives from adjectives, verbs, bound nouns)

7.2.3. Bound postverbs.

By bound postverb we refer to certain formatives that are suffixed to verb stems to form new stems, usually intensive, causative, or passive:

INTENSIVE	-chi-	-li-
	-chwu-	-lu-
	-khi-	
CAUSATIVE, PASSIVE	-chwu-	-li-
	-hwu- (spelled -chwu-)	-(i)wu-
	-chi-	-wu-
	-i-	-kwu-
	-hi-	-ay-
	-ki-	-y-
	-ukhi-	-u-
	-ikhi-	

For details and examples, see Part II and also §7.4, §11.6.

We might wish to consider as "bound postverbs", too, the past and future markers (-ess- etc. and -keyss-) that I have chosen to include with the endings for the following reason. These elements occur only before some, but not all, of the final "mood" endings, unlike the other elements we are calling bound postverbs. Moreover, the tense markers attach freely to ALL stems, unlike the bound postverbs, for which the stems must be individually specified. It is this last criterion alone which excludes from the bound postverbs the honorific marker -usi-, for it occurs freely before all the mood endings, as well as before the tense markers. A final criterion would be simply one of sequence: whatever the decision, we will see that the bound postverbs making intensives, causatives, and passives occur in a position BEFORE the series of positions described for the verb endings in §9.1.

7.3. Defective verbs.

Several verbs occur in only a few of the paradigmatic forms:

tă-l- 'request' → tao, tăko (tăkwu), tălla (notice that tălla 'nta is an abbreviation of tălla ko hanta); on the irregularity of the forms, see Part II

tepu-l- 'accompany' → tepulko, tepul.e (se)

kalo- 'say' → kalotoy

(··· ulo) malmiam- (§6.3) → malmiam.^{e}a (se), malmiam.un

chamq ta(la)h- 'be gentle' → chamq ta(la)h.key

Choy Hyenpay 1959:338-9 also includes a bound infinitive taka '(drawing) near' from a supposed *tak-, but there is no reason not to consider this to be just the expected literary or dialect variant infinitive of taku- 'bring (draw) close', for which the normal colloquial infinitive in Seoul is take. To be sure, taku- itself probably comes from *tak- (> tah- 'touch, arrive, ... ') + the causative postverb -u-, but we can ignore the etymology in our synchronic description. To the contrary, Choy Hyenpay 1960 (Hankul 127:7-27). See also the note on -ta (ka) in Part II.

Certain intransitive verbs or phrases with the meaning 'gets to be' occur only in the past or in the simple modifier form, and these are sometimes mistaken for adjectives, since the usual translation of 'has gotten to be' is 'is'. Proof that they are not adjectives is that the past is necessary to give the present resultative meaning: **cal nass.ta** 'is nicely formed', **mŏs nass.ta** 'is ugly', **sēylyen toyess.ta** 'is refined'. A few expressions are treated, apparently in free variation, as either intransitive processive verbs or as adjectives: **pāla cyess.ta** or **pāla cita** 'is shallow'; perhaps **pyel nass.ta** (? – rejected by Co Sek.yen) or **pyel nata** 'is odd'. On the other hand, there are some cases which appear only as adjectives: **emcheng nata** 'is enormous', **mo nata** 'is angular = is difficult in personality', **ttwukpyel nata** 'is quick-tempered'. KEd treats **hoth ci-** and **hwumi ci-** as the intransitive 'become simple' and 'form a bend; get deep / secluded', but both NKd and LHS cite them as adjectives.

The variant copula stems **ilo-** and **iolssi-** are also defective; see Part II. I am not quite sure why LHS lists **māta-** 'reject, abhor' as a defective transitive verb. The entry in Kim Minswu and Hong Wungsen's dictionary has **māta-** simply "transitive". NKd does not list the verb, which might be thought to come from a contraction of *mā ha-ta with the infinitive of the MK adjective "ma- 'dislikable, disliked', a structure equivalent to modern **silh.e hanta** 'dislikes'. But the lone MK example is *CAY-"MYEY 'lol "mata 'khesi 'nol* 'though he treats the alms rice as despised' (1459 Wel 8:78a). If the structure is parallel to the **-e hanta** of modern Korean, then LCT was wrong in his citation form " "ma 'ta" for he should have used " "mata 'ta". If he took the structure to be ← "ma-[']ta ho- 'kesi 'nol* 'though he says / feels it is despicable', the entry citation is correct (but there is something odd about the accent). In that case, the transitive stem **māta-** derives from a contraction of the quotative structure **-ta (ha)-**. It is not clear just when the use of **hanta** to transitivize the adjective infinitive developed; it may be not be all that old. The only other use of "ma- cited by LCT is *ku lol mata kwos nekisimyen* 'if you regard it precisely as despicable' (1676 Sin.e 4:15a). Perhaps all these uses are semantic extensions of the verb *"ma[l] 'ta* 'desists', i.e. "rejects".

7.4. Causative and passive verbs.

There are related pairs of Korean verbs which differ in what is called VOICE. We find two major types: PASSIVE related to ACTIVE, and CAUSATIVE related to ACTIVE. The relationship is both semantic and formal. The underlying stem is usually the same, but the passive or causative includes a bound postverb (§7.2.3). Causative verbs (vc) are always transitive, and passive verbs (vp) are typically intransitive (= vpi) but some take a few objects so we will label them transitive passive (= vpt). The types of derivation can be seen from the following scheme:

vc	←	vt
	←	vi
	←	adj
vp(i)	←	vt
vpt	←	vt

One unusual case looks like a vp from a vi: **menci ka palam ey pullinta** 'the dust gets blown by the wind', CF **palam i pūnta** 'the wind blows' and the lack of a *palam i menci lul pūnta 'the wind blows the dust'. But the most appropriate derivation appears to be something like this: **(sālam i) menci lul pūnta** '(a person [etc.]) blows the dust' → **menci ka (sālam eykey) pullinta** 'the dust gets blown (by the person)' → [**palam ey (iss.ta)** '(it is) in the wind' →] **menci ka palam ey pullinta** 'the dust gets blown in the wind = it blows in the wind'. A couple of similar cases are **kāmki (ey) tullinta** 'catches a cold' (= **kāmki ka tunta**), **tali lul tachinta** 'gets injured on the leg' from **tah.chi-** from **tah-** 'touch' (vi). (Most of the examples given by CM 1:273, however, seem to be in error.)

The transitive passives all seem to refer to unsought suffering:

cap.hi- 'have someone take (from one)' < **cap-** 'take': **pal ul cap.hinta** 'gets caught by the leg', **kyelqcem ul cap.hinta** 'has fault found with one'.

ccalli- 'get it cut' < **ccalu-** 'cut': **mok ul ccallinta** 'gets one's throat cut = gets fired'.

ccilli- 'get it pierced (stabbed, pricked)' < **ccilu-** 'stab'.

chayi- 'get kicked on/in' < chay- 'kick': kasum ul chayinta 'gets kicked in the chest' (compare
  kŏng i cal chayinta 'the ball kicks well').
cilli- 'get kicked in the ··· ' < cilu- 'kick'.
halth.i- /halchi-/ 'get it licked or swiped' < halth- 'lick'.
kkayi- 'get hit on' [dialect? − CF NKd 4231a] < kkay- 'hit': cengkangi lul kkayinta 'gets hit in
  the shin'.
kka(y)kk.i- 'get it scraped' < kkakk- 'scrape': sālam i nach ul kka(y)kk.inta 'a person gets his
  face scraped = loses face' − and that can also be said as sālam i nach i kka(y)kk.inta 'a person,
  his face gets scraped'.
mek.hi- 'have it eaten up': talun sālam hanthey tōn ul mek.hinta 'has one's money "eaten up" =
  gets swindled by another person'.
peyi- 'get cut on' < pēy- 'cut': sonq-kalak ul khal ey peyyess.ta 'got one's finger cut on a knife'.
ppāys.ki- 'have someone grab, suffer the loss of' < ppāys- < ppay-as- 'grab': kōngsan kwun
  hanthey Sānghay lul ppāys.kyess.ta 'suffered the loss of Shanghai to the Communist troops'.
ttelli- 'get stripped (= robbed) of' < ttē-l- 'shake off': tōn ul ttellinta 'is stripped of one's
  money'.

According to Song Sekcwung 1967:177, the transitive passive will occur only when there is a WHOLE-
PART relationship between the two nouns. Occasionally a causative is used with unexpected meanings
similar to those of the transitive passive: sēykan ul mocoli thaywunta '(burns up =) loses all one's
furniture in a fire'.

The basic meaning of most causative verbs is something like 'makes it so that something happens
or is'. There is no good general translation in English, which offers a choice of 'makes someone do it',
suggesting force and coercion, or 'lets someone do it', suggesting permission to do something the other
person wants to do. The expressions 'has someone do it' and 'gets someone to do it' are ambiguous,
for they can translate causatives, passives, or simple favors. The Korean causative implies neither force
nor permission. Only from the context can you tell whether the act someone is caused to perform is
something he wants to do, or something he is forced to do.

The basic meaning of most passive verbs is something like 'gets so that something happens to it or
might happen to it'. Often the meaning of a Korean passive verb has some extra flavor of AVAILABLE
or POTENTIAL undergoing of an action. Compare san i pointa 'the mountains can be (are available to
be) seen − whether anyone is looking or not' with san ul ponta 'the mountains are seen; someone sees
the mountains'. Similar examples (CM 1:328) are yeki se nun koki ka cal cap.hinta 'a lot of fish are
caught here' and i mun un swīpkey yellinta 'this door opens easily (is easily opened)'. In English we
often use passives to avoid committing ourselves to the identification of the subject. In Korean the
device is unnecessary for that purpose, since an overt subject is not required by Korean sentences.

For more on the syntax of causatives and passives, see §11.6.

The morpheme for the causative bound postverb has several shapes which are identical with the
shapes of the passive. As a result, convergence sometimes produces homonymous causative and
passive forms from the same active stem:
  anki- vp 'get embraced', vc 'embrace' ← ān- vt 'embrace'
  cap.hi- vp 'get caught', vc 'cause to catch' ← cap- vt 'catch'
  ep.hi- vp 'get carried', vc 'cause to carry' ← ep- vt 'carry (on back)'
  halth.i- /halchi-/ vp 'get licked', vc 'cause to lick' ← vt halth- 'lick'
  ilk.hi- vp 'get read', vc 'cause to read' ← ilk- vt 'read'
  kkakk.i- vp 'be cut', vc 'cause to cut' ← kkakk- vt 'cut'
  kwup.hi- vp 'get broiled', vc 'make someone broil' ← vt kwūw- 'broil'
  mulli- vp 'get bitten', vc 'cause to bite' ← mu-l- vt 'bite'
  palp.hi- vp 'get stepped on', vc 'cause to step on' ← vt pālp- 'step on'
  poi- (pŏy-) vp 'be seen', vc 'cause to see, show' ← vt po- 'see'

silli- vp 'get loaded', vc 'cause to load' ← sīt-/sil- vt 'load, carry'
simki- vp 'get planted', vc 'cause to plant' ← sīm- vt 'plant'
ssip.hi- vp 'get chewed', vc 'cause to chew' ← ssip- vt 'chew'
ssui- vp 'get used; get written', vc 'cause to use; cause to write' ← ssu- 'use; write'
ttut.ki- vp 'get bitten', vc 'cause to graze' ← ttut- 'bite, graze'
tulli- vp 'get heard', vc 'cause to hear' ← tut-/tul- 'hear'

These homonymous pairs of causatives and passives are not differentiated by accent or vowel length in standard speech, despite what is said in CM 1:275-6. CF Ceng Insung 1960:92-3.

In certain stems we find a string that could be representing one of these two formatives, but either there is no underlying active counterpart to justify an analysis like sik-hi- for sikhi- 'cause' (can we perhaps analyze the stem as s-ikhi- and take s- to be an allomorph of ha-?); or, if there is an underlying form (tul-li- = tul-lu- 'drop in', tu-l- 'enter') the syntactic relationship between the two does not correspond to that expected for voice-related pairs. Verbs of this sort lead us to recognize another derivative bound postverb that happens to be of the same shape as the causative. It might be appropriate to treat some of the odd cases of passives formed on intransitives in the same way. There is also tuli- 'give to a superior', which is historically a causative formed on tu-l- 'hold up'.

The passive and causative bound postverbs have so many shapes in common that we will consider them together. The shapes divide into two thematic groups: (1) those which include the PHONEME i, and (2) those which include the phoneme wu (but not the phoneme i); there is also (3) an athematic group, in which we will include the reductions of i to y. Formatives with the wu theme (and, apparently, the athematic formatives) all form only causatives, with the possible exception of one questionable stem, puliwu- vp 'be employed' < puli- vt 'employ'. Formatives with the i-theme form both causatives and passives.

The shapes are listed below with critical examples given for each shape. C = causative, P = passive; T = transitive, I = intransitive, A = adjective (descriptive stem). The down arrow (↓) means the preceding string from the stem is omitted (deleted) when the formative is added, and the right arrow (→) means the stem string on the left is replaced by the string on the right; these are synchronic statements, not necessarily recapitulating the history of the formations. Notice that the two distinct origins of the modern ···lu-/···ll- stems (§8.3.1) are reflected in the derived stems: hulu-/hull- 'flow' makes the causative hulli- < hul˙l-i- 'make flow', and olu-/oll- 'rise' makes the causative olli- < wol˙G-i- 'raise'.

1. i theme (causative, passive)

-i-	cwuk.i- 'kill' (C) ← cwuk- 'die' (I)
	mek.i- 'feed' (C) ← mek- 'eat' (T)
	kiwul.i- 'tilt' (C) ← kiwu-l- 'be tilted' (A)
	noph.i- 'heighten' (C) ← noph- 'be high' (A)
	noh.i- 'get put' (P) ← noh- 'put' (T)
	nanw(u)i- = nanwe ci- 'be divided' (P) ← nanwu- 'divide' (T)
	hulli- 'make flow' (C) ← hulu-/hull- 'flow' (I)
-hi-	anc.hi- 'seat' (C) ← anc- 'sit down' (I)
	kkulh.i- 'makes it boil' (C) ← kkulh- 'boil' (I)
	kwup.hi- 'bend' (C) ← kwup- 'be bent' (A)
	ip.hi- 'cause to wear' (C) ← ip- 'wear' (T)
	mek.hi- 'get eaten' (P) ← mek- 'eat' (T)
(aw↓)-i-	akki- 'spare; value' (C) ← akkaw- 'is regretful; is precious' (A)
(wu↓)-hi-	kat.hi- 'be confined' (P) ← katwu- 'confine' (T)
-ki-	swumki- 'conceal' (C) ← swum- 'be hidden' (I)
	olm.ki- 'move it' (C) ← olm- 'move' (I)
	pes.ki- 'unclothe' (C) ← pes- 'take off, remove' (T)
	ccic.ki- 'get torn' (P) ← ccic- 'tear it' (T)

-chi-	kuluchi- 'ruin' (C) ← kulu- 'be wrong' (A)
	sos.chi- 'raise; exasperate' (C) ← sos- 'tower up, rise' (I)
	– But /sochi-/ could be treated as sos-hi-.
-ukhi-	il.ukhi- 'raise' (C) ← i-l- 'rise' (I)
-ikhi-	tol.ikhi- 'turn (head)' (C) ← tŏ-l- 'turn' (I)
···l-li- < -Gi-	alli- 'inform' (C) ← ā-l- 'know' (T)
	salli- 'let live' (C) ← sā-l- 'live' (I)
	mongkulli- 'make (grain) awnless' (C) ← mongku-l- 'be awnless' (A)
	phalli- 'get sold' (P) ← pha-l- 'sell' (T)
	olli- 'raise' (C) ← olu- / oll- 'rise' (I)

Almost unique: **pemulli-** 'be mixed' (P) and 'cause to mix' (C) **pemuli-** 'mix' (T). The form **pemuli-** was earlier *pe'muli-*, a causative ← *pe'mul-* 'whirl it (around)' (T) and 'tie it up' (T), surviving figuratively in **pemu-l-** 'be involved, mixed up in'. Apparently similar: **holli-** 'get infatuated' (P) ← **holi-** 'infatuate' (T). And **killi-** 'get raised' (< *kil'Gi- < *ki'l[u]-G-i-) is a late development.

2. wu theme (causative only)

-wu-	kkaywu- 'wake someone' (C) ← kkāy- 'come awake' (I)
	kel.wu- = 'fertilize' (C) ← kĕ-l- 'be fertile'
	tot.wu- 'raise it' (C) ← tot- 'rise' (I)
(u↓)-wu-	palwu- 'straighten' (C) [usually replaced by **palo cap-**] ← palu- 'be right' (A)
-chwu-	kot.chwu- 'straighten' (C) ← kot- 'be straight'
-(c)hwu-	nac.chwu- 'abase, make low' (C) ← nac- 'be low' (A)
	nuc.chwu- 'loosen; delay' (C) ← nuc- 'be slack; be late' (A),
	mac.chwu- 'spell' (C) ← mac- 'be correct' (A)
	cac.chwu- 'quicken' (C) ← cac- 'be incessant' (A)
	kac.chwu- 'prepare' (C) ← kac- = kaci- 'have' (T)
(u→ey)-wu-	seywu- 'make stand, establish' (C) ← su- 'stand' (I)
(ew→ey)-wu-	teywu- 'heat' (C) ← tew- 'be hot' (A)
-ywu- < -i-wu-	caywu- 'put to sleep' (C) ← ca- 'sleep' (I)
-kwu-	sos.kwu- 'make rise' (C) ← sos- 'spring up' (I)
	tot.kwu- 'make it higher', (= tot.wu-) 'raise it' (C) ← tot- 'rise' (I)

3. athematic (causative, passive)

-ay-	ēps.ay- 'eliminate; use up' (C) ← ēps- 'be nonexistent' (I) – but see p. 429!
-y-	nāy- 'put out' (C) ← na- 'emerge' (I)
	cāy- = caywu- 'put to sleep' (C) ← ca- 'sleep' (I)
	pŏy- = poi- 'show, let see' (C), 'get seen' (P) ← po- 'see' (T)
(u↓)-ey-	kĕnney- 'carry over' (C) ← kĕnnu- 'cross over' (T)
(h↓)-y-	tāy- 'bring in contact' (C) ← tāh- 'come in contact' (I)
-u-	kilu- 'raise' (C) ← kī-l- 'get big' (I) – see below

The voice-deriving bound postverbs should not be confused with the intensive bound postverb -chi-, which is morphemically related to the auxiliary verb **chi-** that is used after the infinitive as an intensifier. See Part II for examples of the postverbs, and compare Choy Hyenpay 1959:351. The intensive postverb seems to have the shape -chwu- in **tulchwu-** 'raise, expose, ...' (← **tu-l-** 'hold up; lift; cite'), but there is a dialect variant with the expected shape **tulchi-**, and there may be some connection with the obsolete verb **chi-** 'raise' (CF the bound preverb **tul-**); there is also **tulkhi-** 'get discovered, caught', a specialized use of a passive from the same **tu-l-**. I have not included -chwu- among the shapes of the intensive, but the -li- / -lu- of **tulli-** / **tullu-** 'drop in' (← **tu-l-** 'enter') is there. The -khi- of **tulkhi-** is not listed, only the causative -ikhi- (probably < -i-khi-) and -ukhi-.

Some of the complications of shape are the result of phonological changes from earlier forms. The Middle Korean causatives and passives were made with these formatives:

-ˈi-	cwuˈki- 'kill' (C) ← cwuk- 'die' (I)
	meˈki- 'feed' (C) ← mek- 'eat' (T)
	nonˈhwoi- 'get divided' (P) ← nonˈhwo- 'divide' (T)
	naˈhi- 'cause to give birth to' (C) ← nah- 'bear' (T)
	ilˈhi- 'cause to lose' (C) ← ilh- 'lose' (T)
	hulˈli- 'make flow' (C) ← hulu- / hull- 'flow' (I)
	wolˈGi- 'raise' (C) ← wolo- / wolG- 'rise' (I)
-(ˈ)y-	¨cay- 'cause to sleep' (C) ← °ca- 'sleep' (I)
	¨nay- 'cause to emerge' (C) ← °na- 'emerge' (I)
	¨kenˈney- 'carry it over' (C) ← ¨kenˈne- 'cross over' (I)
	¨pwoy- 'cause to see' (C), 'gets seen' (P) ← °pwo- 'see' (T)
	¨syey- 'cause to stand' (C) ← °sye- 'stand' (I)
-ˈki-	swumˈki- 'conceal' (C) ← ˈswum- 'lie in hiding' (I)
	wolmˈki- 'move it' (C) ← ¨wolm- 'move' (I)
	pesˈki- 'unclothe' (C) ← pes- 'remove, strip off' (T)
-ˈhi-	anˈchi- 'cause to sit' (C) ← anc- 'sit' (I)
	caˈphi- 'cause to catch' (C), 'get caught' (P) < cap- 'catch' (T)
	elˈkhi-, elkˈkhi-, elqˈkhi- = elˈkhi- 'get tied' (P) < elk- 'tie' (I)
	meˈkhi-, mekˈhi-, mekˈkhi- 'get eaten' (P) < mek- 'eat' (T)
	niˈphi-, nipˈhi- 'cause to wear' (C) < nip- 'wear' (T)
	paˈkhi-, pakˈhi- 'get stuck / printed' (P) < pak- 'stick in / on, print' (T)
	patˈhi- 'cause to get' (C) < pat- 'get' (T)
	twotˈhi- 'cause to rise, raise' (C) < twot- (I)
-ˈGi-	moyngkolˈGi- 'cause to make' (C) ← moyngˈkol- 'make' (T)
	mulˈGi- 'get bitten' (P) ← mul- 'bite' (T)
	nolˈGi- 'cause to fly' (C) ← nol- 'fly' (I)
	salˈGi- 'cause to live' (C) ← ¨sal- 'live' (I)
	skolˈGi- 'get spread' (P) ← ˈskol- 'spread' (T)
	tulˈGi- 'cause: to hear, to enter, to lift' (C)
	kilˈGi- 'increase it' (C) ← ¨kil- 'get big' (I)
	twolˈGi- 'cause to turn' (C) = twolo- ← ¨twol- 'turn' (I)
-ˈGwᵁ⁄ₒ-	elˈGwu- 'cause to freeze' (C) ← ¨el- 'freeze' (I)
	meˈmulGwu-, meˈmulGwo- 'cause to stay' (C) ← meˈmul- 'stay' (I)
	meyˈGwu- 'cause to shoulder' (C) ← ¨mey- 'shoulder' (T)
	sulˈGwu- 'cause to vanish' (C) ← ˈsul- 'vanish' (I)
	tuˈliˈGwu-, tuˈliˈGwo- 'cause to hang down' (C) = tuˈli- (T)
	twolˈGwo- 'cause to turn' (C) = twolo- / twolG- ← ¨twol- 'turn' (I)
	kilˈGwu-, kilˈGwo-, kilˈGwuy- 'raise' (C) = kilᵁ⁄ₒ- ← ¨kil- 'get big' (I)
-ˈGwᵁ⁄ₒy-	¨nilGwuy- 'cause to reach' (C) ← niˈlu- = niˈlul- 'reach' (I)
	alˈGwoy- 'inform' (C) ← ¨al- 'know' (T)
-ᵁ⁄ₒ- < *-G-	kilᵁ⁄ₒ- / kilG- < *kilᵁ⁄ₒ-G- 'raise' (C) ← ¨kil- 'get big' (I)
	twolo- / twolG- < *twolo-G- 'cause to turn' (C) ← ¨twol- 'turn' (I)

The vowel of -ˈGwᵁ⁄ₒ- may represent an incorporation of the modulator -ˈwᵁ⁄ₒ-; if so, the etymon of the formative was simply -G-, as indicated also by -ᵁ⁄ₒ- < *-G-. The infinitives of the last two examples are kilˈGe (1465 Wen 1:1:1:111a) and tolˈGa (1447 Sek 6:4b); CF kilˈGwe (1447 Sek 9:17a) and twolˈGwa (1632 Twusi-cwung 16:56b) = twolˈGa (1481 Twusi 16:55b), twolˈGye (?1517- Pak 1:21b) — from twol-ˈGi- (> tolli-). But ¨ep.siˈWa (1449 Kok 155), ¨ep.siˈWozoˈWa (1459 Wel 17:77a), and ¨epˈsiWoˈn i (1459 Wel 23:65b) indicate a labial *-i-pᵁ⁄ₒ- (echoing the p of ¨eps-?).

7.5. Auxiliary verbs.

Auxiliary verbs are used in construction with preceding verb forms, most often the infinitive -e or the gerund -ko; less often the suspective -ci, the adverbative -key, the transferentive -ta, and the unusual cases of 34, 45, and 46 in the lists below. In these lists all the auxiliary descriptive verbs (= auxiliary adjectives) are segregated from the auxiliary processive verbs (= auxiliary verbs proper), and each auxiliary is preceded by an indication of the category of verb form with which it enters into a construction: the letters A (adjective), C (copula), and V (processive verb) represent the stem before the "-..." that designates the ending. With some misgivings I offer tag translations for the auxiliaries, but the reader is urged to look up the separate entries in Part II for more detailed descriptions and examples. The separable auxiliaries are marked by the symbol # placed after the number; they can be set apart from the preceding verb form by at least the particles un/nun or tul. Since we distinguish auxiliary constructions from simple compounds or sequences in which both verbs retain their usual meanings and functions, not included are such forms as -e neh- 'do and put in'. And idiomatic formations such as ka(-)tah- 'arrive (there)' and wa(-)tah- 'arrive (here)', tāy(-)ka- 'arrive (there) in time' and tāy(-)o- 'arrive (here) in time' are best put in the dictionary as lexical entries, since you will seldom if ever separate the infinitive from the following stem, even by the particle se. At the left of each item in the lists below there is information on attaching the honorific marker to the main verb (α), to the auxiliary (β), or to both (αβ). A plus (+) means it is possible to attach -usi-, a minus means that it is not possible. When the plus is italicized (+) the honorific marker is attached only under special circumstances of one kind or another; even in some of the cases marked with the minus it is possible to get the honorific verbs capswusi- 'eat', cwumusi- 'sleep', and kyēysi- 'stay' (also tol.a kasi- when it means 'die'), though not the regularly derived forms such as hasi- 'deign to do', kasi- 'deign to go', and pat.usi- 'deign to receive'.

LISTS OF AUXILIARY VERBS

Auxiliary processive verbs (aux v)

+ -usi-

α	β	αβ				
−	+	−	1.	#	V-e tāy-	[intensive] 'do hard / continuously'
−	+	−	2.		V-e chi-	[intensive] 'do hard / continuously'
+	−	−	3.		V/A-e ssah-	'do/be more than an ample extent'
−	−	−	4.		V/A-e ppā ci-	'(get old, rotten, musty) through and through'
−	+	−	5.		V-e (p)peli-	[exhaustive] 'do completely'
−	+	−	6.	#	V-e twu-	[completive] 'get it done'
−	+	−	7.	#	V/A-e noh-	[anticipatory] 'do for now / later' / 'be all ... '
+	−	−	8.	#	V-ko na-	[transitional] 'just did, come from doing'
+	+	+	9.	#	V-e na-	[continuative] 'keep doing, do and do again' − CF -e na- as regular compound (kkāy na- 'recover one's senses, come to')
+	+	+	10.	#	V-ko mā-l-	[terminative] 'finish(ed) doing'
?	?	?			V-ko ya mā-l-	'end in doing, end up doing'
+	−	+			V/A/C-ko mālko	'of course do/be'
+	+	+	11.	#	V-ta (ka) mā-l-	'do a while and then stop'
+	+	+	11a.	#	V-ta (ka) mōs ha-	'fail to do, try but cannot'
+	+	+	12.	#	V-ko tani-	'go around doing' (Treat as regular compounds?)
−	+	−	13.		V-e mek-	[vulgar and pejorative] − CF 44.
−	+	−	14.		V-e nāy-	[perseverative] 'do all the way'
−	+	−	15.	#	V/A-e ka-	[out-directive, exo-developmental] 'away, ongoing' − CF regular -ko ka- 'go ... doing'

−	+	−	16.	# V/A-e o-	[in-directive, endo-developmental] 'this way, upcoming' − CF regular -ko o- 'do and come'
+	+	+	17.	# V-e po-	[exploratory] 'try doing' (NOT 'try to do' = -ulye ko ha- or -ki ey him ssu-)
?	+	?	18.	# A-e/-key poi- (pōy-)	[semblative] 'look like (it is)'
−	+	−	19.	# V-e cwu-	[favor] 'do for' − separable by 'ta
+	−	−	19a.	# V-e tālla; V-e tao (tāko)	[reflexive request, §11.2] 'ask someone to do for for one' − separable by 'ta
−	+	−	20.	# V-e tuli-	[honorific favor] 'do for (an esteemed person)'
−	+	−	21.	# V-e pachi-	[honorific favor] 'do for (an esteemed person)'
+	+	+	22.	# V-ci anh-, V-ci an(i) ha-	[negative] 'not do' − CF 43.
+	+	+	23.	# V-ci mā-l-	[prohibitive] 'refrain from doing' − usually in a subjunctive form (imperative, hortative)
			24.	# (V) ha-	'do' − dummy verb (general auxiliary) in such structures as V-ki to ha- 'indeed / also do'
+	+	+	25.	# V/A-key ha-	[causative] 'make it so that' − see §7.4
+	+	+	26.	# V/A-key toy-	[externally conditioned gradual inceptive] 'get so that, come to do/be'
−	+	−	27.	# A/V-key kwū-l-, A-i kwū-l-	[behavioral] 'act in a manner that is' − usually A-key, but mōs kyentikey 'unbearably' ← vt
−	+	−	28.	# A-e ha-	[cathecticizer, emotion transitivizer] 'project an emotion (toward something / someone)'
			29.	V-e cilu-	= 30.
−	+	−	30.	V-e ttuli-	(1) turns vi into vt (2) intensifies transitivity of vt and defective infinitives
−	+	−	31.	V-e ci-	(1) [inceptive] 'get to be, become, grow' − usually A-e ci- but sometimes V-e ci-, e.g. pel.e ci- 'split' ← pē-l- vi (2) 'get/be done': turns vt or defective inf into vi (3) intensifies vi
+	+	+	32.	# V/A-e (se) cwuk.keyss.ta	'so much one could die; very much'
+	+	+	32a.	# V-e (se) mōs sālkeyss.ta	'so much one will not live; extremely'
+	+	+	32b.	# V-e (se) hon nass.ta	'so much it frightened one witless; extremely'
+	−	−	33.	# V/A-e kaciko	'with (the accomplishment or resultant fact)'
+	−	−	34.	# V-ulye ko tu-l-	'threaten (try, be about) to do'
−	+	−	35.	V-e tu-l- / tul.i-	'do into, upon, at' (Treat as regular compounds?)
+	+	+	36.	# V-ko iss-	[progressive] 'be doing, be ...ing'
−	+	−	37.	# V-e iss-	[resultative] 'be done, be ...ed'

<u>Auxiliary adjectives (aux adj)</u>

+	+	+	38.	# V-ko siph-	[desiderative] 'want to do'
−	−	−	39.	V-ko ci-	[literary] = 38.
−	−	−		V-ko ca / ce / cie	'wanting / intending to do' (= -ulye)
−	−	−	40.	V-e cii-	[literary] = 38.

−	−	−	41.	#	V-e ci-	in **mes-tul.e ci-** 'be nice'; and in free variation with 31 (aux. v.) in **pǎla ci-** 'be (or get) shallow'[1]
+	−	−	42.	#	(A) ha-	'be' − dummy adjective (general auxiliary) in such structures as **A-ki to ha-** 'indeed / also be'
+	+	+	43.	#	A-ci anh-,	
					A-ci an(i) ha-	[negative] 'not be' − CF 22
+	−	−	44.		A-e mek-	[vulgar and derogatory] − CF 13
+	−	−	45.		V-na po-,	
				#	V-nun ka po-	
					A-un ka po-	[semblative] look as though, seem
+	−	−	46.	#	V/A/C-na siph-	[semblative] feel as if − also postnominal verb
					-ta siph-	with **tus, sang / seng, ka, ya, -ulq kes man**
					-ulila siph-	
					-ess.umyen siph-	

[1] The critical examples are **ku kes cham mes-tul.e cita** (not *cyess.ta) 'that is real nice' and **ku kes i pǎla cita / cyess.ta** 'that is shallow'.

7.6. Postnominal verbs.

Postnominal verbs occur in construction with preceding nouns, typically verbal nouns (§5.6). Some of the postnominal verbs are separable, at least by the particles **un / nun, to,** or **tul,** and they are marked with "#".

LISTS OF POSTNOMINAL VERBS

Postnominal processive verbs (postnom v)

1.		keli-	'behave in a way that creates the impression of'; XX **ha-** = X **keli-** 'repeatedly / continuously do'
2.		tǎy-	[colloquial] = 1.
3.		k(h)uli-	'do'
4.		ha-	'behave, go (boom!, ...)': X **ha-**, XX **ha-** = X **keli-**
5.		i-	'behave, go' − as in **wumcik i-** 'move, budge'
5a.		na-	'behave, feel' (in **kamcil na-** 'feel impatient')
6.	#	ha-	'do'
7.	#	ttē-l-	'do'
8.	#	puli-	'do'
9.	#	phi(wu)-	'do'
10.	#	ppǎy-	'do'
11.	#	po-	'do; see to'
12.	#	(na-)ka-	'go (out) to do'
13.	#	(na-)o-	'come (out) to do'
14.	#	sikhi-	'cause to do' [causative] − see §7.4
15.	#	toy-	'get/be done' [passive] − see §7.4
16.	#	pat-	'incur the doing of, have done to one' [passive] − see §7.4
?17.	#	ssu-	'use, do; [? causative]'
18.		ci-	'get / become characterized by'
19.	#	chi-	'do'
?20.	#	cī(s)-	(= 6) in **kyelqceng cī(s)- / ha-** 'decide'
21.		ēps-	'lack' − can be treated as regular compounds

Postnominal adjectives (postnom adj)

?22.		ēps-	'be lacking / deficient in; be bad with respect to': SEE Part II.
22a.	(#)	kwuc-	'be bad with respect to' (simswul kwuc- rarely is simswul i kwuc-)
23.		na-	'be' — pyel nata or pyel nass.ta [defective vi] 'is special'; mas nata / nanta [A/V] 'is tasty'
24.	#	ha-	'be'
25.		ha-	'be, give the impression of being': X ha-, XX ha-
26.		mac-	= 25
27.		sulew-	= 25
28.		(h)ow-	[obsolete] = 27 = 25
29.		low-	'be characterized by' [occurs only after vowel]
30.		(···q) toy-	'be'
30a.		kath-	'be ...-like' — inseparable in engtheli kath-, ...
30b.		cha-	'be full of / in' — inseparable in an cha-, ...
31.		taw-	'be like, be worthy of being'
32.		ci-, chi-	'be, be characterized by'
32a.		cew-	'be characterized by' — Are the only examples swus cew- 'be simple-hearted' and pich cew- 'be dignified'?
33.	#	ccek-	'feel, give / have a feeling of'
34.	#	(tus) siph-	'feel / look (like)' — separable by to
35.		(s^{e}ang) siph-	'seem to be' — separable by to
36.		(ka, ya, -ulq kes man) siph-	'feel / look (like)'
37.		(sĕng) p^a/$_u$lu-	[dialect] = 35

We can add to the list of postnominal verbs **lop.hi-** 'makes it be characterized by' (occurring only after a vowel), a causative from the postnominal adjective **low-** (item 29 above). I have excluded from the list **cōh-** 'be good with respect to, have a nice ·· ', **sānaw-** 'be bad with respect to, have a bad ·· ', and other such words carried in the lists of CM 1:447-9, because these adjectives seem quite freely separable by the particle **i / ka** and therefore do not differ in kind from other adjectives that are preceded by a noun (+ particle).

The stem **ha-** 'do / say / be', which has so many uses (see the entries in Part II), is both processive and descriptive. The two uses contrast nicely in **te hata** (adj-n) 'be more, be worse' and **te hanta** (vni) 'get worse (exaggerated)' or (vnt.) 'add, gain, increase'.

7.7. Recursiveness of auxiliary conversions.

What, if anything, constrains the application of an auxiliary conversion to a sentence that had already undergone an auxiliary conversion? Apparently the only restrictions are those of semantic incompatibility (the result does not make sense), or unwieldiness (the sentence is too heavily burdened for easy processing). If it were not for these constraints, an infinite number of longer and longer sentences could be created just by reapplying auxiliary conversions. There are a fair number of sentence types with a sequence of no more than two auxiliary conversions. The table below, compiled by [1]Yi Tongcay in 1962, shows those sequences of two infinitive-auxiliary conversions that are acceptable (+) and those that are not (−). The auxiliaries are assigned letters (A to X) arbitrarily and these are used as references at the left (the first conversion) and at the top (the second conversion). The key to the letters is on the extreme left. If you want to know whether it is permissible to reapply **-e noh-** to a sentence which has already had it, you look for the "G-G" intersection and find a "−" that means there are no such sentences as *hay noh.a noh.ass.ta 'did it for later for later', though it is

possible to apply the conversion to a main verb **noh-** 'put' as in **phyěnci lul chayk-sang wi ey noh.a noh.ass.ta** 'I put the letter on the desk for the time being'. An examination of the table will reveal that in general a conversion cannot be reapplied. There seems to be an exception in **Ce sălam hanthey mul.e pwă ('na) poca** 'Let's try asking that fellow' and similar expressions, so you will find a "+" at the intersection "M-M" in the chart. A more involved sentence such as **?Ce sacen ul pwă pwă poca**, if possible, is better taken as a conjoined sentence with two main verbs **po-** and translated 'Let's try looking in that dictionary to see'.

CHART OF DOUBLE INFINITIVE-AUXILIARY CONVERSIONS

-e +		A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X
tăy-	A	−	+	+	+	+	+	+	+	+	+	+	−	+	−	+	+	+	+	+	+	+	−	−	+
chi-	B	−	+	−	−	−	−	−	−	−	+	−	+	−	−	−	−	−	−	−	−	−	−	−	−
ssah-	C	+	+	−	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	−	+
ppă ci-	D	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	+	−	−	−
peli-	E	+	+	+	+	−	+	+	+	+	+	+	+	+	+	−	+	+	+	+	+	+	+	−	−	+
twu-	F	+	+	+	−	+	−	+	−	+	+	+	+	+	+	+	+	+	+	+	+	+	−	−	+
noh-	G	+	+	+	−	+	+	−	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	−	+
na-	H	+	−	−	+	−	−	−	−	−	+	+	+	+	+	−	+	+	+	+	−	+	−	+	+
mek-	I	+	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−
năy-	J	+	+	+	−	+	+	+	+	+	−	+	+	+	+	+	+	+	+	+	−	+	+	−	−	+
ka-	K	+	+	−	+	+	+	+	+	+	+	−	+	+	+	+	+	+	+	+	−	+	+	−	−	−
o-	L	+	−	−	+	−	+	+	+	+	+	−	−	+	+	+	+	+	+	+	+	+	−	−	−
po-	M	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	−	−	+
pŏy- (poi-)	N	−	−	−	+	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	+
cwu-	O	+	+	+	−	+	+	+	−	+	+	+	+	+	+	−	+	+	+	+	+	+	−	−	+
tuli-	P	+	−	−	−	+	+	+	−	+	+	+	+	+	+	+	−	+	+	+	+	+	−	−	+
pachi-	Q	+	−	−	−	−	−	+	−	+	+	−	−	−	−	+	+	−	−	−	−	−	−	−	−
tălla / tao / tăko	R	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	−	+	+	+	−	−	+
ha-	S	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	−	+	−
ttuli-	T	−	+	−	−	−	−	−	−	−	+	−	−	−	−	−	−	−	−	−	−	−	−	−	−
ci-	U	+	+	+	+	+	+	+	+	+	+	+	−	+	+	+	+	+	+	+	+	−	+	−	+
cwuk.keyss.ta	V	+	−	−	−	−	−	−	−	−	−	+	+	+	+	+	+	+	+	+	+	−	−	+
kaciko	W	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	−	−	+
iss-	X	−	+	−	+	+	+	+	+	−	+	−	−	−	−	+	+	+	−	−	+	+	−	−	−
		A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X

8.0. Stems.

We describe the verb stems of Korean in terms of conjugations, sets of stems that differ from each other in shape when attached to various groups of endings. Behind the complications of the modern conjugations you will see a simpler system at work in earlier forms of the language.

8.1. Conjugations.

Each inflected form consists of a stem + an ending. It is possible to classify stems and endings into groups according to the ways in which alternant shapes are attached to each other. We find two kinds of ending: in rough terms, ONE-SHAPE endings (-ko, -ta, -ci, -sey, -nun, -keyss-, -ess-, -kka, -ᵉa, ...) and TWO-SHAPE endings (-sup.nita / -p.nita, -so / -o, -una / -na, -umyen / -myen, -nunta / -nta, -un / -n, -ul / -l, -um / -m, -usi- / -si-, ...). The two-shape endings have one shape which is attached to a stem that ends, in its basic form, with a CONSONANT and another shape which is attached to a stem that ends with a VOWEL in its basic form, but some of the vowel stems have an l-extension before certain of the endings. The one-shape endings may actually have more than one shape − the infinitive

has several shapes (-e, -a, zero, ...) — but the choice of alternants is not correlated with the kind of sound at the end of the stem.

With this in mind we can set up CONJUGATIONS, or classes of verb stems. Those stems which attach the shapes -sup.nita, -so, -una, -umyen, -un, -ul, -um, -usi-, etc., are CONSONANT stems. Those which attach the shapes -p.nita, -o, -na, -myen, -nta, -n, -l, -m, -si-, ... , are VOWEL stems. Vowel stems and consonant stems attach one-shape endings, such as -ko, -ta, -ci, -nun, -ᵉ⁄a, ... , in the same way.

In addition to the major dichotomy of consonant stems and vowel stems, we also find a few h-dropping stems that we will call AMBIVALENT, and several verbs with minor irregularities that we can lump together as IRREGULAR stems. Among consonant verbs we distinguish:

(1) stems ending in /h/ which are regular in the Hankul orthography (and if ···ah- take the infinitive ending as -a) but ambivalent in colloquial speech except for the infinitive, which is regular -e (but -a after ···ah- or ···oh-) — CF the infinitive ···-ay of the truly ambivalent stems, such as kuleh- 'be so'.

(2) stems ending in /w/ and /l/ which are quite regular in our Romanization — though they show automatic alternations unusual outside the inflectional system (/w/ → /p/ before a consonant, and /l/ → /t/) — but which must be treated as the special classes of "irregular P, irregular T" in the analysis underlying the Hankul spelling, reflecting the fact that the alternation is the result of a pre-Hankul lenition of p and t before a stem-final *ᵘ⁄o- which was later elided.

(3) s-dropping stems, which involve a special type of alternation that is the result of a pre-Hankul lenition of s before a stem-final *ᵘ⁄o- which was later elided. Among the vowel verbs we distinguish the subclasses of l-extending vowel stems, l-doubling vowel stems, and l-inserting vowel stems.

8.2. Consonant stems.

Below are examples of all occurring types of consonant-final stems.

ip- 'wear'	pālp- 'tread on'
noph- 'be high'	ulph- 'intone, chant'
ēps- 'be nonexistent'	tālm- 'resemble'
tat- 'close'	kām- 'shampoo'
kath- 'be alike'	ān- 'embrace'
wūs- 'laugh'	anc- 'sit down'
iss- 'exist; stay; have'	noh- 'put'
chac- 'look for, find'	ilh- 'lose'
coch- 'follow'	kkunh- 'cut'
mek- 'eat'	kakkaw- 'be near'
takk- 'polish'	tut- / tul- 'hear'
ilk- 'read'	cī(s)- 'build'
halth- 'lick, taste'	

One anomalous adjective stem ends in ···lw-: sēlw-, a contracted form of sēlew- 'sad'. And a truncation of ilu- 'be early' creates the anomalous stem īlq- that is found in what seems to be a dialect form, īlqkena mālkena = ilukena nuc.kena 'early or late, sooner or later'. A comprehensive list of the shapes of shorter stems is arranged by conjugation in Appendix 1. Some of the consonant-final stems turn up in dialect versions with a final ···u-: simu- for sim- 'plant' (see the remarks at the end of §8.3.1), siphu- for siph- 'desirous', kathu- for kath- 'like, same'.

8.2.1. Stems ending in sonants.

A typically voiceless obstruent (p t s c k) is reinforced (→ pp tt ss cc kk) after a stem-final m, n, or l (reduced from syllable excess, since a basic l is treated as /t/ in this environment, §8.2.4). That reinforcement, not present in certain dialects and fairly recent in the central area (see Martin ⁷1991), is ignored by the Hankul spelling, but we note it in our Romanization by a dot. To be consistent, we would like to use "···q" in place of the dot, but that would be misleading in terms of the Hankul spelling. The reinforcement is completely automatic only within the inflectional system, though it is

widespread in other parts of the structure (especially after /l/), where we write it with q; see §1.5. Examples:

	-ko	-ta	-ci	-sup.nita	-nun
halth-	halth.ko	halth.ta	halth.ci	halth.sup.nita	halth.nun
'lick'	/halkko/	/haltta/	/halcci/	/halssumnita/	/hallun/
năm-	năm.ko	năm.ta	năm.ci	năm.sup.nita	nămnun
'remain'	/nămkko/	/nămtta/	/nămcci/	/nămssumnita/	/nămnun/
tălm-	tălm.ko	tălm.ta	tălm.ci	tălm.sup.nita	tălm.nun
'resemble'	/tămkko/	/tămtta/	/tămcci/	/tămssumnita/	/tămnun/
ăn-	ăn.ko	ăn.ta	ăn.ci	ăn.sup.nita	ănnun
'hug'	/ănkko/	/ăntta/	/ăncci/	/ănssumnita/	/ănnun/
anc-	anc.ko	anc.ta	anc.ci	anc.sup.nita	anc.nun
'sit'	/ankko/	/antta/	/ancci/	/anssumnita/	/annun/

In 15th-century Korean one-syllable stems that ended in ···m- (including ···lm-) and ···n-, like the counterparts of the modern -(s)-, -w-, and -T/L- stems, began with the rising tone marked by the double dot (¨) when attached to endings that began with a vowel − specifically, the infinitive -ˈ%a, the modulator -ˈw%o-, and (interestingly) the honorific -%oˈsi-. But before other endings, the stem began with the low tone that is left unmarked, and a high pitch (the single dot ˈ) appears at the beginning of the ending. From that we conclude that these stems were originally dissyllabic ···ˈm%o-, ···ˈn%o-, and (before the lenition) ···ˈs%o-, ···ˈp%o-, and ···ˈt%o-. The rising tone results from blending the basic initial low with the high tone left stranded when the vowel was elided. Accordingly, a form like ¨saˈmosiˈm ye (1482 Kum-sam 2:3b) contains ¨sam- < *saˈm[o]- 'make' + -oˈsi- (honorific) but a form like saˈmo.n i ˈˈla (1459 Wel 2:27b) contains the original stem saˈmo- + -n, the modifier ending − here entering into an extended predicate with the postmodifier ˈi and the abbreviated form of the copula indicative attentive ˈiˈla, which is ˈyˈla but automatically suppresses the glide after /i/. Forms for 'hug' include the infinitive anˈa (1449 Kok 57, 1459 Wel 8:85b) and the honorific modifier found in ¨anˈosiˈn i ˈ-ngi ˈˈta (1459 Wel 8:86a; sic, ¨an-ˈo-) 'hugs', which has a rising accent like the gerund ¨anˈkwo (1459 Wel 8:100-1) and the deferential infinitive ¨anzoˈWa (1449 Kok 23), among other forms. An explanation similar to that for ···m- and ···n- stems accounts for some of the peculiarities of the -l- verbs (§8.3.2), which were originally ···l- stems.

8.2.2. Stems ending in h.

When attaching an ending that starts with a consonant, a stem that ends in a vowel + h treats the h as /t/ − which is then subject to automatic alternations (§2.6) − unless the ending-initial consonant is t, c, or k, with which the h undergoes metathesis. A stem that ends in a sonant + h (namely lh and nh) drops the h unless the ending-initial consonant is t, c, or k, with which the h undergoes metathesis. But stems which end in vowel + ph, th, or ch reduce the syllable-excess to p or t before attaching a consonant-initial ending of any kind, and show the aspiration only when the ending begins with a vowel and so can accommodate the syllable excess. (There are no endings that begin with p; there are no verb stems ···kh-.)

	-ko	-ta	-ci	-sup.nita	-nun
noh-	noh.ko	noh.ta	noh.ci	noh.sup.nita	noh.nun
'put'	/nokho/	/notha/	/nochi/	/nossumnita/	/nonnun/
ilh-	ilh.ko	ilh.ta	ilh.ci	ilh.sup.nita	ilh.nun
'lose'	/ilkho/	/iltha/	/ilchi/	/ilssumnita/	/illun/
kkunh-	kkunh.ko	kkunh.ta	kkunh.ci	kkunh.sup.nita	kkunh.nun
'sever'	/kkunkho/	/kkuntha/	/kkunchi/	/kkunssumnita/	/kkunnun/

Before a vowel, the stem-final **h** goes unpronounced but it is sometimes restored for emphasis, as described in §2.7.3, or as a reading pronunciation. In Middle Korean a noun, as well as verbs and adjectives, could end in a basic *h* (*nwo'h on* 'the cord'), which metathesized when a particle such as *'two* or *'kwa* was attached, and the resulting strings were written phonemically: *nwo'khwa* ← *nwoh 'kwa* 'with the cord'. Before a voiced consonant or as a free form, such nouns suppressed the final **h** and it went unwritten in Hankul: *nwo* ← *nwoh* 'cord'. For a list of these nouns, see §4.2. There are a few compound nouns that may show the metathesis, such as *pol'thwok* (1459 Wel 21:7b; 1466 Kup 1:36a; 1481 Twusi 22:13a, 16:24a) 'elbow' ?< *polh 'twok*, treated by LCT as *pol[h] 'thwok* but the second noun appears only in this compound.

According to the rules in KEd a stem that ends ···**lh**- is treated like ···**l**-, but that will not account for the fortition that is found in **ilh.sup.nita** /ilssumnita/ and **ilh.so** /ilsso/. Kim-Renaud (1986:24-5, 22:n7) would derive such forms by three rules: **ilh-so** → *ilt-so ("h-unreleasing") → *ilt-sso ("post-unrelease fortition") → **ilsso** ("coronal [= apical] deletion"). I wonder, however, if the fortition may not be simply a part of the almost automatic rule **ls** → **lss** (§2.6), which applies generally to most strings, with a few exceptions (in Seoul) such as ···**l se**, in which the particle can be treated as an abbreviation of **ey se**. Notice that the KEd rule implies that the reductions ···**lh** → ···**l**, together with reductions from ···**lth**-, form a new category, not to be confused with either the -T/L- stems (**kĕt-/kel-** 'walk') or the -L- stems (**kĕ-l-** 'hang'), for the modifier forms differ:

ilh- 'lose'	**ilh.sup.nita** /ilssumnita/	**ilh.nun** /illun/
kĕt-/kel- 'walk'	**kĕt.sup.nita** /kĕssumnita/	**kĕt.nun** /kĕnnun/
kĕ-l- 'hang'	**kĕp.nita**/kĕmnita/	**kĕnun** < ¨*ke'non*

8.2.3. Stems ending in w: -W- (= -P/W-).

Stem-final **w** alternates with **p** before a consonant and coalesces with a following **u** in the vowel phoneme **wu**; and that is one reason we write what is traditionally regarded as a single phoneme with a digraph that consists of **w** + **u**. The basic **w** is heard only before the infinitive ending -ᵉ⁄ₐ and the past-tense element derived from the infinitive (-ᵉ⁄ₐss-), yet also sometimes before the derived adverb/noun ending -**i**: **tewi** 'warmth' but **kakkai** 'vicinity, nearby'. The following examples show the contrast between a vowel stem ending in ···**wu** ('give'), a -**p/w**- stem ('help'), and a **p**-final stem ('wear'):

	-ko	-sup.nita	-nun	-ᵉ⁄ₐ	-una
cwu-	cwuko	cwup.nita	cwunun	cwue[1]	cwuna
tōw-	tōpko	tōpsup.nita	tōp.nun	towa	towuna
ip-	ipko	ipsup.nita	ip.nun	ip.e	ipuna

[1] Usually not distinguished in pronunciation from /cwuwe/ 'pick up' (§2.7.6).

The modern Hankul writing system has no way to show a **w** at the end of a syllable, since /w/ is written as part of the vowel medial, and so the infinitive **towa** has to be written **to + wa** and the adversative **towuna** must be written **to + wu + na**, even though the endings are clearly -**a** and -**una**. Since morph-final **w** occurs only for inflected stems, the alternations of **w** are completely automatic — phonemically determined. (See also the remarks on -W- stems in §9.5-6.) In some of the provinces the -W- stems are treated as regular ···**p**- stems: Hwanghay and Phyengan (Pak Wensik 25); Kyengsang, Cenla, and Hamkyeng (Choy Hyenpay 1959:332-3); Mkk 1960:3:33 cites Cincwu in South Kyengsang. The **w** is thought to have been a voiced fricative in the 15th century (/W/), and the stems were probably lenited from an original *-p(ᵘ⁄ₒ)- under conditions that kept them apart from the ···**p**- stems, where the labial stop did not lenite (see Martin 1973, Ramsey 1975).

There are many adjective stems that end in **w**, but only a few processive verbs: **kīw-** 'mend, darn', **kwūw-** 'cook, broil', **nwuw-** 'lie down', **nwuw-** 'bleach' [rare except in the passive **nwui-** = **nwī-** 'get bleached'], **pōyw-** '(I) humbly see', **tōw-** 'help', **yeccwuw-** 'tell (a superior)', **cesswuw-** [obsolete?] 'bow to a divinity' = **cesswu(s)-** [dialect?], **cwūw-** 'pick up', **tut-caw-** [literary, archaic] '(I) humbly hear/listen'.

The anomalous adjective sēlw- is contracted from sēlew- 'be sad'; compare the noun sēlwum 'sadness' < sēlw- + -um (substantive).

Middle Korean treated these -P/W- stems in much the same way. The w was also written as W (the voiced bilabial fricative) or as Ww. The stem ˝twoW- 'help' seems to be unique in that it is often spelled ˝two[W]-, with the labial consonant / semivowel elided but the endings attached as if it were still there. That is similar to what happens for the -(s)- stems, once the MK -z- is totally lost, as in modern ciun < ci˙zun ' -- that has built'. Examples of 'help': two˙[Ja (1463 Pep 1:14b, 1481 Twusi 8:50b); ˝two[Jo˙sya (1462 ¹Nung 1:37b); two˙[Jol (1462 ¹Nung 8:57a), two[J˙o.l i ˙ye (1465 Nay 3:62a), two˙[Jon (1482 Nam 1:65b). If a -w- were inserted before the epenthetic o of all but the first example, the forms would be taken as two˙wo-, the modulated stem. Compare this stem with ˝kwoW- 'pretty': kwo˙wa (1481 Twusi 22:43a), ˝kwoWo˙sya (1459 Wel 21:211b). The stems with other vowels have either W or w in the forms that do not have p: ˝swuyW-, ˝kiW-, mu˙zuyyeW-, sa˙wonaW-, ... ; also -- lwoW- and -- loW-. When the adverb-deriving suffix -i is attached, however, any -w- stem normally drops the final labial: ˝swuy˙i 'easily' < ˝swuyW-, ˝kwo˙i 'nicely' < ˝kwoW-, ... Interestingly, King 1991b:7 reports that Soviet materials on Korean from the 1920s consistently preserve the unlenited p for the -P/W- stems, treating them as regular ···p- stems, but tōp- 'help' is given exceptional forms with the labial consonant eroded: toa for the infinitive (= towa) and towum for the substantive.

Roth (1936:163) gives as the "extended" stem for kwūp- 'bake', cwūp- and cip- 'pick up' the forms kwu-u-, cwu-u-, ci-u- without the labial glide, but (173-4) he has tōp- 'help', kōp- 'be pretty', nwūp- 'lie down', and etwup- 'be dark' with the extension (p →) ···wu, as expected, except that cip- is nonleniting in the standard language. His data may reflect dialect divergences.

The MK stems began with the rising pitch (˝) except when attaching endings that began with a basic vowel. We explain that by assuming that they were originally low-initial dissyllables which had retained the high pitch of an elided vowel -- ˙p[ᵘ/ₒ]- (before lenition of the p to W) and blended it with the initial low to produce the rise. For more on this, see the discussion in §8.2.1.

8.2.4. Stems ending in l: -T/L-.

When attaching an ending that starts with a consonant, a stem that ends in a basic l treats that final consonant as if it were /t/. Korean dictionaries cite verbs in the indicative assertive form -ta, and that form has an orthographic -t- instead of -l- for these stems; Korean grammarians treat the stems as "irregular T stems", just as they treat the -w- stems as "irregular P stems". Pak Wensik (24) says the stems are treated as regular t-final consonant stems in Hwanghay and Phyengan. (Kim Yengpay 1984:53 says tut- 'hear' is the only stem of this type that is regular in Phyengan; sīt- / sil- 'load' and the others all lenite the t to l as in Seoul.) Mkk 1960:3:33 says there are two variant treatments in Cincwu in South Kyengsang: the local mūl.ko /mūlkko/ and the standard mūt.ko /mū[t]kko/ 'asking'. The Cincwu version, which may be regarded as ···lq-, is also reported from Hamkyeng. The existence of the lq may lend support to Cook's speculation that these stems have an underlying form ···lt-, though I believe that to be historically inaccurate. An alternative theory has the -T/L- verbs continuing a lost distinction between two kinds of liquid: earlier *r as well as l. The most likely historical explanation, however, is that these stems have lenited a final t (underarticulating the stop as a flap) under conditions that kept them apart from the ···t- stems that did not lenite (see Martin 1973, Ramsey 1975), so that the -T/L- stems are quite parallel to the -w- ("p-leniting") stems. Dialects which do not differentiate these two types of stems from their nonleniting counterparts, the ···p- and ···t- stems, just never underwent the lenition. Those dialects which lack the ···t- version altogether have generalized the lenited forms, and that accounts for the data reported by ¹Yi Iksep from Myengcwu county of Kanglung, where kēlkkwu means 'walking' (standard kēt.ko) and kēlkwu means 'hanging it' (standard kēlko), kelumwun means 'if one walks' (standard kel.umyen) and kēlmun means 'if one hangs it'.

The consonant stems ending in l (lenited from t) are to be kept distinct from l-extending vowel stems (§8.3.2), for these are treated as "regular", i.e. l-dropping, stems by the Korean grammarians, who fail to draw the major dichotomy between consonant-final and vowel-final stems that we rely upon here. The grammarians are historically correct, in that etymologically the extension is part of the stem.

Interestingly, the 1930 grammar of the Soviet Koreanist O Changhwan treated the -L- stems much as Martin 1954 and this book do (King 1991d). The following examples illustrate the differences between an l-extending vowel stem (kē-l- 'hang'), a consonant stem that ends in l (kēl- 'walk'), and a regular consonant stem that ends in t (ket- 'gather up, fold / roll up').

	-ko	-sup.nita	-nun	-ᵉ⁄a	-una
kē-l-	kēlko	kēp.nita	kēnun	kel.e	kēna
kēl-	kēt.ko	kēt.sup.nita	kēt.nun	kel.e	kel.una
	/kē[t]kko/	/kēssumnita/	/kēnnun/	/kele/	/keluna/
ket-	ket.ko	ket.sup.nita	ket.nun	ket.e	ket.una
	/ke[t]kko/	/kessumnita/	/kennun/	/kete/	/ketuna/

The only form in which the l-extending vowel stems fall together with the l-final consonant stems is the infinitive and the past-tense forms that are built on it: kel.ess.ta 'hung' or 'walked'.

Variations of /l/ with /t/ turn up spottily in other parts of the vocabulary, as in these words:

  ithul 'two days', **ithut nal** /ithunnal/ 'the next day'
  meychil, **meychit nal** /meychinnal/ 'what day of the month'
  puchwul 'squatting board in toilet', **puchwut tol** 'squatting stones'
  phul 'grass', **phut so** /phusso/ 'cow on summer diet of grass'
  sēl (nal) 'New Year('s day)', **sēt tal** 'December'
  sahul 'third day', **sahut nal** /sa(h)unnal/ 'third day of the month'
  swul 'spoon', **swut kalak** /swukkalak/ 'spoon'
  ca-l- 'be fine, small', **cat-talah-** 'be quite fine (small)'
  sē-l- 'be unfamiliar', **sēt-pulu-** /seppulu-/ 'be awkward, clumsy'

He Wung (313:n35) explains sēt tal, swut kalak, and mus ··· = /mut/ (1722 Sipkwu) = mwul(-i) 'the (whole) group, all' < ˈmwul as a /t/ that comes from the /s/ of sē[l] s tal < ¨seɫl] s ˈtol (1466 Kup), swu[l] s kalak, and mu[l] s ··· , used to represent the adnominal (genitive) particle (CF Part II, s NOTE 1). That leaves sēl < ¨sel (1481 Samkang) and swul < ˈswul (1481 Twusi) as the original forms. In KEd I treated swul as a further contraction of swut kal(ak) and did not try to explain sēl, though it would have been possible to suggest the contraction sē[t ta]l. Those explanations, however, must be rejected in favor of He Wung's, despite my remarks in KM 54:n32, and his explanation will apply to the other nouns above, as well. That is, all noun-final alternations of ···l and ···t··· are from ···[l] s ··· , with the liquid elided (for more on that, see §2.11.3 and the entry for the particle s in Part II). Notice that ¨sel also meant 'years of age' (modern sal) and therefore may be connected in some way with ¨sal- 'live, be alive'.

See Martin 1983:27 for etymological examples of lenited t → l. In some cases the source of the lenition survives as the modern affricate because of the (southern) merger ty > c: tolyang or tōcang 'Buddhist seminary' < MK ˈtwotyang < ¨TWO-¨TYANG. The lenited form of the plain copula ila ← i-ta is used in quotations.

A note on notation. Contrary to the historical development, we are not considering the -l- of the l-extending bases as elided (dropped) in the several paradigmatic forms where it fails to appear, and therefore do not use an apostrophe to mark its absence. We write sānta for 'lives' rather than ¨sā'nta¨. Accordingly, we will not consider as abbreviation the unextended form of the stem in verb compounds such as ē-nok- (< ē[l]-) 'freeze and then thaw' and tu-nallinta (< tu[l]-) 'lifts it and makes it fly'. If we modify our description to match the history, we could still omit the notational reminder of the elision, which goes unmarked in the Hankul orthography, saving our apostrophes for more meaningful cases of optional contractions, such as l' for lul, and elision of the final consonant of a noun in compounds (pu' son 'fire scoop', mu'-tepta 'is sultry', na'-nal-i 'day after day, daily'), rather than let them clutter up the verb paradigms.

The stem tut-/tul- 'listen, hear' is the only -T/L- stem with the vowel /u/, and in MK it was unique in having the same low initial accent in all forms. The t-leniting stems of Middle Korean that did not have the minimal high vowels u or o began with the rising pitch (¨) except when attaching

endings that began with a basic vowel. (The expected rising pitch automatically lost its high component in closed syllables like C^uoC, leaving only the low pitch: $[\ddot{}]C^uoC- < {}^{*}C^uo\dot{}C[^uo]-$.) We explain that by assuming that they were originally low-initial dissyllables which had retained the high pitch of an elided vowel $-\dot{}t[^uo]-$ (before lenition of the *t* to *l*) and blended it with the initial low to produce the rise. For more on this, see the discussion in §8.2.1.

8.2.5. S-dropping stems: -(s)-.

A few stems end in basic s when a consonant-initial ending is attached but drop the s when the ending starts with a vowel. The SELECTION of the vowel-initial alternant of a two-shape ending is just like that for any other stem so that shapes beginning -u··· will often follow the vowel that remains when the s drops. In ordinary speech, however, the minimal vowel u is often dropped after a vowel (§2.7.5) and that leaves the stem shape much like that of the h-dropping ambivalent stems and the regular h-final stems that drop the h between vowels (§8.2.2, §2.7.3). It will prove helpful to compare a simple vowel stem (na- 'emerge'), an h-final consonant stem (nah- 'give birth to'), an s-dropping stem (nă(s)- 'get/be better'), and a regular s-final stem (as- 'seize'). The table below shows the pronunciations heard for each spelling.

	na-	nah-	nă(s)-	as-
-ko	nako	nah.ko	năs.ko	as.ko
	/nako/	/nakho/	/nă[t]kko/	/a[t]kko/[1]
-ta	nata	nah.ta	năs.ta	as.ta
	/nata/	/natha/	/nătta/	/atta/
-ci	naci	nah.ci	năs.ci	as.ci
	/naci/	/nachi/	/năcci/	/acci/
-sup.nita	nap.nita	nah.sup.nita	naup.nita	as.sup.nita
	/namnita/	/nassumnita/	/naumnita/ →	/assumnita/
		nah.up.nita	/nămnita/	
[dialect]		/naumnita →/		
		/nămnita/		
-nun	nanun	nah.nun	năs.nun	as.nun
	/nanun/	/nănnun/	/nănnun/	/annun/
-e/a	na	nah.a	naa	as.e(, asa)[2]
	/na/	/naha/ →	/naa/ = /nă/	/ase(, asa)/
		/naa/ = /nă/		
-una	nana	nah.una	nauna	as.una
	/nana/	/nahuna/ →	/nauna/ →	/as.una/
		/nauna/ →	/năna/	
		/năna/		

[1] The bracketed **t** is normally suppressed (§2.6): -tk- → -tkko → -kko.

[2] The Hankul orthography standardizes the historical spelling **as.a**, and in certain dialects only that form is heard, but we have chosen as standard the Seoul **as.e** (see §9.4), though the verb is uncolloquial.

The pronunciation /nassumnita/ corresponds to both nass.�robsup.nita 'emerged' (← na-, past formal) and nah.sup.nita 'gives birth to' (← nah-, nonpast formal). The plain past of na- is /natta/ (nass.ta) with short vowels; the long first-syllable vowel in /nătta/ signals 'gave birth to' (nah.ass.ta) or 'got better' (naass.ta). Notice that the shape of the infinitive after ···a(s)- and ···a(h)- is -a, even though Seoul speakers use the shape -e after ···aC-, including as- and the more colloquial ppay-as-. Despite the Hankul orthographic prescription we treat **as.e** as the standard colloquial infinitive and speak of **as.a** as a literary or dialect version of that. Under the influence of schoolroom and dialect pronunciations the Seoul colloquial standard may be reverting to the older form, but it would be premature to say now (1991) that the historical change in Seoul has been reversed.

With the suppression of postvocalic h and u, the h-final consonant stems fall together with the s-dropping stems when the infinitive or a two-shape ending is attached, and together they differ from a simple vowel stem (such as na-) only by the length of the vowel left behind. But the forms are kept distinct in Hankul spelling, at least by those who spell correctly, since the spelling is based on the uncontracted forms.

It will be recalled that long vowels in the l-extending, s-dropping, and -w- stems are shortened BEFORE ENDINGS BEGINNING WITH A VOWEL (§2.7.2). In general, that is not true of the h-final consonant stems: **cŏh.a** 'is good' = /cŏa/ or, with epenthetic glide (§2.7.6), /cŏwa/. But occasionally the shortened forms are heard: /co(w)a/ or even /cwa/ and (§2.7.4) in rapid speech /ca/. In /cŏna/ ← /cŏ(h)una/ for **cŏh.una** 'is good but' we could attribute the length to the dropped -u- but we might just as well say it is retained from the basic shape. The shortening of the long vowels reflects their origin as the MK low-high rising tone which resulted from contraction of the high-pitched syllable following the basic low with which the stems began (see below).

According to Mkk 1960:3:33, speakers of Cincwu in South Kyengsang treat only the stem **cī(s)-** 'build' as s-dropping; the other s-dropping stems are regular s-final consonant stems like **as-** 'seize' and **wus-** 'laugh'. Horne 1950-1 came across only the one stem **cī(s)-** and decided on a clever analysis that treated the stem as basic **ciy-**, perhaps misled by the y-epenthesis (§2.7.6; §2.11) that makes the infinitive **cie** sound like /ciye/. Finding cases with other vowels, I amended her analysis and treated these stems as ending in a basic **q**, to account for the reinforcement reflexes that are the only evidence in Seoul speech that the stem has a basic final consonant. In the 15th century the stem-final consonant was a voiced [z] before a vowel, so that the infinitive was spelled *ci˙ze*, using the obsolete triangle symbol for the MK /z/. Since modern dialects retain forms such as /nasa/ for **naa** 'get/be better' ← **nā(s)-** and lack the distinction from regular -·s- stems, we assume that the MK version was an ephemeral lenition of an earlier -s-, a lenition which took place under conditions (a later-elided minimal vowel) absent from the regular s-final consonant stems (see Martin 1973, Ramsey 1975). For more on the history of the stems with -·(s)- < -·z- see §2.11.4.

The MK verb *kuz-* 'pull' is the only s-leniting stem with the vowel /u/ and it continues its initial low pitch through a following /u/, as in *kuzu˙m ye* (1481 Twusi 23:10a), but that is a reduction of **kuzGu-*, as we can see from forms with other vowels, such as the infinitive *kuz˙Ge* (1463 Pep 2:200b), and the earlier shape of the stem is reconstructed as **kusuk-* (see §8.3.1). On the other hand, the MK verb *toz-* 'love', with the other minimal vowel o, is from **to˙s[o]-*, and has such forms as *to˙zo˙m ye* (1462 ¹Nung 4:31a), *to˙zon* (1462 ¹Nung 9:96a), and *to˙za* (ibid.). The other stems began with the rising pitch (˝) except when attaching endings that began with a basic vowel (whether ᵘ/o or ᵉ/a). We explain that by assuming that they were originally low-initial dissyllables which had retained the high pitch of an elided vowel -·˙s[ᵘ/o]- (before lenition of the s to z) and blended it with the initial low to produce the rise. For more on this, see the discussion in §8.2.1. Presumably *koz-* 'cut' is like *toz-* 'love' and accordingly is from **ko˙s[o]-*, but only the infinitive *ko˙za* is attested. Similarly only the infinitive *puz˙Ge* is attested for *puzG-* < **pusuk-* = *pozG-* < **posok-* 'crush'.

8.3. Vowel stems.

There are groups of stems which end in every vowel but one: **swī-** 'rest', **sēy-** 'count', **toy-** 'become', **nāy-** 'put out', **ssu-** 'use; write', **sa-** 'buy', **cwu-** 'give', **po-** 'see'. The exception is the vowel e, for the only examples of -·e- in Seoul speech are the abbreviations **ile-**, **kule-**, **cele-**, and **ette-**, and these are irregular stems (§8.3.5) because the infinitives (**ilay, kulay, celay, ettay**) are like **hay**, the irregular infinitive of **ha-** 'do/say/be'. The Hankul spelling writes the stem **su-** 'stand' as **se-** (thereby clarifying to some extent the causative stem **seywu-** 'make stand'), and that is what it must once have been (for MK had ˙**sye-**), but in Seoul speech the verb is regularly **su-**. There are, however, a few clichés which retain **sen** for the modifier (used as an adnoun) instead of the more usual **sun**. Two stems end in -·**ye-** in the Hankul spelling (and in non-Seoul speech), as they did in Middle Korean: **phye-** 'smooth out, ... ' and **khye-** 'turn on (lights), ... '. I treat these as back formations from the Seoul stems **phi-** and **khi-**, based on the contracted infinitives **phye** ← **phie** and **khye** ← **khie**, despite the

earlier versions and the variant pronunciation **phey-** and **khey-**, which is apparently confined to northern speakers. A similar case is **kĕnnu-**, spelled **kĕnne-** by the Korean grammarians, thereby clarifying the causative **kĕnney-**. The Hankul spellings are historically correct: **phi-** was °*phye-* in the 15th century, and **khi-** was first attested in the early 16th century as *khye-*; kĕnnu- was MK ¨*ken'ne-* < ¨*ket'na-* (the second vowel assimilated to the first) from a compound verb ¨*ket-°na-* ('walk' + 'emerge').

Most of the endings attach to the vowel stems in a simple and expected fashion, but there are various complexities involving both the ending and the stem for the infinitive form; they are set forth in §9.4.

8.3.1. L-doubling vowel stems: -LL-.

The l-doubling vowel stem has a shape which ends in vowel + **lu-**. When the infinitive (-e/-a) or the past tense (-ess-/-ass-) is attached, the vowel u drops, as expected, and the remaining l geminates – as not expected: **pulu-** → **pulle** 'calls', **molu-** → **mŏlla** 'does not know' (the long ŏ in the infinitive and forms derived from it is an irregularity). Many Koreans regularize these verbs by doubling the l everywhere; they treat the stems as **pullu-**, **mollu-**, etc. Since the modern Hankul system makes no provision for two l's at the end of a syllable block, the second l is perforce written as the initial of the second syllable (**pul + le**, **mol + la**) even though the infinitive ending itself is just the final vowel.

The odd behavior of these stems goes back to the earliest Hankul texts, so we must reconstruct a still earlier history to account for them. The basic forms were probably pre-MK **pulul-* and **¨mwolol-*. When a consonant was attached, the final liquid dropped, *pulu-'ta* < **pulul-'ta* and *pulu-'kwo* < **pulul-'kwo*; but when a vowel was attached, the minimal vowel MK ʉ (> **u**) itself dropped: *pull-e* < **pulul-e*. Yet among the modern -ll- verbs there are some, such as **talu-** 'be different', for which the 15th-century infinitive was given a spelling (with "*-l.-*") that we interpret as /-lG-/ with the liquid followed by a consonant (probably a voiced velar fricative): **talle** = **talla** < *tal'Ga*. These stems we reconstruct as pre-Hankul **-lʉoG-*, probably lenited from **-lʉok-*, so that the MK stem *talo-/talG-* was earlier **taloG-* < **talok-* and the **G* dropped before a consonant (**taloG-ta* → MK *talo'ta* > modern **taluta**) but before a vowel the cluster *-lG-* assimilated the fricative to the liquid and produced the modern *-ll-*: **taloG-a* > MK *tal'Ga* > *talla* > (Seoul) **talle**. The Taycen version of **taluta** is **taltha**, with a stem **talh-** that may reflect the *G* (see also the Phyengan version, p. 240); another Cenla version **talpu-** (Choy Hak.kun 1978:1191) either carries a suffix or implies that the reconstruction **talok-* should be corrected to **talop-*. (LHS gives a Kyengsang version as **talp-**.) There is other evidence pointing to an original shape like **-lʉop-* for the doublets that lie behind **ccalp-/ccelp-** (< *cyelp-*) < *tyalo-/tyelʉo-* < *tyelG-* < **tyelW-* 'be short, fine' ?< **tyalop-/tyelup-*, **nelp-** and **nelu-** < *nelʉo-* 'be wide' ?< **nelup-*.

Certain peculiarities of dialect versions of stems are also to be accounted for in terms of stem alternants in the Hankul texts for which an earlier single form is to be reconstructed. Most of the types are represented both in verb stems and in nouns, as shown below. (This table is adapted from Martin 1982/3:8-9, with corrections. The Middle Korean alternants are followed by the modern Seoul forms.)

(1)   *-mok-   *simok- 'plant'
                            simo-/simk- > **sīm(q)-**
                       *tomok- 'soak'
                            tomk-/tomo- > **tamku-**

    *-mwok   *namwok 'tree'
                                              namwo/namwok- > **namu**

    *-mwuk   *kwumwuk 'hole'
                                                 kwumwu/kwumk- > **(kwumeng)**
                                         *pwulmwuk 'bellows'
                                                pwulmwu/pwulmk- > **(phulmu)**

(2)   *-n ^{u}/ok   *nyen ^{u}/ok 'other' ?< *nyonok[1]
                                                    nyen ^{u}/o / nyenk‑ > **yenu**

   *...s ^{u}/ok(-)   *posok- 'crush'   *asok 'younger sibling'
                 pozo-/pozG- > **pa(s)-**   azo / azG‑ > **awu**
                    = **paswu-**
                                                    *yes ^{u}/ok 'fox' ?< *yosok[1]
                                                    yez ^{u}/o / yezG‑ > **yewu**
               *kusuk- 'pull'   musuk 'radish'
                 kuzu- / kuzG- > **kkū(s)-**   muzu / muzG‑ > **muwu, mū**
(3)   *...l ^{u}/ok(-)   *talok-[2] 'differ'   *calok 'gunnysack'
                 talo- / talG- > **talu- / tall-** calo / calG‑ > **calwu$_1$**
                                                    *colok 'handle'
                                                    colo / colG‑ > **calwu$_2$**
                                                    *nolok 'ferry'
                                                    nolo / nolG‑ > **nalwu**
                                                    *nwolok 'roe deer'
                                                    nwolo / nwolG‑ > **nolwu**
                                                    *siluk 'steamer'
                                                    silu / silG‑ > **silwu**
(4)   *...l ^{u}/ol(-)   *molol- 'dry up'   *molol 'ridge'
                 molo- / moll- > **malu- / mall-** molo / moll‑ > **malwu**
               *hulul- 'flow'   *holol 'one day'
                 hulu- / hull- > **hulu- / hull-** *holo / holl‑ > **halwu**
(5)   *...lok, ...lol   *kolok, *kolol 'powder'
                                                    kolo / kolG‑ , / koll‑ > **kalwu**

[1] When the vowel of the first syllable is e, the reduced vowel of the second syllable appears both as u and as o, so we reconstruct an undecided * ^{u}/o. The situation probably points to original *yo‑ for such morphemes, even in the absence of other evidence.

[2] Or perhaps *talop- (see above). What evidence we have for the nouns points to a velar, not a labial: in many dialects (Choy Hak.kun 1978) 'roe deer' is **nolki** or **nolkay(ngi)**, and 'steamer' is **silki** in Kangwen (Tokyey) and also (Kim Yengpay 1984) in Phyengan.

For the last example the evidence may indicate competing versions, one of Type 2 and the other of Type 4, the two types represented by the modern l-doubling stems. Dialect forms (**kalgi**, **kalgu**) confirm the velar, while forms such as **kallu** and **kalli** may be the result of lG > ll, and that is the source of the doublet, as confirmed by the dating of kol.l oy (1795 [1]No-cwung 1:20b [K]) < kol`G oy (?1517- [1]No 1:23a) and kol`G ul (?1517- [1]No 1:23b), where the later version of the passage has kol.l i (1795 [1]No-cwung 1:20b [K]) though LCT 9b has that as "kol.l ol". But Ramsey 1975:40 thinks we should reconstruct the doublet on the basis of Ceycwu kolol (Hyen Phyenghyo 1961:116a). I wonder if all the forms may come from a unique shape *kolGol < *kol(o)kol, conceivably a reduplication.

Of the nouns with two alternants, the shape on the left of the slash is the "free" form, used alone or before certain peripheral particles such as ˙two (highlighted focus), ˙kwa (comitative/reciprocal), ˙lwo (instrumental), s (genitive), and sometimes ˙non (subdued focus). The shape on the right is required to attach the primary particles ˙i (nominative), ˙ul (accusative), ˙^{u}/oy (genitive or locative/allative), ˙^{e}/ay (locative/allative), and sometimes ˙^{u}/on (subdued focus), as well as the copula ˙i‑ .

Some of the modern dialects retain features that more clearly point to the earlier forms. In Phyengan, for example (Kim Yengpay 1984:88, 90, 104, 168-71), the following nouns have /lk/ for earlier *l ^{u}/ok: **calk(i)** = **calwu** 'bag' or 'handle', **kalk(i)** = **kalwu** 'flour', **malk(i)** also **mall(i)** = **malwu** 'ridgebeam' **nangk(i)** = **namu** 'tree', **nolk(i)** = **nolwu** 'roe deer' (attested as [norogi] = **noloki** in 1898 Tayshin), **silk(i)** = **silwu** 'steamer'. And the following nouns have /lk/ for MK lG: **elkey-pit** = **elley-pis** 'coarse wooden comb', **kelk(w)um** = **kelum** 'fertilizer', **kwulk^e/ay** = **kwulley**

'bridle', **melkwu** = **melwu** 'mulberry', **molkay** = **molay** 'sand', **nilkwey** = **iley** 'seven days', **pelkeci** = **peleci** 'worm', **swulkwu** = **swuley** 'wagon', **s^i/$_u$lkeng** = **sileng** 'shelf', **tolkaci** = **tolaci** 'bellflower'. An earlier velar is also indicated by Phyengan **alkwuy-** = **alli-** 'let know, inform' and probably **taluh-**/**talu-** 'be different' (with such forms as **taluh.key** and **talun**). Perhaps also (Kim Yengpay 1984:103) the Phyengan stem **kilk-** = **kīl-** 'be long'; notice *kil'li* (1586 Sohak 4:53b) ?< **kil'Gi* 'for a long time' (= *ki'li* > **kil.i**), also MK *'kilh* 'path' (? < 'length') and the peculiar spelling *'kilq'h ol* for one occurrence of its accusative (1462 [1]Nung 6:80a).

The noun *mi'lu* 'dragon' looks as if it should have the forms *milG...* < **miluk* or *mill...* < **milul* but the only examples are of the free form in glossaries. In other texts the Chinese word LYWONG is used for dragon. The following words, probably nativized Chinese nouns containing the diminutive suffix -*zo* (= *"co*), have only one shape, unlike the words in (2) above:

co'zo > *couy* > **cawi** 'kernel' or (*'nwun s* ~) 'pupil (of eye)'

pwo'zo > *pwo[z]o* > **po** 'small bowl'

swu'zo, swu'zu > *swu[z]o* 'a seal-ribbon' ?< ** 'SYWUY-"co*

sway'zo > *sa[z]o* > **(cwu)-sawi** 'dice'

8.3.2. L-extending vowel stems: -L-.

The l-extending vowel stem selects the appropriate alternant of a two-shape ending in the same way as an ordinary vowel stem, but it adds an l to the stem before certain endings:

before all ONE-shape endings that begin with a vowel or with a voiceless consonant other than s — and [1]Yi Ungpayk 1961:499 prefers the extension before s (of a one-shape ending), too, treating **nōlsey** as standard and **nōsey** as variant;

before only those TWO-shape endings that begin with l or m + vowel or y, such as -**lye**, -**la**, -**myen** — and -**m** when it is followed by a vowel-initial particle shape such as **ulo**, **ey**, or **a**.

Perhaps the rule can be more clearly stated: the -l- extension is present except before **p, s, n, mC, ml** and except before the ending -**o**. Accordingly the stem **tu-l-** 'enter' makes the forms **tulko, tulta, tulci, tulkeyss.ta, tul.e, tul.ess.ta, tullye, tulla, tulmyen, tulm ulo**; but **tuo, tunun, tunta, tuna, tun, tul(q)**, and /**tum**/ (spelled **tulm**) + pause or consonant. A long vowel in a one-syllable l-extending stem is shortened in the infinitive and past forms: **kē-l-** 'hang' becomes **kel.e, kel.ess.ta**. (The length in the stem reflects the monosyllabification of a pre-MK dissyllable: **ke'lu-* > *"kel-*/*ke'lu-*.) There is a substandard variety of speech that inserts /u/ between the liquid and a following m or l (also n? — see below): **pulumyen** = **pūlmyen** 'if it blows' (CF An Sangchel 1988:153), **wulul(q)** = **wūl(q)** 'to cry' (Kim-Renaud 1986:112, who says these forms are the more common type in Chwungcheng). According to [1]Yi Tongcay 1989:147 forms like **sal.umyen** for **sālmyen**, **salu.lye** for **sāllye**, and **sal.ul(q)** for **sāl(q)** (to live'), which are "less commonly used and less readily accepted" occur (for Seoul) "only in the speech of some, mostly young, speakers". There may also be speakers who drop the liquid and say **wūmyen** for **wūlmyen** 'if one cries' (Kim-Renaud 1986:113:n8). In Taycen it is usual to say **mel.un** for **mēn** '(that is) distant' and **kel.un** for **kēn** '(that has) hung'. In describing the variants in conjugation of stems such as **kī-l-** ('be long') one suggestion (1936 Roth 141) is to think of a "shortened stem" **kī-** and an "extended stem" **kilu-** as supplementary to the normal stem. That may be helpful in considering dialect variants such as **āci** = **ālci** and **alusio** = **āsio** ('know').

It is unclear whether all of the several nonstandard treatments are analogical innovations or whether some are simply preserving uncontracted forms from the earlier language. The Middle Korean treatment of the modifiers (the elided *[^{u}o]* is explained below):

...l[^{u}o]-n → *...n*, as in *"an cyen'co 'lwo* (1462 [1]Nung 9:13a) 'since he knew' = **ān kkatalk ulo**; *"an ti's 'i* (1449 Kok 43) 'as if he knew' = **ān tus 'i**, *"a'n i* (1482 Kum-sam 2:2b) 'knew' = **ān kes ita**; *"men 'tuy s HHWO-'KYWOW 'lol* (1459 Wel 2:69a) 'alien teachings from distant places' = **mēn tey**

...l[^{u}o]-no-n → *...non*, as in *"a'no.n i ''la* (1482 Kum-sam 2:3a) 'knows' = **ānun kes ita**

...l[^{u}o]-l(q) → *...ll* before i or y, as in *"al'l ye (' mwot ho'l ye)* (1463 Pep 3:86a) 'can you tell me (or not)?' and *'NYELQ-PPAN ay 'tull i 'Gwo* (1482 Kum-sam 2:13b) 'how will they possibly enter nirvāṇa?' = **tulq kes in ko**

···l[ᵘᵒ]-l(q) → ···l(q) (except before *i* or *y*), as in ˙tul ˙tt ol (1463 Pep 1:55b) 'that you can enter' =
tulq kes ul

There is a puzzling form *annon* for ¨a˙non in 1887 Scott 122; perhaps it is a mistake, or a secondary
doubling of the *n* for emphasis.

Before the honorific, modern Seoul uses the "shortened stem" but the earlier language had the
"extended stem":

    ¨a˙losi˙m ye (1465 Wen 1:2:3:6a) = **āsimye** 'knows and'

    ¨wu˙lusi˙n i (1449 Kok 57) = **wūsini** 'cried (and)'

Three situations placed a sibilant directly after a stem, and in these forms the "shortened stem" was
used, with the *l* elided: ˙tuson ˙ta (1462 ¹Nung 5:31b) 'does one enter?' (emotive -so-), ¨azop˙kwo
(1449 Kok 109) 'humbly knowing' (deferential -¨zoW-), ˙tu-˙sa (1447 Sek 13:58a) 'only entering' (=
˙tule ˙za). The basic form of the -L- verbs must have been ···lᵘᵒ- but the surface forms are often
reduced to ···l- (with loss of the vowel) or ··· (with total loss of the syllable). For those stems beginning
with a low pitch (the unmarked tone), the reducing syllable had a high pitch (···˙lo-) and that was kept
and blended with the initial low so that, for example, *a˙lo- became ¨al··· and ¨a-, but the basic accent
survived in the infinitive a˙l-a, the modulated forms a˙l-wo-, and the forms with the elided-initial
version of the effective forms a˙l-a··· (but not in ¨al-¨Ga··· with the lenited-initial version). The critical
factor for the low initial accent is that the surface form of the attached element begins with a basic
vowel. That means we must treat the honorific as basically vowel-initial: ¨a˙l-osi-, ¨wu˙l-usi-. One
further point: the initial low of a stem with the vowel *u* (but not *wu*) or the vowel *o* (but not *wo*) stayed
low in all forms, so that *tul*- 'lift' has such forms as *tun* (1481 Twusi 8:35a), *tunon* (1463 Pep 4:19a),
tul(q) (1527 Cahoy 3:10b=23b), tu˙ti (1463 Pep 2:173b), and tu¨zopke˙na (1447 Sek 13:53b), as well
as tu˙le (1449 Kok 73), tu˙lwum (1482 Kum-sam 3:22a), and tul˙Gwo (1459 Wel 7:8a). Likewise *mul*-
'bite', *nul*- 'be better', and *pul*- 'envy' (but not ¨pwul- 'blow'). There is a counterpart in the initial
high pitch of the stems ˙tul- 'enter' and ˙sul- 'vanish', which is retained in all forms. But the two
phenomena may have come about in different ways. Middle Korean had no word-initial syllables *¨Cul
or *¨Col except for stems with final consonant clusters as found in ¨kolp˙kwo (1481 Twusi 20:22a)
'lining them up', ¨solp˙kwo (1459 Wel 1:15b) 'telling a superior', and ¨tulp˙kwo (1463 Pep 6:154b)
'piercing'. The few attestations to the contrary are scribal errors: ¨pol˙sye (?1512· Pak 1:37b) must be
a mistake for pol¨sye (id. 1:5b), a variant (1462 ¹Nung 1:37a, 1518 Sohak-cho 8:7a) of pol˙sye (1465
Wen se:68a, 1481 Twusi 7:8a, 1483 Kum-sam 2:2b) = pol˙ssye (1447 Sek 6:35b; 1459 Wel 9:36a;
1462 ¹Nung 3:25ab, 9:117a, 1463 Pep 4:63b) 'already'. Therefore the accent of forms such as kol˙Gwo
(1466 Kup 1:10a) 'changes and' or tul˙Gwo (1459 Wel 7:8a) 'lifts and' are functionally equivalent to
that of ¨mel˙Gwo (1459 Wel 10:23b) 'is far and'. Even without the accentual clue we will still account
for the choice of regular, extended, or shortened stem by assuming that the original stem had two
syllables, the second of which bore a basic high pitch. Stems with the higher of the minimal vowels:
*˙tu˙lu- > ˙tul- 'enter', *˙su˙lu- > ˙sul- 'vanish';
*tu˙lu- > [¨]tul- 'lift', *mu˙lu- > [¨]mul- 'bite', *nu˙lu- > [¨]nul- 'be better', *pu˙lu- > [¨]pul- 'envy'.
This notation presumes a stage when the low-rise was actually pronounced, but such a stage may not
have existed: the reduction of the expected low-rise to just low may have been simultaneous with the
truncation. In any event, in Part II we leave the initial syllable of these stems unmarked (i.e. low),
following the Hankul spellings. Stems with the lower of the minimal vowels:
   *˙ko˙lo- > ˙kol- 'grind', *˙pho˙lo- > ˙phol- 'sell', *˙so˙lo- > ˙sol- 'burn it', *˙sko˙lo- > ˙skol-
'spread it out', *˙spo˙lo- > ˙spol- 'be sharp-pointed; launder; sip', *˙to˙lo- > ˙tol- 'hang';
   *ko˙lo- > [¨]kol- 'change', *mo˙lo- > [¨]mol- 'roll it up', *no˙lo- > *[¨]nol- 'fly', *to˙lo- >
[¨]tol- 'be sweet; weigh it'.

    In citing the l-extending stems of modern Korean, it is handy to mark them off from those
consonant stems that end in **l** (lenited from a pre-MK *t) by inserting a hyphen before the extension,
for when we write **tu-l-** 'enter' that way not only are we reminded that it belongs with the vowel-stem

conjugation but that it is different from **tut-**/**tul-** 'hear' (§8.2.4), though the two stems have in common the shape of the infinitive **tul.e** 'enters' or 'hears', and the past-tense forms based on that.

In Hankul the -l- extension should always be written with the final syllable of the stem, so that 'enters' and 'hears' are both spelled **tul.e**, but many Koreans violate this rule by beginning the first syllable of the ending with the letter l when possible, especially in the infinitive, and such spellings were common in all but a few of the early texts. The best way to state the Hankul spelling rule is perhaps as follows. For the l-extending vowel stems such as **tu-l-** 'enter', write the l — at the end of the last syllable of the stem — only when it is heard, but always write the substantive as ···**lm**. For the l-final consonant stems such as **tul-** 'hear' (the -T/L- stems), write a stem-final l whenever the l is actually heard, but in all other forms write a stem-final **t**.

Some of the l-extending stems are confused by many Koreans with regular or l-doubling stems in their paradigmatic forms: we find both **ecilun** and the standard **ecin** for the modifier of **eci-l-** 'be kind, good' and **situlun** alongside **situn** for the modifier of **situ-l-** 'wither, wilt' (as in ~ **chǎyso** 'wilted vegetables' and ··· **son** 'withered hand'). We find also **āl.um** for **ālm** 'knowledge', and **al.un** for **ān**, the modifier of **ā-l-** 'know'. I have also heard /**alumnita**/ = **al.up.nita** for **āp.nita**. Common variants, usually considered nonstandard in the modern language, drop the l before t, l, and especially c: **āci** (= **ālci**) **mōs hanta** 'can't know', **āta** (= **ālta**) **siph.i** 'as we know'. For the negative auxiliary in **haca māca** (= **mālca**) '(no sooner than =) as soon as one does', the shorter form seems to be the norm. All these variants were the usual forms in earlier Hankul texts (§2.11.2), so that the modern standard usage shows either a restoration or a preservation of spoken versions of the language that never did suppress the l.

8.3.3. L-inserting vowel stems.

The l-inserting stem ends in a vowel + **lu**, like the l-doubling stem, but instead of dropping the **u** and doubling the l it adds an l before the infinitive or the past-tense element: **nwulu-** 'be yellow' → **nwulule**. (The orthography, of course, spells the l with the ending: **nwu-lu-le**.) There are only a few such stems: **nwulu-**/**nolu-** 'be yellow', **phulu-** 'be blue', (**kām**)-**phalu-** 'be blue', and **ilu-** 'reach'. Compare **ilule** 'reaches' with **ille** (< *nil´Ge*) 'says' or (< *il´Ge*) 'is early' from l-doubling stems **ilu-** < *nil*ᵘ⁄ₒ-/*nilG*- < **nil*ᵘ⁄ₒ*G*- and *il*ᵘ⁄ₒ-/*ilG*- < **il*ᵘ⁄ₒ*G*-. And compare **nwulule** 'is yellow' with **nwūlle** 'presses down' < MK *nwu´lu-*/*nwull*- < **nwu´lul*-. The l-inserting stems must be < *···*l*ᵘ⁄ₒ*l*-, but that is clearly attested only for **ilu-** < *ni´lul*- 'reach'. Taycen regularizes the verb **ilu-** to **ilulu-**, so that **ilulun kos** is said for **ilun kos** 'place reached'.

Aside from the few l-inserting stems, all stems that end in ···**lu-** seem to be the l-doubling type, with the following exceptions, which are simply among the regular vowel stems that happen to end in ···**u-**: **ttalu-** (→ **ttale** or **ttala**) 'conform, obey; pour', **chilu-** (→ **chile**) 'pay, disburse', **tatalu-** (→ **tatale** or **tatala**) 'arrive' from a consonant stem **tatal-** (**tatat.ta**), **mak-talu-** (→ **mak-tale** or **mak-tala**) '(an alley) be closed at one end', and **wulelu-** (→ **wulele**) 'lift one's head, look up, respect'.

South Korean dictionaries also list **salu-** 'winnow' as regular, with the infinitive **sale** (or **sala**), but North Korean dictionaries list it as l-doubling, like the verb **salu-** 'set afire' with the infinitive **salle** (or **salla**). I have been unable to confirm either version, for the common way all my informants say 'winnow' is **khi cil ha-**.

8.3.4. Ambivalent stems: -(H)-.

Ambivalent stems are treated as consonant stems that end in **h** (§8.2.2) before **-sup.nita** and before one-shape endings not beginning with a vowel (i.e. those other than the infinitive and the past-tense element, which are like the forms of irregular stems, §8.3.5), but as vowel stems, with the **h** dropped, before two-shape endings other than **-sup.nita**/**-p.nita**. These stems are all derived from an infinitive (**-e**/**-a** etc.) + a reduced form of the irregular adjective **ha-** 'be', so their infinitives and past-tense forms are similar to **hay** and **hayss-** (§8.3.5). Stems derived from the processive verb **ha-** 'do, say' are not ambivalent (despite mistaken spellings by some writers), they are just irregular vowel stems like **ha-**. Compare the following examples:

	ADJECTIVE	VERB INTRANSITIVE
stem	kule(h)- 'be like that'	kule- 'do/say like that'
gerund	kuleh.ko /kulekho/	kuleko
suspective	kuleh.ci /kulechi/	kuleci
formal statement	kuleh.sup.nita	kulep.nita
	/kulessumnita/	/kulemnita/
adversative	kulena	
substantive	kulem	
infinitive	kulay	

In the spoken language all ···h- stems (§8.2.2) are usually treated as if ambivalent, but they have regular infinitives: **neh.e** (often pronounced /nē/), **noh.a** (often pronounced /noa/ or even /nwa/, §2.7.7). And they always have the alternant -a (rather than -e) after ···**ah-**, as in **tah.a** (often /tā/) from **tah-** 'touch; reach'. Roth (1936:158) gives the infinitive of **cokomah-** 'small' as **cokoma** and of **twungkuleh-** 'round' as **twungkule** but has ···**ay** for the infinitive of the other ambivalent stems.

8.3.5. Irregular stems: ha- and derivatives.

The infinitives are irregular for the stem **ha-** < °*ho-* both as the processive verb 'do / say' and as the adjective 'be' (but not the obsolete **ha-** < °*ha-* 'big, much, many'), and for certain processive stems derived from it. The infinitives of **ha-**, **ile-**, **kule-**, **cele-**, **ette-**, and **āmule-** are **hay**, **ilay**, **kulay**, **celay**, **ettay**, and **āmulay**. The infinitive of **ha-** has the literary variant **ha.ye** (also **ha.ya**). The past-tense forms follow the pattern of the infinitive: **hayss-** or **ha.yess-**, **ilayss-**, **kulayss-**, ... There are no literary variants for the derived verbs because they are abbreviations and in formal writing they are expanded to their models: **ile hay** or **ile ha.ye** (= **ilay**), **kule hayss-** or **kule ha.yess-** (= **kulayss-**). **Ette** 'what way' has a variant **ecce**, and from that comes a derived adverb (§9.6) **ecci** with about the same meaning. Notice that /eccay/ 'how' is an abbreviation from **ecci hay** (→ **ecc' 'ay**). There is also a derived adverb from the adjective **ha-** 'be', with the shape **hi** < ˙*hi* (§9.6). And we might want to consider **sikhi-** 'cause to do' as an irregular alternant **s-** of the stem **ha-** + the bound postverb **-ikhi-** (found also in **tol.ikhi-**); see §7.4.

8.3.6. Irregular stems: k-inserting and n-inserting.

A few stems have two infinitive forms: the normal one is formed as expected, the special one is used only before the command particle **la**. Do not confuse this word with the subjunctive attentive ending **-ula / -la**, which is attached directly to the stem and produces a plain command used only in quotative constructions or literary forms. The two are indeed etymologically related, though not quite not as directly as the shapes seem to suggest. Notice the exclamatory use of adjective infinitive + **la** and see the historical remarks in the entries of Part II. For vowel stems that end in **ey**, **oy**, **ay**, or **a** the two command structures will sound identical: **sēy(e) la**, **sēyla** 'count!'; **oy(e) la** (spelled "**wayla**" in the Hankul orthography, CF §9.4), **ōyla** 'memorize!'; **nāy la**, **nāyla** 'pay!'; **sa la**, **sala** 'buy!'. But for the other stems a difference is heard: **mek.e la**, **mek.ula** 'eat!'; **nol.a la**, **nōlla** 'play!'; **kie la**, **kila** 'crawl!'; **ttwie la**, **ttwila** 'jump!'; **cwue la**, **cwula** 'give!'; **sse la**, **ssula** 'write!'. In Seoul the forms for 'stand!' are different (**se la**, **sula**) but they are identical in the literary / dialect forms (**se la**, **sela**).

The vowel stems **ca-** 'sleep', **na-** 'emerge, ... ', **ka-** 'go', and **toy-** 'become', together with the consonant stem **iss-** 'stay', insert a **k** before attaching this secondary infinitive ending: **cake la**, **cala** 'sleep!'; **nake la**, **nala** 'emerge!'; **kake la**, **kala** 'go!'; **iss.ke la**, **iss.ula** 'stay!'. The vowel stem **o-** 'come' uniquely inserts **n**: **one la**, **ola**. In Hankul spelling the inserted phoneme is written as the onset of the infinitive syllable, and the string with the particle is considered by the grammarians to be an unanalyzed ending (**ka-ke-la**, **o-ne-la**, **iss-ke-la**). There may be other stems that belong to this class. According to Choy Hyenpay 1959:334-5, competing variants of the type **iss.e la** and **iss.ke la** occur for that verb and also **tul-** 'hear' (**tul.e la** and **tut.ke la**), **cwuk-** 'die' (**cwuk.e la** and **cwuk.ke la**), **anc-** 'sit' (**anc.e la** and **anc.ke la**), and **su-** 'stand' (**se la** and **suke la**). Choy treats the -ke version as

"dialect" for all these stems, but that may not be entirely accurate. I have heard **ka la** for **kake la** and for **one la** we can expect to hear **wǎ la** (which I am told is a "Seoul-ipsism"). In the expression **toylq tay lo toy(ke) la** 'let what may happen happen!' either treatment is accepted. Some people insert **-k-** for all one-syllable stems ending in ⋯**a-**. The **-k-** and the **-n-** come from morphemes marking the "effective" aspect of Middle Korean.

9.0. Endings.

We describe the verb endings in terms of sequence positions (§9.1): where each ending fits when put into a long string of endings. More detailed information is given for the specific categories in separate sections (§§9.2−8). The modern verb system developed from an earlier scheme, which is described in a similar fashion in §9.9. The description focuses on form and shape, but both here and in later parts of the book attention is paid also to function and meaning.

9.1. Sequence positions.

The total number of paradigmatic endings for modern Korean is well over 400. And that number does not include structures that are here treated as inflected form + particle (such as **-e se, -e to, -e ya, -e la; -ki ey, -ki lo; -ko nun; -ci man; -um ulo, ⋯**) or cases of modifier form + postmodifier (such as **-tun ci, -nun ya, -ulq ka, -nun tey, ⋯**), or abbreviated quotative constructions (such as **-ta 'nta ← -ta hanta, -ulye 'nta ← -ulye hanta, ila 'nun ← ila hanun, ⋯**). Korean grammarians often lump these constructions together with the inflected forms, and in those cases where the syllable division could show a difference (as with **-nun ya**) the Hankul spelling system leaves them unanalyzed.

We can class the ingredients of the various endings into rough semantic categories: STATUS, TENSE, ASPECT, STYLE, and MOOD. None of these terms are to be taken as identical in reference to the way they are used in descriptions of other languages, though there are obvious similarities. See §11 for some of the ways the categories are used in Korean.

There are two morphemes of TENSE. The PAST marker is historically a contraction of the infinitive mood (typically **-e**) + the stem **iss-** 'exist', and it has the typical shape **-ess-**, with the vowel **e** subject to most of the same variations as those of the infinitive mood ending **-e**, including the shape **-ass-**. We say the contraction is historical because today **anc.e iss.ta** 'is seated' means something slightly different from **anc.ess.ta** 'sat down'. The FUTURE marker has the typical shape **-keyss-**. While it could be regarded as an abbreviation of the shortened variant **ke** of the word **kes** here meaning '[tentative or probable] fact' + **iss-**, the historical origin seems to be the effective infinitive -`ke` + **iss-**, so that the difference between **-ess-** and **-keyss-** comes from the difference between -`e` and -`ke`. The meaning of the past marker is a definite and completed action or state (and so, usually past); the future marker shows an incompleted action and it is used both for a definite future and a probable present (or past). The probable future is expressed by the periphrastic expression **-ulq kes ita** 'it is the probable fact that it will happen / be', with the subject usually limited to the second and third person, since the first person is someone the speaker can make more definite statements about. On this structure is built a probable-past construction **-ess.ulq kes ita** 'it is the probable fact that it will have happened / been'. The action or state of PAST-PAST (**-ess-ess-**) is more remote or more definitely completed than that of PAST, but it is not necessarily related to some other past action, and therefore it does not always correspond to the English pluperfect 'it had happened / been'. Typical cases and their implications are **kass.ess.ta** 'he went (but is back)' as against **kass.ta** 'he went − and is still away' = 'he's gone', **wass.ess.ta** 'he came (but left again)' = 'he was here' as against **wass.ta** 'he came − and is still here' = 'he's here', and **mek.ess.ess.ta** 'I ate − but I'm hungry again' as against **mek.ess.ta** 'I've eaten − so I'm full'. The action or state of PAST FUTURE is either future perfect ('will have happened / been, would have happened / been') or probable past ('probably happened / was, likely has happened / been'). There are PAST-PAST FUTURE forms (**kass.ess.keyss.ta**), but they are rarely heard.

The STATUS morpheme is the honorific marker, which shows a special deference toward the subject of the inflected form − or, in a few constructions, toward an indirect or implied subject. See §11.2. There are five ASPECT morphemes: INDICATIVE, SUBJUNCTIVE, RETROSPECTIVE, and

PROSPECTIVE. The exact range of meaning for each is hard to put into words except in a list of the meanings of all the endings which include the morpheme. The SUBJUNCTIVE aspect underlies, when combined with the assertive mood, the ending which expresses suggestion, proposition, or immediate sequence ("as soon as"), and has the plain-style form **-ca**. When combined with the attentive mood, the subjunctive is realized as the imperative ending that is used to express commands, plain-style **-ula**. The RETROSPECTIVE aspect means something like 'it has been observed that -- '. The observation can be that of the speaker, that of someone else, or a purely grammatical device, used to express a recent past. The PROSPECTIVE shows an action which is to be (by wish, obligation, or just expectation) or a state which is yet to be. The PROCESSIVE focuses attention on an action under way, in process.

The number of what we are calling MOOD morphemes is much larger, and it is at times difficult to decide whether to add to that number by counting as a separate mood an element which can perhaps be broken into smaller parts. I have preferred a rather atomistic analysis. The term "mood" is used very loosely to cover the grammatical meaning of the final morpheme in each inflectional ending. Four of the moods are particularly troublesome because of their frequency and the complexity of alternations in shape when they are combined with other morphemes (see also §11.3, §11.5): the assertive, attentive, apperceptive, and modifier (or adnominal).

The ASSERTIVE mood when attached to indicative, retrospective, or processive aspects gives us forms which can be called "statement" or "declarative", for they assert some fact. When attached to the subjunctive aspect, the assertive mood gives us a form which can be called "suggestion" or "propositive" or "hortative", for it asserts a proposition or suggestion − or, in the plain form **-ca** only, it shows an immediate sequence ("no sooner ... than"). Sometimes the suggestion or proposition is addressed primarily to oneself, the speaker, and translates as 'let me' or 'I will' or 'I must'. More commonly it is inclusive 'let us, let's'. Occasionally, it urges the addressee (in place of a direct command), as in **Ca, phyo lul ppalli sapsita** 'Well (let's you just) hurry up and buy the tickets!'.

The ATTENTIVE mood when attached to indicative, retrospective, or processive aspects gives us forms which can be called "question" or "interrogative": they await a verbal response on the part of the listener. When attached to the subjunctive aspect, the attentive mood gives us a form which can be called "command" or "imperative": it is an order which awaits an action response on the part of the addressee.

The APPERCEPTIVE mood indicates a sudden realization on the part of the speaker, 'Oh, I see that ... !' Certain expected occurrences of this mood are replaced by periphrastic constructions; see §11.5. There are retrospective apperceptive forms, **-tu-kwu(me)n**, but they are interchangeable with the retrospective modifier + postmodifier **-tun kwu(me)n**, and probably they can be regarded as abbreviations of that structure, which is seldom heard in full.

The MODIFIER mood indicates that the form modifies (partially describes) the following noun or noun expression. The resulting forms are adnominal endings; they have sometimes been referred to as "participles".

If we examine all the endings and divide them up into constituent elements, we find seven SEQUENCE POSITIONS, provided we ignore the complex moods discussed in §9.7. The maximum seven-slot possibility can be shown by the ending **-usyess.ess.keyss.ˢup.nita** /**-us(y)essekkeyssumnita**/, the honorific past-past future formal indicative assertive, with a meaning something like 'probably deigned to do it at an earlier time, sir'. When we separate the parts of the string by hyphens and write each part according to its basic shape, the ending looks like this: **-usi-ess-ess-keyss-sup-ni-ta**.

The various shapes of the ending morphemes are displayed, in accordance with their sequence positions, in the following table and in the list of mood morphemes that follows it. The assertive and attentive moods have been split into two subsections to facilitate discussion; as a result, the shapes **-ta** and **-ey** are repeated. A slant bar separates forms which alternate depending on whether the attaching stem ends in a consonant or a vowel in its basic shape. Parentheses enclose dialect versions of the standard forms: **(-up-)** for **-sup-**, **(-uo)** for **-so**. A zero alternant is shown as "**[ ]**".

TABLE OF ENDINGS

1. STATUS	2. TENSE	3. TENSE	4a. TENSE	5. STYLE	6. ASPECT
Honorific	Past	Past	Future	Formal	1. Indicative
-usi / -si-	-ess-	-ess-	-keyss-	-sup- (-up-) / -p-	-ni-
-us(y)- / -s(y)-	-ass-			-u-	-n-
	-ss-			-[ ]-	-[ ]-
	-yess-				2. Subjunctive
	-yass-				-si-
					-sy-
			4b. ASPECT		-[ ]-
			Prospective		3. Retrospective
			-ul- / -l-		-ti-
					-tu-
					-t-
					-l-
					4. Processive
					-nun- / -n-

7. MOOD
  1. Assertive (§9.2)
    1a. Declarative
      -ta ; -la
      -ey
      -so (-uo) / -o, [adj variant] -ui / -i
    1b. Propositive
      -ta
      -ca
      -ey
  2. Attentive (§9.2)
    2a. Interrogative
      -kka
      -i
      -a
    2b. Imperative
      -o
      -ula / -la
  3. Apperceptive (§11.5)
    -kwumen, -kwun, -kwulye
    3a. Extended apperceptive -kwun a
  4. Modifier (§9.3)
    -un / -n
    -[ ]q (after prospective)
  5. Infinitive (§9.4)
    -e, -ey, -ye, -yey
    -a, -ya
    -y, -[ ]
  6. Adversative 'but' -una / -na
    6a. Extended adversative 'but anyway'
      -una-ma / -na-ma

7. Sequential 'as' (< adverbialization of modifier + postmodifier)
    -uni/-ni < -u˙n i '[its being] the fact that ·· '
      7a. Extended sequential 'therefore' -uni-kka/-ni-kka
8. Suspective 'questioned/denied fact; supposed/presumed fact' -ci
9. Projective 'to the point where, so that' -tolok
      9a. Extended projective 'so that indeed' [dialect] -tolok-i
10. Adverbative 'so that' -key
      10a. Extended adverbative 'so that indeed' [dialect]
            -key-kkum (= -key to), -key-sili
11. Gerund 'and also' -ko
12. Summative 'fact, act' -ki
      12a. Extended summative 'since, because' [dialect] -killey (= -ki ey)
13. Substantive 'fact, doing' (§9.5) -um/-m
    13a–d. Complex moods built on the substantive
      13a. Conjunctive 'and' -umye/-mye (< -um + ie copula infinitive)
      13b. Extended conjunctive = conditional 'if, when'
            -umyen/-myen (< -umye n' = -umye nun)
      13c. Contingent 'upon, as a result of (doing)'
            -um ey/-m ey (treated as -umay/-may by the grammarians)
      13d. Assumptive 'I'm willing to, I will/promise'
            -um a/-m a (see below); -um sey/-m sey
14. (= 4b + 7.4 =) prospective modifier -ulq/-lq
14a–i. Complex moods built on the prospective modifier (§9.7.1)
      14a. Intentive -ulye/-lye
      14b. Purposive -ule/-le
      14c. Frustrated intentive -ulyes-man (un) / -lyes-man (un)
      14d. Prospective assertive -ulita/-lita; -ulila/-lila
      14e. Prospective attentive -ulikka/-likka
      14f. Prospective sequential -ulini/-lini
      14g. Prospective literary indicative assertive
            -ulini^t/ⱡa / -lini^t/ⱡa
      14h. Intentive assertive [old-fashioned]
            -ulyetta/-lyetta (usually spelled -ulyes.ta)
      14i. Cajolative -ulyem (una) / -lyem (una)
    15a–j. Complex moods built on the effective formative -˙ke- (§9.7.3).
      15a. Tentative adversative -kena
      15b. Tentative sequential -keni
      15c. Semi-literary sequential -kwantey
      15d. Provisional -ketun
      15e. Tentative conditional -ketumyen
      15f. Literary conditional -kentay
      15g. Semi-literary concessive -ken man (un) (= -kes man)
      15h. Literary concessive -kenul
      15i. Tentative assertive -kes.ta
      15j. Tentative suspective -kes.ci
      15k. Immediate future -ukkey/-kkey (= -u'q key / -'q key < -[u]lq key)
16. Transferentive (§9.8) -ta (ka)
17. Concessive (p. 823) -toy
18. Derived adverb-noun (§9.6) -i, -li ; -o, -wu

Our spacing of **-um a** (14d) indicates a rather casual juxtaposition of **-um** and **a**, but the form is actually quite old, possibly even cognate with the Old Japanese future ending -(a)-mu, and the fact that it can be put into an indirect quotation (**chayk ul sa cwum a ko yaksok hayss.ta** 'promised to buy me a book'), like some of the assertive and attentive forms, casts doubt on our analysis. But notice that questions are normally put into indirect quotations by way of adnominalization to the (bound) postmodifier **ya** or **ka** 'question': the spacing of **cwum a ko** may be as defensible as that in **cwuess.nun ya ko** (with obligatory processive marker) or **cōh.un ya ko**. Treating these and similar endings as opaque entities, as the Hankul orthography does, skirts the issue of morphological identity.

9.2. Assertive and attentive endings.

Below are listed the principal endings which combine the assertive and attentive moods with the morphemes of aspect and style. The list is not a style paradigm, such as that found in §11.3; for different styles, the same semantic category is sometimes represented by periphrastic constructions or simply does not occur. The first column shows the spelling of the ending, the second shows the morph division, and the third gives a label for the category.

-ta	**-[ ]-ta**	PLAIN indicative assertive (= declarative): in the colloquial attached only to adjective stems, or to adjective + honorific marker, and to past and future elements (attached to any stem), or to the quasi-processive stems iss- and ēps-. But see §9.8.
ila / 'la	**i-[ ]-la**	indicative assertive of the copula when it is used in QUOTATIVE constructions
-ney	**-n-ey**	FAMILIAR indicative assertive
-so / -o[1]	**-[ ]-so / -[ ]-o**	AUTHORITATIVE indicative assertive
-ui / -i	**-[ ]-ui / -[ ]-i**	AUTHORITATIVE indicative assertive [variant with adjective (and also iss-, ēps-, -ess-, -keyss-?)]
-sup.nita / -p.nita[1]	**-sup-ni-ta / -p-ni-ta**	FORMAL indicative assertive
-ca	**-[ ]-ca**	PLAIN subjunctive assertive (= propositive)
-sey	**-s-ey**	FAMILIAR subjunctive assertive (= propositive)
-upsita / -psita[2]	**-up-si-ta / -p-si-ta**	FORMAL subjunctive assertive (= propositive)
-tula	**-tu-la**	PLAIN retrospective assertive
-ti	**-t-i**	PLAIN retrospective attentive (= interrogative)
-tey	**-t-ey**	FAMILIAR retrospective assertive
(iley =) itey	**(i-l-ey =) i-t-ey**	FAMILIAR retrospective assertive of the copula
-suptita / -ptita[1]	**-sup-ti-ta / -p-ti-ta**	FORMAL retrospective assertive
-ni	**-n-i**	PLAIN indicative attentive (= interrogative)
-na	**-n-a**	FAMILIAR indicative attentive (= interrogative)[3]
-sup.nikka / -p.nikka[1]	**-sup-ni-kka / -p-ni-kka**	FORMAL indicative attentive (= interrogative)
-ula / -la	**-[ ]-ula / -[ ]-la**	PLAIN subjunctive attentive (= imperative)
-usio / -sio / -psio[3]	**-u-si-o / -[ ]-si-o / -p-si-o**	FORMAL subjunctive attentive (the last shape is attached to the honorific marker). A popular misspelling: "-usiyo / -siyo / -psiyo".
-suptikka / -ptikka[1]	**-sup-ti-kka / -p-ti-kka**	FORMAL retrospective attentive (= interrogative)
-nit/ɪ**a**	**-ni-**t/ɪ**a**	LITERARY indicative assertive

[1] South Koreans often write the alternant **-o** for **-so** and the variant **-up-** for **-sup-** after the sequence **ss** (of **iss-, -ess-, -keyss-**) and after **ēps-**. The automatic alternations (§2.6) are such that both **ss** + **so** and **ss** + **o** correspond to /sso/, and both **ēps-** + **-o** and **ēp-** (← **ēps-**) + **-so** correspond to /ēpsso/. The variant forms seem to be older, and also occur as nonstandard versions after any consonant; that may account for the tendency to write them whenever they are not in actual conflict

with the pronunciation, but **-o** is expanded to **-uo: mekuo = mekso** 'eats', **wusuo = wus.so** 'laughs'. We could follow the South Korean habit of writing **iss.up.nita, -ess.uptikka, -keyss.o** (even though we analyze the endings as **-sup.nita, -suptikka, -so,** etc.), but in this book we indicate both spellings with the notations -�ˢ**up.nita,** -ᵋ**uptikka,** -ᵋ**o,** etc. A number of South Korean authorities, too, favor writing the forms with s unless one is using the variant forms **-up.nita** and **-o** throughout the text, with ALL consonant stems. And, in fact, the always-s versions became the new standard in South Korea in 1988.

² The shapes **-psita** and **-psio** are used after the honorific **-si-**. The shape **-psita** is used after all vowels (**kapsita** 'let's go!') but **-psio** normally appears only after the honorific **-si-**, so that **ka-psio** is treated as a nonstandard variant of **ka-sio**. The shape **-upsita** occurs regularly after a consonant, so that **ilk.supsita** is treated as a nonstandard version of **ilk.upsita** 'let's read it!' You will sometimes hear **-upsio** for **-usio** after a consonant (**ilk.upsio = ilkusio** 'read it!'), and **-sio** sounds the same as **-usi yo**, variant of **-usey yo ← -usye yo** used for polite-style commands and propositions as well as statements and questions. You may also hear **-supsio** after a consonant (**ilk.supsio = ilk.usio**); such forms are nonstandard. [1]Yi Ungpayk 1961:565 draws an artificial distinction between "**-sio**" for questions, commands, or exclamations and "**-siyo**" for statements or conjoinings. Yet (566) he completely rejects "**io**" in favor of "**iyo**", whatever the meaning; CF §11.5.7.

³ CF the adversative **-una/-na**, with which there is some overlap in usage, e.g. with the meaning 'or' in the construction **-una ... -un** for adjectives. The familiar indicative attentive **-na** is used also for **-nun ka/ya**; CF **pi ka ona pota = pi ka onun ka pota** 'It seems to be raining'. But adjective + **-na pota** is rejected in favor of **-un ka pota**, as in **cōh.un ka pota** 'it seems to be all right'.

See also **-ulita/-lita, -ulikka/-likka, -ulyetta/-lyetta, -kes.ta.** Notice also the unusual colloquial forms **-(su)pci yo** and **-(u)psey** among the entries of Part II.

9.3. Modifier endings.

The modifier mood marks a form as the head of a construction that modifies (= is adnominal to) a following noun or noun phrase. If the stem is that of a processive verb, the English translation of the plain modifier form (**-un/-n**) is usually in the past or perfect: **on sālam** 'a person who came, a person who has come', **ilk.un chayk** 'a book one has read'. When the stem is that of a descriptive verb, the English translational equivalent is usually in the present tense: **khun cip** 'a house that is big, a big house', **hak.kyo sensayng in Kim sensayng** 'Mr Kim who is a school teacher'. To say 'a house which was (observed to be) big' you have to use a retrospective modifier **khess.tun cip**, and for 'Mr Kim who was (at the time recalled) a school teacher' you can say **hak.kyo sensayng itun Kim sensayng**. See §11.8. Forms without the explicit past or future markers are either present by default, as it were, or are timeless. They are often used to refer to past happenings and even more often to future events.

The various modifier forms are listed below. In the first column is the spelling of the occurring alternants, with the typical shape (the one that occurs after a consonant) given first. Shape alternants are separated by a slant bar when they alternate according to whether the last phoneme of the stem is a consonant or a vowel. Other alternants (such as those involving the past element, which varies in the same ways as the infinitive, §9.4) are indented beneath the typical shape.

-un/-n	**-un/-n**	modifier
-ess.un	**-ess-un**	past modifier
-tun	**-t-un**	retrospective modifier
-ess.tun	**-ess-t-un**	past retrospective modifier
-ass.tun	**-ass-t-un**	
-ss.tun	**-ss-t-un**	
-yss.tun	**-yss-t-un**	
-yess.tun	**-yess-t-un**	

-ess.ess.tun	-ess-ess-t-un	past-past retrospective modifier
-ass.ess.tun	-ass-ess-t-un	
-ss.ess.tun	-ss-ess-t-un	
-yss.ess.tun	-yss-ess-t-un	
-yess.ess.tun	-yess-ess-t-un	
-keyss.tun	-keyss-t-un	future retrospective modifier
-ess.keyss.tun	-ess-keyss-t-un	past future retrospective modifier
-ass.keyss.tun	-ass-keyss-t-un	
-ss.keyss.tun	-ss-keyss-t-un	
-yss.keyss.tun	-yss-keyss-t-un	
-yess.keyss.tun	-yess-keyss-t-un	
-nun	-n-un	processive modifier
-keyss.nun	-keyss-n-un	future processive modifier
-ul.nun / -l.nun	-ul-n-un / -l-nun	prospective processive modifier
-ess.keyss.nun	-ess-keyss-n-un	past future processive modifier
-ass.keyss.nun	-ass-keyss-n-un	
-ss.keyss.nun	-ss-keyss-n-un	
-yss.keyss.nun	-yss-keyss-n-un	
-yess.keyss.nun	-yess-keyss-n-un	
-ess.ess.keyss.nun	-ess-ess-keyss-n-un	past-past future processive modifier
-ass.ess.keyss.nun	-ass-ess-keyss-n-un	
-ss.ess.keyss.nun	-ss-ess-keyss-n-un	
-yss.ess.keyss.nun	-yss-ess-keyss-n-un	
-yess.ess.keyss.nun	-yess-ess-keyss-n-un	
-ess.nun	-ess-nun	past processive modifier
-ass.nun	-ass-nun	
-ss.nun	-ss-nun	
-yss.nun	-yss-nun	
-yess.nun	-yess-nun	
-ess.ess.nun	-ess-ess-n-un	past-past processive modifier
-ulq / -lq	-ul-[ ] / -l-[ ]]q	prospective modifier
-ess.ulq	-ess-ul-[ ]q	past prospective modifier
-ass.ulq	-ass-ul-[ ]q	
-ss.ulq	-ss-ul-[ ]q	
-yss.ulq	-yss-ul-[ ]q	
-yess.ulq	-yess-ul-[ ]q	
-ess.ess.ulq	-ess-ess-ul-[ ]q	past-past prospective modifier
-ass.ess.ulq	-ass-ess-ul-[ ]q	
-ss.ess.ulq	-ss-ess-ul-[ ]q	
-yss.ess.ulq	-yss-ess-ul-[ ]q	
-yess.ess.ulq	-yess-ess-ul-[ ]q	

The reinforcing **q**, usually ignored in Hankul spelling, will surface whenever the prospective modifiers are in the proper environment (see §1.5)

The complex forms of the processive modifier occur only before:
(1) the postmodifiers **ci** 'uncertain fact (whether)', **ka** 'question', **tey** 'circumstance', **ya** 'question';
(2) the postmodifier adjectival noun **pep** (hata); also ?-**ess.nun** tus (hata / siph.ta);
(3) sentence-final **ke l'** in exclamations.

The prospective processive modifier -ul.nun apparently occurs only before the one postmodifier **ci** 'uncertain fact (whether)' and there it is semantically interchangeable with -keyss.nun or -ulq. The past modifier -ess.un occurs only before the somewhat literary postmodifier **cuk** 'if, when, ... '; the listing in CM 1:379 of -ess.un tul is rejected. Forms also rejected are the future modifier -keyss.un and future prospective modifier -keyss.ul included in the overly tidy table in CM 1:378; the past-past modifier -ess.ess.un in the same list is tentatively accepted, though no example is given. Despite the presence of the processive morpheme -n- (here semantically empty), the modifiers -ess.nun, -keyss.nun, and -ul.nun can be attached to adjective stems and even to the copula. In that, they differ from the simple processive modifier -nun: you can say **chwupkeyss.nun ci** or **chwuwul.nun ci** (to mōlla) 'perhaps it will be cold' but not *chwup.nun ci → chwuwun ci 'perhaps it is cold'.

9.4. The infinitive.

The name "infinitive" is here applied to the ending typically shaped -e, and the forms made by attaching the appropriate shape to verb stems. The reference should not be confused with the use of that term in talking about the grammar of other languages, though it has been applied to a very similar form in Japanese. English speakers name verbs by the translation of the Latin infinitive "to -- " but Koreans name a verb by the indicative assertive ···**ta** even when that form is not otherwise in use, as is true when **mekta** is replaced by **mek.nunta** 'eats', with obligatory marking as a processive verb.

The Korean infinitive is used in the following ways:

(1) by itself at the end of a nonfinal clause to mean 'and so' or 'and then';

(2) as a connecting form used with an auxiliary verb (§7.5) or to link two ordinary verbs in a kind of "regular compound", such as **il.e na-** 'get up', **na o-** → **na-o-** 'come out', **al.e tut-** 'understand', ... ;

(3) followed by the particle **se** with about the same meaning as (1), but more colloquial;

(4) followed by the particle **ya** with the meaning 'only if -- ' in such expressions as -e **ya ha-** and -e **ya toy-** 'only if we -- will it do' = 'we have to (do it)';

(5) followed by the particle **to** with the meaning 'even though -- ' in such expressions as -e **to cōh-** 'be all right even if (one does)' = 'may (do), it is all right (to do)';

(6) followed by the particle **la** to make a command in the unquoted plain style;

(7) by itself at the end of a sentence to present a statement, question, command, or suggestion in the INTIMATE style (§11.3);

(8) followed by the particle **yo** at the end of a sentence to present a statement, question, command, or suggestion in the POLITE style (§11.3).

The typical shape of the infinitive ending is -e, but the shape is -a when the last vowel of the stem is o or a w which is reduced from a basic o, such as **wā** < **o-** + -a 'comes'. For stems ending in ···**ah**- the usual infinitive is ···**ah.a** pronounced /aa/, as in **tāh.a** 'arrives' − but **tāh.e** (pronounced /taae/) is sometimes heard. For ambivalent stems the infinitive is -ay, coming from **hay**, the infinitive of **ha-**, as in **āmulay** ← **āmule(h)-**, but **(p)pū.yay** ← **(p)pū.ye(h)-** 'be misty' is usually treated as **(p)pū.yey** and pronounced /(p)puey/ (§4.3). The infinitive of the inseparable postnominal adjective **low-** 'be (characterized by)' is regularly **lowa**, but there is a common colloquial variant **lowe**; it is perhaps to be explained by the older form of **low-** which is said to have been **lowup-** (or perhaps **lowuw-**?). In the literary language, in literary clichés in the colloquial, in dialects, and in the standardizing prescriptions of the Korean Language Society the ending is -a if the last vowel of the stem is /a/, as well as if it is /o/, and occasionally in texts we find -a used after other vowels (CF the colloquial variant **ia** = **ie** 'it is'). We can treat **pat.a** as a variant for the Seoul **pat.e**, but from the point of view of the Korean Language Society, **pat.e** is a colloquial variant of **pat.a**. The Seoul form has been around a while: 1887 Scott 107 has *patela* 'receive [it]!' despite the first form in (id. 160) *pas.kwua* (= /pakkwa/) *wonela* = **pakkwe one la** (< ˙wo˙na˙la).

There are eleven special comments to be made regarding alternations of stem and infinitive ending. The first six of these apply correspondingly to the attachment of the past marker (typically -ess-) as well as to the infinitive (typically -e). Statements 7 through 11 do not apply to the past marker.

(1) Stems of more than one syllable which end in ⋯i- reduce that vowel to **y** before attaching **-e**: **kitali-e → kitalye** (spelled "**ki-ta-lye**") 'waits for'. When the result is ⋯**cye**, ⋯**chye**, ⋯**sye** − or a combination producing ⋯**chye**, such as ⋯**t.hye** ← ⋯**t.hi-e** or ⋯**th.ye** from ⋯**th.ie**, by the Seoul rule which pronounces **th + i** or **t + hi** as /chi/ − the actual pronunciation is /ce, che, se/ but we follow the Hankul spelling in retaining the written **y** as an indication of the reduced **i**. Stems of one syllable which end in **i** simply add **-e** and that is the way the Hankul spelling treats them: **ttie, chie, cwie, phie, ie, ⋯** . But in pronouncing these words speakers often shorten **ie** to **yē** (§2.7.7, §2.7.8). And many Koreans, hearing the intercalated semivowel in the unshortened forms (§2.7.6) write the last syllable of these infinitives as ⋯**ye**. That is harmless, for there is no possibility of confusion, and it continues the Middle Korean tradition of writing the intercalated palatal glide whenever it occurs. (Our practice of writing **ie** for the copula infinitive could lead to confusion with the infinitive of **ī(s)-** 'continue', so that is a point in favor of keeping the old spelling **iye**, though this book has not done so.) On the other hand, we must deplore the mistake of writing ⋯**wu-we** for the infinitives of stems ending in ⋯**wu-**, since these should be kept distinct from the infinitives of stems ending in ⋯**wuw-** (§8.2.3). The opposite mistake **wue** for **wuwe** also occurs: **nwuˑe** (ʔ1517⁻ Pak 1:42b) = **nwuˑwe** 'lies'. On the irregularities of the MK verb ¨**two[W]-** 'help' see §8.2.3.

(2) The separable auxiliary verb **ci-** 'become, ⋯ ' has the infinitive form /ce/, as expected from desyllabification (§2.7.7) and reduction of **cy** to /c/ (§2.6), but it is about the only one-syllable stem regularly given a shortened infinitive in the Hankul spelling, which usually writes **cye** as we do, though **chie** 'hit (etc.)' is often spelled **chye**, pronounced /che/ or /chē/.

(3) Stems that end in ⋯**u-** drop that minimal vowel before adding **-e**: **ssu- → sse** 'writes', **ttu- → tte** 'floats', **pappu- → pappe** 'is busy', **ippu- → ippe** 'is pretty'. Notice that in the last two cases the orthographic **u**, both in our Romanization and in Hankul, represents the phoneme /wu/. Actually we can say that the **u** of our Romanization behaves the same way in the combination of letters we write for the single unit /wu/: **pakkwu- → pakkwe** 'exchanges', **nanwu- → nanwe** 'divides'. But the infinitives of one-syllable /wu/ stems are normally spelled out in full: **cwu- → cwue** 'gives' − in speech often shortened to **cwe**, especially as the auxiliary for favors. An exceptional case is **phu-** 'dip, ladle', which is spelled **ph + wu** (not **ph + u**) in Hankul and has an infinitive spelled **phe**. In Romanized form that infinitive looks regular enough, but from the Hankul point of view it is best described as a shortening of the expected **phue** (**ph+wu+-e**) by way of a **phwe** which drops its **w** after a labial (§2.7.4). The l-doubling stems (§8.3.1) drop **u** but double the **l**: **pulu- → pulle** 'calls'. The choice of **-e** or **-a** for the shape of the ending depends on the vowel of the ACTUAL preceding syllable: **molu- → mōlla** 'not know', **kophu- → kopha** '(stomach) is empty, hungry'.

(4) Stems that end in ⋯**a-** or ⋯**ay-** add zero (nothing) to make the infinitive, for they have absorbed the ending: **ka- → ka** 'goes', **nāy- → nāy** 'puts out, pays'. The stem **ha-** 'do / say / be' has the irregular infinitive **hay**, with literary variants **ha.ye** and **ha.ya**; see §8.3.5. The only stems that end in ⋯**e-** are **ile- / yole-** 'do or say this (way)', **kule- / kole-** 'do or say that (way)', **cele- / cole-** 'do or say that (way)', **ette-** 'do or say what (way)', and **āmule-** 'do or say any thing / way'. These have the infinitives **ilay / yolay, kulay / kolay, celay / colay, ettay** and **āmulay**. As a result of the merger by many dialects of /ay/ and /ey/, especially in noninitial syllables, the infinitive **hay** is sometimes said as **hey**, and even in Seoul you will usually hear **iley, kuley, celey, ettey**, and **āmuley** for what is written as **ilay, kulay, celay, ettay**, and **āmulay**.

(5) Stems that end in ⋯**ey-** or ⋯**oy-** (usually pronounced like ⋯**wey-**) absorb the ending so that they add zero (nothing) to make the colloquial infinitive: **sēy- → sēy** 'counts', **kkwēy- → kkwēy** 'pierces', **tōy- → tōy** 'is thick'. But a trace of the ending is found in the infinitives of stems with originally short vowels, for the infinitives are long: **toy- → tōy** 'becomes'. Bear in mind that all one-syllable phrases are automatically long, so you will hear the difference between the vowels of the infinitives **hay** 'do / say / be' and **nāy** 'put out, pay' only when immediately followed by another syllable: **hay to** 'even doing / saying / being' and **nāy to** 'even paying'. And the past forms are similar: **hayss.ta** 'did; said; was' and **nāyss.ta** 'paid'. (But the 1988 Ministry of Education guidelines treat **hay** as a colloquial

contraction of **ha.ye** that has a long vowel, **hăy**. See the entry **hay** in Part II.) The literary variant infinitive of stems that end in ···**ey**- or ···**oy**- adds **-e** (often miswritten as "**ye**" because of the automatic glide, §2.7.6): **sēye, kkwēye, tōye**, popularly spelled "**seyye, kkweyye, toyye**". Moreover, He Wung (9) and others say that ···**oy**- + **-e** should have the infinitive **tway**, and that seems to be common in modern writing. He Wung also says that ···**wi**- + **-e** → ···**wey**, so that the infinitive for **ttwi-** 'jump' would be **ttwēy**, and **kkwi-e** → **kkwēy** 'flatulates' would rime with **kkwēy** 'pierces'. I am a bit unhappy with both these claims. I suspect that the former is due to the modern confusion, first of **oy** with **wey** and then of (**w**)**ey** with (**w**)**ay**, for you will hear overcorrected (or Phyengan dialect) pronunciations of **ōykwuk** 'foreign lands' as **wăykwuk**. The second claim is to be accounted for by the reduction of /**wie**/ to /**ōy**/ as described in §2.7.8. There is more at stake here, however: we must account for such historical changes as **twāyci** 'pig' < **to.yaci** < *two(y)yaci* (1819) < *twos-aci* (1819) = *twotaci* (?1660⁻) < *twoth* (1445 ¹Yong 43) and **ttwāyki** < *stwoyyaki* (?1800⁻) < *ˈptwoˈyaki* '[one] patch (of field)' (1586 Sohak 5:83a; paraphrase of *kun* '[not even one] catty' 1518 Sohak-cho 8:2b).

(6) The few **l**-inserting stems (§8.3.3) insert an **-l-** before adding the infinitive ending: **ilu-** → **ilule** 'reaches'. The **l** is usually written as the initial of the ending syllable: **i-lu-le**. Compare the **l**-doubling **ilu-** → **ille** 'tells' or 'is early' and the **l**-extending **i-l-** → **il.e** 'rises'. The inserted **l** (like the doubled **l**) is part of the earlier basic shape of the stem.

(7) The **k**-inserting and **n**-inserting stems (§8.3.6) have regular infinitives and in addition a special version, with the shape **-k-e** or (**o-** 'come' only) **-n-e**, used only before the particle **la** to make a command. Historically the **-k-** is a separate morpheme but we treat it as an extension of the stem. In any event, it is not part of the infinitive morpheme, though written as the initial of that syllable: **ka-ke-la** 'go!', **o-ne-la** 'come'.

(8) When the infinitive is followed by the polite-style particle **yo**, in relaxed speech the final **-e** is usually pronounced **-ey** if preceded by **ss, ps, i, y**, or the **s**(**y**) of the reduced honorific marker (but not the final **s** of a consonant stem like **wūs-**, nor the ···**sy**- that is a reduction of stem-final ···**si**-):

> **iss.ey yo = iss.e yo** 'there exists'
> **mek.ess.ey yo = mek.ess.e yo** 'we've eaten'
> **hakeyss.ey yo = hakeyss.e yo** 'I'll do it'
> **ēps.ey yo = ēps.e yo** 'there isn't any'
> **nay chayk iey yo = nay chayk ie/ia yo** 'it's my book', **nay moca (y)ey yo** (§4.3) = **nay moca ye/ya yo = nay moca ie/ia yo** 'it's my hat'
> **kas[y]ey yo = kasye yo = kasie yo** 'deigns to go'
> **wūs[y]ey yo = wūsye yo = wūsie yo** 'deigns to cry' < **wū-l-**; CF **wus.e yo** 'laughs' and **wus.us[y]ey yo = wus.usye yo = wus.usie yo** 'deigns to laugh'
> **māsey yo = māsye yo = māsie yo** 'deigns to desist' < **mā-l-**; CF **masye yo = masie yo** 'drinks' and **masis[y]ey yo = masisye yo** 'deigns to drink'

In addition there is the anomalous **kath.ey yo = kath.e yo** 'is the same', but there are no other examples for stems ending in **th**; CF **puth.e yo** 'adheres to', **yeth.e yo** 'is shallow', **math.e yo** 'smells it' ... . The adjective **kath-** derives from a contraction of the obsolete adjectival noun (*)**kat ha-** < MK ˈ*kot* ˈ*ho-*; that may account for its odd behavior. Gale wrote *kos.ta* and *kos-hota* (*kos-ha, kos-hun*).

Because the relaxed forms are seldom written, many Koreans will want to correct textbook examples to the "standard" written versions, i.e. leave off the final **y**. That is particularly true if they are not from Seoul, for the polite stylization with **-e yo** itself seems to have originated in the Seoul area. (A Kyengsang speaker will often use the formal style instead.)

In the intimate style of speech (§11.3), which places an infinitive at the end of the sentence without the particle **yo**, some Koreans (especially women in Seoul) often use the variant infinitives as if the **yo** were still there: **iss.ey** for **iss.e**, **mek.ess.ey** for **mek.ess.e**, **hakeyss.ey** for **hakeyss.e**, **ēps.ey** for **ēps.e**, **kasyey** /**kasey**/ for **kasye**, **kath.ey** for **kath.e**, ... In rapid speech ···**ye yo** may sound like ···**ey yo**, as in **kitaley yo** for **kitalye yo** 'waits for'. And /**ey**/ may be raised to /**i**/ (§2.7.9), especially when it is not initial, so that we sometimes hear **kitali yo = kitaley yo = kitalye yo**. From the

pronunciation /kasi(y)o/ we cannot be sure whether we are hearing **kasio** 'go!' (or 'deigns to go' in the AUTHORITATIVE style) or **kasi yo = kasey yo = kasye yo = kasie yo** 'deigns to go' (in the POLITE style).

(9) In the intimate style, the copula infinitive **ie/ye** or **iey/yey** (... **yey** = /ey/, §4.3) is more often pronounced **ia/ya**, at least among Seoul speakers: **nay chayk ia = nay chayk ie** 'it's my book', **nay moca ya = nay moca ye** (= **nay moca ie**) 'it's my hat'. The variant **ia/ya** is not be confused with the homonymous particle ... **iya/ya** 'only if it be ... '. That particle was MK ... *(i)·za*; when the medial /z/ dropped, an epenthetic glide was inserted, leading to the standard spelling **iya/ya** for the particle, and that spelling is widely used in Hankul also for the variant of the copula infinitive, following the practice of the earlier writers. We will use only the morphophonemic spelling **ia/ya** for the variant of the copula infinitive; despite the popular use of **iya/ya** as the written form of that, we will save this spelling for the particle. On **i[y]a** vs **i[y]e** for the copula infinitive, see p. 273.

(10) The variant polite copula **iey yo** is often shortened to **(y)ey yo** even after a consonant: **chayk (y)ey yo = chayk ie(y) yo** 'it's a book'. In the abbreviated probable future construction which consists of the prospective modifier **-ulq** + **ke** (the shortened version of **kes**, here 'probable/likely fact') + copula, the copula may take the variant subphonemic shape of just the palatal feature **y**, as in expressing 'will likely do':

> **halq ke y = halq ke (y)ey = halq kes ie/ia** [intimate style];
> **halq ke y yo = halq ke (y)ey yo = halq kes (y)ey yo = halq kes ie(y) yo** [polite style];
> **halq ke yta = halq ke 'ta = halq kes ita** [plain style];
> **halq ke yp.nita = halq ke 'p.nita = halq kes ip.nita** 'will probably do' [formal style].

The subphonemic **y** is, of course, written as a component of the preceding vowel in Hankul, which runs all the words of these phrases together. More commonly we hear the versions **halq ke yo** [polite, with the copula infinitive absorbed or simply unexpressed] and **halq ke ya** [intimate].

(11) A literary variant infinitive for the copula is **ila**; the same shape is regularly used in quoting the indicative assertive of the copula (**chayk ila ko hanta** 'says it is a book', **moca 'la ko hanta** 'says it is a hat'). The literary variant is heard in colloquial expressions such as ... **ila to** = ... **ie to** 'even being ...' and **Sensayng ila (se) cemccanh.ta** = **Sensayng ie se cemccanh.ta** 'Being a teacher, he is well-mannered'. The origin of this usage may be a quotative structure. Compare the use of **iyo/yo** as a variant of the copula gerund **iko** (see the entry in Part II), which preserves an earlier form that came from the dropping of a lenited velar (MK ... *i·Gwo*) and the insertion of the palatal glide.

9.5. Substantives and derived substantives.

The substantive mood **-um/-m** is a nominalization that is used in the following ways:

(1) with a small number of verbs, as the complementary object of the verb itself, as in **cam ul ca-** 'sleep a sleep' and **chwum ul chwu-** 'dance (a dance)';

(2) with the particle **ulo** to mean 'because', as in **kongpu cal hayss.um ulo cal ālci** 'I studied hard so I knew it well, you see';

(3) occasionally with other particles (**-um ey, -um a, ...**), and before the copula, e.g. **sēym** 'calculation' as a postmodifier in sentences like **Kwīsin ul pon sēym in ya** 'Do you figure you were seeing a ghost?';

(4) sentence-final in the DOCUMENTARY style of written Korean, as in the shop sign **Tāmpay ēps.um** 'No cigarettes available';

(5) with the adjectival postsubstantive inseparable **cik** in **-um cik ha-** 'likely/acceptable to do; worth doing'.

Some of the ...**w**- stems have variant shortened substantives in **-m** instead of **-wum** (= ...**w-um**): **musem = musewum** 'fear', **etwum = etwuwum** 'darkness', **kwiyem = kwiyewum** 'cuteness', **ppukkulem = pukkulewum** 'shame', **pulem = pulewum** 'envy'. Not all ...**w**- stems have the shortened variant: there is only **miwum** for 'hatred'. (In general, one-syllable stems lack the shortening, but polysyllabic stems permit it.)

In addition to the shortened variants, which are freely interchangeable with the longer forms in all

environments, there are a few irregularly formed DERIVED SUBSTANTIVES which are limited in that they do not occur in the uses (2), (4), and (5), nor usually in use (1) — there is the apparent exception of **swūm ul swīm ulo** 'because one breathes a breath', but notice the expected derived substantive **swiem** below. (The noun in **mokum ul mek.um ulo** 'because someone takes a puff' is not from **mek-**, it is from a variant of **mekum-** 'swallow'.) Some derived substantives:

> **cwukem** 'corpse' ← **cwuk-** 'die' → regular substantive **cwuk.um** 'death';
> **mutem** 'tomb, grave' ← **mut-** 'bury' → regular substantive **mut.um**;
> **sālam** 'person' ← **sā-l-** 'live' → regular substantive **sālm** 'life';
> **cokom, cokum, com** 'a little' ← **cĕk-** 'be few/little' → regular **cek.um**;
> **makam** 'terminal date, deadline' ← **mak-** 'block, obstruct; complete, put an end to; ... ' →
>   regular **mak.um** (but **makam** is sometimes mistaken to be a Chinese loanword);
> **heyem** 'swimming' ← **hēy-** 'swim' → regular **hēym**;
> **col.um** 'sleepiness' ← **cŏ-l-** 'doze' → regular **cŏlm**;
> **wul.um** 'crying, weeping' ← **wū-l-** 'cry, weep' → regular **wūlm**;
> **al.um** 'knowledge' ← **ā-l-** 'know' → regular **ālm** — see §8.3.2;
> **sayam, sāym** 'jealousy' ← **saywu-** 'envy' → regular **saywum**;
> **wumkhum/ongkhum** 'handful' ← **wumkhi-/omkhi-** 'grasp' → regular **wumkhim/omkhim**;
> **kiem kiem** 'crawling along' ← **ki-** 'crawl' → regular **kim**;
> **swiem swiem** 'with frequent rests' ← **swī-** 'rest' → regular **swīm**;
> **iem(q) iem** 'continuously' ← **ī(s)-** 'continue, join' → regular **ium**.

It may be argued that the last three examples should be derived from the infinitive (-e) rather than directly from the stem. But the source of these and most of the other derived substantives ending in -em or -am is in the Middle Korean form we are calling the "effective substantive", i.e. a substantive made on the effective stem, which otherwise appeared only before ˙cik ˚ho˙ta. In the 15th century the regular substantives of the ···l- stems had an uncontracted ···l^{U}om, but the only attestations of that are derived substantives such as *wu˙lum* 'crying' < ¨wul- 'cry' and *e˙lum* 'ice' < ¨el- 'freeze', for the modulator was obligatorily inserted when the substantive was used as subject or object (*wu˙l-wu-m* + ˙*i* or ˙*ul*), etc., and in the extended structures with ··· ˙*ye (n')* the unmodulated form was contracted to ···*lm*: ¨*al˙m ye* > **ālmye** 'knows and', ¨*wul˙m ye n'* > **wūlmyen** 'if/when one cries'. In the modern language the unmodulated substantives survive in the contracted version regardless of the structure they are in. They are pronounced with the liquid suppressed ···[l]m and the m treated as syllable-final unless there is a following vowel to carry the nasal and allow the full cluster to appear: **ā[l]m (to)** 'the knowing (too)' but **ālm ulo** 'with (because of) knowing'.

9.6. Derived adverb-noun forms.

The adverbative mood ends in **-key** and means 'so that; so as to (do/be)'; it is attached to any stem but the modern copula **i-**, and the form that results is syntactically used as an adverbial. In addition, many stems have a form we can call the DERIVED ADVERB-NOUN; it is made by attaching to the stem either a suffix with the shapes **-i** and **-li** or a suffix with the shapes **-o** and **-wu**. The suffix **-o** or **-wu** seems to make only adverbs, but perhaps **nalwu** 'ferry' ← **nalu-** 'transport' is an example of **-wu** deriving a noun; see also **-wung** in Part II. The suffix **-i** or **-li** makes both adverbs and nouns, sometimes from the same stem, so that **kiph.i** means both 'deeply' (MK *ki˙phi*) and 'depth' (MK *ki˙phuy*). Notice that the derived adverb **nelli** 'widely' is best derived from the adjective **nelu-** 'be wide' (+ **-li**) and the derived noun **nelp.i** 'width' is derived from **nelp-** 'be wide' (+ **-i**). Not every stem has such a form today, so we cannot make up expected forms without knowing in advance whether they are actually used. For that reason, we call this a derived form, rather than a part of the inflectional paradigm, though we list it at the end of the table of mood endings. The usual mood suffixes attach to any stem, so that we can make up quite acceptable forms without having heard them before. The suffix **-i** is also used to make adverbs out of iterated nouns: **cip-cip-i** 'every house' (= **cip mata**), **na'-nal-i** 'daily', **ta'-tal-i** 'monthly', **nam-nam-i** 'between unrelated persons'. You will notice certain peculiarities in attaching the suffixes:

(1) Final ···u- of a vowel stem drops: **pappi** 'busily' ← **pappu-** 'be busy', **puphi** 'bulk' ← **puphu-** 'be bulky', **khi** 'height' ← **khu-** 'be big', **āy-pali** 'skinflint' from **āy-palu-** 'be money-mad'; **palo** or **palwu** 'right, directly' ← **palu-** 'be right'.

(2) The final ···w- of certain consonant stems drops: **kakkai** 'nearby' or 'vicinity' ← **kakkaw-** 'be near', **pankai** 'gladly' ← **pankaw-** 'be glad', **elyei** 'with difficulty' ← **elyew-** 'be difficult', **swii** (also **swui**) 'easily' ← **swīw-** 'be easy'. In **kyewu** 'hardly, barely' ← **kyew-** 'be too much for one' the appropriate division of forms is **kye-wu**. But not all stems drop the w: **tewi** 'warmth' ← **tēw-** 'be warm'. The inseparable postnominal adjective **sulew-** 'be, give the impression of' drops not only the w but usually the preceding vowel as well: **kapcak sulew-** 'be sudden', **kapcak suli** 'suddenly'; but there is a variant **kapcak suley** in which w drops and the i suffix is reduced to y. CF **swus cey** 'sincerely' ← **swus cei** ← **swus cew-** 'be pure, sincere'. And the derived adverb from the inseparable postnominal adjective **low-** 'be' is typically **loi**: **swūnco low-** 'be smooth, orderly', **swūnco loi** 'smoothly'.

(3) The adjective stem **mukew-** 'be heavy' has the derived noun form **mukey** 'weight', in which the w drops and the suffix is reduced to the phoneme component y, as in **suley** ← **sulew-** above. A shortened variant of **elyei** 'with difficulty' (← **elyew-** 'be difficult') is **el[y]ey**.

(4) The suffix -i is attached in the alternant -li to the EXTENDED shape of some l-extending stems: **mēlli** 'afar' ← **mē-l-** 'be far'. But others attach the shape -i: **kil.i** 'length' or 'lengthily' ← **kī-l-** 'be long', **nol.i** 'game' ← **nō-l-** 'play'. The suffix is usually attached in the alternant -li to the single-l shape of l-doubling stems, though we could equally well say it is attached in the alternant -i to the double-l shape: **talli** 'differently' ← **talu-** 'be different', **ppalli** 'fast' ← **ppalu-** 'be fast' − but CF **yak-ppali** 'shrewd one' from **yak-ppalu-** 'be shrewd and quick'.

(5) The suffix -wu has the shape /chwu/ after **yath-** 'shallow' → **yath.chwu** 'shallowly' and after **kot-** 'straight' → **kot.chwu** 'straight', which is usually spelled just **kochwu** in Hankul.

(6) An s-dropping stem, as expected, drops the s before adding the vowel-initial suffix: **ii** 'joining' ← **ī(s)-** 'join, continue, ... ', as in **way-ii** 'a technique of joining small pieces of wood'.

(7) Some derived nouns, mostly from stems ending in i or y, can be said to have a zero form of the suffix; see the note in the entry for -i in Part II.

(8) The adjective **ha-** 'be' has the irregular form **hi**. Since the h, and even the entire syllable **ha-**, is so often dropped in ordinary speech, the word **hi** frequently sounds like **i**, and some people write it this way, confusing it with the suffix -i. Because many Koreans seem to confuse the ENDING -i with the WORD **hi** we run across anomalous (and mistaken) forms like "**kohi**" = **koi** 'nicely' from **kōw-** 'be nice, pretty' with the w dropped.

We can perhaps look at **ili** 'this way', **kuli** 'that way', and **celi** 'that way' (§5.2.4) as contractions of **ile hi**, **kule hi**, and **cele hi**. And, similarly, **ecci** 'what way' as a contraction of **ette hi** → **ett[e h]i**, the palatalization and affrication taking place after the tt was put in contact with the i. But the simple adverbs are attested from early Hankul texts as ˙i˙li, ku˙li, ˙tyeli, and ¨es˙ti, and may have been made as derived adverbs from the defective stems *˙i-l-, *ku-l-, *˙tye-l-, and *¨est- that produced the infinitives ˙i˙le, ku˙le, ˙tye˙le, and ¨es˙te, which serve as bound adverbs before the postnominal adjective ˚ho- > **ha-** 'be', forming adjectival nouns. A similar defective stem *¨am˙o-l- '(be) any way' produced the derived adverb ¨a˙moli (> **āmuli**) 'however much' and the infinitive ¨a˙mola that is attested in the Middle Korean texts only by the contracted forms ¨amo˙lan < *¨amo˙la [ho]n and ¨a˙mola˙tha < *¨amo[˙]la ho˙ta) but produces a full paradigm in modern **āmule ha-** as well as its contraction **āmuleh-**.

In combinations of an adjectival noun which ends in a basic ···s + the word **hi**, there are three possible treatments, here exemplified by **kkaykkus hi** 'cleanly':

The excess s is, as expected, treated as t and t + **hi** (like th + i) becomes **chi**, so we hear /kkaykkuchi/ from some speakers, mostly northerners.

The h is dropped but the ···s is treated as ···t, so the form is said as /kkaykkuti/, but in Seoul t + i → **ci** so that it is /kkaykkuci/. This treatment seems to be rare; I have never heard it, but others have.

The h is dropped and the remaining i is linked as if it were a particle or suffix, so that the s remains a sibilant: **kkaykkus 'i** /kkaykkusi/.

For bound adjectival nouns, only the latter treatment has been observed (··· **tus 'i** 'as if' ← ··· **tus ha-** 'give the idea/impression of') and it seems to be the common version for the others, as well.

[1]Yi Ungpayk 1961:456 advises writing phonemically any ···i adverb that lacks a ··· **hata** partner: **pantusi, kapcaki, ilcciki,** ... . But (472) **kos.kos-i, cip.cip-i,** ... . When there is a **hata** form, the adverb might be pronounced three ways. His advice on Hankul spellings:

If the adverb is always pronounced without the aspiration, write "**-i**" (equivalent to our '**i**), as in **ttwulyes 'i** 'clearly' ("ttwulyes-i"), **khum cik 'i** 'greatly; generously' ("khumcik-i").

If the adverb is pronounced both ways (**hi** or '**i**), write it as "**hi**", as in **nek.nek hi** 'amply', **sepsep hi** 'unfortunately'; **tantan hi** 'solidly, firmly', where the h would be elided in normal speech, anyway.

If it is always pronounced with the aspiration, write "**-hi**", as in **kup hi** 'hastily', **kuk hi** 'extremely', **cok hi** 'sufficiently, fully'. These rules apply to adverbs that lack the **hata**, too, so that the spelling is **cĕk-i** (= **cĕk.i**) 'somewhat' but **cak-hi** 'very' (< 'little' used ironically).

In addition to those fairly active suffixes, there are also two suffixes **-ay** and **-kay** which make nouns and, in the case of **-ay** an occasional adverb such as **mŏllay** 'in secret' ← **molu-** 'not know' and **killay** 'for a long time' ← **kī-l-** 'be long'; examples will be found in Part II. For some of the resultant forms dictionaries prefer variant versions with **-key**, as in **cipkey** 'tweezers' and **cikey** 'A-frame carrier'. Many Koreans do not maintain the distinction of the vowel **ay** from the vowel **ey**, in any event, especially when it is not in the initial syllable of a word.

9.7. Complex moods.

We should say something about the derivation of the "complex" moods listed as categories 13, 14, and 15 in the mood table of §9.1. For some purposes it is better to treat these endings as unanalyzed units; for other purposes it will be revealing if we consider their component parts. Some of the forms are rather literary in character.

9.7.1. Complex moods built on the prospective modifier.

The INTENTIVE mood **-ulye/-lye** 'with the thought in mind to (do), with the intention of (doing)', often used in the construction **-ulye (ko) hanta** 'intends/wants/tries to (do)', consists of the prospective modifier **-ul** + an element **ye**, which is a variant of the postmodifier **ya** 'question'; CF **-ulq ka hanta** 'thinks about doing, considers doing'. The PURPOSIVE mood **-ule/-le** seems to be a shortening of the intentive. It is used only in conjunction with verbs of motion, typically **ka-** 'go' and **o-** 'come', with the meaning 'for the purpose of', though other words may intervene between the statement of purpose and the verb expressing movement. The intentive also can be followed by a verb of movement: ··· **halye (ko) kanta/onta** 'goes/comes with it in mind to do ··· '.

The FRUSTRATED INTENTIVE **-ulyes-man (un)** / **-lyes-man (un)** is a semi-literary expression with the meaning 'I had hoped that ··· (would do) but' or 'should have (done) but'. The ending appears to be from the intentive (**-ulye**) + **-q** + the particle **man** 'just, but', which can be followed by the particle **un** to subdue the clause and thereby focus attention on what follows, just as happens in **-ci man (un)**.

The PROSPECTIVE ASSERTIVE **-ulita/-lita** and PROSPECTIVE ATTENTIVE **-ulikka/-likka** mean either '(I) will be glad to (do)' or 'will probably (do)' and interrogative versions of those: **Nwu ka halikka − Nay ka halita** 'Who wants (= is willing) to do it? − I'll be glad to do it'. These endings consist of the prospective modifier **-ul** + the copula stem **i-** + the assertive ending **-ta** or the attentive ending **-kka**. Notice that **ita** occurs also as the plain indicative assertive 'it is' but **(-)ikka** does not occur elsewhere, for the plain indicative attentive of the copula is **ini**, and **kka** turns up only in the formal **ip.nikka**. Historically, these forms are contracted from the MK polite structures -*u'l i '-ngi "ta* and -*u'l i '-ngi s 'ka*. There is also the PROSPECTIVE SEQUENTIAL **-ulini** < **-ul i 'ni** 'since (it is that) it will happen' (= **-keyss.uni**) − normally followed by a command, proposition, or statement of volition − and the PROSPECTIVE LITERARY INDICATIVE ASSERTIVE **-ulinit/ɹa** 'is sure to do, will surely be' [old-fashioned] < **-ul i 'n i 'ta** 'it is that it is that it will happen/be'.

The old-fashioned INTENTIVE ASSERTIVE -ulyetta/-lyetta, in Hankul usually written -(u)lyes.ta, is a semi-literary form sometimes used to express a probable future, like -ulq kes ita. The ending consists of -ul + yeq = ye (a variant of the postmodifier ya, as found in -ulye, with -q) + -ta.

The CAJOLATIVE -ulyem (una) / -lyem (una) is an endearing command used by mothers to children: Mek.ulyem (una) 'Do let's be a good boy and eat now!'. The ending consists of the intentive -ulye + the substantive -um/-m − or, more likely, 'm the shortened form of ham, substantive of ha- 'do/say' and here 'feel', often followed by the softening particle una/na ("We feel we want to, don't we)"; the particle is also used in Anc.key na 'Won't you have a seat?'

9.7.2. Adjunctives.

There are two forms we call ADJUNCTIVES. The PROSPECTIVE adjunctive -ulla/-lla is a two-shape ending which consists of the prospective morpheme -ul-/-l- + the attentive ending -ula/-la. The PROCESSIVE adjunctive -nula is usually treated as a one-shape ending and consists of the processive morpheme -nun-/-n- + the attentive ending -ula/-la. But a substandard variant treats the processive adjunctive as a two-shape ending -unula/-nula as if it were from the plain modifier -un/-n. The processive adjunctive occurs, with or without a following particle ko, in two meanings: 'what with doing, as a result of doing' and 'with the idea to do, with the intention of doing'; the particle ko is more common with the second meaning. There are a few occurrences with abbreviated forms of ha-, such as -nula 'myen and -nula 'ni, for which see p. 722. A variant: -nola < -'nwo'la (p. 272, p. 734) with the modulated processive -n[o]-'wo-. The prospective adjunctive -ulla/-lla sometimes has the same meaning as the processive 'what with doing' (perhaps the flavor is more 'what with having to do' or 'what with being faced with the prospect of doing'). Another meaning is 'lest, for fear that it will happen', and there it may be an abbreviation of -ulila/-lila, the prospective assertive. Notice that the same shape -ulla/-lla is a widely used dialect variant also of the intentive -ulye/-lye, and that is often the best guess when you come across the form.

9.7.3. Complex moods built on the effective formative -'ke-.

Because the postmodifier ke(s) can be taken as 'probable, likely, or tentative fact' when it follows the prospective modifier, I once presumed that it was incorporated in certain complex moods, which are attached as one-shape endings directly to a stem or to the past or future markers, mostly carrying a meaning that can be described as "tentative". But that meaning for the structure with ke(s) is carried by the prospective modifier -ulq itself and need not be treated as inherent to ke(s). The true source of most of the complex "tentative" forms seems to be the MK aspect formative -'ke-, which was attached to stems to make what we are calling the EFFECTIVE stems. Forms made on the effective stem are interpreted as sometimes a presumed future and sometimes as a definite past, depending on the form and the context. The effective and the retrospective were mutually exclusive aspects in Middle Korean and they seem to have functioned as opposites. Both have become less common in modern Korean and their earlier meanings are not so apparent.

The TENTATIVE ADVERSATIVE -kena continues the MK effective adversative -'ke'na. This form is often used in contradictory pairs with the meaning 'whether ... or ... ' in much the same way as the ordinary adversatives. The phrase can become an object: hyen.yek ey iss.kena pi-hyen.yek ey iss.kena lul mak.lon hako 'regardless of whether we are in active service or not.'

The TENTATIVE SEQUENTIAL -keni comes from -'ke'n i, which is the MK effective modifier + the postmodifier 'i (factual nominalizer). The general meaning of -keni is something like 'with the likely fact/reason that ... ', often marking contradictory pairs (cwukeni pat.keni 'giving or taking'). See Part II for examples.

The PROVISIONAL -ketun, with a variant -ketullang, means 'if, provided that ... , given that ... ; surely, indeed'. The MK form was -'ke'tun (also -'ke'ton) and that apparently consists of the effective formative + an element -'tun (or -'ton), which is the postmodifier t 'fact' + the subdued-focus particle -'uon ("given that ... "). The element attaches to the retrospective formative -'te- to make the retrospective conditional form -te'tun (= -te-'t un) 'but, and; if, when'. (The particle ullang/llang is a variant, obsolete or vulgar, for un/nun.) See Part II for examples.

The TENTATIVE CONDITIONAL **-ketumyen** is a nonstandard dialect form, equivalent in meaning to the ordinary conditional **-umyen/-myen** 'if, when'. It is probably a blend of **-ketun** and **-umyen**; no earlier forms are found.

The LITERARY CONDITIONAL, in the colloquial limited to a few clichés, has the shape **-kentay**. It preserves the heart of a MK structure *-ken 't ^{e}ay n'*, made up of the effective modifier + the postmodifier *t* 'fact' + the locative marker *^{e}ay* 'at/in; to' subdued with the focus particle *n(^{u}on)*: "given in the fact that ..." → 'if, when'.

The SEMI-LITERARY SEQUENTIAL **-kwantey** 'such that, so that', followed by a question doubting the adequacy of the reason, is MK *-kwan 'toy* and it may be related to **-kentay**. The *-kwa-* seems to be a variant of the effective *-ke-*.

The SEMI-LITERARY CONCESSIVE **-ken man (un)** means the same thing as **-ci man (un)** 'even though, although, but'. The earlier form was *-'ken ma'non/ma'lon* with the effective modifier and a postmodifier of uncertain origin, perhaps *'ma* 'extent' + particle *'non* (> *'lon* by dissimilation?).

The obsolete LITERARY CONCESSIVE **-kenul** < *-'ke'n^{u}ol* is used in two meanings, 'although, while' (= **-ci man**) and 'as, since, when, upon' (= **-um ey**). The source is *-'ken [ ] '^{u}ol*, with the accusative particle applied to a direct nominalization of the tentative modifier. The direct nominalization is probably to be taken as the result of reducing the postmodifier *'i* 'fact' to the glide *y* which is lost before the minimal vowel *^{u}o*; compare a similar elision before the genitive marker (adnominalizer) that is discussed in NOTE 2 of the entry *'uy* in Part II (p. 923).

The TENTATIVE ASSERTIVE **-kes.ta** or its equivalent casual form the TENTATIVE SUSPECTIVE **-kes.ci** has three meanings: 'does/is I assume (suppose, think)', 'surely (certainly) does/is', and 'given this and that' (enumerating a series of reasons that argue a conclusion). Choy Hyenpay 1959:350 gives an obsolete meaning of "past tense" to the form **-kes.ta**, which seems odd. On p. 351 he gives the modern meanings of (1) definite assertion, as in **Ne nun kakes.ta** 'You ARE going!' and **Ne kuli hayss.kes.ta** 'You certainly did so!', and (2) habitual, for which I lack good examples, unless the sentence **Tto sok.ass.kes.ta** 'Deceived again!' will do. Notice that the ending is sometimes pronounced /**-keytta**/ and is then homonymous with the plain future **-keyss.ta**. Both **-kes.ta** and the future **-keyss.ta** probably contain the MK effective formative *-'ke-* and reductions of the verb iss- < *is(i)-* 'exist', rather than directly continuing the MK *-ke 'ta* (effective indicative assertive). But **-kes.ta** could instead be a continuation of a barely attested *-kes 'ta* that seems to contain the emotive bound verb *s-*.

The IMMEDIATE FUTURE **-ukkey/-kkey** = **-u'q key / -'q key**, contrary to the opinion expressed in KM, is nothing more than an abbreviation of the probable future **-ulq key**. (The critical example in KM 47 was a mistake; only **Nay ka cip.u'q key** occurs for 'I've got it!'.)

9.7.4. Gerund-related pseudo-moods.

The gerund occurs (1) linking two clauses with the meaning 'and also', (2) as a connecting form linked directly with an auxiliary verb (§7.5), (3) occasionally before a particle, as in **hako ya mal.e** 'must do it'. The gerund also occurs in a couple of constructions that are often regarded as separate endings, so we might call them pseudo-moods.

The HABITUAL consists of the gerund + the particle **(un/)nun**, often in the shortened form **n'**, and is followed by the auxiliary **hanta** 'does': **sānqpo lul kako n(un) hayss.ta** 'I used to go for walks'.

The LITERARY DESIDERATIVE consists of the gerund + **ca**, a variant of **ce** = **cye** < **cie**, the infinitive of the auxiliary adjective **ci-** 'want to (do)', so that **-ko c(y)e hata** would seem to be the literary analog of **-ko siph.e hanta** 'is desirous of (doing)', but semantically it is closer to the colloquial intentive **-ulye ko hanta** 'has it in mind to (do)'. Choy Hyenpay 1959:312 gives a different etymology for **-ko ca**, but it is unconvincing in view of his remarks on p. 516 about **-ko cita** and **-ko ciko**. In North Korea the spelling is **-koce**.

Historically, the various apperceptive elements **kwumen**, **kwulye**, ... , are shapes of a complex pseudo-mood based on the gerund **-ko** (in its Seoul dialect form **-kwu**) + the particle **man** 'just, but' (in a variant **men**) — or again, in the case of **kwulye**, + an abbreviated shape of the intentive **halye**.

9.8. Transferentives.

The transferentive mood -ta, frequently followed by the particle ka, indicates a CHANGE or SHIFT of action — a reversal, a nullification, or an unanticipated and unrelated consequence if attached to the past marker, usually an interruption otherwise. When two past transferentives are followed by a form of hanta 'behaves', the meaning is that of alternation, doing first one thing and then the other. The transferentive of the copula, which usually appears in the postvocalic shape 'ta (ka) — though there are examples of ita (ka) in Part II, is often used after particles of location to show a shift in location: ··· ey 'ta 'into, onto' and notice also mues ey 'ta sse 'what's it used for?'. The form can be inserted between an infinitive and a verb of giving to emphasize a shift of physical space in the performance of the favor reported: -e ('ta) cwunta '(goes and) does for someone', -e ('ta) tulinta '(goes and) does for someone superior'. Occasionally it is inserted in other constructions of infinitive + verb, e.g. tte 'ta mī-l- 'push aside; shift blame onto another'. And it shows a shift of direction after infinitives such as naylye 'descends' (naylye 'ta 'downward'), tul.ye 'puts in' (tul.ye 'ta 'inward'), ... Notice also the expressions -ta mōs hay 'being more than one can bear to (do)', as in hata mōs hay (nācwung ey nun totwuk cil hayss.ta) 'at wit's end (finally committed theft)'.

You will observe that the ending of the transferentive is the same shape as one of the assertive endings -ta and all of the forms are the same, with the exception of the processive stem + transferentive -ta as in tat.ta ··· 'closes and / but ··· ; interrupts closing and ··· ', a form that has no assertive homonym for the colloquial speaker, who says tat.nunta (processive assertive) for 'closes'. The two moods transferentive and assertive contrast in the example kass.ta wass.ta hay, which can mean either 'they are going and coming (alternately)' or (= kass.ta wass.ta ko hay) 'he says he is back (= has gone and then come back)'. It might be said that the transferentive is simply the assertive (or indicative assertive) + the particle ka and that the occurrences without the particle are just abbreviations of this more complex expression. In that case, we should know that kass.ta wass.ta hay means 'they are going and coming' when we can substitute kass.ta ka wass.ta ka hay with no relevant difference of meaning, and it would have the other meaning ('he says that ··· ') when we cannot insert the second ka. (The first ka is appropriate in either sense.) But notice that kass.ta ka wass.ta hay with just the first ka is ambiguous as to whether it represents kass.ta ka wass.ta ka hay or kass.ta ka wass.ta ko hay. See the entry for -ta ka in Part II.

For a different interpretation of the transferentive, as derived from tak.a, the infinitive of tak- = taku- 'approach', see Choy Hyenpay 1960 (Hankul 127:7-17); CF Ceng Insung 1960:161-3. That may be the right explanation of the etymology, but I believe that the synchronic view taken here can stand independent of the history of how the form came into being, which is still rather unclear, and may well be along lines not too different from this description, though serious questions are raised by the observations made on p. 71, p. 273, and p. 588; also pp. 423-4 (a ni 'la 'ka).

9.9. The structure of earlier verb endings.

Each Korean verb confronts us with a daunting number of bewildering forms, but many of the seemingly disparate shapes can be analyzed as complex structures made up of a reasonably small inventory of basic parts. In §9.1 we explored the positional order of such basic parts for the modern verb forms. In §9.9.1 we present a similar, but richer, scheme for the Middle Korean verb. Several important elements did not survive into modern Korean except as peripheral nuisances. In particular, the effective aspect (§9.9.2) and the modulator (§9.9.10) are important categories of the earlier language that are difficult for us to appreciate today. The emotive structures of §9.9.3 were used where the modern language has developed other means of showing the speaker's attitude toward what he is saying, such as the apperceptive, circumstantial, and exclamatory sentences described in §11.3.

In both the earlier language and its later development matters are complicated by various surface adhesions of formerly loose elements, with the immediate history often obscured by compression. We must resist the tendency to simply list the surface strings as unanalyzed entities, for that puts an unnecessary strain on learning and making use of the possible ways something can be said. Instead, we will attempt to achieve a maximally generous apportionment of word boundaries, based more on

combinatorial factors than on prosodic evidence. At the same time, our notation attempts to capture unobtrusively the syllable divisions of the original spelling, which varied considerably from text to text, or even within a single text. The spaces we write represent grammatical information that is not directly supplied by the texts, for they recognized graphic syllables and morphemes but no unit between those chunks and longer strings, such as sentences. Modern writers usually insert spaces that break up the Hankul text into phrases, basing the boundaries on likely surface junctures – pauses, or momentary slowdowns in the articulatory process. The main principles followed are to attach particles at the end of the phrase, just like verb endings, and to keep many complex ending structures as unbroken strings. At the levels of phrase and morpheme alike people vary in deciding just which complex structures are to be left unanalyzed. With respect to compound nouns, the situation is much like that faced by writers of English ("solid, space, or hyphen?") but usually without the benefit of the hyphen.

9.9.1. Middle Korean finite forms: the basic scheme.

The following chart presents a synopsis of the elements that comprise the basic structures of the earlier verb endings, ordered under eleven sequence positions. That is followed by a brief list of the categories included in each position. Further descriptions of the forms produced will be found in later sections, and in Part II. Variable vowels are shown as $^e\!a$ and $^u\!o$; the criteria for choosing between variants are described in the individual entries of Part II. The lenited and elided forms of velar-initial morphemes are given separately (k, G, $[G]$). In this chart and those that follow the basic accent is often left unindicated, but it is marked in the surface strings of the endings when they are cited.

<p align="center">Middle Korean finite forms: the basic scheme</p>

1	2	3	4	5	6	7	8	9	10	11
-zop-	-($^u\!o$)si-	-no-	-w$^u\!o$-	-two-	-$t^e\!a$-	-($^u\!o$)n	i	-ngi	s	ka
				-swo-	-$k^e\!a$-	-($^u\!o$)l(q)				Ga
				-nwo-	-$G^e\!a$-					kwo
					-$[G]^e\!a$-					Gwo
					-$^e\!a$-					ta
					_____					_____
					-kwa					-ta, -la
					-Gwa					-a, -ya

1 deferential, humble; object-exaltation. SEE §9.9.9.

2 honorific = subject-exaltation. Also FOLLOWS the retrospective: -˙$t^e\!a$-˙si- = -($^u\!o$)˙si-˙$t^e\!a$-. And the effective: -˙ke-˙si- = -($^u\!o$)˙si-˙Ge-. SEE §9.9.8.

3 processive. Mutually exclusive with the retrospective and the effective (6).

4 modulator. SEE §9.9.10.

5 emotive; emotive-emotive (double emotive): -˙nwo-˙swo-, -˙two-˙s(wo)-, -˙nwo-s-˙two-. Before -ngi (at least) -˙swo- < -s-˙wo- and -˙nwo- < -(˙)n[o]-˙wo- (LCT 1973:296). SEE §9.9.3.

6 aspect: the retrospective; the effective (§9.9.2).

7 aspect: the perfect (= realized); the imperfect (= unrealized).

8 summational epitheme ('fact').

9 polite marker. SEE §9.9.8.

10 adnominal particle. SEE s in Part II (p. 764).

11 mood: postmodifiers ('question') above the line; suffixes below.

9.9.2. The effective.

The effective aspect is marked with nonfinal suffixes (here loosely called "infixes") as shown across the top of the chart below. The particular strings of morphemes that attach at the end of each suffix are listed beneath it. I am treating /-kwala/ as a final suffix -kwa which incorporates the infix and is followed by the exclamatory elements 'la or swo'la (see the end of this section).

Markers of the effective aspect

-^{e}a-	-k^{e}a-, -G^{e}a-	-t^{e}a- (cop i-l^{e}a-)	-kwa, -Gwa
+	+	+ -n	
		-lq	
		-n i [rare]	
-m	-m		
-n i ('la)	-n i ('la)	-ta → -la	
-n i Gwa	-n i Gwa		
-n ^{u}ol	-nul		
-n ywo	-n ywo		
	-n ye		
	-n ya		
-ten			
-l(q) [-al(q)]			
-la			
-l i Ga			
-n ti	-n ti		
-ta	-ta		
	-s-ta [rare]		
-sin i			

The -^{e}a- links --l, as in me'len -- (1463 Pep 2:41a) ' -- who have grown distant' — CF ¨melGe'nul (1463 Pep 6:5b) 'become distant and then'; it inserts y after --i or --y, as in pi'chwuyye'nul (1445 [1]Yong 42) 'shone and then'; and °ho- 'do' → 'ho.ya-. We might think of this as -'[G]^{e}a- with elided G, but that would be implausible for forms like ni'c-e- 'forget' or me'k-e- 'eat', though the latter can be treated as me[k]-'ke-, an explanation that fits also the adverbative in me[k]'key 'za (1518 Sohak-cho 18b). Such forms are found for only a few --k- stems: aside from forms for mek- 'eat' I have found only se'kenol (1473 Pep 2:56b) < sek- 'rot'. Contrast pak.ke'nul (1449 Kok 41) < pak- 'embed', sol'ma nik-ke'ta (?1517- [1]No 2:35a) < nik- 'get well cooked', sik.ke'ton (1481 Samkang chwung 27a, 1489 Kup-kan 6:50; cited from LCT) < sik- 'get cool'; cwuk.kesinol (1447[→1562] Sek 11:20; cited from LCT), cwuk.ken 't i (1481 Samkang chwung 6b), cwuk.ke-ngi '' ta (1481 Samkang chwung 22a) < cwuk- 'die'. The variant with no trace of the velar is not common, and I have not found examples for stems that end in --p(h)- or --t(h)-. An additional problem: 'th[o]-a- 'ride' → 'tha- in 'tham cik (1481 Twusi 7:2a). Forms such as -'G^{e}a- and -'Gwa are the result of leniting k to G after --l, --y, and --i (copula stem); the G is shown indirectly, by writing the zero initial. It has been suggested that the copula ends with an underlying y ('iy- in contrast with 'i- 'cover', which does not take lenition), and that is also thought to account for the lenitions after the stem ¨ti- 'drop' = ¨tiy- < *ti-'i-, a causative derived from °ti- 'fall' (which is followed by the unlenited forms). The few exceptions of lenition after --li- stems, such as no'li'Gesi'nol (1445 [1]Yong 8) and ko'liGe'nul (1482 Nam 1:54b), are apparently due to confusion (= false analogy) with the structures -- 'l i '-. (SEE Martin 1982/3:n11.) Most of the effective forms of °wo- 'come' become 'wo'na-, whence modern one la [dialect ona la 'come!'] and Ili on' 'C'mere [Come here]!', but there are a few forms with 'wo'ke-, too. The unique behavior of the

stem °*wo-* may be explained as an incorporation of the stem °*na-* 'emerge', substituting for the stem °*ka-* 'go', the likely source of the effective -ʾ*kʰᵉa-*, which would have been incompatible with 'come', if a feeling for those meanings was there when the earlier forms were created. The exceptions with ʾ*wo-ʾke-* (ʾ*woke ʾna*, ʾ*woke ʾnol*, ʾ*woke ʾtun*) must have been created by analogy at some later time, when the meaning 'go' had been forgotten and the endings were more opaque; we would have expected **ʾwo-ʾka-*. The effective substantive -ʾᵉ*am* is used only before ʾ*cik* °*ho ʾta*; the copula effective substantive ʾ*i ʾGem* (lenited from -ʾ*kem*) appears only as the truncation -- ʾ*[y] ʾGem* in *-u ʾl l* ʾʾ*Ge ʾm ye*. Although -ʾᵉ*a-* is usually treated as an unexplained variant of the effective -ʾ*kʰᵉa-*, King 1991c refines the hypothesis of Ko Yengkun 1980 that the two forms are distributed according to the transitivity of the stem. For more on this, see the entry *-e-* in Part II (p. 466).

The distinction of -ʾ*ta-* and -ʾ*ka-* as first-person 'I, we', versus -ʾ*te-* and -ʾ*ke-* for the other persons, is clearly stated by LCT 1973:317-8, but (as he says) many examples seem to be in conflict and the distinction was perhaps pre-Hankul − if, indeed, it really existed.

The form -ʾ*kwa* (-ʾ*Gwa*) appears before ʾʾ*la* and *swo ʾla* to make an exclamatory first-person statement; see also -ʾ*kwa ʾtye* < -ʾ*kwatoy ʾye* < **-ʾkwa to[wo]y ʾye*. There are but few examples in the texts. It might be the modulated infinitive of the effective, a contraction of **-ʾk[e]-ʾwo-ʾa*; if so it contradicts the otherwise valid rule (given below) that the modulator never precedes the infinitive ending. Another difficulty with that explanation: the accent of *pwo ʾkwa* ʾʾ*la* (1481 Twusi 7:13a, 16:52b) is like that of the gerund (*pwo ʾkwo*) rather than that of the effective (ʾ*pwoke-*).

9.9.3. Emotives.

The emotive bound stems express a subjective statement, often poetic or exclamatory. They are incorporated in the predication structures displayed below.

Emotive statements

-*two-ta*[1]	-*two-s-te-la*	-*two-swo-n i*	-*two-swo-ngi ʾta*
i-lwo-ta[2]			*i-lwo-swo-ngi ʾta*[2]
-*two-s-ta*			-*two-s-te-ngi ʾta*
-*nwo-s-ta*			-*nwo-swo-ngi ʾta*
-*ta-s-ta* /	-*ta-swola*	-*ta-swo-n i*	-*ta-so-ngi ʾta*
(*i*)*la-s-ta*[3]			
-ᵉ*a-so-la*			
-*sya-s-ta*[4]			

[1] Also a few examples of -*twu-ta*.

[2] Or *-u l i* ʾ*lwo-ʾta*, *-u l i* ʾʾ*lwo-ʾswo-ngi* ʾ*ta*. We treat ʾ*ilwo ʾta* as a variant of the copula (see §9.9.11).

[3] Retrospective + emotive -ʾ*s[o]-* + indicative assertive -ʾ*ta*.

[4] Modulated honorific -*(ᵘ⁄o) ʾsya-* + emotive -ʾ*s[o]-* + indicative assertive -ʾ*ta*.

The emotives are mostly built on the bound verb stems **-ʾt[o]-* and -ʾ*s[o]-*, usually in their modulated versions -ʾ*two-* and -ʾ*swo-*. A double emotive can be made by joining the two stems: -ʾ*two-ʾswo-*, etc. Another kind of exclamatory sentence is made with -ᵉ*a* ʾ*y ʾla*, equivalent to modern **-e ʾla**; see the entries in Part II.

There are also emotive questions, phrased with the emotive modifier *-s-on* or the processive emotive modifier -ʾ*no-s-on* followed by the postmodifier ʾ*ta*. See Part II for examples.

9.9.4. Sentence types.

Below are listed the various structures that are used to express different types of sentence. Many of the structures are based on nominalizations made with the postmodifier ʾ*i* 'fact' (= **kes**) used as a

summational epitheme after the perfect and imperfect adnominal forms: in rough translation '[it is] the fact that ⋯ does/did (is/was)'. Such nominalizations are followed by overt forms of the copula to make extended predicates — 'it's [the case] that ⋯ ', and the other forms can be treated as elliptical versions of that common type of predication, which usually had little function except to make the statement somewhat indirect or poetic. Stronger versions of the extended predicate were made with the postmodifiers s (after imperfect -lq only) and t 'fact' (after -lq or -n), and these nominalizations were also used in other structures of some importance, such as -lq 's oy 'since, because'. The i had other uses as an extruded epitheme 'the one that ⋯ '. The extrusion was usually from the subject of the adnominalized sentence 'one who ⋯ ' but occasionally from the object 'one whom ⋯ ': ne ʿ[G]wa kolʿWoʾl i ˝ep.suʾn i ʾʿla (1459 Wel 18:57b) 'there is no one to compare with you'.

<u>Sentence types</u>

COMMAND	-(ᵁo)ʾla; -ʿᵉaʾla, -ʾkᵉaʾla
	-ʾkwo ʾʾla, -ʿGwo ʾʾla
	-ʿᵉaʾssye
	-(ᵁo)ʾsywoʿsye
SUGGESTION/DESIRE	-ʿcye (ʾʾla) [incorporated aux adj inf]
	-ʿsa-ngi ʾʾta [to a superior]
PROMISE	-(ᵁo)ʾm a
EXCLAMATION	-(ᵁo)lʿssyᵉa = -(ᵁo)lq ʾsyᵉa < -(ᵁo)lq s ʾyᵉa
(apperceptive)	-i-ʾkwan ʿtye
STATEMENT/QUESTION	-(ᵁo)ʾn i
	-(ᵁo)ʾl i
STATEMENT	-ʾta; -ʾla after -ʾwᵁo-, -ʾnwo-, -ʾtᵉa- (and ʾile-), (-)ʾswo-,
	? ʾci- (desire), cop i- (but honorific ʾisiʾta) and var cop iʾlwo-,
	but not after -ʾkᵉa- (-keʾta) or -ʾtwo- (-twoʾta).
QUESTION	-(ᵁo)n + ʾta, ʾka, ʾkwo
	-(ᵁo)lq + ʾta, ʾka, ʾkwo; ʾt (⋯)
	-(ᵁo)ʾn i + ʿGa, ʿGwo, ʾya;
	-(ᵁo)ʾl i + ʿGa, ʿGwo, ʾya;
	-(ᵁo)ʾn [i] + ʾye, ʾywo
	-(ᵁo)ʾl [i] + ʾye, ʾywo
	-(ᵁo)ʾn i ʾ-ngi s ʾka/ʾkwo
	-(ᵁo)ʾl i ʾ-ngi s ʾka/ʾkwo
(negative)	aʾni ʿGa/ʿGwo
Extended predicates:	-(ᵁo)ʾn i ʾ⋯
	-(ᵁo)n ʾt i⋯ , -(ᵁo)n ʾt iʾn i (ʾ⋯)
	-(ᵁo)lq ʾt i⋯ , -(ᵁo)lq ʾt iʾn i (ʾ⋯)
	-(ᵁo)lq ʾs i⋯ , -(ᵁo)lq ʾs iʾn i (ʾ⋯)

The extended predicates are used to make FACTUAL sentences by predicating a summational epitheme (ʾi, s, t 'the fact that ⋯ ') with some copula form or, as if directly, with the copula ellipted.

9.9.5. Aspect marking of sentence types.

Sentences are marked for the aspects of perfect, imperfect, processive, and retrospective by various morphemes, most commonly incorporated in the modifier endings.

Aspect marking of sentence types

	PERFECT	IMPERFECT	PROCESSIVE	RETROSPECTIVE
STATEMENT			-no˙ta -˙nwo˙la[1]	-(ᵘ/o)˙l i ˙le˙la
	-(ᵘ/o)˙n i ˙˙la -(ᵘ/o)˙n i ˙-ngi ˙˙ta	-(ᵘ/o)˙l i ˙˙la -(ᵘ/o)˙l i ˙-ngi ˙˙ta	-˙no.n i ˙˙la -no˙n i ˙-ngi ˙˙ta -˙nwo-ngi ˙˙ta[2]	
QUESTION	-(ᵘ/o)n ˙ka l˙kwo l˙ta -(ᵘ/o)˙n i ˙-ngi s ˙ka l˙kwo	-(ᵘ/o)lq ˙ka l˙kwo l˙ta -(ᵘ/o)˙l i ˙-ngi s ˙ka l˙kwo	-non ˙ka l˙kwo l˙ta -no˙n i ˙-ngi s ˙ka l˙kwo	?
FACTUAL₁	-(ᵘ/o)˙l i ˙˙n i -(ᵘ/o)˙l i ˙˙n i ˙˙la	?		

FACTUAL₂

> -(ᵘ/o)lssila =
>   -(ᵘ/o)lq ˙s i˙la
> -(ᵘ/o)lssiGwo =
>   -(ᵘ/o)lq ˙s i-˙Gwo

EXCLAMATORY
STATEMENT
('I / we ... !')

> -˙kwa ˙˙la,
>   -˙Gwa ˙˙la
> -˙kwa-ngi ˙˙ta,
>   -˙Gwa-ngi ˙˙ta
> -kwa swo˙la

^{1} = -˙no-˙wo-˙ta with the modulator
^{2} = -˙no-˙wo-ngi ˙[y-]˙ta with the modulator

9.9.6. Nonfinite endings.

Various structures can be attached to a stem to make a nonfinal clause, coordinate with or (more often) subordinate to the final clause that follows. A few structures of stem + ending incorporate relatively free elements, and they can perhaps be treated as abbreviations of analytic phrases. These elements begin with an apical, and before them an --l- stem elides its final liquid. The pertinent morphemes are the bound adjectival noun ˙tos, the postmodifier t 'fact', which adds the nominative particle to make - ˙ti, the suspective, but also attaches the accusative (˙t ol) and other particles, and the particles ˙two = - ˙ti ˙two and (rarely) ˙sa = - ˙e ˙za. The elements - ˙toy, -ti˙Wi, -toy.ye, and - ˙to˙lwok were more definitively absorbed, but - ˙toy may have been compressed from -(no)n ˙toy. Some of the forms listed below are so important that we give them paradigmatic labels (INFINITIVE, GERUND, ...), as well as tag translations.

Nonfinite endings

- ˙ᵉ/a, - ˙yᵉ/a, ˙ho˙ya	and, ... INFINITIVE[1]
+ k, ˙sye, ˙two, ˙za, ...	(various kinds of emphasis)
- ˙ᵉ/a-[si-]˙nol	when, since, as; although CONCESSIVE
- ˙ke-[si-]˙nol, - ˙Ge-[si-]˙nol	when, since, as; although CONCESSIVE

-'kwo, -'Gwo	and, ... GERUND
+ k, 'sye, 'two, 'za, ...	(various kinds of emphasis)
+ n'	and, but, when (much more / less ...)
-'kwom °ho-	do repeatedly (CF -ko nun ha-)
-'ke-/-'Ge-(si-, ...-)'tun	if, when PROVISIONAL [= EFFECTIVE CONDITIONAL]
-na-'ton	(after 'wo- 'come')
-'a-(si-, ...-)'ton	if, when EFFECTIVE CONDITIONAL
-'ton	if, when CONDITIONAL (< t + '^{u}/on)
-(^{u}/o)'na	but ADVERSATIVE
-ke-/-Ge-'na	but; whether ... or ... EFFECTIVE ADVERSATIVE
-'k^e/a.n/-'G^e/a.n/-'^{e}/a.n i 'Gwa	but / and (even more)
-'no.n i 'Gwa	but / and (even more)
-'k^e/an/-'G^e/an/-'^{e}/an ma'lon	but
-ken ma'non	but
-ken/-Gen 'tyeng	although
-kwan'toy, -Gwan'toy	since, as
-'toy	and ACCESSIVE → -'wo-'toy; cop 'ilwo'toy,
	honorific -('^{u}/o)sya'toy
-(^{u}/o)n 't oy/ay (n')	and, but
-'te-/-'ke-n 't ^{e}/ay/oy n'	and then; if, when
-'w^u/o-l 'tyeyn	if, when
-(^{u}/o)'n i	(its being that ...) EXTENDED PREDICATE
-(^{u}/o)lssoy = -(^{u}/o)lq 'so y	as, since, so; because
-(^{u}/o)'la 'n 't oy	and therefore; because
-(^{u}/o)'la	if, when; since
-w^u/o-'l ye	for the purpose of, in order to
-(^{u}/o)'lak	with the intention of; + °ho- intend to do
-'ta 'ka, 'ila 'ka	and / but then (changing to ...) TRANSFERENTIVE
-'key/-'Gey, -'kuy/-'Guy[2]	so as to be/do; (in a manner) such that
-te-'tun	but, and; if, when RETR CONDITIONAL (hon. -'tesi'tun)
-'to'lwok	all the way to where, until
-'tos °ho-; -'to's 'i	be as if ... ; as if
-'^{e}/am 'cik °ho-	be likely / possible, be somewhat / quite ...
-(^{u}/o)l 'solwok	the more ... (the more ...)
-'t i →	
-'ti	(1) = -ki ka; (2) = -ci [ka] (+ neg aux)
-'ti ma'la (k)	= -ci mālko 'not ...ing but (instead)'
-'ti 'Gwos	the more ... (the more ...)
-'t ol	= -ci lul
-'two = -'ti 'two	(+ neg aux 'not ... even / either')
-ti 'Wi, -ti 'Gwuy, -ti 'Gwey, -'ti 'Gwoy	but (= -ci man)
-'sa = -'e 'za	only / precisely if
-'kwo/-'Gwo 'cye	wanting to: + °ho-, + ''wen °ho-
-'kwa 'tye, -'Gwa 'tya	wanting to
-'kwatoy 'ye, -'Gwatoy 'ye	wanting to
*-'key 's 'kwo, -'Gey 's 'kwo	wanting it to happen
-'kuy 's 'kwo	wanting it to happen
*-'kwo s, -'Gwo s	wanting it to happen
-toy.ye	I hope / desire that ...
-'k^e/a, -'G^e/a + ci'la, 'ci-ngi ''ta	I hope / desire that ...

¹ When the infinitive is attached, stems ending in ‥*i*- or ‥*wu*- usually reduce those vowels to semivowels (‥*i*-˙*e* > ‥˙*ye*, ‥*wu*-˙*e* > ‥*we*) and stems ending in ‥*u*- drop that vowel (‥*u*-˙*e* > ‥˙*e*). Stems ending in ‥*wo*- often reduce that vowel to a semivowel (‥*wo*-˙*a* > ‥˙*wa*) but the unreduced version is also found, as in *to˙thwoa* (1475 Nay 3:41a) = *to˙thwa* (1463 Pep 2:113b) 'fight'. The only stem with ‥*o*- is °*ho*- 'do', and its infinitive is irregular: ˙*ho˙ya*. (Stems such as *mwo˙lo*-/ ¨*mwoll*- attach the infinitive to the ‥*ll*- shape: ¨*mwol˙la* 'not know'.) For stems with ‥*a*- the infinitive ending is absorbed by the stem: ˙*ka*-˙*a* > ˙*ka* 'go', ˙*sa*-˙*a* > ˙*sa* 'buy'. Forms with ˙‥*a*-˙*a* and ˙‥*e*-˙*e* represent the effective infinitive, as in ˙*sa˙a ci˙la* (1459 Wel 1:10b) 'I want to buy' and ˙*phye˙e ˙ys.ten* (1447 Sek 6:2a) '‥ that one has stretched'. But *te˙e* (1459 Wel 1:47b, 23:76b; 1462 ¹Nung 76:2; 1463 Pep 6:10b) < *te[u]-˙e* 'increase' is the simple infinitive; the unattested effective infinitive would be **teu˙ke*. And *ta˙a* (1445 ¹Yong 84, 1447 Sek 9:16b; 1462 ¹Nung 9:114b, 10:9a) < *ta[o]-˙a* 'exhaust' is also a simple infinitive.

² And uncommonly -˙*koy*/-˙*Goy* (He Wung 602-5).

9.9.7. Nominalizers.

Nominalizations are usually made with the substantive (= literary summative) suffix -(˙ᵁ⁄ₒ)*m*, but the modulator is normally obligatory, so the ending is -˙*w*ᵁ⁄ₒ*om*, attached to the stem under the rules for the modulator stated in §9.9.10. The copula is (?˙*i˙lwom*/) ˙*(y)˙lwom* = ?˙*i˙ywom*/˙˙*(y)wom*. The honorific of the substantive is -(ᵁ⁄ₒ)˙*syam*, and the honorific substantive of the copula ought to be ?*˙*i˙syam*/˙*(y)˙syam*, or ?*˙*i˙lwo˙syam*/˙*(y)˙lwo˙syam*, but examples of those copula forms have not been found. In extended structures based on the substantive (such as -˙ᵁ⁄ₒ˙*m ye*) the modulator is absent: ˙*i˙m ye* [< ˙*i-m i*-˙*e*], ˙*i˙m ye n*', ‥ ; ˙*isi˙m ye (n*'), ‥ . Compare the two substantives in *te˙tuy˙m ye spol˙lwo˙m i* (1462 ¹Nung 6:54a) 'the tardiness or promptness'. Examples: ¨*twul[h] a˙ni* ˙'*m ye* (1459 Wel 8:31b) 'are not two, nor ‥ ', ¨*ne ˙y˙m ye* (1459 Wel 8:5b) 'it is you and ‥ ', ‥ *towoy˙m ye* (1447 Sek 6:34a) 'it becomes ‥ and ‥ ', ¨*nay˙m ye* (1459 Wel 7:48a) 'we impart it and ‥ ', *mwoncye* ¨*mal ˙hosi˙m ye* (1459 Wel 2:58b) 'he speaks first and ‥ ', *mwoncye ˙mas ˙pwosi˙m ye* (1475 Nay 1:9-10) 'first tries the taste and ‥ '.

Notice that either *i˙sywom*/˙*(y)˙sywom* or *i˙sywum*/˙*(y)˙sywum* is the modulated substantive of *is(i)*- 'exist', and ˙˙*sywom* or ˙˙*sywum* (when not optionally representing ˙*y˙sywom* or ˙*y˙sywum* after a Chinese word ending in ‥*l* or ‥*Y*) is the modulated substantive of its shortened form ˙*si*-. The honorific is ¨*kyesi˙m ye n*' ([1447→]1562 Sek 3:1a), modulated as ¨*kyesya˙m ay* (1445 ¹Yong 26); in ¨*kye˙sim ˙ay* (1586 Sohak 6:122a) the ˙*sim* must be broken type for ˙*syam*. The substantive of °*sye*- 'stand' is *syem* (*sye˙m ye n*' 1462 ¹Nung 6:29a), with honorific (?*)˙*sye˙sim*; and the modulated substantive is ¨*syem* = *sye˙wum*, honorific (?*)˙*sye˙syam*. The modulated substantive of ˙*psu*- 'use' is ˙*pswum* (1447 Sek 9:12a, 1462 ¹Nung 10:42b); for ˙*ptu*- 'float' the form is ˙*ptwum* (˙*ptwu˙m i* 1462 ¹Nung 3:106a, ˙*ptwu˙m ey* 1459 Wel 8:6a); for ˙*khu*- 'big' it is ˙*khwum* (˙*khwu.m u˙lwo* 1459 Wel 1:29b). The modulated substantive of ¨*hye*- 'pull' is ¨*hyem* (¨*hyem ˙kot* [broken type lost the upper dot], ¨*hye˙m on* 1465 Wen 2:1:1:16a), of ¨*hyey*- 'reckon' it is ¨*hyey˙ywum* (¨*hyey[˙]ywu˙m i* 1481 Twusi 8:36a). The form for °*ho*- 'do' is ˙*hwom* and for ˙*ho˙si*- 'deign to do' it is ˙*ho˙syam*: ˙*hosya˙m olwo* (1482 Nam 1:33b), ˙*hosya˙m on* (1459 Wel 14:58a; 1463 Pep 6:145b; 1462 ¹Nung 1:17b, 4:13a; 1465 Wen se:12a), ˙*hosya˙m i* (1462 ¹Nung 4:13b, 10:42b; 1463 Pep 5:100a), ˙*ho˙sya.m i˙la* (1459 Wel 14:58a). But in extended structures the substantive appears unmodulated: ˙*hosi˙m ye* (1459 Wel 2:58b).

There are a few examples of the nominalizing -˙*ki* (the summative): -˙*ki l*' ¨*al*- 'know to do'; -˙*ki ˙lol ˙cul˙ki*- 'be glad to do, delight in doing'; -˙*ki ˙lol* ᴋʏᴡᴇʟQ °*ho*- 'decide to do'; -˙*ki ˙yey* 'in doing'. (Examples in Part II.) Wider use of the summative took hold in the 17th century. In the modern language, the MK nominalizations with the substantive have largely been replaced by analytic structures that consist of modifier + *kes* 'fact; thing; one'.

Notice also the summational nominalizations made up of modifier + the postmodifier ˙*i* 'fact'. These are used to express a favorite MK sentence type of 'it is [the fact] that ‥ ', referred to as "factual predication" or "the extended predicate".

9.9.8. Exaltation; the politeness marker (-*ngi*).

As in the modern language, earlier speakers of Korean used various devices to show their respect for the subject and toward the listener. To exalt or show honor to the subject the verb stem attaches a bound auxiliary (usually referred to as a suffix or an infix). The morpheme is combined with other elements to make paradigmatic forms parallel to the unmarked (nonhonorific) forms.

The honorific stem can be modulated (§9.9.10):

$$-({}^{u}\!/\!o)\,{}^{\cdot}si\text{-} + \text{-}{}^{\cdot}w^{u}\!/\!o\text{-} \text{ modulator} \rightarrow -({}^{u}\!/\!o)\,{}^{\cdot}sya\text{-}$$

$$+ \text{-}{}^{\cdot e}\!/\!a \text{ infinitive} \rightarrow -({}^{u}\!/\!o)\,{}^{\cdot}sya$$

$$+ \text{-}s\text{-} \text{ emotive} \rightarrow -({}^{\cdot u}\!/\!o)syas\text{-}{}^{\cdot}ta$$

Both the effective honorific and the honorific effective occur:

$$-{}^{\cdot e}\!/\!asi\text{-}, \; (\text{-}y, \text{-}i)\, \text{-}{}^{\cdot}y^{e}\!/\!asi\text{-} = \text{-}{}^{\cdot}k^{e}\!/\!asi\text{-}, \text{-}{}^{\cdot}G^{e}\!/\!asi\text{-} = -({}^{u}\!/\!o)\,{}^{\cdot}si\,{}^{\cdot}ke\text{-}$$

Do not confuse this with:

$$-{}^{\cdot e}\!/\!a\,{}^{\cdot}s(i)\text{-}, \; (\text{-}y, \text{-}i), \text{-}{}^{\cdot}y^{e}\!/\!a\,{}^{\cdot}s(i)\text{-} \quad \text{inf} + \text{aux } is(i)\text{-}$$

$$-{}^{\cdot}k^{e}\!/\!a\,{}^{\cdot}s(i)\text{-}, \; (\text{-}y, \text{-}l), \text{-}{}^{\cdot}G^{e}\!/\!a\,{}^{\cdot}s(i)\text{-} \quad \text{effective inf} + \text{aux } is(i)\text{-}$$

Optional order of the honorific is possible also for the provisional, which consists of the effective + incorporated *t* 'fact' + pcl ${}^{\cdot}(n)^{u}\!/\!on$:

$$-{}^{\cdot}esi\,{}^{\cdot}t^{u}\!/\!on, \; (\text{-}y, \text{-}i)\, \text{-}{}^{\cdot}yesi\,{}^{\cdot}t^{u}\!/\!on = \text{-}{}^{\cdot}kesi\,{}^{\cdot}tun = \text{-}{}^{u}\!/\!o\,{}^{\cdot}sike\,{}^{\cdot}tun$$

And it is possible, as well, for the concessive, which consists of the effective modifier + the accusative marker ${}^{\cdot}(l)^{u}\!/\!ol$:

$$-{}^{\cdot e}\!/\!asi\,{}^{\cdot}n^{u}\!/\!ol, \; (\text{-}y, \text{-}i)\, \text{-}{}^{\cdot}y^{e}\!/\!asi\,{}^{\cdot}n^{u}\!/\!ol = \text{-}{}^{\cdot}k^{e}\!/\!asi\,{}^{\cdot}n^{u}\!/\!ol = -({}^{u}\!/\!o)\,{}^{\cdot}sike\,{}^{\cdot}nul$$

The bound stem -¨*zop*- (-¨*sop*-, -¨*cop*-), with its morphophonemic peculiarities (§9.9.9), was attached to make forms that are deferential toward the listener or that exalt the direct or indirect object. Before a vowel the *p* often becomes *W* or *w*: -*zowa* ← -*zoW-a*; -*zowo*⋯ ← -*zoW-o*⋯ , ← -*zoW-wo*-.

When both exaltations are present, the deferential (object exaltation) comes first: -*zo̍W-osi*- ← **-(o)so̍po-si-* as in -*zo̍ wosya̍m ol*, -*zo̍ wosi̍ kwo*, -*zo̍ wo̍site̍n i*. Such forms are used to show respect to the listener when referring to his acts toward a superior, as when I ask whether "you" will humbly offer something to Buddha. Not every example of --*si*- represents the honorific. The morpheme is not present in ˙*TTAY-SSIN* ˙*tol̍h i* ¨*mwoy̍sizo̍Wo̍n i* (1449 Kok 23) '[twenty-seven] great gods served to guard round him', for the verb ¨*mwoy̍si*- is a contraction of *** ¨*mwoy̍ye isi-*.

The polite marker -*ngi* shows respect toward the addressee, like modern -(su)p-ni-. It is sometimes reduced to -*ng*', and the copula polite form -- '-*ngi* = *[i]-ngi* is occasionally ellipted altogether (CF He Wung 1970:118-9):

˙*ho̍nwo.n i s* ˙*ka* (1447 Sek 6:16b) = ˙*ho-no-̍wo-n* ˙*i [˙i-ngi] s* ˙*ka*

is.no̍n i s ˙*ka* (1447 Sek 6:14b) = *is-n-on* ˙*i [˙i-ngi] s* ˙*ka*

a̍ni tutco̍Wa 'ys̍tesi̍n i s ˙*ka* (1447 Sek 17a) = -- *is-̍te-si-n* ˙*i [˙i-ngi] s* ˙*ka*

Compare the unellipted structures in *e̍nu y* ˙*za* ˙*mos* ¨*tywoho̍n i* '-*ngi s* ˙*ka* (1447 Sek 6:35b) 'which one is best?', ˙*SYENG-ZIN* ˙*i* ¨*kyesi.n i* ''*n i* '-*ngi s* ˙*ka* (1465 Wen se:68a) 'is there a holy man here?'

9.9.9. The deferential (-¨*zop*-).

The bound stem used to make the deferential is -¨*zop*- < **-so̍po-* or **-oso̍po-*. For Middle Korean we take the synchronically basic shape to be -¨*zoW*- and account for the -*s*⋯ forms as assimilations; that is just opposite from the viewpoint taken in Martin 1982/3, where the basic form was taken to begin with -*s*⋯, like the reconstruction of the earlier stem. I believe the immediate ancestor of ALL cases of *z* was *s*, even for particular morphemes that do not preserve evidence of the conditioning factors, such as the accentual residue of a lost vowel. Similarly in all cases, I believe the ancestor of -*W*- was *p*, and that of the last consonant of the -T/L- stems was *t*. The revised reconstruction of **-so̍po-* as **-oso̍po-* follows from taking -¨*zoW*- as the basic synchronic shape for Middle Korean. The initial vowel of the reconstruction is not to be confused with the epenthetic ⋯ *u*/*o*⋯, for it did not function to separate the ending from a preceding vowel. Instead, it accounts for rules of attachment that are unique to this stem.

How - ¨*zop*- attaches:

···*s*- ¨*zop*-	→	···*s* ¨*sop*-, ··· ¨*ssop*- (including ¨···*z*- < *···*so* ˈ*po*-)
···*sk*- ¨*zop*-	→	···*s* ¨*sop*-
···*h*- ¨*zop*-	→	··· ¨*ssop*-
···*lh*- ¨*zop*-	→	···*l* ¨*ssop*-
···*c*- ¨*zop*-	→	··· ¨*ccop*-; also ···*s* ¨*cop*-, ···*t* ¨*cop*-
···*ch*- ¨*zop*-	→	··· ¨*ccop*-; also ···*s* ¨*cop*-, ···*t* ¨*cop*-
···*nc*- ¨*zop*-	→	···*n* ¨*ccop*-; also ···*nt* ¨*cop*-, ? ···*s* ¨*cop*-
···*t*- ¨*zop*-	→	···*t* ¨*cop*- (including ···*t*-/···*l*- < *··· ˈ*to*-)
···*th*- ¨*zop*-	→	···*t* ¨*cop*-
···*p*- ¨*zop*-	→	···*p* ¨*sop*-
···*ph*- ¨*zop*-	→	···*p* ¨*sop*-
···*ps*- ¨*zop*-	→	···*p* ¨*sop*-
···*lp*- (···*lW*- < *···*l* ˈ*po*-) →		···*lp* ¨*sop*-
···*k*- ¨*zop*-	→	···*k* ¨*sop*-
···*lk*- ¨*zop*-	→	···*lk* ¨*sop*-
···*l*- ¨*zop*-	→	··· ¨*zop*-
···*m*- ¨*zop*-	=	···*m* ¨*zop*-
···*n*- ¨*zop*-	=	···*n* ¨*zop*-
···- ¨*zop*-	=	- ¨*zop*- (stems that end in vowels or diphthongs)

Source of strings in the attached forms:

···*p* ¨*sop*-	←	···*p*- ¨*zop*-, ···*ph*- ¨*zop*-, ···*ps*- ¨*zop*-
···*k* ¨*sop*-	←	···*k*- ¨*zop*-
··· ¨*ssop*-	←	···*s*- ¨*zop*-, ···*h*- ¨*zop*-
···*s* ¨*sop*-	←	···*s*- ¨*zop*-, ···*sk*- ¨*zop*-
···*s* ¨*cop*-	←	···*c*- ¨*zop*-, ···*ch*- ¨*zop*-
···*t* ¨*cop*-	←	···*t*- ¨*zop*-, ···*th*- ¨*zop*-; ···*c*- ¨*zop*-, ···*ch*- ¨*zop*-
··· ¨*ccop*-	←	···*c*- ¨*zop*-, ···*ch*- ¨*zop*-
···*m* ¨*zop*-	=	···*m*- ¨*zop*-
···*n* ¨*zop*-	=	···*n*- ¨*zop*-
··· ¨*zop*-	=	···- ¨*zop*-, ···*l*- ¨*zop*-

A scribal error must be responsible for *ki* ˈ*tulicop* ˈ*ti* (1463 Pep 2:7a) < *ki* ˈ*tu* ˈ*li*- 'wait for'; it should be corrected to *ki* ˈ*tulizop* ˈ*ti*.

9.9.10. The modulator (- ˈ*w*ᵘ⁄*o*-).

The modulator is a bound stem that attaches to other stems and modulates the meaning, in varying ways and to varying degrees depending upon the ending(s) that follow. Below we describe: how the morpheme is attached; what meaning it imparts; the restrictions that apply in making up forms. The modulator gradually fell into disuse starting from the early 1600s (LCT 1973:346).

The modulator attaches as follows:

(0) After a consonant the morpheme is attached with no special peculiarities, whether the stems are short or long: *me* ˈ*kwumwo* ˈ*m i* (1482 Kum-sam 3:3b) ← *me* ˈ*kwum*- 'swallow; harbor', *tato* ˈ*lwom* (1482 Kum-sam 3:28b) ← *tatot*- 'reach', ˈ*muke* ˈ*wu* ˈ*m i* (1462 ¹Nung 7:86b; = ˈ*muke[W]*- ˈ*wu-m*) ← ˈ*mukeW*- 'heavy'.

(1) As they do before ALL vowels, *o* and *u* drop before - ˈ*w*ᵘ⁄*o*-: ˈ*khwu.m u* ˈ*lwo* (1459 Wel 1:29b) ← ˈ*khu*- ˈ*wu-m* 'being big', ˈ*pcwo* ˈ*m on* (1463 Pep 7:120b) ← ˈ*pco*- ˈ*wo-m* 'being salty', ˈ*thwo.m i* (1475 Nay 3:63a) ← ˈ*tho*- ˈ*wo-m* 'receiving', ˈ*phwom* (1463 Pep 4:95b) ← ˈ*pho*- ˈ*wo-m* 'digging'. The form ˈ*pha* ˈ*m ol* (1462 ¹Nung 3:87a) is unexplained and tacitly corrected by LCT to the expected ¨*phwo* ˈ*m ol*. In the phrase *te* ˈ*wo* ˈ*m ol* (1481 Twusi 23:23a) ← *teu*- ˈ*wo-m* 'becoming more (so)' the choice of

-ʾwo- rather than of -ʾwu- seems ill-motivated; CF *te ʾwu ʾm un* (1451 Hwun-en 14a) 'adding [a tone dot]'. Another violation of harmony: *tu ʾlwolq* (1462 ¹Nung 2:111a) = ?* *tu ʾlwulq* 'to enter'.

(2) ··*i* + -ʾw⁴⁄₆- → ··*i ʾyw⁴⁄₆*-: *culkywo ʾm ol* (1463 Pep 2:249b, 1481 Twusi 22:7b) < *culki-* 'delight'; *me kywom* (1482 Nam 2:63b) < *me ki-* 'feed'; *namwo ˝cywu.m ey* (1481 Twusi 7:6b) < *namwo °ci-* 'chop wood'.

(3) ··*y* + -ʾw⁴⁄₆-- → ··*y ʾyw⁴⁄₆*-: *˝hyey ʾywom* (1465 Wen 3:3:1:62a), *˝hyeyywu ʾm i* (1481 Twusi 21:42a) < *˝hyey-* 'reckon'; *muy ʾywo.m ol* (1481 Twusi 25:23a) = *muy ʾywu ʾm ul* (1464 Kumkang 79b) < *muy-* 'hate'; *towoy ʾywo ʾm i* (1463 Pep 4:75a) < *towoy-* 'become'.

(4) The copula usually appears as ʾ*i ʾlwo-* but occasionally as ʾ*i ywo-* / ˝*ywo-*: ʾ*i ʾlwom* / ˝*lwom* = *i ʾywom* / ʾ*ywom*; *a ni ʾlwo ʾm i* (1459 Wel 2:55b, 1482 Kum-sam 2:27b), *hon ka ci ʾlwo ʾm ol* (1468-Mongsan 19a); *a ni ʾlwon* (1482 Kum-sam 2:27b), *ke wu lwu ʾylwon ʾt i* (1462 ¹Nung 2:17b); ʾ*ilwo toy* (1463 Pep 2:28b, 1462 ¹Nung 1:87b), ʾ*ylwo toy* (1462 ¹Nung 7:24a, 1464 Kumkang se:5b — after Chinese words); *a n[i] ʾywo ʾm i* (1459 Wel 1:36a); are there examples of unabbreviated ʾ*i ywom*? See also -*ul swongi ta* = -*ulq s ʾ[y]wo-ngi ta*.

(5) The verb °*ho-* 'do, say' has the modulated substantive ʾ*hwom* but also ˝*hwom*, as if the stem vowel were more open (see 7 below), but probably the accent is a residue from contracting ʾ*ho ywom* (see just below). Examples: ˝*hwo ʾm i* (aux, 1459 Wel 21:22a); ʾ*hwom* ('saying', 1459 Wel 1:31b), ʾ*hwo ʾm i* (after verbal noun, 1463 Pep 5:148b) = ʾ*hwo[ʾ]m i* (1482 Kum-sam 2:16a), ʾ*hwo ʾm ol* (aux, 1462 Nung 1:108b), ʾ*hwo[ʾ]m ol* / *on* (1481 Twusi 7:31b). Instead of attaching to °*ho-* the modulator can attach to ʾ*ho.y-*: ʾ*ho.y- wo-m* → ʾ*ho.ywom* (1482 Nam 1:3a, 1463 Pep 3:63a), ʾ*ho.ywo ʾm ol* (1481 Twusi 8:24b); ʾ*ho.y- wo-n* → ʾ*ho.ywon* (1459 Wel 9:6b, 1482 Kum-sam 2:25a), ʾ*ho.y- wo-lq* → ʾ*ho.ywolq* (1459 Wel se:10b); ʾ*ho.y- wo- la* → *[ʾ]ho.ywo la* (1481 Twusi 21:25b); ʾ*ho.y- wo- toy* → ʾ*ho.ywo toy* (1447 Sek 13:57b). These forms look as if they were made on the effective stem ʾ*ho ya-* with the final vowel ellipted, but perhaps they are telling us something about the prehistory of the stem: °*ho-* / *ho.y-* < **hyo-*, see the note on °*ho ta* in Part II.

(6) The honorific modulates as -(⁴⁄₆b) ʾ*si- w⁴⁄₆-* → -(⁴⁄₆b) ʾ*sya-*. Examples: ·· ʾ*hosya ʾm on* (1462 ¹Nung 1:17b) 'his saying that ·· '; *patco wosya ʾm ol* (1459 Wel 18:62b) '[seeing] that you are giving it to him'; *he mu.l i ˝ep susya ʾm i* (1463 Pep 2:15-6) 'that he has no blemishes'; ˝*cye kusya ʾm i ˝kye siken tyeng* (1463 Pep 3:189b) 'though there are those who have little'; [ʾTUK-NGWEN] ˝*wol mosyam two* (1445 ¹Yong 4) 'that he moved to Tek.wen'; *ku casi ʾm ye ˝kyesya ʾm ol* (1475 Nay 1:44a) 'that he is there asleep'; ʾ*ho sya.m i la* (1459 Wel 14:58a); *towoy sya ʾm i* (1459 Wel 1:21a) 'it is deigning to do'; *cwocho sya ʾm i* (1475 Nay 2:1:49a) 'that you follow'; *teu sya.m ol* (1463 Pep 4:192-3) '[he seeks] to enhance'.

(7) After *e a wu wo* the -ʾ*w⁴⁄₆*- automatically drops, but it can be retained for clarity. Examples with the morpheme suppressed but assumed because the ending requires the modulator: ʾ*pola ʾm ol* (1481 Twusi 7:7a), ʾ*pola ʾm ay* (?1517- Pak 1:68a) ← 'look; hope', *i Gem kwa ʾlol* (1462 ¹Nung 4:21b) ← *i Ge-* 'shake'. But most vowel-final polysyllabic stems are compounds with the same behavior as the final monosyllabic stem: ˝*ket- ˝na toy* (1459 Wel 2:19a) < ˝*ket-°na-* 'walk across; cross'. When the modulator is suppressed, the accent of a monosyllabic stem changes to rising:
  ˝*pwo ʾm on* (1459 Wel 8:9b), ˝*pwo.m i ʾn i* (1482 Kum-sam 2:63a) ← *pwo- [wo]-m* < °*pwo-* 'see'; ˝*wo ʾm ol* (1482 Nam 1:50b), ˝*wo ʾm i* (1482 Kum-sam 3:19a) ← *wo- [wo]-m* < °*wo-* 'come'
  ˝*twu ʾm i* (1459 Wel se:22b) ← *twu- wu-m* < °*twu-* 'put away'; ˝*cwul ʾptu.t i* (1481 Twusi 7:40a) 'the idea to give it' ← ʾ*cwu- wu-m* < °*cwu-* 'give', ˝*cwu toy* (1447 Sek 19:3a) 'give it and' ← *cwu- [wu]-toy* < °*cwu-* 'give', ˝*cwulq ʾt i la* (1447 Sek 9:12a) 'is to give it' ← *cwu- [wu]-lq* < °*cwu-* 'give'
  ˝*nye ʾm i* (1481 Twusi 20:11b) < °*nye-* 'go'; ˝*hyem* (1465 Wen 2:1:1:16a [broken type lost the upper dot]) < °*hye-* 'draw [a needle]'; ˝*hhye.m o lwo* (1462 ¹Nung 7:90a) 'by pulling', ˝*hhye toy* 'leads to -- and' (1462 ¹Nung 1:69a) < *hhye- [wu]-* < °*hhye-* 'pull, lead'

¨nam ˙kwa (1447 Sek 6:19a), ¨na˙m ol (1447 Sek 9:16b) ← na-˙[wo]-m and ¨na˙toy (1447 Sek 19:7b, 1449 Kok 185) ← na-˙[wo]-˙toy < °na- 'emerge'

¨ca˙m ay (1462 ¹Nung 10:82a), ¨ca[˙]m ol (1481 Twusi 8:27b) ← ca-˙wo-m < °ca- 'sleep'

¨ha˙m ol (1463 Pep 5:100a, 1482 Kum-sam 3:19a) ← ha-˙wo-m < °ha- 'be many'; ¨ha˙toy (1445 ¹Yong 13); ˙ptu˙t i ¨han cyen˙cho lwo (1447 Sek 6:2b) 'because the desires are great'

˙e˙m[i] uy ¨kan ˙sta˙h ol (1459 Wel 21:21b) 'the land where your mother went' ← ka-˙wo-n < °ka- 'go'; CF ka˙n i ˙'la (1447 Sek 6:20b) 'went'

A peculiarity is that the accent change apparently can take place before attaching the modulated honorific: ˙i ˙SYANG ˙on ˙YWOK-˙QOY ˙uy ¨na˙syan ˙t i a˙ni ˙si˙n i (1462 ¹Nung 1:42a) 'this aspect is not what desire is born from' ← ˙na-˙si-˙wo-n. But also, without the change: ˙ka˙sya (1447 Sek 6:45b, 1459 Wel 2:11b), ˙hosya (1447 Sek 6:12a) = ˙ho˙sya (1482 Kum-sam 2:2b), ˙ho˙syan (1463 Pep 6:144a), ˙ho˙syam (1482 Nam 1:33b), ... The modulated honorific may well be the EFFECTIVE with the modulator absorbed (i.e. suppressed, as with ‥a- stems in general, p. 270): -ᵁ⁄o˙si-˙(G)a-[˙wᵁ⁄o-].

A compound verb may be treated like the final stem: (mac-°na- >) mas-°na- 'meet' → mas-¨na- in mas-¨nala (1481 Twusi 8:13b).

(8) ‥l- + -˙wᵁ⁄o- = ‥˙lwᵁ⁄o-, as in a˙lwo˙m i (1462 ¹Nung 1:55a) < ¨al- 'know'.

‥lᵁ⁄o- + -˙wᵁ⁄o- = ‥l˙lwᵁ⁄o-, as in ¨mwol˙lwol (1447 Sek 13:37b) < mwo˙lo- 'not know', mol˙lwom (1459 Wel 2:42a) < molo- 'get dry', hul˙lwo˙m ol (1462 ¹Nung 10:18a) and hul˙lwu˙m oy (1463 Pep 6:86b) < hulu- 'flow'.

(9) In general, strings like -zowo- are treated as modulated (= -zoWwo-) and strings like -zoWo- as unmodulated. But for those endings that do not permit the modulator to intrude, strings like -zowo- are equivalent to the unmodulated -zoWo-. The relevant cases are -¨zowo˙m ye = -¨zoWo˙m ye, -¨zowo˙m ye n' = -¨zoWo˙m ye n', and the infinitive -¨zo˙wa = -¨zo˙Wa. Before the honorific -(ᵁ⁄o)˙si- and its modulated form -(ᵁ⁄o)˙sya- strings like -zowo- are also equivalent to -zoWo-. Thus there is only one modulation in -zo˙wosya˙m ol.

The modulator has three meanings:
> (1) nothing (vacuous use, obligatory or optional)
> (2) the subject is first-person
> (3) the sentence is adnominalized to an epitheme extruded from the object

This description follows the theory of He Wung. An alternative theory, maintained by LSN and toward which LCT is also inclined, treats the basic or original meaning as volitive. An argument can be made that the volitive meaning in the obvious cases is carried by the attached prospective modifier ending -˙ᵁ⁄olq. But a similar argument would attribute the cases that strongly imply first-person subject to other elements, and LCT is concerned about the many examples where a modulated form refers to the second or third person as the subject. Whatever the original meaning, it was attenuated by the time the texts were written and eventually disappeared, though traces of the morpheme lingered on. Both theories on the meanings of the modulator must make allowance for the various restrictions that require or preclude its presence, as described below.

Restrictions

1. The modulator is never used before: -˙kwo, -˙Gwo
> -˙kuy, -˙Guy
> -˙to˙lwok
> -(ᵁ⁄o)˙m ye (n')
> -˙ᵉ⁄a

For a possible exception, see the etymology of -˙kwa suggested in §9.9.2 (p. 263).

2. The modulator is obligatory before the accessive -˙toy → -˙wᵁ⁄o˙toy and before most uses of the substantive -(ᵁ⁄o)m → -˙wᵁ⁄om. But -(ᵁ⁄o)˙m ye (n') never takes modulation. Simplex nouns are derived

from either the modulated or the unmodulated substantive: *e'lum* 'ice' < *"el-* 'freeze', *kelum* 'gait, pace' < *"ket-/kel-* < **ke'lu-* 'walk' (but *ke'lwu'm ey* in 1481 Twusi 16:70b); *wu'lwum* (1459 Wel 1:27b) = *wulwum* (--) (1775 Han-Cheng 5:47a [on p. 145a]; LCT 592b *"wulum"* is a mistake) = *wul.um* 'crying' < *"wul-* 'cry' (also *wul'Gwum* < *'wulu-/'wulG-* < **'wuluG-*), *ki'chwum* (1447 Sek 19:39a) = *ki'chum* (1463 Pep 6:102b) < *kich-* 'cough'.

3. The modulator expresses first-person subject:

before *-'ta* (→ *-'la*) *-w^(u/o)-'la* 'I/we … ', CF *-'ta* 'you/he … '
before *-(u/o)'n i*   *-w^(u/o)-'n i* 'I/we … ', CF *-'n i* 'you/he … '

It can be preceded by *-(')no-*, and *-'no-'wo- → -'nwo-*:

-'nwo-'la 'I/we … ', CF *-no-'ta* 'you/he … '
-'nwo-'n i 'I/we … ', CF *-no-'n i* 'you/he … '

4. The subject-exalting *-(u/o)'sya- ← -(u/o)'si-'w^(u/o)-* will not occur when the modulator expresses a first-person subject, for "I" never exalt myself: **-(u/o)'sya-'la, *-'sya-'n i*

5. Sometimes the modulator as a marker of first-person subject will occur with *-(u/o)'l i ''la, -(u/o)'l i ''n i*, or *-(u/o)'l i '-ngi ''ta*:

-'w^(u/o)-'l i ''la 'I/we will' …
-'w^(u/o)-'l i ''n i
-'w^(u/o)-'l i '-ngi ''ta

6. The modulator is optional (and vacuous) with *-'no-ngi ''ta*:

-'nwo-ngi ''ta = -'no-ngi ''ta

7. In adnominalized sentences, including *-(u/o)'n i ''la* and *-(u/o)'l i ''la*, the modulator is obligatory when the epitheme has been extruded from the OBJECT:

-'w^(u/o)-l(q) 'that one is to do it to'
-'w^(u/o)-n 'that one did it to'
-'nwo-n 'that one is doing it to'

And with subject exaltation:

-(u/o)'syalq   *← -(u/o)'si-'w^(u/o)-lq*
-(u/o)'syan   *← -(u/o)'si-'w^(u/o)-n*
-(u/o)'si'nwon   *←-(u/o)'si-'no-'w^(u/o)-n*

But there are occasional slips from careless authors who omit the modulator even though the epitheme is extruded from the object; CF He Wung 1970:139.

8. When the epitheme has been extruded from the SUBJECT, the modulator will not be found. If it has been extruded from some other adjunct (TIME, PLACE, INSTRUMENT, REASON, etc.) or is an intruded epitheme (such as the summational *'i, s, t,* and *'cwul* 'fact that'), the modulator is vacuously optional.

-'(u/o)lq	[I/you/he] who (will) do it	that [I/you/he] (will) do it
-'w^(u/o)lq	[you/he] who (will) do it	that [you/he] (will) do it
-'(u/o)n	[I/you/he] who did it	that [I/you/he] did it
-'w^(u/o)n	[you/he] who did it	that [you/he] did it
-'non	[I/you/he] who am/are/is doing it	that [I/you/he] is doing it
-'nwon	[you/he] who are/is doing it	that [you/he] are/is doing it
-(u/o)'silq	[you/he] who (will) do it	that [you/he] (will) do it
-(u/o)'sin	[you/he] who did it	that [you/he] did it
-(u/o)'si'non	[you/he] who are doing it	that [you/he] are doing it

Cen Cenglyey 1990 observes that the MK words corresponding to what are here called quasi-free nouns or postmodifiers vary in the degree to which the preceding modifier can be modulated. He notes that the structures they form change function through time from nominal phrase > adverbial phrase >

"verbal ending". The less noun-like (the more adverbial or predicative) the function, the less likely will the word be preceded by the modulated forms. But he notes that *t(o)* and *s(o)* are exceptional because the structures they form were already in the process of becoming verbal endings. By that he mainly refers to the structures sometimes called extended predicates: modifier form (of a predication) + *t* or *s* + a form of the copula ·*i*- , with the meaning 'it is (the fact) that ... '.

9.9.11. The copula.

The copula ·· ·*i*- has an extended version ··· *i·lwo*- that incorporates a lenited shape of the emotive morpheme -·*two*- and perhaps implies a more subjective judgment than that expressed by the unextended copula. Most of the forms occur for each version, but some are more common as one or the other. Both ·*ilwo·ta* and ·*ilwo·la* are used, the latter being required in quotations. But *·i·ta* seems to be replaced by ·*i·la* in all cases, except for the structures -*ngi* ·· *ta* and (infinitive -·*e*, particle ·*ey*, or adverb +) ·*ta·ka*. (The lack of *·-ngi* ··*la* and *·-·e·la·ka* casts doubt on the historical accuracy of this analysis. See the note on ita in Part II, p. 588.) The form ·*i·la* also functions for the infinitive before a particle (·*sye*, ·*two*, ·*za*), and that is the only situation where we can expect the copula infinitive to appear, since the copula does not take auxiliaries, unlike the verb and the adjective. We expect the infinitive to be *·i·ya* if the copula stem is ·*i*- but (*)·*i·ye* if the stem is taken as ·*iy*-, for which there is evidence in the leniting of suffix-initial *k* to *G* (as in the gerund ·*i·Gwo*). We believe that the form ·*i·ye* and its postvocalic reduction ··*ye* can be found serving as a quasi-particle meaning 'whether, or; and; or/and the like' after a noun or the (unmodulated) substantive -·*ᵘ⁄ₒm*, for which the resulting structure -·*ᵘ⁄ₒm ye* functions to conjoin predicates and is usually treated as a simple ending like the gerund -·*kwo* (of similar function). There are also examples of *a·n'* ·*ye* = (?*)*a·ni* ··*ye* for the negative copula infinitive, and an 1887 example of *an'* ·*ya*. In modern Korean i(y)a is found as a variant of the regular i(y)e; in Seoul that is now limited to the end of a sentence. In dialects iya se/to/ya can be found and it may be that Seoul iey/[y]ey yo came about by raising iya(y) yo < i(y)a + yo rather than from i(y)e yo as is usually (and here) assumed; CF [1]Yi Unceng, Hankul say sosik 201:10 (1989).

Both ·*ilwo-ngi* ··*ta* and ·*i-ngi* ··*ta* occur, but only ·*i·lwo·swo-ngi* ··*ta* and not *·i-·swo-ngi* ··*ta*; similarly ·*i·lwoswo·n i* and not *·iswo·n i*. (Neither *·i-·two·swo*- nor *·ilwo-·two·swo*- is found.) The honorific is ·*isi*- (infinitive ·*i·sya*) and there is no *·i·lwosi*-; compare ¨*ilu·sya* (1459 Wel 18:33b), the honorific infinitive of 'become'. The copula deferential is ·*izoW*- and there is no *·ilwozoW*-; I lack examples of the deferential honorific (?)*·izow·o·si*-. The initial vowel of both ·*i*- and ·*i·lwo*- normally reduces to ·*y*- or is elided (·-) after a vowel. The negative copula appears in both versions: *a·ni* ··*la*, *a·ni* ·*lwo·la*. I have found no examples of ?*a·ni* ·*ta* or ?*a·ni* ·*lwo·ta* and perhaps they never existed. Notice that MK *a·ni* ··*ta* (LCT 513b) is an abbreviation of *a·ni [ho] ta*, as is *a·ni* ¨*tha* (p. 425).

The extension can be explained as a lenition of the emotive -·*two*- (as LCT views it, at least for some of the forms). We might, however, consider taking ·*i·lwo*- as the modulated form of ¨*il*-, a MK stem roughly synonymous with *towoy*- 'become, come into being' (see Part II and LCT 622b for forms and examples), but if that were true the accent should be *·i·lwo*- with initial low pitch (§8.3.2). The form ·*i·lusyas·ta* (1445 [1]Yong 100) is the copula retrospective honorific emotive, with the -*l*- a unique variant of -*te*- (see the argument in the entry ·*i·lusyas·ta* of Part II, p. 572). We would have expected *·i·lesyas·ta* as the lenited version of *·i·tesyas·ta*; compare ·*i·lesi·ta* (1447 Sek 13:35b) for the copula retrospective honorific indicative assertive. The indicative assertive ¨*i·ta* (1459 Wel 7:44b, 1462 [1]Nung 8:33b) 'becomes' is identical with that of the copula (*·i·ta* →) ·*i·la* except for accent and lack of lenition (*i·le* is the infinitive of ¨*i[l]·ta*). The MK copula apparently did not make use of the suspective (*·i-·ti*), but the verb ¨*il*- had the form ¨*i·ti*. Modern Korean uses **ici** (and **ani 'ci**) at the end of a sentence (followed by **yo** in polite style) to make casual sentences, and also in structures such as **Ney kes i ani 'ci nay kes ita** 'It isn't yours, it's mine' or its counterpart **Nay kes ici ney kes i ani 'ta** 'It's mine, it isn't yours'. Not only is there no MK copula suspective (*·i·ti*), neither are there examples of the summative *·i·Gi* (*·*y·Gi*, *·*·Gi*), despite modern iki. (MK used the summative very little, in any event; some of the modern uses take the place of MK nominalizations with *t* 'fact'.) On the other hand, there are examples of ·*i·Gey*, the copula adverbative 'so as to be', despite the lack of

modern *ikey, as well as examples of ˮil˙Gey (and variant ˮil˙Guy) 'so as to become' (see Part II).

Accent differentiates the modifiers ˮin ' ⋯ that has become' (1462 ¹Nung 9:85a) from ˙in ' ⋯ that is' (?1517- ¹No 2:54b), and ˮil(q) (1462 ¹Nung 4:38b) / ˮill(q) (+ ˙i ⋯ → ˮil˙li⋯ 1445 ¹Yong 123) '[it is] that it will become' from ˙il(q) ' ⋯ that is to be', as in ⋯ [˙]il ˙ss oy (1447 Sek 6:45b) and e˙nu ˮhoy 'l[q] ˙kwo 1481 Twusi 7:4b 'what year was it?'. There is no processive modifier for the copula (*˙i˙non) but ˮil- 'become' has ˮi˙non as in swo˙li ˮino˙n i (1451 Hwun-en 13a) 'sounds [= syllables] are formed'.

The verb infinitive i˙le 'become' (1445 ¹Yong 2, ~ ˙za 1462 ¹Nung 8:40a) has a higher vowel than the copula form ˙i˙la, the source of which but for accent could be a variant of i˙le, rather than the lenition of *˙i˙ta that I suggest elsewhere. The intransitive stem ˮil- underlies a derived causative stem ilG-/il^{u}o- < *il^{u}oG- 'accomplish, make', for which the modulated stem is il˙Gw^{u}o-. LCT assumes that the ˙i˙lwo- variant copula is the modulated retrospective *˙i-˙t(e)-˙wo-, so that the -l- allomorph of the retrospective is not then unique to the form ˙i˙lusyas˙ta. And the emotive -˙two- appears to be a similar formation -˙t[o]-˙wo- with the vowel reduced and elided, perhaps ultimately to be identified with the retrospective, if not with the postmodifier t 'the fact (that)'.

After a vowel (including vowel + y or w) the copula ˙i- is abbreviated to 'y- but even that is automatically suppressed after i or y, so that '[y]- is written just '-. As a result, after i or y certain of the copula forms merge with abbreviations of forms of ˮho- 'do/be', and only context tells you when ⋯y '˙m ye is to be taken as ˙i˙m ye rather than ho˙m ye. But the copula lenites endings that start with the voiceless stops (⋯y '˙la = '[y]˙la < ˙i˙la ← *˙i˙ta) so that ⋯y '˙ta can only be from ho˙ta. And '˙kwo is from ho˙kwo, for the abbreviation of the copula gerund is '˙Gwo = '[y]˙Gwo < ˙i˙Gwo.

10.0. Constructions.

The words of Korean enter into a variety of constructions which form phrases that serve as constituents of sentences. Below we discuss the problem of dividing a phrase into words, to begin with, and then describe the formation of sentences in terms of predicates and adjuncts, with observations on features that constrain the acceptable combinations of syntactic components.

10.1. Problems of word division.

One of the most perplexing of the basic problems in describing Korean syntax is that of deciding whether a given stretch of morphemes is one word or a phrase of several words. For some languages such decisions can largely be based on phonological cues: is there a pause, or could there be a pause? In Korean that is not the most useful criterion, for adjacent elements are apt to stick to each other even if they are not closely tied grammatically. Instead, we base our decisions on freedom of combination. Can the individual elements occur in other and widely varying environments? Is the unit, though restricted in occurrence, grammatically parallel to similar units that occur more widely? It is this relative freedom of combination that enables us to decide the phrase structure of sentences. Typically, a free word is always an immediate constituent of some larger sequence. No "IC cuts" separate some part of the word and put it with an adjacent element.

A number of the Korean constructions often described as compounds I prefer to call "pseudo-compounds" because they can be analyzed as phrases that consist of free words. For example, the string /pammeke/ representing the phrase **pap mek.e** 'eats rice = eats (one's meal)' is sometimes treated as a compound that consists of noun + vt, but I think of **pap** here simply as a noun in its absolute, unmarked, use — for which the "object" role is inferred from the context. The accusative particle can be inserted, making the role of the noun explicit: **pap ul mek.e**. And virtually any object — or subject — can drop its role-specifying particle, especially when (as here) the role is obvious from the meanings of the words themselves, so that the number of such would-be "compounds" is almost infinitely large by any logical principle of inclusion or exclusion. Korean grammarians choose to include in their dictionaries some but not other lexical items of this sort when either (1) the phrase has acquired a special idiomatic flavor, or (2) the phrase corresponds to a single-word translation in English (or Japanese or Chinese), or to a single-word synonym in the core vocabulary.

I prefer to retain the term "compound" to refer strictly to a word that includes at least one bound constituent, such as a verb stem (with no ending attached) or an affix. As far as affixes go, I follow different tendencies with respect to the core and the Chinese vocabulary, giving the benefit of the doubt to any core element in question as a "word", even when its distribution is severely limited, but regarding one-syllable Chinese elements as typically bound even when they are very productive. To some extent these judgments are influenced by historical considerations, but I believe they correspond to something in the structure of the vocabulary that is unconsciously felt by the native speaker. And not all elements of Chinese origin are considered part of the "Chinese" vocabulary in our description. The word **chayk** is simply the Korean word for 'book', despite its origin as a monosyllable of Chinese. (The synonym for **chayk** in the Chinese vocabulary consists of two quite different morphemes: **secek**.) A single etymon may serve in both vocabularies: **san** is the Korean noun for 'mountain' but in **tungsan** 'mountain climbing' it is a bound Chinese morpheme.

10.2. Constructions and pseudo-constructions.

Not only does Korean enjoy a variety of constructions, it also offers pseudo-constructions. A pseudo-construction is a sequence of one or more words that is often wrongly taken as a unit. For example, the particle sequences (especially the arguable case of **ey se**) are often taken as single unanalyzed elements, but as I interpret the constituency each particle is in construction with the entire phrase that precedes it, so that the first cut is between the two particles, not between the string of particles and the rest of the phrase, as the other treatment would suggest. Shown below are examples of some, but undoubtedly not all, types of construction. (CF LHS 1955:256 ff.)

<u>List of constructions with examples</u>

1.	noun + noun	**onul nal** 'today', **ip mas** 'taste (to the mouth)', **Kim sensayng** 'Mr Kim', **Kim Poktong-i** 'dear little Kim Poktong', **Kim Poktong(-i) emeni** '(dear little) Poktong's mother', **wuli nala** 'our nation; Korea', **Ilponq sālam** 'a Japanese', **Yenge chayk** 'an English book', **kotung hak.kyo** 'high school', **mulqcil munhwa** 'material culture', **Kwukcey ¹Yenhap** 'the United Nations', **siksa cwūnpi** 'meal preparation', ...
1a.	noun phrase + noun	**Mikwuk tāysa-kwan aph** '(the area in) front of the American Embassy', **Yĕnhuy Tāy-hak.kyo pū-kyosu** 'an associate professor at Yenhuy University', **i tal welkup** 'this month's salary', **ku kkoch pongoli pich** 'the color of those flower buds' or 'the bud-color of those flowers', ...
1b.	pseudo-compound noun + noun	**pal-mok mul** 'ankle-deep water', **pan'-cit koli** (= **panu'-cilq koli**) 'embroidery ring', ... (The meaning is different from the components; or, at least one of the components is bound.)
1c.	noun + noun phrase	**Mikwuk saynghwalq pep** 'the American way of life', **wuli cak.un cip** 'our little house', ...
1d.	noun + pseudo-compound noun	**pataq mulq-koki** 'saltwater fish', **patak ches-ccay** 'first from the bottom'
1e.	noun phrase + noun phrase (see below)	**Hankul Hak.hoy Khun Sacen** 'the Unabridged Dictionary of the Korean Language Society', **kotung hak.kyo ip.hak sihem** 'the high school entrance examination', ...
1f.	pseudo-compound noun + compound n	**pal-mok mulq-kyel** 'ankle-deep waves' (?), ...
1g.	noun + vi subst	**palq kel.um** 'pace; gait'
1h.	vc substantive + (noun + noun)	

		pat.him swulq cip '(a kind of liquor package store)', ...
1i.	adverb + noun (phrase)	(1) **palo ku (chayk)** 'that very one (book)', **cokum aph** 'a little ahead', ... (see §5.2.5)
		(2) **toy thucip** 'carping (back) at one's superiors', **olay(q) tong-an** 'a long time', **mence sikan (ey)** '(in) the previous / preceding hour', ...
1j.	adverb + number	**kkway yeles** 'quite a lot', **kas sumul** 'just twenty years old', ... (see §5.2.5)
1k.	noun + derived noun	(1) < vi **hay tot.i** 'sunrise', ...
		(2) < vt **koki cap.i** 'fishing; fisher(man)', **aph cap.i** 'guide; catspaw', **son cap.i** 'handle', ...
1kk.	der n (← adj) + noun (← summative)	**noph.i / nelp.i ttwiki** 'the high / broad jump', ...
2.	noun + postnoun	**panu' cil** 'embroidering', **pangmangi cil** 'paddling (laundry)'; **sensayng nim** 'esteemed teacher / sir', ...
2a.	vt subst + postnoun	**pakkwum cil** 'exchanging', ...
2b.	n phrase + postnoun	**Yensey tāy-hak.kyo kyōswu tul** 'the professors at / of Yensey University', ...
2c.	-- postnoun phrase + postnoun	**Yensey tāy-hak.kyo kyōswu tul ney** 'the professors at / of Yensey University' [the first cut is before **ney**], ...
2d.	pseudo-compound noun + postnoun	**palq-kil cil** 'kicking', ...
2e.	bound compound noun + postnoun	**pal-petwung cil** 'stamping one's feet', ...
2f.	adnoun + postnoun	**ches ccay** 'first'; **sayngq kwun** 'greenhand, novice', ...
2g.	number + postnoun	**twūl ccay** 'second', ...
2h.	iterated postnoun or counter → adverb	**kkili kkili** 'group by group', **kwuntey kwuntey** 'here and there'
3.	adnoun + noun	**ches insang** 'first impression', **i nom** 'this rascal', **yēys nal** 'ancient days', **ōn sēykyey** 'the whole world', ...
3a.	compound adnoun + noun	**ney-kkacis nom** 'a rascal like you', ...
3b.	adnoun + noun phrase	**ku cak.un cip** 'that little house', ...
4.	numeral + noun	**pān tal** 'half a month', **twū sensayng** 'the two teachers / gentlemen', **ahop chayk-sang** 'nine desks', ...
4a.	numeral + counter	**twū si** 'two o'clock', **payk wen** '100 wen', **han kwēn** 'one (book)', **swū kwēn** 'several (books)', ...
4b.	counter + noun	**kwēnq swu** (← **swū**) 'the number of books', ...
4c.	noun + counter	**el.umq cang** 'a sheet of ice', ...
5.	noun + particle	**cip ey** 'to the house', **kicha lo** 'by train', **chinkwu hanthey** 'to a friend', **sensayng kkey** 'to the teacher', **Mikwuk se** 'from / in America', **cēki kkaci** 'up to there', ...
6.	noun phrase + particle	**wuli cip ey** 'to our house', **wuli cak.un cip ul** 'our little house [as direct object]', ...
6a.	number + particle	**hana ka** 'one [subject]', **payk ul** 'a hundred [object]', ...
6b.	counter phrase + particle	**chayk han kwēn to** '(not) even one book', **ahop si puthe** 'from nine o'clock, starting at nine', **(sālam) han salam i** 'one person [as subject]', ...
7.	particle phrase + particle	**achim ey nun** 'as for in the morning', **yeki (ey) se to** 'even at / from this place; here too', **sensayng khenyeng un** 'far

8.	noun + copula	yenphil ita 'it's a pencil', achim imyen 'if it's morning', ...
8a.	noun phrase + copula	wuli emeni 'ci! 'it's our mother!', kotung hak.kyo 'p.nikka? 'is it a high school?', ilk.ko siph.un chayk ia 'it is a book I want to read', achimq pap imyen 'if it is breakfast', Yenge chayk ina 'an English book or something', ...
8b.	counter phrase + copula	chayk han kwĕn ita 'it's a book', payk wen ina 'a hundred wen or so', twū si 'myen 'if it's two o'clock', ...
9.	particle phrase + copula	Mikwuk se 'ta 'it's from / in America', ahop si puthe 'myen 'if it starts at nine o'clock', ...
10.	adverb + copula	ani 'ta 'it's not'; (yeki se) palo 'ta 'it's straight ahead', ...
11.	noun (phrase) + verb	(1) vi ayki iss.ta 'there is (one has) a baby', ayki nanta 'the baby is born', ... (2) adj ayki cōh.ta 'the baby is nice; the baby likes it; I like the baby', ... (3) vt ayki ponta 'the baby sees' (= ayki ka ponta) or 'sees the baby' (= ayki lul ponta); pap mek.nunta 'eats (a meal)'; na cwue! 'gimme!'; ...
11a.	verbal noun + postnominal verb	− see entries for postnominal verbs (§7.6) in Part II
11b.	verbal noun + ellipted ham = ha(n)ta	[in headlines, telegrams, stage directions] tungcang [hanta] 'enters (stage)', phok.kyek [ham] 'bombards', ...
11c.	verbal noun + ellipted hako	Pusan ul chwulpal [hako] Mikwuk ulo kanta 'departs Pusan and goes to America', ...
11d.	adjectival noun + ellipted hakey	hōn.lan [hakey] toynta 'gets disordered', ...
12.	counter phrase + verb	twū pen hayss.ta 'did it two times', (chayk i) han kwĕn iss.ta 'there is a book', (chayk ul) han kwĕn cwunta 'gives a book', ...
13.	adverb + verb (phrase)	cal hanta 'does (it) well', cal (l) mōs hanta 'does not do well', kkok (l) cal mōs hanta 'does not do well for sure', ...
14.	verbal noun + verbal noun	vni + vni ipsin yangmyeng (hanta) 'rising in life and making a name', phāyka mangsin (hanta) 'going to rack and ruin' adj-n + vni cici-pucin (hanta) '(makes but) slow progress' adj-n + adj-n īsang yalus (hata) '(is) odd and queer', ttattus micikun (hata) 'is warm but not warm enough', ... vnt + vnt phōwi kōngkyek (hanta) 'surrounding and then attacking', ...
15.	verb + auxiliary	− see the entries for auxiliary verbs (§7.5) in Part II
16.	verb infinitive + verb (auxiliary)	kacye o- 'bring'; ka-po- 'go see'; na-ka- 'go out'
17.	verb gerund + verb	(mal ul) thako tani- 'go around riding (a horse = on horseback)', nōlko mek.nunta '(plays and eats) = leads a life of ease / indolence', ...

Some of the verb forms, notably -ki and -um, regularly enter into constructions like nouns; others (the modifier forms -un, -nun, -ulq, ...), like adnouns. But bear in mind that the entire verb phrase (including such adjuncts as the subject and the object) goes with the verb as a constituent of any wider structure. CF §11.7, §11.8.

The constituency of long noun phrases can be puzzling: haksayng mīswul cēn.lam hōy 'student art exhibition' could have its first IC cut at any of the three spaces, and even lexicalizing the last two words to make the compound cēn.lam-hoy does not help decide whether we are talking about an art

exhibition by / for the students or an exhibition of student(-made) art. There are also problems of "collapsing" constituents as in **kwuk.mun + munqpep → kwuk.munqpep** 'vernacular grammar', **uyhak + haksayng → uyhaksayng** 'medical student', **căn swul + swulq cip → cănswulqcip** 'draft liquor shop'. Notice the ambiguity, at least in writing, of **I cip īmca ka nwukwu 'n ya** 'Who is this house-owner?' (→ **i cipq īmca**) or 'Who is the owner of this house?' (= **i cip cipq-īmca** or **i cip uy īmca**), where the ambiguity can be resolved if juncture is inserted either before **cip** or before **īmca**. See below (§10.3) for further thoughts.

10.3. Compounds and quasi-compounds

In addition to the quasi-compounds that have been covered as constructions (such as noun + noun), there are others that I include here with the list of full-fledged compounds: those that involve some bound element, especially a verb stem. The quasi-compounds are marked below with a "Q". I have arranged the items according to the grammar of the resulting construction. This list can be thought of as a continuation of the list of §10.2, even though it is arranged differently. Notice that I do not generally treat Chinese binoms like **hak.kyo** 'school' as compound nouns, since both elements are often bound, and so many cases are on the borderline between morphology and etymology that only clearcut cases will be treated as compounds, e.g. **chayk-sang** '(book table →) desk' is a compound because both elements are free nouns that just happen to come from Chinese. The constituency of certain compounds is obscured by the simultaneous occurrence of the same morpheme in two words that are combined: **¹inkunche** 'neighborhood' could be treated as a shortening of **¹inkun kūnche** 'neighboring vicinity'. But there are difficulties. While **uyhaksayng** 'medical student' could be treated as a shortening of **uyhak haksayng** 'student of medicine' (see the "collapsing" IC's at the end of §10.2), the noun **sōhaksayng** 'primary-school student' is not so simple, because the normal word for 'primary school' is **sŏ-hak.kyo** rather than **sōhak**, so we will have to say that **sōhak-sayng** consists of a bound shortening of **sŏ-hak.kyo** + a shortening of **haksayng** or, probably better, a suffix (bound postnoun) **-sayng** 'student'.

<u>List of compounds with examples</u>

1.	n + vt (vc) → n	**ip-nay (lul nāy-)** '(do) mimicry' (CF **hyungnay** 'mimicry' ← **hyung ul nāy-** 'bring out the defects')
2.	iterated subst → n; ... → adv	**sayngkim-sayngkim** 'appearance, looks'; **hullim-hullim** 'in little driblets'
3.	iterated subst + suf → n; ... → adv	**ssum-ssum-i** 'use', **toym-toym-i** 'makeup, character'; **kel.um-kel.um-i** 'at each step'
4.	subst + same-stem der n → n	**kel.um-kel.i** 'gait, manner of walking', **mek.um-mek.i** 'way of eating, appetite'
5.	vt + n → n	**kkekk-soy** 'clamp', **ppalq-tay** 'straw' (← "suck stem")
5a.	cpd vt + n → n	**nāymi-son** 'a pushover' (← **nāy-mi-l-**)
6.	vt + vt der n → n	**palp-tatum.i** 'smoothing by trampling'
7.	vi + n → n	**kwulq-tay** 'axis' (← "roll stick"), **puth-căng** 'built-in cupboard', **ik-pancwuk** 'hot-water dough; kneading' (← "half-cooked")
8.	vt + bound postn → n	**mek-sim** 'hunger'
9.	adj + n → n	**petq-(n)i** 'protruding teeth', **okq-(n)i** 'in-turned tooth'
9a.	cpd adj + n → n	**kkekciq-son** 'heroic measure'
Q10.	vt inf + vt → vt	**pat.e ssu-** 'write down (from dictation)' (← "get and write")
Q11.	n (ey / ulo) + vt → vt	**twī ī(s)-** 'follow after' = **twī ey ī(s)-**; **pic cwu-** 'lend' = **pic ulo cwu-**; **kewul săm-** 'model on, use as mirror' = **kewul lo săm-**; **saks nāy- / noh-** 'hire (out)' = **saks ey / ulo săm.ta**
Q12.	(... uy) n (ul) vt → vt	**mas po-** 'sample (the flavor of)' = **... uy mas ul po-**; **pal poi-** 'show a part ("foot") of' = **... uy pal ul poi-**
13.	vi + vi → vi	**kwulm-cwuli-** 'starve', **o-ka-** 'come and go'

Q14.	bound adv + vt	
	→ vt	pī tatum- 'smooth (down / out), preen'
15.	vt + vi → vi	īs-tah- 'continue in contact', īs-ta-l-$_1$ 'continue', tāy-cilu- 'stand up to, defy'
16.	vt + vt → vi	?
17.	vt + vt → vt	pat-tul- 'lift, hold up', yē-tat- 'open and shut' ← yě-l-, with t dropped before t (§3.5), īs-ta-l-$_2$ 'connect it', īs-tay- 'connect / continue it', puth-coch- 'follow; revere'
Q18.	bound inf + aux v inseparable → vi	ppā ci- 'fall'
19.	n (i / ka) + vi → vi	pal mac- 'fall into step' = pal i mac-; pal ppā ci- 'fall out of step' = pal i ppā ci-; sēng na- 'get angry' = sēng i na-; palam na-ka- 'lose one's vigor' = palam i na-ka-
Q19a.	n (ey) + vi → vi	twī ttel.e ci- 'fall behind, lag' = twī ey ttel.e ci-
19b.	bnd n + qvi → qvi	tes-ēps- 'be ephemeral'
19c.	n (i / ka) + adj → adj	him sēy- / cha- 'be strong', nachq ik- 'be familiar (in face)', kethq yak- 'be superficially shrewd', kway kulu- 'go amiss' ← "divination sign is wrong" — or is this from an obsolete variant of kkulu- (vi) "divination sign comes undone"?
19d.	n (ey) + adj → adj	son-swīw- 'be easy', nwun-pusi- 'be dazzling (to the eyes)', nam-pukkulew- 'be ashamed before others'
19e.	n (kwa) + adj → adj	nam-talu- 'be different from others; be uncommon'
19f.	n (ul) + vt → vi	pal ppay- 'evade' = pal ul ppay-; palam cap- 'take to frivolous ways' = palam ul cap-; īl po- 'work' = īl ul po-; pal mac.chwu- 'get in step' = pal ul mac.chwu-; sēng nāy- 'get angry' = sēng ul nāy-
Q20.[1]	vi subst (ul) + same vi → vi	chwum (ul) chwu- 'dance', kkwum (ul) kkwu- 'dream', ttwim ul ttwi- 'jump', cam (ul) ca- 'sleep', wus.um (ul) wūs- 'laugh, smile', kel.um (ul) kēt- / kel- 'walk (a gait)'
Q21.	bound compound n + postnominal v → vi	pal-petwungi chi- 'stamp one's feet'
Q22.	bound adv + vi → vi	il kkay- 'wake up early'
23.	adj + adj → adj	mayp-cca- 'peppery and salty', cay-ppalu- 'swift and fast', sēy-cha- 'strong (and full)', kēl-cha- 'richly fertile', kem-phulu- 'a blackish blue', ōl^h-palu- (← olh- + palu-) '(just and) right = upright, honest'; *noph-nac- in noph-nac-i (derived noun) 'undulations, ups and downs' — or is this a compound of der n + der n (noph.i 'a high' + *nac.i 'a low')?
24.	adj + adj-n → adj n	tal-poltuley (hata) '(is) sweet and soft'; tongkul-napcak / twungkul-nepcek (hata) '(is) round and squat'
25.	iterated adj → adj-n	ttel-ttel (hata) '(is) inferior; (is) disinclined, leery' (← ttělp- 'astringent')
Q26.	adj der n + (i / ka) + same adj → adj	khi (ka) khu- 'be tall, big', noph.i (ka) noph- 'be tall, high', nelp.i (ka) nelp- 'be wide', kiph.i (ka) kiph- 'be deep' — CF kwulk.ki (ka) kwulk- 'be bulky, thick' with adj summative

[1] Because the verbs are transitive (and can take other objects) kūlim ul kūli- 'draw a picture' and cim ul ci- 'bear a burden' do not belong here. Of course, the real criterion may be semantic: kūlim and cim are tangible, the others are abstract. In noph.i ttwiki lul ttwinta 'jumps the high jump' we also

informants reject such attempts as *mek.un sai 'while still full from eating', *ssis.un sai 'while still clean from being washed', and *ssun sai 'while still written and not yet erased'. (These meanings could be conveyed by the ··· tay lo construction; see the entry in Part II.)

10.8.4. Constraints on modifiers.

The occurrence of modifier forms of verbs is constrained by various restrictions on the possible uses of adnominalized sentences, not only in terms of the categories of tense and aspect but also in terms of the three-way classification of verb, adjective, and copula. These constraints have not been studied in a systematic way, but information on each postmodifier will be found in the appropriate entry of Part II. Although adnominalized sentences cannot modify nouns of relative location such as **wi** 'above' and **yeph** 'beside' according to what we have said in §6.4, but that statement should be reexamined since the restraint does not hold for the corresponding situation in Japanese ('above where ··· , beside where ··· ').

10.8.5. Auxiliary constraints.

Many of the auxiliary constructions (§7.5) occur quite freely or are restricted only in that, say, they reject adjectives — or, conversely, processive verbs. But others are quite limited. For example, I have not been able to find more than a few stems for most of the following constructions:

-e chinta	mek-, wūs-; kkamule-chi- 'swoon'; ? tŏ-l- (CM)
-e mek.nunta	ha-, ic-, kaluchi-, noh-, sok.i-, (cal to) toy-
(→ mek.ess.ta, mek.keyss.ta)	
-e mekta	keyulu-
-e nāynta	chac-, iki-, kyenti-, mak-, ssawu-, ssu-l-, (īl ul kiil ey) tāy(e) ha- 'finish a job on time', ... ; ilk-, pha-
-e ppā cinta	kolh-, ssek-; hē-l-, keyulu-, malu-, nulk-, talh-, yak-
-e ssah.nunta	mek-, nō-l-, ssawu-, tte-tu-l-; hun ha-, mānh-
-e tāynta	kkapu-l-, masi-, mek-, mŏ-l-, mūt-/mul-, ssawu-, tte-tu-l-, twulu-, wuki-, wū-l-, wūs-; (soli lul) cilu-, (kēcis mal ul) kkwumi-, (ocwum) ssa-

Of perhaps greater interest are the aspect-tinged classes that occur with -ko iss- (in four different meanings) and with -e iss-:

(1) -ko iss.ta 'is in the act of doing': mek.ko iss.ta 'is eating', wūs.ko iss.ta 'is laughing', poko iss.ess.ta 'was looking at it' (compare pwass.ta 'saw it'), chac.ko iss.ess.ta 'was looking for it' (compare chac.ess.ta 'found it'), ...

(2) -ko iss.ta 'habitually/regularly/routinely does': taniko iss.ta 'goes (around), commutes', phalko iss.ta 'sells (regularly, as a business)', sako iss.ta 'buys (as a professional buyer)', kaluchiko iss.ta 'teaches (as one's job)', ...

There seems to be considerable overlap between (1) and (2). If it is total, the difference may be semantic only.

(3) -ko iss.ta 'is in the state of doing': kitaliko iss.ta 'is waiting', ssuko iss.ta 'is using', memchwuko iss.ta 'is stopping', pethiko iss.ta 'is supporting', kyenti(e nāy)ko iss.ta 'is bearing up'; mek.una māna hako iss.ta 'is uncertain whether to eat or not'.

Expressions with auxiliaries may be constrained by the aspectual nature of the verb: math.e cwuko iss.ta 'is favoring us by taking care of it' and poa cwuko iss.ta 'is favoring us by looking at/after it' are acceptable, but *mek.e cwuko iss.ta 'is favoring us by eating it' is rejected.

(4) -ko iss.ta 'is in the continuing state resulting from doing': os ul ipko iss.ta 'is wearing clothes', moca lul ssuko iss.ta 'is wearing a hat', neykthai lul māyko iss.ta 'is wearing a necktie'; cako iss.ta 'is sleeping'; mōs hako iss.ta 'has been unable to do it (and is still unable)'.

(5) -e iss.ta 'is in the continuing state resulting from doing': anc.e iss.ta 'is seated', nwuwe iss.ta 'is recumbent (lying down)'; allye cye iss.ta 'is known', ? other cases of -e iss.ta: cha iss.ta 'is full', (··· ulo) toye iss.ta 'is made up (of ··)', nam.e iss.ta 'is left over'; tul.e iss.ta 'is inside/within', ka iss.ta 'is gone', wā iss.ta 'is come, is here'; ip.wen hay iss.ta 'is in the hospital, is hospitalized'; cwuk.e iss.ta 'is dead'; ... . In (kil) kēnne iss.ta 'is across (the way)' the infinitive serves as a postnoun.

10.8.6. Emotive adjectives.

Certain subjective adjectives of evaluation and emotion ('it is ·· according to my reactions, it is such as to produce such-and-such a reaction; I feel such-and-such a reaction toward it') can be transitivized and also externalized so that 'HE' finds it reaction-producing, by following the infinitive -e with the auxiliary verb hanta. These include: cōh- 'be liked, be found likable' with the antonym silh- or miw- 'be disliked, be found dislikable' (notice that the antonym of cōh- meaning 'good' is nappu- 'bad'), musew- 'be frightening, feel frightened', komaw- 'be obliging, feel grateful', culkew- 'be enjoyable, feel enjoyment', ... At least one intransitive verb behaves in a similar way, but apparently only when the result is adnominalized: kamcil na- '(I) feel impatient' → *kamcil na hanta 'he is impatient; I am impatient of it' → kamcil na hanun mosup 'the appearance of being impatient'.

These adjectives are not constrained from appearing in the construction -e cinta 'becomes -- ': cōh.a cinta, miwe cinta, musewe cinta; komawe cinta (of limited distribution); and some accept kamcil na cinta 'grows impatient'.

10.8.7. Separability constraints; auxiliary preemphasis.

In the lists of §7.5 the auxiliaries are marked for "separability". There are several elements which can separate the preceding verb form (e.g. the infinitive -e) from the following auxiliary (e.g. cwu-): the particles un/nun, to, and tul are the most common, but for some of the auxiliaries the verb form is set off also by man, se, iya/ya, ina/'na, and ita/'ta (ka). The ubiquitous particle tul 'acting severally' is the best diagnostic for separability: if tul cannot intervene, usually nothing can. The constraints seem to be specific to each auxiliary rather than general in nature. Certain close-knit combinations of V-e V- are separable even though they may be treated as lexical compounds in the dictionaries: pala (to/'ta) po- 'gaze at', tol.a (tul) ka- 'return', ...

Of particular interest are cases of auxiliary preemphasis with the particles i/ka or ul/lul, of which the negative preemphasis described in §11.7.2 is a special case. Some structures found:

(1) -ko siph.ta → -ko ka/lul siph.ta 'want to do'
(2) -e iss.ta, -e ponta, -e kanta, ... → -e lul iss.ta (ponta, kanta, ...) [jocular]
(3) -key an toynta 'doesn't get to (do)' → -key ka/lul an toynta.

Limitations on further applying conversions to auxiliary structures are probably individual to the particular auxiliary. Often a conversion such as negativization can be separately applied to the main verb or to the auxiliary, or again both may be negativized.

10.8.8. Animate-inanimate constraints.

An indirect object is marked by eykey (or hanthey) when animate, by ey when inanimate. Using this criterion we can clearly characterize most nouns as either animate or inanimate, but there are a few difficulties caused by the following factors (CM 1:140-1):

(1) animation (or personification):

Tal nim un inkong wiseng eykey taceng hakey iyaki lul kel.ess.ta 'The (man in the) moon engaged the man-made satellite in friendly conversation'.

(2) disanimation (or depersonification):

Ku uy yēnkwu nun tōngmul ey kwuk.han toyess.ess.ul ppun man ani 'la thuk hi konchwung ey māy-tallye se ku pēm.wi lul te nem.e suci anh.ess.ta 'His research was not only restricted to animals, but was especially involved with insects and did not go beyond that area'.

(3) treating a group to be animate as a whole, but inanimate (impersonalized) as made up of individual members:

> **Kwuntay eykey kŏngkup hanta** 'They supply the army' — **Kwuntay ey tul.e kanta** 'He enters (the ranks of) the army'. (But Co Sek.yen prefers ey for the first sentence, too.)

> **Sam-hak.nyen eykey wusung-ki lul cwuess.ta** 'They gave the Excellence Banner to the third grade (class)' — **Sam-hak.nyen ey taninta** 'He attends the third grade'.

Concepts such as **unhayng** 'the bank', **hŏysa** 'the company', **hak.kyo** 'the school', **kwuk.min** 'the populace', **wuli nala** 'our nation', ... , can be taken as animate and given the dative — **hanthey** or — **eykey**, though they are more commonly treated as inanimate with the dative — **ey**. There may be a question whether the sentences with **ey** involve an "indirect object", strictly speaking; it is hard to draw the line between the directional meaning of **ey** and the more abstract meaning.

On the basis of the animate-inanimate distinction in nouns we can mark subject-object constraints for certain verbs (§10.8.1).

Certain expressions use either **ey** or **eykey** for an animate indirect object: **Ōykwuk sālam ey / eykey hūngmi lul kacinta** 'He takes an interest in foreigners', **I yak un wiq-pyĕng hwānca eykey / ey cēy-il ita** 'This medicine is the best thing for stomach sufferers'. Certain extended particle phrases (§6.3) are usually constructed with **ey** only, regardless of the noun: (— **ey**) **uy hay se, ttal^e/a se, kwan hay se, tāy hay se** (at least in the meaning 'about, in reference to'), ...

10.8.9. Indirect-object intensification.

For certain verbs that call for an indirect object it is possible to intensify that valence by following the particle with **'ta (ka)**. Here, in disagreement with the Korean grammarians, we treat /ta(ka)/ as the copula transferentive, optionally + particle **ka**; see §9.8. But for other verbs, the transferentive intensification is most unlikely or impossible. Contrast the particle **to**, which can be used after any phrase of noun + **ey** to highlight the phrase as a whole (or the noun itself) rather than apply just to the meaning of the particle **ey**.

The examples that follow, partly taken from a list in CM 1:155 that was designed to illustrate the animate-inanimate distinction of §10.8.8, has been checked with native speakers for the insertibility of **'ta (ka)**. The examples are accordingly arranged in six groups. (Examples preceded by a question mark are doubted or rejected by Co Sek.yen, who is reluctant to accept the insertion with adjectives and many intransitive verbs, but speakers I had checked with earlier were more tolerant of the structures. She offered a few additional examples, however, which are marked with " + " below.)

(1) ey, ey 'ta, ey 'ta ka

> **pyek ey ('ta, 'ta ka) kī-taynta** 'leans against the wall'
> **chilphan ey ('ta, 'ta ka) kul ul ssunta** 'writes on the blackboard'
> **tāy-hak.kyo ey ('ta, 'ta ka) phyĕnci lul ssunta** 'writes a letter to he university'
> **tose-kwan ey ('ta, 'ta ka) chayk ul kicung hanta** 'donates a book to the library'
> **unhayng ey ('ta, 'ta ka) ponaynta** 'sends it to the bank'
> **ttang ey ('ta, 'ta ka) ttel.e ttulinta** 'drops it on the ground'
> **tāmpayq-tay ey ('ta, 'ta ka) pul ul puth.inta** 'lights a pipe'
> **cilmun ey ('ta, 'ta ka) tāytap hanta** 'answers the question'
> **ettenq īl ey ('ta, 'ta ka) 'na kwankyey hanta** 'has relevance to a certain matter'
> **saynghwal ey ('ta, 'ta ka) hūngmi lul kacinta** 'takes interest in life'
> **kkoch ey ('ta, 'ta ka) mul ul cwunta** 'waters the flowers'
> **kwanyek ey ('ta, 'ta ka) chong ul kyenwunta** 'aims a gun at a target'
> **congi ey ('ta, 'ta ka) kilum ul mek.inta** 'oils paper'
> **huyn pathang ey ('ta, 'ta ka) kum munuy** 'a gold pattern on a white background'
> **Yeksi ku api ey ('ta, 'ta ka) ku atul ikwun!** 'Like father like son!'
> **Kath.ci-anh.unq īl ey ('ta, 'ta ka) hwā lul nāyl phil.yo ka eti iss.e yo** 'Is there any need to lose your temper at the least little thing?'

Swul ey ('ta, 'ta ka) koki ey ('ta, 'ta ka) cal mek.ess.ta 'We ate well — wine, and meat, and so forth'.

(?) ip ey ('ta, 'ta ka) tāmpayq-tay lul munta 'puts a pipe in one's mouth'

(?) uyca ey ('ta, 'ta ka) anc.nunta 'sits down on a chair'

? kēnkang ey ('ta, 'ta ka) cōh.ta 'is good for one's health'

(?) kongpu haki ey ('ta, ta ka) papputa 'is busy with one's studies'

? swul ey ('ta, 'ta ka) chwī hanta 'gets drunk on liquor'

? I pi ey ('ta, 'ta ka) eti kasip.nikka! 'Where ever are you going in such a rain?!'

? Selthang un han kun ey ('ta, 'ta ka) elma 'p.nikka 'How much is sugar a pound?'

? Ku uy pak.hak ey ('ta, ta ka) nōllass.ta 'I was surprised at his wide learning'.

? Pulunun soli ey ('ta, 'ta ka) cam i kkayyess.ta 'I awoke at the sound of someone calling'.

(?) Kulenq īl ey ('ta, 'ta ka) mue l' nōpal-tāypal ia 'Why get mad at such a thing?'

+ kongpu ey ('ta, 'ta ka) yel.uy lul tā hanta 'devotes oneself to one's studies'

+ Sewul ey ('ta, 'ta ka) sālq kos ul malyen hayss.ta 'I set up a place to live in Seoul'.

+ Piq mul ey ('ta, 'ta ka) ppallay lul hamyen ttay ka cal kanta / cinta 'Washing clothes in rain water gets rid of the dirt easier'.

(2) ey, (?) ey 'ta, (??) ey 'ta ka

Sewul ey tōchak hanta 'arrives in Seoul' — in rather colloquial contexts 'ta (less likely 'ta ka) may occur, but both are better avoided.

kongpu ey ('ta, 'ta ka) yel.uy ka cikuk hata 'is devoted to one's son's studies' — and both are unlikely

pi ey ('ta very awkward, *'ta ka rejected) cec.nunta 'gets wet in the rain'

chong-al ey ('ta perhaps, *'ta ka rejected) mac.nunta 'gets hit by a bullet'

Kwuncwung i hwanhuy ey ('ta awkward, *'ta ka rejected) nēmchiko iss.ta 'The crowds are overflowing with joy'.

I yak un wiq-pyēng ey ('ta may be acceptable, but *'ta ka is rejected) cēy-il ita 'This medicine is the best thing for stomach troubles'.

(3) probably ey only

Phyengyang ey tol.a wass.ta 'came back to Phyengyang'

kacca cungmyeng-se ey sok.nunta 'is deceived by a false identity card'

tewi ey cici anh.nunta 'is not bested by the heat'

mul ey millinta 'is pushed by the water'

(4) ey only

kongcwung ey nanta 'flies in(to) the air'

cēncayng ey na-kanta 'goes off to war'

halwu ey twū pen 'two times a day'

sip-nyen ey han pen 'once every ten years'

kāmki ey kellinta / tullinta 'catches a cold'

chwīmi ey mac.ta 'is to one's taste'

elkwul ey pan hanta 'falls in love with a face'

ku sālam ey kwan hay se 'with respect to him, about him'

Chwuwi ey etteh.key cīnaysey yo 'How are you getting along in all this cold?'

Cekcin ey tolkyek ita! '(It's) charge the enemy lines!'

? payk wen ey phanta 'sells it for a hundred wen' (Co Sek.yen OK's payk wen ey 'ta ka phanta)

(5) eykey / hanthey, eykey / hanthey 'ta, eykey / hanthey 'ta ka

sacang eykey ('ta, 'ta ka) kuleh.key māl hanta 'says that to the boss'

haksayng eykey ('ta, 'ta ka) chayk ul pointa 'shows the book to the student'

nam eykey ('ta, 'ta ka) īl ul hakey hanta 'has someone else do the job'

ai eykey ('ta, 'ta ka) pap ul mek.inta 'feeds the child'

nam eykey ('ta, 'ta ka) tōn ul mek.hinta 'gets one's money swindled by someone'

ⁿyeca eykey ('ta, 'ta ka) chwī hanta 'is intoxicated with a woman'

haksayng eykey ('ta, 'ta ka) congi lul cwunta 'gives the student some paper'

cek eykey ('ta, 'ta ka) chong ul kyenwunta 'aims a gun at the enemy'

Son nim i tongsayng eykey ('ta, 'ta ka) cēnhwa lul kel.ess.ta 'The guest phoned his
younger brother'.

? Son i tongsayng eykey ('ta, 'ta ka) tah.ass.ta 'His hand touched (his) younger brother'.

(6) probably eykey / hanthey only

emeni eykey tol.a wass.ta 'came back to his mother'

ku nom tul eykey sok.nunta 'are deceived by those rascals'

nam eykey cici anh.nunta 'does not give in (yield) to others'

kwancwung tul eykey millinta 'is pushed by the spectators'

10.9.10. Locative constraints.

For expansions that indicate location ('in, at') Koreans use the particle **ey** 'being at' or **(ey) se**
'happening at'. (We are not here concerned with the fact that **se** also means 'from'; that meaning
correlates with a small class of verbs that includes **o-** 'come', **ka-** 'go', **nayli-** 'get off / down', **ppāy-**
'remove', ...) In general, **ey** is used with certain adjectives (of quantity / frequency) and a few verbs of
stative meaning, such as **su-** 'stand', **nām-** 'remain', **anc.ko iss-** 'be sitting' or **anc.e iss-** 'be seated',
... ; **ey se** is used in other cases, notably with verbs of activity. But certain verbs and adjectives are
used with either **ey** or **(ey) se**:

¹yekwan ey (ey se) memunun / swīnun son nim 'a guest staying / resting at an inn'

san kwa tūl ey (ey se) phinun kkoch 'the flowers blooming in the mountains and fields'

photay wi ey (ey se) nallinun kiq-pal 'the flag flying over the gun battery'

? cēnthwu ey (ey se) sūng.li hanta 'are victorious in war' – with ey se Co Sek.yen prefers sūng.li lul
ketwunta 'garners victory'

I maul ey (ey se) sāsip.nikka? 'Do you live in this village?'

Kosan sik.mul cwung ey (ey se) etten kes i yūmyeng han ya 'Among Alpine plants which ones are
well known?' – apparently provoked also by **cwung**, since only **ey** is accepted in **Kosan sik.mul ey ⋯**
'Of Alpine plants ⋯ '.

In these cases there seems to be no difference of meaning, and most speakers have a preference
for one or the other. Cang Sengen (Sung-Un Chang), for example, says that he prefers ⋯ **ey se sānta**
'lives in ⋯ '. A difference of meaning obtains between **Cēki ey pointa** 'It is visible there (= you can
see that it is there)' and **Cēki ey se pointa** 'It is visible from there (= you go there and you can see
it)'.

For **iss.ta** 'exists; has' and **ēps.ta** 'is lacking, lacks', and the adjectives the choice of **ey** or **ey se**
depends on whether the subject of the verb is a THING or an EVENT (CF CM 1:154):

kāngtang ey iss.tun phiano 'the piano (that was) in the lecture room' ← **Phiano ka kāngtang ey
iss.tula** 'The piano was in the lecture room (I noticed)'.

kāngtang ey se iss.tunq īl 'the event (that was happening) in the lecture room' ← **Īl i kāngtang ey
se iss.tula** 'The event was in the lecture room (I observed)'.

That gives us a diagnostic for setting up a class of EVENT NOUNS. Perhaps all processive verbal nouns
would fall in this category; does it include any nouns that are not, in fact, verbal nouns?

The following quantifying adjectives seem to be similar to **iss.ta**: **mānh.ta** 'is / has much, are
many', **cēkta** 'is / has little, are few', **tumulta** 'is rare, are few', and the adjectival nouns **hun hata** 'is
frequent, are common / many' and **katuk hata** 'is filling / ample, are many indeed'. Yet it is possible to
say either **Hānkwuk ey se (nun) san i mānh.ta** 'In Korea there are lots of mountains' or **Hānkwuk ey
(nun) san i mānh.ta**; perhaps the latter means something more like 'Korea has lots of mountains'.

For copula sentences, **(ey) se** seems to be the normal particle: **Sewul ey se pec kkoch i hanchang
ita** 'The cherry blossoms are in full bloom in Seoul', **Ilpon ey se yākwu ka tāy-inqki 'ta** 'In Japan

baseball is very popular'. Such sentences express a judgment, and so do most adjective sentences, so we expect them to take locatives with **ey se**.

Elsewhere (Martin 1975) I have taken the position that the Japanese counterpart of **ey se** (the Japanese particle <u>de</u>) is the RESIDUAL (default) locative marker, and the counterpart of **ey** (the Japanese particle <u>ni</u>) is specifically in valence with a few particular verbs of stative meaning, notably the Japanese verbs expressing existence and possession. There are extenuating circumstances: <u>ni</u> will mark a place where something is found, i.e. discovered to BE, or the site where something is bought or sold that cannot be moved, such as land or a house. I believe Korean is similar to Japanese in this respect, but may differ in rejected **ey se** for certain adjective sentences that take <u>de</u> in Japanese. That means if you start a sentence with 'In Korea ··· ' before deciding on a predicate, you say **Hānkwuk ey se ···** and then correct that to **Hānkwuk ey ···** if and only if you select a specific predicate that calls for it (··· **san i mānh.ta** 'there are lots of mountains ··· ', ··· **chinkwu ka iss.ta** 'I have a friend ··· ') but not otherwise. There are delicate problems and unexpected exceptions to this generalization; these need to be explored, as Martin 1975 tried to do for most of the similar Japanese problems. Notice, for example that of a tenant it can be said **cip ey hāswuk hako iss.ta** 'is lodging at the house' (and some speakers reject ***cip ey se ···**), yet of a landlady one says **cip ey se hāswuk chinta** 'provides lodging at the house', also **cip ey se son nim ul chinta** 'entertains guests at the house'. See pp. 496, 503-4.

In pursuing this subject, care must be taken not to mistake an occurrence of the subordinating particle **uy** 'of' for **ey** just because the two particles are pronounced alike. Notice too that the particle **ey** can carry also the allative meaning '(going) to', and that will perhaps (by semantic extension) account for **San ey tanphung i cinta** 'The mountains take on autumn tints' and **Pakk ey nwūn i wā yo** 'It's snowing outside'.

10.8.11. Copula and particle constraints.

There are individual constraints on what particles and forms of the copula can occur after certain quasi-free nouns, postnouns, postmodifiers, and the like. (The lists in CM 1:174-5 are suggestive but far from complete; a more rigorous table is called for.) There are similar constraints on certain words of the Chinese vocabulary (CM 1:176-7), such as **cāylay** 'being (as) usual', **kāmang** 'possibility', **kākwan** 'being worth seeing; being ridiculous', **mucin-cang** 'being inexhaustible'. And a group of words from the core vocabulary are similar in their constraints: **engmang** 'mess', **machan-kaci** 'being the same'.

The particle **tele** is used as a substitute for the dative marker **hanthey**, or its less colloquial synonym **eykey**, when the indirect object is socially inferior (or, at most, equal) to the subject and the verb is one of telling, ordering, asking, showing, instructing or the like: **(māl) ha-** 'tell', **mūt- / mul-** 'ask', **cheng ha-** 'request; invite', **yōkwu ha-** 'demand', **cilmun ha-** 'inquire', **āykel ha-** 'appeal', **kaluchi-** 'teach', **kalikhi-** 'point out', **poi-** 'show', ... The particle **poko** can be used with (all?) the same verbs without any social connotation; it is derived from the gerund of the verb **po-** 'look at' but the particle does not require the visible presence of the person being told (etc.) and there is potential ambiguity in **na poko māl hayss.ta** 'said it to me' or 'looked at me and said it' in that only the former meaning would apply if the subject were **cāng-nim i** 'a blind person'.

10.8.12. Miscellaneous constraints.

Our attention is called by CM to several minor constraints. The pronouns **cē-huy** 'we / us' and **ne-huy** 'you (people)' never take the particle **uy** when used adnominally (CM 1:258). The directional adverbs **ili** 'this way', **kuli** 'that way', and **celi** 'that way (over there)' lack the "predicate" (pre-copular) and adnominal uses and never occur with the particle **uy**; they do not occur with the particle **ey** (instead **ulo / lo** is used); and they are rarely found with the particle **kwa / wa** (or its colloquial synonym **hako**), so that the example **Ili wa celi wa twū kil i iss.ta** 'There are two roads, one this way and one over that way' (CM 1:260) is unusual. There are, of course, constraints between pronouns and styles of speech (CM 1:261), depending upon attitudes toward the referents of a sentence and of the

deictic situation. A rough guide to the correlation between sentence stylization and ways of referring to the first and second person:

'I / me'	:	'you'		style
na	:	ne		-ta; -e, -ci
	:	caney		-ney
	:	tangsin, kutay		-o
ce	:	tangsin, kutay; TITLE		-e yo, -ci yo
	:	TITLE		-sup.nita

Other things to be noted:

(1) The word **āmu** 'any' requires its sentence to include some such form as ⋯ **to**, ⋯ **ina / 'na**, ⋯**-una / -na**, ⋯ **itun / 'tun ci**, ⋯**-tun ci**, ⋯ .

(2) Some adverbs are severely limited in use, and the limitations need to be explored.

(3) There is no way to predict the acceptability of noun compounds: **onul nal** 'today' is common but speakers reject *¹**nayil nal** 'tomorrow' and (despite CM 1:357) *ecey(q) **nal** 'yesterday'.

The verb **kaci-** 'hold, have' has several peculiarities that relate to aspect. For example, it does not occur with the plain transferentive **-ta (ka)**; there is no *kacita (ka). The expression **kac'ta** is a contraction of **kacye 'ta**, the infinitive + the copula transferentive in its use as a quasi-particle. (Other examples of **-e 'ta** will be found in Part II.) Are there other verbs that lack the transferentive? Notice that both **iss.ta (ka)** and **ēps.ta (ka)** are used:

Ecey kkaci iss.ta ka onul un eti lo kass.nun ya 'He was here till yesterday, but where's he gone now?'

Tōn ila n' iss.ta ka (to) ēps.ko ēps.ta ka (to) iss.nun kes ita 'Money is something that now you have it now you don't'.

Tōn i ēps.ta ka sayngkini acwu heyphuta 'New money is carelessly spent'.
The expression **iss.ta (ka)** 'exists / stays and then' is often used in the sense 'after a while', and in that meaning it is sometimes treated as an unanalyzed adverb and spelled phonemically as **i-tta(-ka)**.

11.0. Conversions.

Simple sentences are easy to process and understand, but a speaker finds it economical to package as much information as possible in a single complex sentence, made by expanding or converting one or more simple sentences through systematic processes of various types. These processes are described in the following sections and referred to by the general term of sentence CONVERSIONS.

11.1. Nuclear sentences and sentence conversions.

It is possible to think of all the sentences of a language as derivable by various systematic processes from a small number of quite simple basic sentence types. If we leave aside a few odds and ends in the way of minor sentences, such as **Nwuku** 'Who?', we are tempted to say that Korean has only one nuclear sentence type. But instead we will say that there are three such types, which can be represented by somewhat arbitrarily chosen samples:

(1) verbal sentence	**Ponta.**		'Someone looks at (sees) it / one.'
(2) adjectival sentence	**Cōh.ta.**		'It is good.'
(3) copular sentence	**Cip ita.**		'It is [a matter of] a house.'

In literary, rhetorical, or poetic contexts certain forms of the copula may go unexpressed: **Wuli nun mincwu chengnyen (imye), inmin uy atul-ttal (ita)** 'We are the youth of the masses, the sons and daughters of the people' (CM 1:180). All the copula does, after all, is predicate the noun.

Our three sample sentences can be taken and turned into other sentences — ultimately, we would like to think, all the sentences — by processes such as the following.

(1) We can SUBSTITUTE other verbs, adjectives, or nouns:

Cwuk.nunta.	'Someone dies.'
Khuta.	'It is big.'
Kim sensayng ita.	'It is Mr Kim.'

The choice of particular classes of nouns to precede the copula **ita** and of particular classes of adjectives and verbs will impose constraints upon the choice of words elsewhere in the sentence. We do not say *****Kāy ka Kim sensayng ul cwuk.nunta** 'The dog dies Mr Kim' nor, except by a special dispensation called "personification", **Kōng i ayki lul ponta** 'The ball looks at the baby'. But in our choice of a particular one of the three nuclear sentence types, we impose much broader constraints upon the kinds of operations possible, and that is why we need all three types, even though the predicates of the second and third type may be regarded as restricted subclasses of the first.

(2) We can EXPAND the sentence, by prefacing the predicate with one or more adverbial phrases and/or, in the case of the copular sentence, by prefacing the noun with an adnominal phrase:

> **(Cikum) (emeni ka) ayki lul PONTA** 'Now the mother looks at the baby'.
> **(Yeki se) cip i KHUTA** 'The houses are large (here)'.
> **(Ku kes i) wuli CIP ITA** 'That (thing), it is our house'.

We do not look at the structure of the phrases themselves as converted; we do not set up "kernel phrases" from which the others are derived by a series of operations, since the operation would consist merely of addition. However, parts of phrases that are themselves derived from sentences, such as modifier phrases, will include conversions listed below. It would be possible, of course, to assign — somewhat arbitrarily — a kind of kernel sentence that would derive each phrase so that noun + subject marker could be obtained from the kernel sentence **Ayki ka ponta** 'The baby looks at it', but that procedure seems both unnatural and unnecessary.

(3) We can CONVERT or transform the sentence by applying somewhat interdependent processes:

1. status elevation: normal → honorific.
2. style shift: plain → formal, → semiformal (authoritative), → familiar, → intimate (including intimate casual and circumstantial), → polite (including polite casual and circumstantial).
3. tense-aspect shift: present (or timeless) → past, → future, → tentative, → retrospective; and combinations of these.
4. finite-mood shift: statement → question, → command, → proposition, → apperception.
5. voice shift: active → causative, → passive.
6. negation: affirmative → negative, → strong negative.
7. condensation: sentence → nominalization, → adnominalization, → adverbialization.
8. quotation: sentence → quoted sentence.

A basic form is postulated for each category and labeled above as "normal, plain, present, statement, active, affirmative sentence", to which all three of our nuclear sentences correspond. The other forms mentioned are considered as produced by some process of derivation from the basic form.

(4) We can transform the EXPANSIONS of expanded sentences by means of the following processes:

9. switching emphasis (order of the expansions). We are assuming no "normal" order, but that may be untenable, since there is usually a least marked version, such as TIME - PLACE - SUBJECT - OBLIQUE OBJECTS - DIRECT OBJECT - VERB.
10. subdual of focus (with the particle **un / nun**).
11. highlighting of focus (with the particle **to**).
12. restriction (with the particle **man**) and other focus settings.
13. grammatical specification by assigning particles to roles, such as marking the subject, object, and indirect object; or the instrumentality, location, time, and so forth.

Substitution and expansion have been discussed in earlier sections; no more will be said about them here. Material on specification and focus will be found in Part II under each of the relevant particles (see the list in §6), and in the discussion of phrase order in §10.5. The remaining categories are taken up in the following sections: §11.2. Status conversions; §11.3. Style conversions; §11.4. Tense-aspect conversions; §11.5. Mood conversions; §11.6. Voice conversions; §11.7. Negation conversions; §11.8. Nominalizations; §11.9. Adnominalizations; §11.10. Adverbializations; and §11.11. Quotations. Certain special problems of reflexive requests and quoted favors are described in §11.12. And in §11.13 there is a discussion of sentence connectors derived from adverbializations.

11.2. Status conversions.

The honorific marker -usi-/-si- can be attached to a stem in order to show a special deference toward the subject of that stem, usually the direct subject: **posinta** '[someone exalted] deigns to look at', **cŏh.usita** '[someone honored] is good', **Kim sensayng isita** '[someone esteemed] is Mr Kim'. But sometimes, especially with adjectives, the copula, **iss-**, **ēps-**, and idiomatic expressions of various kinds, the deference is toward the less direct subject (expressed or implied), such as the possessor or beneficiary, or toward the psychological subject (the one who feels or reacts):

Kim sensayng i kāy ka iss.usip.nikka 'Does Mr Kim have a dog?' (The dog is the direct subject − here the possessed, and Mr Kim the indirect subject − here the possessor.)

Pak sensayng eykey phyēnci lul ssunun tey, musun pūthak hạl māl-ssum i ēps.usip.nikka? 'I am writing to Mr Park − is there anything you want me to tell him?' (The implied indirect subject is 'you', the source of the request.)

Ku pun un hwullyung han hakca (i)sina sangsik i ēps.usita 'He is a fine scholar but he lacks common sense'. (The implied subject, who is the [non-]possessor of common sense, is extruded and thematized, and subdued as 'that esteemed person'.)

Khi ka khusip.nita 'You are tall'.

Son i kowusip.nita 'You have nice hands'.

Sayngkak i cŏh.usip.nita 'Your idea is good'.

Cŏh.usin sayngkak ip.nita / Cŏh.un sayngkak isip.nita / Cŏh.usin sayngkak isip.nita 'That's a good idea you have there'.

Chayk i mānh.usikwun yo 'I see you have a lot of books!'

Emeni son un cham cal to wumcik isinta 'Mother's hands work quite deftly'.

Pyēng i tā nausyess.ᵁup.nikka? 'Are you all over your illness?'

Sensayng nim to os i tā cec.usyess.ᵁup.nita kwulye 'I see you got your clothes wet, too, sir'.

Sensayng nim un i pang i maum ey tusip.nikka? 'Does this room please you?'

Sāep i cal toysip.nikka? 'Is your work going well?'

Cip i cham khusikwun yo 'My what a big house you have!'

Cŏh.usin cip ilokwun yo 'My what a nice house you have!'

The following cases are frowned upon but often said:

Ileh.key palam i pūsinun tey wā cwusye se komapsup.nita 'I appreciate your coming with the wind blowing [at you] this way'.

Nappun nal-ssi 'sin tey (Nappusin nal-ssi ey) wā cwusye se komapsup.nita 'I appreciate your kindly coming to us in such bad weather'.

On the subtleties of reference, see Lukoff 1978. On multiple subjects, see §10.6.

Since the purpose of the honorific marker is to elevate the status of the subject, that phrase must be personal and other than the first person. You never use honorific forms of yourself. There is one type of exception to the requirement for a personal subject: 'it rains (snows)' is often said as **pi ka (nwūn i) osinta** or **pi ka (nwūn i) naylisinta**. But no other statements of weather phenomena are treated as intrinsically deferential, and some speakers reject **nwūn** 'snow'.

Some verbs are commonly replaced by euphemisms in place of the expected regular honorific formations: **capswusi-** (abbreviated often to **capswus-**) or **cāsi-** < ¨**c(w)asi-** is used for (*)**mek.usi-** 'deign to eat', **cwumusi-** for *casi- 'deign to sleep', **tol.a kasi-** 'deign to go back' for (*)**cwuk.usi-** '[an honored person] dies' (but **wuli lul wi hay cwuk.usin Yēyswu nim** 'Jesus who died for us'). For the honorific forms of the stem **iss-** (strictly speaking the three homonymous stems meaning 'be', 'stay', and 'have') see the discussion under suppletive negatives (§11.7.3). The euphemistic replacements are much like simple nonhonorific stems in freely entering into larger structures, for they are not subject to the combinatorial restrictions of -usi-.

In complex conversions involving more than one verb, it is often possible to put the honorific marker on each of the stems or on both:

V-(usi)ki ka swiw(usi)- / elyew(usi)- 'be easy / hard for one to do'

V-(usi)ki ka cŏh(.usi)- / silh(.usi)- 'like / dislike to do'

        V-(usi)ki lul côh.a / silh.e ha(si)- 'like / dislike to do'

        V-(usi)ki lul sīcak ha(si)- 'begin to do'

        V-(usi)ki ey him ssu(si)- 'try to do'

On the acceptability of marking as honorific a verb with an auxiliary, see the chart in §7.5 (p. 226).

    An obsolete variant of the honorific marker has the shapes **-usiop-** / **-siop-** (also **-usiap-** / **-siap-**) before one-shape endings and the shapes **-usio-** / **-sio-** (also **-usia-** / **-sia-?**) before two-shape endings. The obsolete imperative ending **-usiopsose** / **-siopsose**, as in the form **cwusiopsose** 'please give us' used in prayers, consists of this element **-siop-** + an obsolete ending **-sose**, which sometimes drops and leaves just **cwusiop** (also **cwusiap**).

    Parallel to the honorific marker there is an obsolete element with the shape **-sa(o)w-** / **-ow-**, which is described by Korean grammarians as "humble", but since the humility often seems to refer to the object or indirect object rather than the subject (**Ak ey se kwū haopsose** 'Deliver us from evil') it can be equivalent in force to the honorific. On the other hand, a derived version **-caow-** (abbreviation **-caw-**) or **-caow-** / **-cao-**, usually attached only to stems that end in **t c ch nc**, seems to have only the meaning 'I / we humbly do': **Tut.caopkentay** ... or **Tut.cao(wu)ni** ... 'From what has reached my humble ears, ... ', **Mut.caopkentay** ... or **Mut.cao(wu)ni** ... 'May I venture to ask ... '. This too is obsolete. About the only modern humble stem is **pōyw-** 'I have the honor of seeing', and we might say that this verb is the converse of **posi-** 'deign to look at' in that it elevates the status of the OBJECT (explicit or implied) rather than the SUBJECT: **Tto pōypkeyss.ºup.nikka** 'I'll be (having the honor of) seeing you again' − and 'you', of course, are worthy of deference.

    There are other devices to exalt the status of phrases in the expansion of the nuclear sentence. The indirect object can be exalted by using the honorific particle **kkey** 'to someone esteemed' in place of **eykey** or its synonyms such as **hanthey**, and to say 'from someone esteemed' you replace **eykey se** with **kkey se**. One way of exalting a personal subject is to turn it into an indirect subject with the particle sequence **ey se** 'from; at' − as in **hōysa ey se cwunta** 'the company gives it', the usual way to state an impersonal subject − but replacing the indirect-object particle **ey** with its honorific form **kkey**, as in **sensayng nim kkey se cwusip.nita** 'you deign to give it'. Another way to make any personal title honorific is to add the postnoun **nim**, as in **sensayng nim** 'the esteemed teacher / maestro / gentleman' (often 'you, sir'), **paksa nim** 'the esteemed Doctor', **samo nim** 'Madam', **Kim sensayng nim** 'the esteemed Mr Kim', **Kim sensayng (nim) samo nim** 'Madame Kim, Mrs Kim'. The postnoun is also used with kin terms, both male and female: **ape' nim** 'honored father' ← **apeci** 'father', **eme' nim** 'honored mother' ← **emeni** 'mother', **atu' nim** 'esteemed son' ← **atul** 'son', **tta' nim** 'esteemed daughter' ← **ttal** 'daughter', **hyeng nim** 'esteemed elder brother' ← **hyeng** 'elder brother' (also 'you' in a letter to a male colleague of any age). There are both honorific and humble terms for kinship roles. In general, the honorific version is used in addressing one's own elder kin and in speaking of someone else's kin of any age. Younger kin are usually addressed by name or nickname. In speaking of one's own kin, less honorific forms are in order, but honorifics are often heard even so, perhaps as a carryover from childhood inculcation, especially with reference to grandparents and parents.

11.3. Style conversions.

    Koreans speak in different STYLES depending on the person with whom they are talking. The style chosen shows something about the social rapport which the speaker feels to exist between himself and the person he is addressing. The stylization of a sentence differs, of course, from the insertion of the honorific marker **-usi-** / **-si-**, in that the verbs containing the honorific show a special deference toward the SUBJECT of the verb form, and that subject may or may not be the same as the person to whom one is speaking. Honorific forms occur in ALL styles of speech. If you are talking to a child about his teacher, you might use the PLAIN style, but at the same time insert the honorific marker for each verb which has the teacher for a subject.

    Each style is marked by the choice of the final verb expression in the sentence. Each of our three sentence types can be altered from the basic, plain-style forms by doing something to the inflected word (**Ponta; Côh.ta;** ··· **ita**). The possible sentence-final types are realized through the finite-mood

shifts of §11.5, where all of the shapes are presented. The full range possible for kinds of ending expression – statement, question, command, proposition, or apperception – is specifically marked only for the plain and formal styles. The other styles have certain gaps, and those are filled either by using a basic form (the statement) from the same style or by "borrowing" a form from some other style – in a sense, changing one's style in order to make certain types of sentences. A command, for example, is often made in a more polite style than a statement, even though both are said to the same person. The FORMS that correspond to the ending-expression types, which will be found in §11.5, differ for the three nuclear sentences in the different styles, and the command and proposition forms are lacking for adjectival and copular sentences in all styles, except that a form equivalent to the plain command is used to make adjectival exclamations such as **komawe la** 'heaven be praised!'. Statements can be made by using the assertive endings (for the polite, formal, semiformal, and familiar styles); the infinitive (for the intimate style); or the infinitive + particle **yo** (for the polite style). In the plain style, questions are sometimes asked by a nominal sentence that is made by adnominalizing the nuclear sentence and adding a postmodifier meaning 'question' as in **Ponun ya** 'Does (one) look at it?'.

There are six styles: plain, formal, semiformal (or authoritative), familiar, intimate, and polite. There is one additional style that is unspoken, the DOCUMENTARY, which typically uses the substantive to make a nominalization of the sentence (**Ponta → Pom; Cŏh.ta → Cŏh.um; Cip ita → Cip im**). After two-syllable verbal nouns **ham** 'does' is often omitted at the end of a documentary sentence, especially in newspaper headlines. Within the intimate and (+ the particle **yo**) the polite styles, there are two special types of sentence: the CASUAL, which uses the suspective **-ci** (**Ponta → Poci; Cŏh.ta → Cŏh.ci; Cip ita → Cip ici**); and the EXCLAMATORY, which uses an adnominalization (§11.9) + the postmodifier **tey** 'circumstance' to make a nominal sentence or, with **yo**, an adverbial sentence. We could treat these as two substyles of the intimate and polite. There are also three kinds of SUSPENDED sentences in the intimate and polite styles: the CIRCUMSTANTIAL type, made just like the exclamatory sentence (adnominalization + **tey**); the UNCERTAINTY type, consisting of an adnominalization + the postmodifier **ci**, an abbreviation of ⋯ **ci to molunta** 'maybe'; and the AFTERTHOUGHT type, an adverbialization (§11.10) with the gerund **-ko**.

We will summarize the uses of the various styles as follows:

1. PLAIN style (in Korean labeled **hāy-la**). Plain forms are used by adults to children, by children (and sometimes older friends of about the same age) among themselves. The forms are also found in impersonal writings and quotations, but in these cases, the questions and commands have special characteristics that set the substyle apart as QUOTATIVE PLAIN, further discussed in §11.11. The plain style is regarded as a sort of "basic" style for the purpose of giving grammatical examples, citing forms, and the like.

2. FORMAL style (in Korean labeled **contay** or **hasipsio**). The formal style is used when addressing someone toward whom a certain reserve is in order: a high official, a professor, one's employer, a famous person one does not know well, a foreigner, a doctor, a preacher, a scholar, … . The style is also common in certain set greetings, such as **Annyeng hasip.nikka?** 'How are you?', and other clichés even when the style of the rest of one's conversation may be more relaxed. (The greeting can actually be given in several styles. The polite **Annyeng has(y)ey yo?** is especially common, and to babies Koreans sometimes say **Cal iss.ni?** with the same meaning.) The formal style is mixed with the polite. You put most of your sentences in the polite, a few of them every now and then in the formal, somewhat the way some Americans insert "sir" or "ma'am" into every third or fourth sentence. Upon first meeting a stranger, it is good practice to begin in the formal style, especially if you are a foreigner, and then lapse into the polite style after the ice has thawed a bit. The polite style seems to be a Seoul development that has spread. In parts of Kyengsang and other areas you may notice the formal style being used for situations where the Seoul speaker would choose the polite style.

3. SEMIFORMAL style (in Korean labeled **hao**). The semiformal or authoritative style is used mostly by people in AUTHORITY in some situation, such as a policeman talking to a traffic offender, a man speaking to a personal servant or menial (who replies in formal or polite speech), or an older man

giving advice to a younger relative. There is a variant of this style in Seoul speech, -swu / -wu ← -so / -o, that is used to seniors, including servants, within the family circle. (To family juniors the intimate and plain forms are appropriate, and to friends the familiar style is used.) The semiformal style seems to be used less and less, and younger people regard it as old-fashioned. Roth (1936) says that -so / -o is often called the "middle" (= middlingly respectful) form, as contrasted with the high (respectful = formal, polite) and the low (plain). According to ¹Yi Hyosang (1991:154), who calls it the "formal lateral style", this style is "particularly preferred when there is a conflict among politeness factors: a husband speaking to his wife, a younger supervisor to an older supervisee, or a superior officer to an older inferior"; letters written in this style "are perceived as very stylish, literary, and courteous".

4. FAMILIAR style (in Korean labeled hakey). This is a friendly style somewhere between the intimate and the polite. It is widely used among adult male friends who are not quite close enough to use the intimate style, and less widely by (or to) women. In most cases of friendship that are like that shown by the male use of the familiar (or "buddy-buddy") style, women seem to use the polite style, but sometimes the intimate. There are indications that the familiar style, though still heard, is on the way out in the Seoul area. ¹Yi Hyosang (1991:156) says this style is "used only among grownups, e.g. by a senior addressing a grownup junior or between grownup social equals" and is "typically used by parents-in-law addressing their sons-in-law, or by a supervisor to a male supervisee", noting that it is "never used among biological family members". He also observes that this style is used in letters between male friends of about the same age who would usually use the -e or -ta styles in speaking to each other.

5. INTIMATE style (together with the polite labeled pān-mal in Korean). The intimate style, which is the polite style minus the particle yo, is the most common way adults who are close friends or relatives talk to one another. Often sentences in the plain style are freely mixed with those in the intimate, especially by younger people.

6. POLITE style (together with the intimate labeled pān-mal in Korean). The polite or "-e yo" style, which is the intimate + the particle yo, is perhaps the most widely heard way to end a sentence, and the most generally useful style for the foreigner. Adult Koreans who are not close friends or relatives use this style among themselves. Children use it in speaking to adults, who usually address them in the plain style. When a Korean approaches a stranger for information, he most often speaks in the polite style. If he felt sufficiently in awe of the stranger's appearance to find the formal style called for, he would probably hesitate to approach the person with his question.

11.3.1. Casual sentences.

The CASUAL sentence may be either intimate (-ci) or polite (-ci yo, often reduced to -c[y]o) and it has several uses which we can sum up in the tag translation 'suppose':

(1) A casual statement anticipating agreement. With the double question-mark intonation we get a meaning something like 'I suppose it is, isn't it; don't you agree with me; n'est-ce pas' as in Kongwen ey kaci (yo)?? 'I suppose we are going to the park, aren't we.'

(2) A casual suggestion or proposition. With the period intonation or the double exclamation-point intonation there is often the meaning 'let's (us); I suggest that we; how about; suppose we' as in Kongwen ey kaci (yo)!! 'Suppose we go to the park!'

(3) A casual reminder question. Sometimes with either of the exclamation-point intonations the meaning is that of an accusing sort of reminder: 'Didn't you say ‥ ? But you said ‥ !', as in Tekswu kwung ey to yūmyeng han pak.mul-kwan i iss.ta (ha)ci!! 'Didn't you say there's a famous museum in Tekswu Palace too?'

(4) A casual informative statement. With the period intonation the casual style is often used to impart information. From the basic meaning of the morpheme ci 'uncertain fact', a flavor of uncertainty — largely feigned — colors the information given, and that has the effect of softening the statement much like English 'you know, I think, it seems to me, I guess, I suppose':

Poktong-i to kaci (yo). 'Poktong-i is going too, you know.'

Kuleh.key hamyen cōh.keyss.ci (yo). 'I guess that will do.'

Though you may make statements about yourself in this way, you seldom answer questions about yourself with casual statements, for it would seem evasive not be more definite with information about your own activities and intentions when directly queried on them.

(5) A casual command. With the period or the exclamation-point intonation, the casual style can be used as a soft command 'suppose you just — ':

Tāyhap-sil ey anc.e se kitalisici yo(!) 'Suppose you girls sit down and wait in the lounge'.

(6) A casual question. With the question-mark intonation, the casual style indicates a yes-or-no question 'I suppose that — ?':

Kongwen ey kaci (yo)? 'I suppose we're going to the park?'

Eti kaci (yo)? 'I suppose you're going somewhere?' — CF **Eti ka (yo).** or **Eti kana yo.** 'Where are you going?'

Questions which contain a content-interrogative (such as **mues** meaning 'what' rather than 'something') often seem too specific for such a casual inquiry; but they sometimes occur, with the period intonation:

Phullathuphom un meych pen ici yo. 'What (number) platform do you suppose it is?'

To sum up the uses of the casual -ci (yo) with the various intonations:

-ci yo.	(1) 'I suppose — '; 'I guess — '; ' — ; you know'
	(2) 'Suppose we ... '; 'Let's (us) — '
	(3) 'Suppose you — '; 'Please — '; 'Do — , willya'
	(4) 'I suppose — ?'; 'Wh– do you suppose — ?'
-ci yo?	(1) 'I suppose — ?'
-ci yo??	(2) 'I suppose — , don't you agree'; ' — n'est-ce pas'
-ci yo!!	(1) 'Suppose we — ', 'Let's (us) — '
	(2) 'But I thought — ', 'Didn't you say — ?!'

According to [1]Yi Hyosang (1991:454) the -ci forms are COMMITTAL: they "express the speaker's commitment to the truth of the information conveyed with varying degree of certainty", ranging from probable to certain. Apt translations for -ci statements include 'obviously', 'definitely', 'for sure', and 'of course', or 'you know' and 'you see', pointing to the obviousness of the information. "In interrogative contexts, the suffix expresses asking confirmation on information the speaker is committed to. In imperative or propositive contexts, the suffix expresses suggestion for an action which the speaker believes to be proper in a given context."

See also the entry -pci yo in Part II. Notice that -ci yo is usually reduced to a single syllable -cyo and pronounced /co/.

11.3.2. Exclamatory sentences.

Exclamatory sentences occur in the intimate and (+ yo) polite styles. They are made by adnominalization (§11.9) + the postmodifier **tey** 'circumstance' and the exclamation-point intonation, though sometimes the simple period intonation is used. When the suspensive or triple-dot intonation is heard the same expression is CIRCUMSTANTIAL, §11.3.3. The meaning is something like 'my what – !' or 'oh isn't it — ', and sometimes in English a final low-pitched 'though' (or an initial 'But') catches the feel of the Korean:

Chwuwun tey (yo)! 'Gee but it's cold!'

Cōh.un tey (yo)! 'How nice!'

Cōh.un kos in tey (yo)! 'But what a nice place!'

Phyen.li han tey (yo)! 'Isn't it convenient, though!'

Such expressions differ from the meaning of the apperceptive sentence (§11.5) primarily in the focus of emphasis. The apperceptive sentence stresses the suddenness of realization, or the novelty of the situation produced by the realization. The exclamatory sentence stresses the genuineness or intensity of the state described, much as the simple exclamation point does in English prose. When the exclamatory sentence is accompanied by the "??" intonation, as it occasionally is, it means about the same thing as the casual 'isn't it':

Nemu yātan sulen tey yo?? 'Isn't it too noisy, though?'

Exclamatory sentences are more often built on adjectival and copular sentences, but there are verbal examples, too:

Nwun ey ttuynun tey! 'It's striking (to the eye)!'

Wuli săchwun tul i ku hak.kyo ey tanyess.nun tey 'Why, my cousins went to that school!'

A few adjectives can make exclamatory sentences by using the colloquial **-ulq si ko** and the literary **-un ci ko**; see the entries for those expressions in Part II.

11.3.3. Circumstantial sentences.

One type of suspended sentence is made with a modifier form + the postmodifier **tey** 'circumstance', usually accompanied by the suspensive or triple-dot intonation: **Ponta** → **Ponun tey** ... ; **Cŏh.ta** → **Cŏh.un tey** ... ; **Cip ita** → **Cip in tey** ... . The meaning is something like 'it is this way, so ... ', 'and uh ... ', 'but uh ... ', '(but) you know ... ', ' − you know? − '. A circumstance is mentioned with some unstated conclusion to be drawn from it, perhaps a conclusion one hesitates to put into words. For any such utterance, the speaker can always go ahead and supply the implied conclusion, and he may very well do so if prompted:

Kim: **Cey ka onul pappun tey yo** ... 'I'm sorta busy today, you know, ... '

Pak: **Kulay se yo** ... 'And so ... ?'

Kim: **Sāmu sikan ey mŏs okeyss.ey yo.** 'I won't be able to come for office hours'.

The circumstantial sentences are sometimes used to ask questions in the intimate and polite styles, as well as to make comments. Notice the difference of meaning that accompanies a difference in intonation when an indeterminate (a content-interrogative) is present:

Ce ke n' musun chayk in tey?? 'What sort of book is it(, anyway)?'

Ce ke n' musun chayk in tey! 'Gee, I guess it must be some sort of book!'

Compare:

Ce ke n' musun chayk ia. 'What sort of book is it?'

Ce ke n' musun chayk ia! 'It must be some sort of book!'

Further examples:

Chima nun musun pich in tey?? 'What color is the skirt(, anyway)?'

Musun tāykwel kath.un tey?? 'Is it like some sort of palace?' − This could also be taken as a fragment, 'You mean the place [tey = kos] that looks like some sort of palace?'

11.3.4. Uncertainty sentences.

Sentences can be adnominalized (§11.9) and followed by the postmodifier **ci** + the particle **to**, as an expansion of the verbal sentence **Molunta** 'I don't know' to express the meaning 'perhaps, maybe'.

Ponta. → **Ponun ci to molunta.** 'Maybe someone is looking at it.'

Cŏh.ta. → **Cŏh.un ci to molunta.** 'Maybe it is good.'

Cip ita. → **Cip in ci to molunta.** 'Maybe it is a house.'

These sentences can then be abbreviated by dropping **to molunta**, and the result is an UNCERTAINTY sentence in the intimate or (+ **yo**) polite styles, usually accompanied by the period intonation:

Cip ey iss.nun ci (yo). 'Maybe she is at home.'

Kuleh.key hamyen cŏh.keyss.nun ci (yo). 'Maybe we should do it that way.'

Tol.a wass.nun ci (yo). 'Perhaps he's back.'

11.3.5. Afterthought sentences.

Afterthought sentences are made in the intimate and (+ **yo**) polite styles by an adverbialization (§11.10) with the gerund **-ko**, which is commonly pronounced **-kwu**, especially before **yo** in this colloquial structure. According to Pak Sengwen (108-9) the sentence-final gerund can be used either to express an afterthought, as here described, or in answer to a question. Ordinarily the gerund does not occur at the end of a sentence, but it can be used to finalize a kind of afterthought in much the same way that an English sentence sometimes begins with 'And also, ... ':

Phyo nun eti se sa yo. Tto kaps un elma 'ko yo. 'Where do we buy tickets? And how much are they?'

I kes un mues iko, ce kes un mues in ka yo. — I kes un tangsin uy moca 'ko, ce kes un tangsin uy chayk iko yo. 'What is this, and what is that? — This is your hat, and that is your book.'

Pipimq pap un ili cwusey yo. — [1]Nāyngmyen un ili cwusiko yo. 'Serve the mixed rice here. — And the chilled noodles, here.'

Ka (se) cwumusey yo; na ttaymun ey caci anh.ko kitalici māsiko yo. 'Go off to bed; don't wait up for me.'

There are many other ways of stating an impromptu afterthought, of course, including common inversions such as Pappi kwūlci mala, sikan i nek.nek hani 'Don't rush, (for) there's plenty of time'. The use of a syntactic inversion that puts the subject or object at the end, after the verb, is an effective stylistic device in poetry, popular both in Korea and in Japan.

A special use of afterthought structure is seen in the expressions -ko mālko (yo)! 'of course --!': Ponta → Poko (§11.10) → Poko mālko (yo)! or Pokwu mālkwu (yo)! 'Of course I'm looking at it!'.

11.4. Tense-aspect conversions.

We have referred (§9.1) to two tense markers (-ess- past, -keyss- future), and to five aspect markers: indicative and subjunctive (which combine with the assertive and attentive moods to form some of the endings treated as mood conversions in §11.5), retrospective (-tu-, ...), prospective (-ul-, ...), and processive (-n-, -nun-, ...). But by tense-aspect conversions we do not refer directly to the specific morphemes that go to make up what we are calling the verb-final "moods", but rather to categories of sentence relationship such that our nuclear sentences can be transformed in these ways:

(1) Present → Past. Ponta → Pwass.ta 'I looked at it'; Cōh.ta → Cōh.ass.ta 'It was good'; Cip ita → Cip iess.ta 'It was a house'.

(2) Past → Past-Past. (Ponta →) Pwass.ta → Pwass.ess.ta 'I looked at it (but I have forgotten what it looked like)'; (Cōh.ta →) Cōh.ass.ta → Cōh.ass.ess.ta 'It was good (and then something went wrong)'; (Cip ita →) Cip iess.ta → Cip iess.ess.ta 'It was a house (or so I thought, but later it turned out to be something else)'. It is difficult to set up situations adequate to call for the past-past without a bit of artificiality, and the verbs of going and coming seem to work best: Onta 'He comes' → Wass.ta 'He has come = He is here' → Wass.ess.ta 'He came (but left) = He was here'; Kanta 'He goes' → Kass.ta 'He has gone = He is away' → Kass.ess.ta 'He went (but came back) = He is back'. Other situations are set up with verbs that imply a result likely to be reversed or changed such as eating (and getting full but later feeling hunger again), borrowing (but later repaying), getting tired (but renewing one's energy with rest), getting cloudy (but then clearing up later), ...

(3) Present → Future. Ponta → Pokeyss.ta 'I will look at it' (or, below, 'He probably looks at it'); Cōh.ta → Cōh.keyss.ta 'It will be good' (or 'It probably is good'); Cip ita → Cip ikeyss.ta 'It will be a house' (or 'It probably is a house').

(4) Present → Tentative. Same as (3); often preceded by ama 'likely'.

(5) Future → Future tentative. (Ponta →) Pokeyss.ta → Polq kes ita (abbreviation Polq ke yta or more often Polq ke 'ta); (Cōh.ta →) Cōh.keyss.ta → Cōh.ulq kes ita 'It will probably be good'.

(6) Past → Past Future. (Ponta →) Pwass.ta → Pwass.keyss.ta 'I will have looked at it' (or, below, 'He probably looked at it'); (Cōh.ta →) Cōh.ass.ta → Cōh.ass.keyss.ta 'It will have been good' (or, below — and more likely, 'It must have been good'); (Cip ita →) Cip iess.ta → Cip iess.keyss.ta 'It will have been a house' (or — and more likely, 'It probably was a house').

(7) Past → Past Tentative. Same as (6); often preceded by ama 'likely'.

(8) Past-Past → Past-Past Future. (Ponta → Pwass.ta → Pwass.ess.ta →) Pwass.ess.keyss.ta 'I will have looked at it (but will have forgotten it)' (or, below, 'He probably looked at it — but forgot what it looked like'); (Cōh.ta → Cōh.ass.ta →) Cōh.ass.ess.ta → Cōh.ass.ess.keyss.ta 'It will have been good (but then something will have gone wrong)' (or, below and more likely, 'It probably was good — but then something went wrong'); (Cip ita → Cip iess.ta) → Cip iess.ess.ta → Cip iess.ess.keyss.ta 'It will have been a house (but then will have turned into something else)' (or — and more likely, 'It probably was a house — but then turned into something else').

(9) Past-Past → Past-Past Tentative. Same as (8); often preceded by **ama** 'likely'.

(10) Present → Retrospective. **Ponta → Potula** '(When observed) he was looking at it'; **Cōh.ta →
Cōh.tula** '(According to my observations) it was good, it was found to be good'; **Cip ita → Cip itula**
'(I noticed) it was a house'. The one who did the observing must be the speaker of the statement.

(11) Past → Past Retrospective. (**Ponta →**) **Pwass.ta → Pwass.tula** 'I found that he had been looking
at it'; (**Cōh.ta →**) **Cōh.ass.ta → Cōh.ass.tula** 'I noticed it had once been good'; **Cip ita → Cip
iess.ta → Cip iess.tula** 'I remembered that it had been a house'.

(12) Past-Past → Past-Past Retrospective. (**Ponta →**) **Pwass.ta → Pwass.ess.ta → Pwass.ess.tula**;
... . The forms are rare in speech; when written they are sometimes used just as emphatic forms of (11).

(13) Past Future → Past Future Retrospective. (**Ponta → Pwass.ta →**) **Pwass.keyss.ta →
Pwass.keyss.tula** '(From what I observed) he will have looked at it' or 'He likely looked at it'; ... .
Not too common; see the entry **-ess.keyss.tula** in Part II.

The meanings of present, past, and future conversions are sometimes at variance with what the
label seems to call for; see the entries **-keyss.ta** and **-ess-** in Part II. Examples given by CM 1:316-7
show the present used for (1) permanent or habitual; (2) future, especially definite expectation with
verbs of departure and arrival; (3) historical present; (4) command-like instructions, such as recipes or
stage directions; (5) citing a series of actions. For more on the retrospective, see p. 325.

Korean resembles English rather than Japanese in expressions of the type **acik an / mōs V-ess.ta**
'has not yet V-ed'. In Japanese the nonpast negative will appear in such sentences (ma'da sinai).

11.5. Mood conversions.

In speaking of mood conversions we use the term "mood" in a somewhat narrower sense than
before, to refer to the finite moods. Specifically, we treat the STATEMENT as basic and regard each of
the other moods — question, command, proposition, and apperception — as a conversion from that.
Because of the complexities of form taken in the various styles (§11.3), I have prepared a table to
display the forms used for each category and it includes also the retrospective forms (§11.4) because of
their interrelated complexities. In the table an arrow pointing up means "use the simple statement
form, perhaps with a different intonation". An arrow pointing to the left means "use a form from a less
polite style", one pointing to the right means "use a form from a more polite style". An arrow pointing
both left and right means "use either a less or a more polite style". The difference between the styles is
not entirely a gradation of politeness as such, to be sure, but for the purposes of this table we will so
consider it. Some categories offer several possibilities, for which there is generally a slight difference
in usage; the options are cited here in the order of the relative frequency with which they are chosen.
The table on p. 306 summarizes the facts that are discussed in detail, style by style, in later sections. In
the table **(-)kwun** represents also **(-)kwumen** and **kulye** represents also **kwulye**.

There are several colloquial and dialect forms that do not appear in the table, such as **-(su)pci yo,
-(u)psey, -la kwu, -ca kwu,** ... . They will be found as individual entries in Part II.

11.5.1. The plain style.

PLAIN STYLE: Statement.

The indicative assertive **-ta** is attached to adjectives, to the copula, to **iss-** and **ēps-**, and to all cases of
the tense markers **-ess-** and **-keyss-** (regardless of what kind of stem they may be attached to): **Cōh.ta**
'It's good'; **Nay kes ita** 'It's mine'; **Cip i iss.ta** 'I have a home', **Tōn i ēps.ta** 'I have no money';
Pwass.ta 'I looked at it'; **Pokeyss.ta** 'I will look at it'. But verbs attach the PROCESSIVE assertive
-nunta / -nta: **Ponta** 'He looks at it'. The copula has a special alternant when used in quotative
constructions (§11.11): instead of **ita / 'ta** we hear **ila / 'la** in **Cip ila ko hayss.ta** 'They said it's a
house', **Pusan ila 'nun tosi** 'the city called (= of) Pusan', and **na 'la to** 'even though / if it be me'.

PLAIN STYLE: Question.

(1) The indicative attentive, in the form of the one-shape ending **-ni**, is attached to any stem: **Cōh.ni?**
(/cōnni/) 'Is it good?'; **Cip ini?** 'Is it a house?'; **Poni?** 'Do you see it?'; **Pwass.ni?** 'Did you see it?';
Iss.keyss.ni? 'Will there be any?' Do not confuse this with the two-shape ending called the sequential,

Mood shift table

	PLAIN	FAMILIAR	INTIMATE	CASUAL	CAS.POL.	SEMIFORM.	POLITE	FORMAL
STATE- MENT	-ta, i-la -nunta	-ney	-e	-ci	-ci yo	-so	-e(y) yo	-sup.nita
QUESTION	-ni -n(un) ya -nun ka, ... -nun -un ka	-na	←↑ -nun tey	-ci 'ni	←↑	↑	-un ka yo -na yo	-sup.nikka
APPER- CEPTION	-kwun -nun kwun	← -ney kulye	←	←	→	←→	-kwun yo -nun kwun yo	-sup.nita kulye
RETRO. STATE- MENT	-tula	-tey, ?i-ley ←	←	←	→	→	-tey yo -tun tey yo -tula ko yo	-suptita
RETRO. QUES- TION	-tun ya -tun	-ti	←	←	→	←→	-tey yo -tun ka yo	-suptikka
RETRO. APPER- CEPTION	-tukwun	←	←	←	→	←→	-tukwun yo, -tun kwun yo	-suptita kulye
SUGGES- TION	-ca	-sey	-ulq ka -ulye	←	↑→	←↑→	-ulq ka yo	-upsita
COMMAND (quoted)	-e la, ... -ula	-key (na)	←↑	↑	↑→	←↑→ ↑→	·	-usio, ...

-uni / -ni. The forms are alike after a vowel, so that poni ··· can mean 'since you see it', but they contrast after a consonant: Mek.ni? 'Does he eat?', mek.uni ··· 'since he eats'; Pwass.ni? 'Did you see it?', pwass.uni ··· 'since you saw it'; Pokeyss.ni? 'Will we look at it?', pokeyss.uni ··· 'since we will look at it'. However, [1]Yi Tongcay tells me that older Seoul speakers prefer -un i for consonant-final adjective stems: Cōh.un i? /cō(u)ni/ 'Is it good?', Cak.un i? 'Is it little?' (instead of Cāk.ni? /cāngni/).

(2) Processive verbs, iss- and ĕps-, -ess- and -keyss- (attached to any stem) may use the PROCESSIVE MODIFIER -nun + the postmodifier ya: Ponun ya? 'Are you looking at it?'; Pwass.nun ya? 'Did you see it?'; Pokeyss.nun ya? 'Will we see it?'; Cōh.ass.nun ya? 'Was it good?'; Cōh.keyss.nun ya? 'Will it be good?'; Iss.nun ya? 'Is there any?' The postmodifier is sometimes pronounced i or a (Ponun i? Ponun a?), and the processive modifier -nun is sometimes abbreviated to -n', so that you will hear Pon' ya, Pwass.n' ya; Pokeyss.n' ya?; Iss.n' ya? The forms like Poni? in (1) above may very well be simply Pon' i? ← Ponun i? = Ponun ya? You may also hear Ponun ya? as Ponun a? and Pon' a?

(3) A modifier form + the postmodifier ka is a structure attached mostly to adjectives and the copula, but occasionally to verbs, too: Cōh.un ka? 'Is it good?'; Cōh.ulq ka? 'Will it be good?'; Cip in ka? 'Is it a house?'; Ponun ka? = Ponun ya? 'Do you see it?' CF Polq ka? 'Shall we look at it?' = 'Let's look at it!' (FAMILIAR suggestion).

(4) The same as (2) but with the postmodifier ya omitted: Ponun? 'Do you see it?'; Pwass.nun? 'Did you see it?'; Pokeyss.nun? 'Will we see it?'; ... . This usage seems largely confined to the dialect of Phyengan province, where -kān is also used for -keyss.nun (ya).

How do we choose among these several patterns? Follow the most common practice (leaving aside for the moment quotations, §11.11):

Use -**ni** for verbs, **iss-**, **ēps-**, **-ess-**, and **-keyss-**.

Use -**un ka** or -**ni** for adjectives and the copula.

PLAIN STYLE: Apperception.

The apperceptive endings -**kwun (a)**, **kwumen**, -**kwulye** are attached to adjectives, to **iss-** and **ēps-**, and to -**ess-** and -**keyss-**, as in: **Cōh.kwun!** (or **Cōh.kwun a!** or **Cōh.kwumen!** or **Cōh.kwulye!**) 'Oh, it's nice!'; **Iss.kwumen!** 'So there is some!'; **Ēps.kwulye!** 'Why, there isn't any!'; **Pwass.kwun a!** 'Why, they've seen it!'; **Pokeyss.kwun a!** 'We're going to see it!' But verb stems use the processive modifier + the apperceptive postmodifier **kwun** (**kwun a**, **kwumen**, **kwulye**), as in **Ponun kwun (a)!** 'Why, you're looking at it!'. And the copula stem is often replaced by a variant **ilo-**: **Cip ilokwun a!** or **Cip ikwun a!** 'Why, it's a house!' [1]Yi Hyosang 1991 says these forms represent sudden perception of unassimilated information or evidence, said to express oneself rather than inform the listener.

PLAIN STYLE: Retrospective statement.

The retrospective assertive -**tula** attaches to any stem: **Potula** 'He was looking at it (I noticed)'. CF §11.4.

PLAIN STYLE: Retrospective question.

(1) The retrospective modifier -**tun** + the postmodifier **ya**, as in **Potun ya?** '(Did you notice) was he looking at it?' and **Pwass.tun ya?** '(Could you tell) had he been looking at it?'

(2) The same construction omitting the **ya**: **Potun? Pwass.tun?** Largely confined to Phyengan.

PLAIN STYLE: Retrospective apperception.

The retrospective apperceptive -**tu-kwun** (-**tu-kwun a**, -**tu-kwumen**, -**tu-kwulye**) attaches to any stem; or, you can use the full form from which that is probably abbreviated, the retrospective modifier + the postmodifier **kwun** (**kwun a**) and variants **kwumen** and **kwulye**: **Potun kwun = Potukwun** 'Why, I see he's been (found to be) looking at it!'

PLAIN STYLE: Suggestion or proposition.

The subjunctive assertive -**ca** is used to express the meaning 'let's do it': **Poca** 'Let's look at it!'. The mood does not occur for adjective, copula, -**ess-** or -**keyss-**; nor for **ēps-**, but **iss-** can make a proposition in one of its meanings, **Iss.ca** 'Let's stay!' (The negative is **Iss.ci mālca** 'Let's not stay!')

PLAIN STYLE: Command.

When final in an unquoted verbal sentence, a command is expressed with the infinitive -**e** + the particle **la**, as in **Pwā la!** 'Look at it!' (Certain verbs have an alternant infinitive form in this construction; see §8.3.6.) The formally corresponding conversion of an adjectival sentence produces an exclamation: **Cōh.a la!** 'How nice!' In a quoted sentence (§11.11) the command is expressed by the subjunctive attentive -**ula** / -**la** as in **Pola ko hayss.ta** 'He told me to look'.

11.5.2. The familiar style.

FAMILIAR STYLE: Statement.

The familiar indicative assertive form -**ney** is used: **Poney** 'I see it'; **Pwass.ney** 'I saw it'; **Pokeyss.ney** 'I will look at it'; **Cōh.ney** /cōnney/ 'It is good'; **Cip iney** 'It is a house'. But adjectives and the copula often take the prospective modifier -**ul(q)** + the postmodifier **sey**, instead: **Cōh.ulq sey** 'It's good!'; **Cip ilq sey** 'It's a house'.

FAMILIAR STYLE: Question.

The familiar indicative attentive form -**na** is used: **Pona?** 'Do you see it?'; **Pwass.na?** 'Did you see it?'; **Cip ina?** 'Is it a house?'; **Cōh.na?** /cōnna/ 'Is it good?' — CF. the /cōna/ variant of **Cōh.un a?** = **Cōh.un ya?** (PLAIN style) and of **cōh.una** 'is good but'.

FAMILIAR STYLE: Apperception.

Shift to the plain style. But some people will add the particle **k(w)ulye** after -**ney**.

FAMILIAR STYLE: Retrospective statement.

The familiar retrospective assertive -**tey** attaches to a verb or adjective: **Potey** '(I noticed) he was looking at it'; **Cōh.tey** 'I found it was nice'. The copula form is **itey** or **?iley** (presumably a lenition

from **itey**, CF **ila** for the copula **ita** in a quotation): **Cip itey** 'I noticed it was a house'. Do not confuse this with **-ta 'y** = **-ta hay** and ⋯ **ila 'y** = ⋯ **ila hay**; see entries in Part II.

     FAMILIAR STYLE: Retrospective question.

The familiar retrospective assertive **-ti** attaches to any stem: **Poti?** '(Did you notice) was he looking at it?'; **Cŏh.ti?** 'Did you find it nice?'; **Cip iti?** '(Could you tell,) was it a house?'

     FAMILIAR STYLE: Retrospective apperception.

Shift to plain style.

     FAMILIAR STYLE: Suggestion or proposition.

The familiar subjunctive assertive **-sey** is attached to a verb: **Posey** 'Let's look at it'.

     FAMILIAR STYLE: Command.

The adverbative **-key** 'so that it be/do ⋯ ' is attached to a verb, and may be followed by the particle **una / na** to soften the effect: **Pokey (na)!** 'Look at it! (Have a look!)'

11.5.3. The intimate style.

     INTIMATE STYLE: Statement.

The infinitive **-e** attaches to any stem: **Pwā** 'I see it'; **Pwass.e** 'I saw it'; **Pokeyss.e** 'I'll look at it'; **Cŏh.a** 'It's good'. The copula infinitive **ie** is often pronounced **ia** (and misspelled **iya**) with the shortened form **ya** after a vowel and in fast speech sometimes even after a consonant: **Cip ia** 'It's a house'; **Na ya** 'It's me'. Ending a statement the infinitive ending **-e** is sometimes pronounced **-ey** after **-(u)si-**, **iss-**, **ēps-**, **-ess-**, **-keyss-**, and **kath-**, especially in the speech of women. (CF §9.4.)

     INTIMATE STYLE: Question.

(1) Use the statement form with the appropriate intonation: **Pwā?** 'Do you see it?'; **Cŏh.a?** 'Is it nice?'; **Cip ia (ie)?** 'Is it a house?'; **Pwass.e?** (or **Pwass.ey?**) 'Did you see it?'; **Pokeyss.e?** (or **Pokeyss.ey?**) 'Will we see it?'

(2) Shift to the familiar or plain styles.

(3) For verbal sentences, **iss-** and **ēps-**, **-ess-** and **-keyss-**, you can use the processive modifier **-nun** + the postmodifier **tey**: **Ponun tey?** 'Do you see it?'; **Pwass.nun tey?** 'Did you see it?'; **Pokeyss.nun tey?** 'Will we see it?' Sometimes, too, the modifier **-un** + **tey** can be used for adjectival and copular sentences: **Chima nun musun pich in tey** 'What color's the skirt?'; **Musun tāykwel kath.un tey?** 'Isn't it like some sort of palace?'

     INTIMATE STYLE: Apperception. Shift to plain style.

     INTIMATE STYLE: Retrospective statement. Shift to familiar or plain style.

     INTIMATE STYLE: Retrospective question. Shift to plain style.

     INTIMATE STYLE: Retrospective apperception. Shift to plain style.

     INTIMATE STYLE: Suggestion or proposition.

(1) The prospective modifier **-ul(q)** + the postmodifier **ka**, often with the lively "**??**" intonation: **Polq ka?(?)** 'Shall we have a look?'

(2) Shift to familiar or plain style.

(3) Use the Statement form (the infinitive) with the appropriate intonation: **Pwā!** 'Let's look!'

(4) [old-fashioned, literary] Use the intentive **-ulye / -lye**: **Polye** 'Let's have a look at it'; **Com te mek.ulye** 'I'd like us to eat a little more'; **Cikum halye** 'Let's do it now'. CF the cajolative **-ulyem / -lyem** (§9.7.1). In northern dialects the intentive is often pronounced **-uley / -ley**; do not confuse that with a vowel-raised variant of **-ula / -la 'y** as in **Na com poley** (= **pola 'y**)! 'Look at me!'

     INTIMATE STYLE: Command.

(1) Shift to familiar or plain style.

(2) Use the Statement form (the infinitive) with the appropriate intonation: **Pwā!** 'Look!'

11.5.4. The casual intimate style.

     CASUAL INTIMATE STYLE: Statement.

The suspective **-ci** attaches to any stem: **Poci** 'I see it'; **Pwass.ci** 'I saw it'; **Pokeyss.ci** 'I think I'll see it'; **Cŏh.ci** 'I think it's nice'; **Cip ici** 'It is a house, you see'.

CASUAL INTIMATE STYLE: Question.

(1) Follow the suspective with the indicative attentive of the copula **ini / 'ni**: **Poci 'ni?** 'Do you suppose he sees it?'; **Pwass.ci 'ni?** 'Do you suppose he saw it?'; **Pokeyss.ci 'ni?** 'Do you suppose we'll see it?' (This seems to be a dialect usage. See p. 458.)

(2) Use the Statement form with the appropriate intonation: **Poci?(?)**; **Pwass.ci?**; **Pokeyss.ci?**; **Cŏh.ci?**; **Cip ici?**

(3) Shift to plain style.

CASUAL INTIMATE STYLE: Apperception. Shift to plain style.

CASUAL INTIMATE STYLE: Retrospective statement. Shift to familiar or plain style.

CASUAL INTIMATE STYLE: Retrospective question. Shift to plain style.

CASUAL INTIMATE STYLE: Retrospective apperception. Shift to plain style.

CASUAL INTIMATE STYLE: Suggestion or proposition.

(1) Use the Statement form, usually with the "!" or "!!" intonation, but sometimes just the ".": **Poci!(!)** 'Suppose we have a look at it!'

(2) Shift to intimate, familiar, or plain style.

CASUAL INTIMATE STYLE: Command.

(1) Use the Statement form, with "!" or "." intonation: **Poci!** 'Suppose you look at it'.

(2) Shift to intimate, familiar, or plain style.

11.5.5. The casual polite style.

CASUAL POLITE STYLE: Statement.

This is the same as the casual intimate with the addition of the particle yo after the suspective -ci, and the resulting -ci yo is often shortened in pronunciation to -c[y]o: **Poci yo = Poc[y]o**; **Pwass.ci yo = Pwass.c[y]o**; **Pokeyss.ci yo = Pokeyss.c[y]o**; **Cŏh.ci yo = Cŏh.c[y]o /cŏcho/**; **Cip ici yo = Cip ic[y]o**.

CASUAL POLITE STYLE: Question.

(1) Use the Statement form with the appropriate intonation: **Poci yo?(?) = Poc[y]o**; **Pwass.ci yo? = Pwass.c[y]o?**; **Pokeyss.ci? = Pokeyss.c[y]o**; **Cŏh.ci yo? = Cŏh.keyss.c[y]o?**; **Cip ici yo? = Cip ic[y]o?**

(2) Shift to plain style.

CASUAL POLITE STYLE: Apperception. Shift to polite style.

CASUAL POLITE STYLE: Retrospective statement. Shift to polite or formal style.

CASUAL POLITE STYLE: Retrospective question. Shift to polite or formal style.

CASUAL POLITE STYLE: Retrospective apperception. Shift to polite style.

CASUAL POLITE STYLE: Suggestion or proposition.

(1) Use the Statement form, usually with the "!" or "!!" intonation, but sometimes just the ".": **Poci yo!(!) = Poc[y]o!(!)** 'Suppose we have a look!'

(2) Shift to polite or formal style.

CASUAL POLITE STYLE: Command.

(1) Use the Statement form, with "!" or "." intonation: **Poci yo!** 'Suppose you look at it'.

(2) Shift to polite or formal style.

11.5.6. The semiformal (authoritative) style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Statement.

The semiformal indicative assertive -so/-o (dialect -uo/-o) attaches to any stem: **Poo** 'I see it'; **Pwass.�robo** 'I saw it'; **Pokeyss.ᵗo** 'I will see it'; **Cŏh.so** 'It is good'; **Cip io** 'It is a house' − CF two other utterances that sound identical: the polite fragment **Cip iyo** 'A house.' and the variant polite copular sentence **Cip i yo = Cip (y)ey yo = Cip iey yo** 'It is a house'.

For adjective stems there is a variant -ui/-i, as in **Cŏh.ui = Cŏh.so** 'It is good' and **Chai = Chao** 'It is cold to touch' (← **Chata**). CF LHS 2266b, 2289a.

SEMIFORMAL (AUTHORITATIVE) STYLE: Question.

Use the Statement form, with the appropriate intonation: **Poo?** 'Do you see it?'; **Pwass.⁸o?** 'Did you see it?'; **Pokeyss.⁸o?** 'Will we see it?'; **Cōh.so?** or **Cōh.ui?** 'Is it good?'; **Cip io?** 'Is it a house?'

SEMIFORMAL (AUTHORITATIVE) STYLE: Apperception. Shift to plain or polite style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Retrospective statement. Shift to plain or polite style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Retrospective question. Shift to plain or polite style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Retrospective apperception. Shift to plain or polite style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Suggestion or proposition.

(1) Use the Statement form with the appropriate intonation: **Poo!** 'Let's have a look at it!'

(2) Shift to familiar or plain style.

SEMIFORMAL (AUTHORITATIVE) STYLE: Command.

(1) Use the Statement form with an appropriate intonation: **Poo!** 'Look at it!'

(2) Shift to familiar or plain style.

11.5.7. The polite style.

POLITE STYLE: Statement.

The infinitive -e + the particle yo attaches to any stem: **Pwā yo** 'I see it'; **Pwass.e(y) yo** 'I saw it'; **Pokeyss.e(y) yo** 'I will see it'; **Cōh.a yo** 'It is good'; **Cip ie(y) yo** 'It is a house'. The copula is often shortened to ye(y) yo, which usually sounds like **ey yo** (§4.3): **Cip (y)ey yo** 'It is a house'. The mid vowel is sometimes raised to high: **Cip i yo** = **Cip (y)ey yo**. CF **Cip io** 'It is a house' [semiformal], **Cip iyo** 'A house' [polite fragment]. All three sound alike: /cipi(y)o/.

POLITE STYLE: Question.

(1) Use the Statement form with the appropriate intonation: **Pwā yo?** 'Does he see it?'; **Pwass.e(y) yo?** 'Did he see it?'; **Pokess.e(y) yo?** 'Will we see it?'; **Cōh.a yo?** 'Is it good?'; **Cip ie(y) yo?** or **Cip (y)ey yo?** or **Cip i yo?** 'Is it a house?'

(2) The familiar indicative attentive -na + the particle yo attaches to any stem: **Pona yo?** 'Does he see it?'; **Pwass.na yo?** 'Did he see it?'; **Pokeyss.na yo?** 'Will we see it?'; **Iss.na yo?** 'Is there any?'; **Ēps.na yo?** 'Isn't there any?' This is more common with verbal sentences, including **Iss.ta** and **Ēps.ta**, but it is also heard with adjectives when they are past or future (**Cōh.ass.na yo?** 'Was it good?'; **Cōh.keyss.na yo?** 'Will it be good?'), and sometimes when they are in the present tense: **Cōh.na yo?** 'Is it good?'

(3) A modifier + the postmodifier ka + the particle yo will attach to any stem, and is common with present-tense adjectival and copular sentences (**Cōh.un ka yo?** 'Is it good?'; **Cip in ka yo?** 'Is it a house?'), but it occasionally occurs also with past, future, and verbal sentences.

As a rule of thumb: use -na yo with a verb stem, the past -ess- or future -keyss-, iss- and ēps-; and use -un ka yo with an adjective stem or the copula.

POLITE STYLE: Apperception.

(1) Adjective stems, iss- and ēps-, -ess- and -keyss-, attach the apperceptive ending -kwun (or -kwumen) + the particle yo: **Cōh.kwu(me)n yo!** 'Oh, it's nice!'; **Iss.kwu(me)n yo!** 'Why, so there is!'; **Ēps.kwu(me)n yo!** 'But there aren't any (of them)!'; **Pwass.kwu(me)n yo!** 'Oh, he's seen it!'; **Pokeyss.kwu(me)n yo!** 'Why, we'll see it!'

(2) Verb stems attach the processive modifier -nun + the postmodifier kwu(me)n + the particle yo: **Ponun kwu(me)n yo!** 'Oh, he sees it!'

POLITE STYLE: Retrospective statement.

(1) Use intimate (-tey) + the particle yo = -tey yo.

(2) Use polite retrospective apperceptive or polite retrospective circumstantial (-tun tey yo).

(3) Use plain retrospective statement + ko yo = -tula ko yo.

POLITE STYLE: Retrospective question.

(1) The retrospective modifier -tun + the postmodifier ka + the particle yo attached to any stem: **Potun ka yo?** 'Were they looking at it?'; **Pwass.tun ka yo?** 'Had they been looking at it (or could you tell)?'

(2) Shift to the formal style.

POLITE STYLE: Retrospective apperceptive.

(1) The retrospective apperceptive ending **-tukwu(me)n** + the particle **yo** attaches to any stem: **Potukwu(me)n yo!** 'Why, I see he's been looking at it!'. This seems to be a contraction of the next option.

(2) The retrospective modifier **-tun** + the postmodifier **kwu(me)n** + the particle **yo** attaches to any stem: **Potun kwu(me)n yo!** 'Why, I see he's been looking at it!'.

POLITE STYLE: Suggestion or proposition.

(1) The prospective modifier **-ul(q)** + the postmodifier **ka** + the particle **yo** with "??" intonation: **Polq ka yo??** 'Shall we look at it?'

(2) Use the Statement form, with "!" or "." intonation: **Pwā yo!** 'Let's look at it!'

(3) Shift to the formal style.

POLITE STYLE: Command.

(1) Shift to the formal style.

(2) Use the Statement form, with "!" or "." intonation: **Pwā yo!** 'Look at it!'

11.5.8. The formal style.

FORMAL STYLE: Statement.

All stems attach the formal indicative assertive **-sup.nita** / **-p.nita** (with the dialect or spelling variant **-up.nita** after a consonant): **Pop.nita** 'I see it'; **Pwass.ˢup.nita** 'I saw it'; **Pokeyss.ˢup.nita** 'We will see it'; **Meksup.nita** (dialect **Mek.up.nita**) 'I eat it'; **Cŏh.sup.nita** (dialect **Cŏh.up.nita**) 'It is good'; **Cip ip.nita** 'It is a house'.

FORMAL STYLE: Question.

All stems attach the formal indicative attentive **-sup.nikka** / **-p.nikka** (with the dialect or spelling variant **-up.nikka** after a consonant): **Pop.nikka** 'Does he see it?'; **Pwass.ˢup.nikka** 'Did he see it?'; **Pokeyss.ˢup.nikka** 'Will we see it?'; **Meksup.nikka** (dialect **Mek.up.nikka**) 'Does he eat it?'; **Cŏh.sup.nikka** (dialect **Cŏh.up.nikka**) 'Is it good?'; **Cip ip.nikka** 'Is it a house?'.

FORMAL STYLE: Apperception.

(1) Shift to the polite style.

(2) All stems attach the formal indicative assertive **-sup.nita** / **-p.nita** (with the dialect or spelling variant **-up.nita** after a consonant) + the particle **kwulye** (usually, however, pronounced **kulye**): **Pop.nita k(w)ulye!** 'Oh, I see he's looking at it'.

FORMAL STYLE: Retrospective statement.

All stems attach the formal retrospective assertive ending **-suptita** / **-ptita** (with the dialect or spelling variant **-uptita** after a consonant): **Poptita** '(I noticed) he was looking at it'; **Cŏh.suptita** (dialect **Cŏh.uptita**) 'I found it nice'; **Cip iptita** '(I recall) it was a house'.

This form is little used in Seoul; people prefer the polite apperceptive **-tu-ku(me)n yo** or circumstantial **-tun tey yo**.

FORMAL STYLE: Retrospective question.

All stems attach the formal retrospective attentive ending **-suptikka** / **-ptikka** (with the dialect or spelling variant **-uptikka** after a consonant): **Poptikka** '(Did you notice) was he looking at it?'; **Cŏh.suptikka** (dialect **Cŏh.uptikka**) 'Did you find it nice?'; **Cip iptikka** 'Was it a house?'.

FORMAL STYLE: Retrospective apperception.

(1) Shift to polite style.

(2) All stems attach the formal retrospective assertive ending **-suptita** / **-ptita** (with the dialect or spelling variant **-uptita** after a consonant) + the particle **k(w)ulye**: **Poptita k(w)ulye** 'Oh, (I remember noticing) he was looking at it!'

FORMAL STYLE: Suggestion or proposition.

Verbal stems attach the formal subjunctive assertive **-upsita** / **-psita** (with a variant **-supsita** after a consonant): **Popsita** 'Let's have a look at it'; **Ilk.upsita** (or **Ilk.supsita**) 'Let's read'. Since we are

using the formal style it is often appropriate to show respect to the other person included in the action, the addressee, by making the form honorific: **Kasipsita** 'Let's go'; **Capswusipsita** 'Let's eat'; **Tusipsita** 'Let's have a drink'.

FORMAL STYLE: Command.

Verbal stems attach the formal subjunctive attentive ending **-usio/-sio**, with the alternant **-psio** after the honorific **-usi-/-si-**: **Posio** (with honorific **Posipsio**) 'Look at it!' — CF **Posi yo** ← **Pos(y)ey yo** = **Posye yo** 'You see it' (polite honorific statement). Since we are using the formal style, it is natural to make the stem honorific to show respect to the subject of the action, who is the person addressed ('you'): **Posipsio** 'Please look at it'; **Kasipsio** 'Please go'; **Capswusipsio** 'Please eat'. It should be noted that the prevailing practice in South Korea is to spell final /···io/ as "···iyo" in all instances, without regard to the basic form of the components of the endings.

Commands can be turned into requests, in any style, by using the auxiliary verb **cwunta** 'gives (the favor of doing), does for (someone)': **Pwā cwusipsio** or **Pwā cwus(y)ey yo** or **Pwā cw(u)e** or **Pwā cw(u)o** or **Pwā cwukey** or even occasionally **Pwā cw(u)e la** 'Look at it for us/him'.

11.6. Voice conversions.

In §7.4 we found related pairs of Korean verbs that differ in voice: passive built on active, causative built on active. The derived verbs are often spoken of as "morphological" passives and causatives (like English "feed them cake"), in contrast with the periphrastic structures (like English "let them eat cake") that play a similar role. We observed that causative verbs (vc) are always transitive and that passive verbs (vp) are typically intransitive (vpi) but some of these take a few nouns as direct objects so we decided to call them transitive passives (vpt). Looking at these verbs we can see the following conversion schemes:

(1) A ka X lul vt → B ka A eykey X lul vc
(2) A ka vi (or adj) → B ka A lul vc
(3) A ka B lul vt → B ka A eykey vpi
(4) A ka B uy [or B eykey (se)] X lul vt → B ka A eykey X lul vpt

Examples:

(1) **Ai ka pap ul mek.nunta** 'The child eats the food' → **Emeni ka ai eykey pap ul mek.inta** 'The mother has/makes/lets the child eat the food'.

(2) **Ai ka uyca ey anc.nunta** 'The child sits down on the chair' → **Emeni ka ai lul uyca ey anc.hinta** 'The mother seats the child on the chair'.

    Cengto ka noph.ta 'The level is high' → **Wuli ka cengto lul nop.hinta** 'We raise the level'.

(3) **Kāy ka sālam ul munta** 'The dog bites the man' → **Sālam i kāy eykey mullinta** 'The man is bitten by the dog'.

    Wuli ka san ul ponta 'We see the mountain' → **Wuli eykey san i pointa** (or **San i wuli eykey pointa**) 'The mountain is visible to us'. Notice that the order of sentence expansions is determined by the sentence profile (the relative importance of the adjuncts) and is of no relevance to the voice conversion, which is manifest only in the particular specification of the expansions by particles.

(4) **Sensayng i haksayng eykey (se) yakcem ul cap.nunta** [better with ··· **eykey se**] 'The teacher catches the student on a weak point' (or, **Sensayng i haksayng uy yakcem ul cap.nunta** 'The teacher catches a weak point of the student') → **Haksayng i sensayng eykey yakcem ul cap.hinta** 'The student gets caught on a weak point (or, gets his weak point caught) by the teacher'.

Not all verbs have derived causative and passive stems. If a verb lacks such a derived stem, or even if it has one, it can be turned into the causative or the passive by using periphrastic conversions:

    (1) A ka X lul vt   → B ka A eykey X lul vt -key hanta
                                 → B ka A lul sikhye (se) X lul vt -key hanta
    (2) A ka vi (or adj)   → B ka A lul vi(/adj) -key hanta

                                           → B ka A lul adj -key mantunta
    (3) A ka B lul vt   → B ka A eykey vt -um ul pat.nunta
                                                         tang hanta

But tang hanta seems to be limited to VN [ham] ul tang hanta, and eykey is often replaced by eykey se: Mōtun sālam eykey / hanthey se phi ham ul tang hanta 'He is shunned by all'.
Examples:

(1) **Ai ka wuyu lul masinta** 'The child drinks the milk' → **Emeni ka ai eykey wuyu lul masikey hanta** 'The mother gets the child to drink the milk'.

Sik.mo ka pap ul cīs.nunta 'The cook prepares the rice' → **Emeni ka sik.mo eykey [or, sik.mo lul sikhye (se)] pap ul cīs.key hanta** 'Mother has the cook prepare the rice'.

(2) **Haksayng i anc.nunta** 'The student sits down' → **Sensayng i haksayng ul anc.key hanta** 'The teacher has the student sit down'.

Cip i khuta 'The house is big' → **Wuli ka cip ul khukey hanta** 'We make the house big(ger)'.

Ku i ka ttok-ttok hata 'He is bright (intelligent)' → **Hak.kyo kyōyuk i ku i lul ttok-ttok hakey mantul.ess.ta** 'Schooling made him bright'.

Sālam tul i ku i lul ki hanta 'People shun him' → **Ku i ka sālam tul eykey phi ham ul pat.nunta** 'He is shunned by people'.

When a derived causative verb exists, its meaning is usually narrower than that of the periphrastic construction: the meaning of **anc.hinta** 'seats one' is included in the broader meaning of **anc.key hanta** 'has / lets one sit down'.

Verbal nouns of one syllable that are not free get only the periphrastic treatment: **pong hanta** 'seals it' → **pong hakey hanta** 'has one seal it', **cheng hanta** 'invites' → **cheng hakey hanta** 'has / lets one invite', **hap hanta** 'adds' → **hap hakey hanta** 'has / lets one add'. I have been unable to find any good cases of a one-syllable adjectival noun; for **mōs hata** 'is inferior' the conversion is rejected, and there are only questionable examples for **sok hata** 'is speedy', **chēn hata** 'is lowly', and **sil hata** 'is substantial':

? **palq kel.um ul sok hakey hanta** 'quickens (speeds up) one's steps'

(?)**cey mom ul cey ka susu lo chēn hakey hanta** 'cheapens one's body oneself'

(?)**achim mata wūntong ul hay se mom ul sil hakey hanta** 'builds up one's body with exercise every morning'

Some of the intransitive verbal nouns are a bit awkward in this conversion, too:

(?)**Ku sālam ul munhwaq kwa ey sok hakey hanta** 'They attach him to the cultural section'.

Verbal nouns and adjectival nouns of more than one syllable, and also free verbal nouns of only one syllable such as **īl** 'work' and **māl** 'talk', are subject to the conversions in the following ways:

(1) A ka X lul vnt hanta   → B ka A eykey X lul vnt sikhinta
                                                        hakey hanta

(2) A ka vni hanta   → B ka A lul / eykey vni sikhinta
                                                        hakey hanta

A ka adj-n hata   → B ka A lul adj-n mantunta
                                                        hakey hanta

(3) limited to certain transitive verbal nouns, which should be marked in the lexicon (for further constraints, see §5.6.6):

A ka B lul vnt hanta   → B ka A eykey X lul vnt (lul) pat.nunta
                                                        tang hanta

A ka X lul vnt hanta   → B ka A eykey X lul vnt pat.nunta
                                                        tang hanta

A ka X lul vnt hanta   → X ka vnt (i) toynta

Examples:

(1) **Sāmu-wen i congi lul cwūmun hanta** 'The clerk orders paper' → **Nay ka sāmu-wen eykey congi lul cwūmun sikhinta** (or, **cwūmun hakey hanta**) 'I have the clerk order paper'.

Nay ka (ku sālam ul) sayngkak hanta 'I think (of him)' → **Kulenq īl i na eykey (ku sālam ul) sayngkak hakey hanta** 'Such events make me think (of him)'.

(2) **Ku sālam i kyelhon hanta** 'He gets married' → **Apeci ka ku sālam ul kyelhon sikhinta** (or, **hakey hanta**) 'His father makes him get married'.

Ku sālam i īl hanta 'He works' → **Apeci ka ku sālam eykey īl hakey hanta** (or, **īl sikhinta** — but ?***īl hakey sikhinta** is unacceptable to some speakers) 'His father makes him work'. I do not know why eykey is accepted in this sentence but rejected (in favor of ul) for the preceding sentence.

Wuli saynghwal i nek.nek hata 'Our life is rich' → **I kes i wuli saynghwal ul nek.nek hakey hanta** 'This enriches our life'.

(3) **Wuli ka totwuk nom ul kwutha hanta** 'We attack the thief (with our fists)' → **Totwuk nom i wuli eykey kwutha (lul) tang hanta** 'The thief is attacked by us'.

ⁿ**Yeca ka kyelhon ul kēcel hanta** 'The woman refuses the marriage' → **Namca ka ⁿyeca eykey kyelhon ul kēcel tang hanta** 'The man is refused marriage by the woman'.

Ku i ka wuli lul hyep.pak hanta 'He threatens us' → **Wuli ka ku i eykey hyep.pak (ul) pat.nunta** 'We are threatened by him'.

Wuli ka ku lul cwūmok hanta 'We pay attention to him' → **Ku i ka wuli eykey cwūmok (ul) pat.nunta** (or, ⋯ **wuli uy cwūmok ul** ⋯) 'He has attention paid to him by us' (or, 'He is subject to our attention').

Sālam tul i ku māl ul cwūn māl ila ko selmyeng hanta 'People explain that word as an abbreviation' → **Ku māl i cwūn māl ila ko selmyeng toynta** 'That word can be explained as an abbreviation'.

More difficult to explain:

Nay ka ku īl i kuleh.ta ko sayngkak hanta 'I think it is that way' → **Kuleh.ta ko sayngkak toynta** 'That's the way it is thought to be'. (We would have expected the source to contain ku īl ul ⋯.)

We must bear in mind several things about these voice conversions. The particle **eykey** can be replaced by a more colloquial synonym, **hanthey**. If the indirect object is impersonal, the particle will be **ey**: **kōngpho ey salo cap.hinta** 'is seized with fear'. These particles are separately called for, on their own, by certain verbs (giving/writing/telling TO ⁓) and sometimes that results in ambiguity: **Ku ay hanthey i kes ul selmyeng hakey hasio** can mean either 'Have him explain this' or (less likely) 'Have someone explain this to him'. If we clear the ambiguity up a bit we can say **Ku ay hanthey ne hanthey i kes ul selmyeng hakey hasio** 'Have him explain this to you'. Or, to avoid the juxtaposition of two hanthey phrases, **Ku ay hanthey i kes ul ne hanthey selmyeng hakey hasio**. You could also substitute **eykey** for the first hanthey or rephrase the beginning: **Ku ay hanthey (lo) ka se** ⋯ 'Go to him and ⋯ '. When there are two hanthey phrases the one nearest the verb that calls for an indirect object goes with that verb. When there is only one hanthey phrase, you cannot tell for sure whether it goes with the verb or with the conversion. The farther from the verb it is placed, the more likely it goes with the voice conversion.

The particles **ey, eykey,** and **ulo** are sometimes replaced in colloquial or sloppy speech by **ul/lul**. (That caused us some difficulties in defining transitivity, §7.2.) As a result, occasionally we hear a causative sentence with two **ul** phrases. The one nearest the verb is usually the direct object of the verb, the one further removed is a replacement for the indirect-object particle: **ai lul os ul ip.hinta = ai eykey os ul ip.hinta** 'gets the child dressed'. It is possible to make a kind of causative on a causative conversion: **A ka B eykey X lul vt -key hanta** → **C ka A eykey B lul sikhye (se) X lul vt -key hanta** 'C gets A to get B to do X'. An example: **Na nun sāmu-wen eykey sāhwan ul sikhye se congi lul cwūmun hakey hayss.ta** 'I had the clerk make the office boy order paper'.

A literary variant of **eykey** in causative sentences is the expression **ulo ha.ye-kum** (obsolete **ulo ha.ye**). The colloquial variant, as we have noted, is **hanthey**. In passive sentences the literary variants of **ey(key)** are **ulo**, **ulo malmiam.ˢ⁄ₐ**, **ulo in ha.ye**, and **ey uy ha.ye**.

The passive conversions are not to be confused with the construction **-key toy-** 'gradually get to be, get so that' as in the following sentences:

  Ai ka payq nol.i lul cōh.a hakey tōyss.ta 'The child came to enjoy boat rides'.

  Tōn i ēps.e to kongpu hakey tōyss.ta '(It came about that) even with no money I got to study'.

  Kim sensayng to māl hakey tōyss.ta 'Mr Kim happened (or, got) to talk, too'.

  Sāwel i toymyen nongpu tul un puncwu hakey toynta 'When it becomes April, farmers get busy'.

As an optional abbreviation of **hakey toynta**, the verb **toynta** will sometimes appear after an adjectival noun, as in **hōn.lan (hakey) toynta** 'gets disordered'. Notice that all uses of **toynta** 'becomes' fall together with all passives in the constraints associated with negative preemphasis (§11.7.2).

Koreans prefer a simple intransitive to a passive, whenever possible: **Ce uy atul i mācek eykey cwuk.ess.ta** (Roth 353) 'His son died at the hands of bandits' = 'His son was killed by bandits'.

The auxiliary structure **-e ci-** means 'gets to be, becomes' and is applied to adjectives and intransitive verbs. But it can also be used with certain transitive stems to make a kind of periphrastic passive: **ccic.e cinta** 'it tears = it gets torn', **allye cinta** 'it gets known', ...[1]Yi Kitong 1988 says that the derived stems express spontaneous acts (not wished or controlled) but the periphrastic conversions are made on controlled, voluntary acts. Thus an agent is implied for the latter, but not the former:

  Mun i yellyess.ta 'The door opened (came open)'.

  Mun i yel.e cyess.ta 'The door got opened [by someone]'.

Yet it is difficult to include specification of the agent without choosing the simpler active sentence: **?*Mun i / un ku namca eykey yel.e cyess.ta** 'The door got opened by the man' → **Mun ul / un ku namca ka yel.ess.ta** (= 'The door, the man opened it'). SEE **-e cita** in Part II.

11.7. Negative conversions.

Korean sentences are negated in more than one way. Short predicates can be denied by preposing a negative adverb. Longer predicates use the periphrastic (or "sentential") negativization, by attaching the suspective ending **-ci** to the stem and following that with a negative auxiliary. That option is available for the short predicates, too. There are a number of special features in negative sentences, and some of them are covered in the following sections. (See also §10.8.2).

11.7.1. Negatives and strong negatives.

An affirmative sentence can be turned into a negative ("**ani**") or a strong negative ("**mōs**") in two ways: the short (or simple) negative and the long (or complex) negative.

Short Negative

	a n i				**m ō s**	
1. Ponta.	→	An(i) ponta.		Ponta.	→	Mōs ponta.
2. Cōh.ta.	→	An(i) cōh.ta.		—		
3. Cip ita.	→	Cip i ani 'ta.				

Long Negative

	a n i				**m ō s**	
1. Ponta.	→	Poci ani hanta. anh.nunta.		Ponta.	→	Poci mōs hanta.
2. Cōh.ta.	→	Cōh.ci ani hata. anh.ta.		Cōh.ta.	→	Cōh.ci mōs hata.
3. —				—		

The translation of the **ani** negative is '(does / is) not', of the **mōs** 'definitely not; not possibly, cannot, (absolutely) will not'. In the sense of mere possibility the word 'can' usually translates as **-ulq swu iss.ta** and 'cannot' is **-ulq swu ēps.ta**. In the sense of knowhow (ability) the Korean is **-ulq cwul ānta** (ā-l-). When 'can' is used to mean permission 'may, be permitted to', the appropriate Korean is **-e to cōh.ta** (or **kwaynchanh.ta**); permission is denied with **-umyen an toynta**.

For adjectival sentences, the **ani** negative has both the short form and the long form, but only the long occurs for the **mōs** negative. And there are some adjectives which never take the strong negative, notably those describing weather. There is no ***Chwupci mōs hata** from **chwūw-**, and **Tēpci mōs hata** from **tēw-** 'be warm' can have as its subject only **mul** 'water' or the like, but never **nal(-ssi)** 'the weather'. (For water, or anything you can touch, 'cold' is **cha-**.) The intransitive verb **mō-cala-** 'becomes deficient' will not take the **mōs** negative, perhaps because a shortened form of **mōs** is incorporated in the stem itself; there is no ***mōs mō-calanta** or ***mō-calaci mōs hanta**.

As remarked in §5.2.9, we might wish to consider **ani** in **ani 'ta** 'it is not' as a precopular noun. Korean grammarians usually treat **anita** as an unanalyzed stem, the "negative copula" as against the affirmative copula **ita**, and that is certainly a convenient way to look at it. The one critical context that could help point toward a preference for one treatment or the other on morphophonemic grounds is indecisive: the past is either /**anietta**/ = **ani 'ess.ta** or /**anyetta**/ = **an' yess.ta**. So we have no clearcut reason to choose to write **anita, aninya**, ... (following the usual Hankul spelling − "when in doubt do not analyze") rather than **ani 'ta, ani 'n ya**, ... , as we have done in this book. Notice that the grammar of **ani 'ta** and **ita** is different, in that the negative marks the predicate complement (the B of "is B"), as well as the subject, with the nominative particle; but in the affirmative, with **ani** absent, the copula is attached to the complement with no marking particle: **A ka B ka ani 'ta** 'A is not B' ← **A ka B (i)ta** 'A is B'. But sometimes the nominative particle **i / ka** is omitted after the complement in a negative copula sentence, too, and that was true of the language in the early Hankul texts, as well; see the entry for the particle **i** in Part II. The particle is sometimes omitted also after the complement of **toynta** 'becomes'. And **i / ka** is obligatorily suppressed when a focus particle or delimiter (such as **un / nun, to**) is attached; it is usually omitted, too, when the complement is delimited by **man** or **ppun** 'only'. The expression **A ka ani 'la B 'ta** 'It's not A, it's B' has roughly the same meaning as **B 'ci A ka ani 'ta** 'It's B, not A'. To say 'it is neither A nor (is it) B' you highlight the complements and conjoin the sentences with **-ko**, as in **Ku kes un kaykwuli to ani 'ko, olchangi to ani 'ta** 'That is neither a frog nor a tadpole'. With the affirmative, since nothing can intervene between the complement and the copula, you highlight the copula itself (in its summative form **i-ki to ha-** 'it is indeed / also'): **Ku i nun uysa (i)ki to hako um.ak-ka (i)ki to hata** 'He is both a physician and a musician' = **Ku nun uysa 'mye (tto) um.ak-ka 'ta** 'He is a physician and (also) a musician'. Or, the sentence can be rephrased as 'not only ··· but also ···': **Ku i nun uysa (i)ki man (or (i)l ppun man) ani 'la um.ak-ka (i)ki to hata** 'He is not only a physician but also a musician'.

Both the short negatives and the long negatives are found in the earliest Hankul texts. In colloquial passages, such as those of 1447 Sekpo, the shorter forms are somewhat more frequent than the longer ones. The long negative is a sentential negation, and implies a greater scope than the short negative, which basically negates just the verb phrase. But you will sometimes find a short negative doing the work of the longer form (i.e. negating the whole sentence) when the stem itself is short; conversely, the long form will sometimes be preferred for longer stems (especially of adjectives) even when the scope does not extend beyond the verbal phrase itself. The short negative is quite direct; in certain situations, the long negative may be perceived as less brusque and therefore more polite.

11.7.2. Negative preemphasis.

In order to emphasize the verb being negated it is possible to take the long negative and insert a particle after the suspective **-ci**. For processive verbs the particle is normally **ul / lul**:

anc.ci anh.nunta 'does not sit' → **anc.ci lul anh.nunta** 'does not SIT'

ku kes ul poci anh.nunta 'does not LOOK at that' → **ku kes ul poci lul anh.nunta** 'does not LOOK at that' (smoother with **ku kes ul** → **ku kes un**)

With adjectives either the particle **ul / lul** or the particle **i / ka** can be inserted in the longer negatives to emphasize the adjective being negated: **Tolie kyelkwa ka cōh.ci ka** (or **lul**) **mōs hayss.ta** 'On the contrary, the results were no good at all'; **coqken ey mac.ci ka** (or **lul**) **anh.ko** 'without meeting the qualifications at all, lacking the least qualification'.

Certain classes of verbs can undergo negative preemphasis with **i / ka** as well as with **ul / lul**:

(1) Passives, apparently all of them. But ka is awkward (ungrammatical?) when the passive can take an object (vpt) and that object is expressed, so that while tachici (< tah.chici) ka anh.nunta 'doesn't get INJURED' is acceptable, (*)tali lul tachici ka anh.nunta 'doesn't get INJURED ON THE LEG' is awkward at best, and one speaker suggests amending it to ⋯ tachye cici ka anh.nunta. Certain idiomatic cases seem to be exceptions. Some speakers accept Yakcem ul cap.hici ka anh.nunta 'does not have one's weak points SEIZED UPON', mok ul callici ka anh.nunta 'does not get one's throat CUT = doesn't get FIRED', and nach ul kka(y)kk.ici ka anh.nunta 'does not have one's face SCRAPED = doesn't LOSE FACE'. Yet (?)tōn ul mek.hici ka anh.nunta 'does not get one's money EATEN = doesn't get SWINDLED out of one's money' is found awkward, and speakers prefer to say tōn i mek.hici ka anh.nunta 'one's money does not get eaten (= taken by deceit)'. Perhaps we could make an argument for a different order of applying the conversions (and accordingly a different constituency analysis) in the two situations. The "idiomatic" examples could be taken as adding the object AFTER the passive conversion (cap.nunta → cap.hinta → yakcem ul cap.hinta), the others as adding the object BEFORE the conversion (mek.nunta → tōn ul mek.nunta → tōn ul mek.hinta). And at least one speaker rejects almost all the examples with derived passives.

(2) All cases of toy- 'become', including -key toy- 'get so that' and VN + (i/ka +) toy-, as well as N + ulo/lo (as well as i/ka) + toy-.

(3) All cases of almost all intransitive processive stems pronounced ci-, including kkoch i cinta 'flowers fade', ttay ka cinta 'dirt comes off', cangma ka cinta 'the rainy season sets in', pel.e cinta 'it opens up', nul.e cinta 'it dangles', ssot.a cinta 'it pours down', ssule cinta 'it topples over', ttel.e cinta 'it falls (out); it separates', ppā cinta 'it falls', khye cinta 'it ignites; (light, ...) goes on', kkē cinta '(light, ...) goes out'. But for the transitive ci- (as in pic ul cinta 'owes a debt') the pre-emphasis with the particle ka is awkward (ungrammatical?); it is also difficult (impossible?) for the intransitive cinta 'is defeated, loses', sala cinta 'vanishes', and swūm (i) cinta 'breath expires = dies'.

(4) The intransitive verbs cwuk- 'die' (Cwukci ka/lul anh.nunta 'He just won't die!'), phi- 'bloom' in kkoch i phi- 'flowers bloom', tulli- in kāmki ey tullinta 'catches a cold'; and perhaps a few others.

(5) Periphrastic passives (§11.6) with VN (+ ul) + tang hanta are slightly awkward with ka as preemphasis, but apparently not ungrammatical. Those with pat-, on the other hand, are all rejected.

In interesting contrast with the behavior of adjectives and of the other verbs, most of the processive verbs that allow either ka or lul for preemphasis cannot have the mōs hanta form, even without pre-emphasis. There is no *mek.hici (lul/ka) mōs hanta 'can't/won't get eaten', *kakey toyci (lul/ka) mōs hanta 'can't/won't get to go', ... But we can do this: mōs kanta 'can't/won't go' → mōs kakey toynta 'gets so one can't/won't go' → mōs kakey toyci lul/ka anh.nunta 'doesn't get so one can't/won't GO'. And poici (lul/ka) mōs hanta occurs, but only as the causative 'can't show', not as the passive 'can't get seen'; the passive and causative stems derived from po- 'see' converge in shape. Exceptions:

(1) phinta: Pi ka an wā se kkoch i phici (ka/lul) mōs hanta 'The flowers are unable to bloom because of the lack of rain'.

(2) ttel.e cinta 'be separated' (but not 'fall'): Ttel.e cici (ka/lul) mōs hanta 'It can't be SEPARATED'.

(3) kunul (i) cinta: Kunul (i) cici lul mōs hanta 'It won't get SHADY' − but preemphasis with ka is somewhat awkward.

(4) swūm (i) cinta: Ku ¹nōin un cāngnam ul mōs pwass.ta ko tomuci swūm i cici lul mōs hako iss.ta 'The old man just won't die, saying he has not seen his eldest son'.

(5) cwuk.nunta: Cwukci lul mōs hanta 'I can't DIE = I just won't die' (but not *cwukci ka mōs hanta).

(6) sala/sule cinta: I sēysang ey ēps.e to cōh.ulq pyēngsin in tey, yōngki ka ēps.e sala cici lul mōs hako iss.ta 'While an invalid the world might be as well without, I lack the courage to slip away'.

(7) ppā cinta: Ppā cici lul mōs hanta 'I can't get rid of it' − but Ppā cye na-oci lul mōs hanta is more common.

(8) **ippe cinta**: **te ippe cici (lul) mōs hanta** 'can't get any prettier' occurs, but *ippe cici ka mōs hanta does not.

(9) **kēnkang hay cinta**: **Com chelem kēnkang hay cici (ka / lul) mōs hanta** 'can't get the least bit healthier'.

We might expect that these verbs of "becoming" would lack the command and suggestion forms, but the only limitations seem to be semantic: **Com te ippe cye la** 'Get a little prettier!'; **Te ippe cici mal.e la** 'Don't get any prettier' (by way of **ippe cici mōs hanta** 'can't get any prettier'); **(Com te) kēnkang hay cye la** 'Get better!'; **Ppalli kkē cye la** 'Get lost!'; **Puth-tulliki cen ey kkē cica** 'Let's vanish (= escape) before they catch us!'

Notice that **iss.ta** (§11.7.3) in the meaning 'stays' has only the **lul** preemphasis: **iss.ci lul anh.nunta** 'doesn't STAY' (*iss.ci ka anh.nunta). In the meanings 'is (at)' and 'has (got)' both kinds of preemphasis are possible, but with 'has (got)' they are apparently limited to certain forms of the auxiliary, such as **anh.e**.

Though negative preemphasis might be expected with the double negative (§11.7.6), instead we usually find the focus subdued (i.e. deemphasized) with the particle **un / nun**, as in **ai tul i ēps.ci nun anh.e to** 'although he does NOT lack children = although he DOES have children'. (You will also find focus highlighting with **-ci to anh-** and **-ci to mōs ha-** 'not even / either', and restriction with **-ci man anh-** 'not just'. I lack an example of **-ci man mōs ha-** 'not just' but I see no reason not to expect it, too: Part II has **-ci pakk ey mōs ha-**.) We also find, however, **Kulenq īl i ēps.ci lul anh.e iss.ta** 'There ARE some such cases' (not accepted by all speakers), apparently an infinitive-adverbialization from (*)**ēps.ci lul anh.ta**. There seems to be no *Cōh.ci ka anh.ci anh.ta, except perhaps as a joke, but **Cōh.ci anh.ci ka anh.ta** sometimes occurs, in contexts appropriate to **Cōh.ci anh.ci anh.ta**.

The copula lacks a long negative (except in rhetorical questions), so there can be no preemphasis. But notice the normal marking of the complement noun with **i / ka** before **ani 'ta** in contrast with its obligatory absence before **ita**. The fact that the copula negative will allow particle sequences otherwise unobtainable (see §6.5) suggests the somewhat special function that the particle is playing here.

Negative preemphasis can be treated as a special case of AUXILIARY PREEMPHASIS, discussed in §10.8.7. Compare the extended adversative **-uni-kka**, the extension of which looks as if it might be **-q-** + the particle **ka**, but here similar to the ···**unikka** (< ···^{u}/o 'n i s 'ka 'question of the fact that ·· ') of the formal question ending **-sup.nikka**, so probably from the bound noun **ka** 'question', at least etymologically. (Perhaps the late-blooming nominative **ka** has the same origin as the bound noun.)

11.7.3. Suppletive negatives.

The negative of **ā-l-** 'know' is usually **molu-** 'not know'. We find **ānta** 'knows' → **molunta** 'does not know' rather than → **an ānta** or → **ālci anh.nunta**. But a rhetorical question can be built on the latter form: **Ku sālam ālci anh.nun ka** 'You surely don't know him?' to be contrasted with ··· **molunun ka?** 'Don't you know him?' and ··· **moluci anh.nun ka** 'Of course you are not unacquainted with him?' (see the discussion in §11.15). And **an ānta** is accepted in some contexts. Co Sek.yen offers these examples:

Kongpu man ālci mālko nōnun kes to com al.e la! — **Silh.e yo, na n' kulen ke n' an āllay yo [= āllye ko hay yo]** 'Don't confine your knowledge to work alone, get acquainted with a bit of fun! — No, I have no desire to acquaint myself with that sort of thing.'

Nay mom ey hāy lowuni-kka ilpule an āllye ko haci 'As it is harmful to my body (= health), I deliberately choose not to get acquainted with it!'

Ne ilen kes āni? — **An ānta (ko) halq swu nun ēps.ci** 'You know such things? — How could I not?!'

The strong negative is either **mōs ā-l-** (short) or **ālci mōs ha-** (long) as expected: **Ku kes ul ālci mōs hayss.ta** 'I didn't know that' — or **mōllass.ta**, but **mōs al.ess.ta** is rejected as awkward, if not ungrammatical. For more on the negative of 'know' see **moluta** in Part II.

The verb **iss-** 'exists' is especially tricky, for in some of its uses the expected negative form is replaced by **ēps-** 'be lacking'. Because of what happens in the negative and honorific conversions, it

seems wise to recognize at least three homonymous verbs: (1) 'stays'; (2) 'is located' = 'is at'; (3) 'is possessed' = 'has'. The following paradigms display the occurring forms. The notations at the left: A = **ani** negative, M = **mŏs** negative, C = longer negative with **-ci**, L = preemphasis with **lul**, K = preemphasis with **ka**; S = the honorific (**-usi-**/**-si-**) for the numbered verb.

	1. iss.ta 'stays'	2. iss.ta 'is (at)'	3. iss.ta 'has'
A	anq iss.nunta, anq iss.ta	anq iss.ta, ēps.ta	ēps.ta
A C	iss.ci anh.nunta, iss.ci anh.ta	iss.ci anh.ta	(iss.ci anh.ta)[1]
A C L	iss.ci lul anh.nunta	iss.ci lul anh.ta	iss.ci lul anh.ta[1]
A C K	–	iss.ci ka anh.ta	iss.ci ka anh.ta[1]
M	mŏs(q) iss.nunta	–	–
M C	iss.ci mŏs hanta	iss.ci mŏs hata	iss.ci mŏs hata
M C L	iss.ci lul mŏs hanta	iss.ci lul mŏs hata	iss.ci lul mŏs hata
M C K	–	iss.ci ka mŏs hata	iss.ci ka mŏs hata

↓ ....↓

	S 1., S 2. kyēysinta, kyēysita	S 3. iss.usita[2]
A	an kyēysinta, an kyēysita	ēps.usita[2]
A C	kyēysici anh.nunta, kyēysici anh.ta	(iss.usici anh.ta)[3]
A C L	kyēysici lul anh.nunta, kyēysici lul anh.ta	–
A C K	kyēysici ka anh.ta	
M	(mŏs kyēysinta)[4], mŏs(q) iss.usinta	–
		–
M C L	(kyēysici mŏs hanta)[4], iss.usici lul mŏs hanta, iss.ci lul mŏs hasinta	–

[1] Apparently this occurs only as the basis for interrogative conversions: **iss.ci (ka) anh.un ya**. The pronunciation is also /annunya/ as well as /anunya/, but that version is not be interpreted as **anh.nun ya**, for it is **anh.un ya** + a morpheme of emphasis that geminates the first nasal.

[2] The question forms are **iss.usin ya** and **ēps.usin ya**, as expected from descriptive (adjective) stems; contrast **iss.ta** → **iss.nun ya**, **ēps.nun ya**. There is also **iss.ci anh.usin ya** with the interrogative made on an honorific **iss.ci anh.usita** (does that occur?) that is made on the negative (*)**iss.ci anh.ta**, which apparently does not occur.

[3] Apparently this does not occur except as the basis for the interrogative conversion **iss.usici anh.un ya** and the infinitive-adverbialization **iss.usici anh.e**.

[4] Less common than the following forms. There is also **kyēysici mŏs hasinta**, honorific made on negative from honorific, so that the honorification is pleonastically repeated. **Iss.usici mŏs hanta** is a negative made on the honorific and **iss.ci mŏs hasinta** is an honorific made on the negative.

The auxiliary **iss-** in **-ko iss.ta** and **-e iss.ta** is much like the first **iss.ta** ('stays') except that there are no **an**/**mŏs** ... **iss.nunta** forms. Using the examples **ipko iss-** 'is wearing' and **anc.e iss-** 'is seated':

anq ipko iss.ta	an anc.e iss.ta
ipko iss.ci (lul) anh.nunta	anc.e iss.ci (lul) anh.nunta
mŏsq ipko iss.ta	mŏs anc.e iss.ta
ipko iss.ci (lul) mŏs hanta	anc.e iss.ci (lul) mŏs hanta

The particle **tul** 'severally' can always be inserted after **-ko** and **-e**, regardless of the other conversions.

The form -ko iss.usi(n)ta occurs but -ko kyĕysinta (or kyĕysita) is to be preferred. The honorific can, of course, be applied twice (-usiko kyĕysinta), and when the negative is included even three applications are possible (-usiko iss.usici mŏs hasinta), but simpler forms are usually preferred: -ko iss.usici mŏs hanta or -ko iss.ci mŏs hasinta.

Some of the forms are hard to elicit in isolation. They are more readily produced when put into quotations, questions (especially if ironic or rhetorical), and the like: mŏs(q) iss.nunta 'y; iss.ci anh.nunta 'myen; ... .

Both mŏs(q) iss.nunta and iss.ci mŏs hanta sometimes occur, but there seems to be no *mŏs iss.ta, *iss.ci mŏs hata, *mŏs ĕps.ta, or *ĕps.ci mŏs hata. (We are excluding here the literary style, often used in diaries, which regularly replaces the processive forms by unmarked forms without the processive morpheme, so that mŏs(q) iss.nunta → mŏs iss.ta, iss.ci mŏs hanta → iss.ci mŏs hata.) That raises the question whether mŏs taniko iss.ta is to be regarded as mŏs taniko + iss.ta (taninta → mŏs taninta → mŏs taniko → mŏs taniko iss.ta) rather than mŏs + taniko iss.ta (taninta → taniko iss.ta → mŏs taniko iss.ta).

Examples to illustrate some of the forms listed:

1 A **Yo say cip ey anq iss.ta / iss.nunta** 'He doesn't stay home lately'.

2 A **Cikum cip ey anq iss.ta** 'He is not at home now'.

2 S A **Cikum cip ey an kyĕysinta / kyĕysita** (but not **iss.usita**) 'He is not at home now'.

2 A C **Ku nal cip ey iss.ci anh.ess.ta = (A) ··· cip ey ĕps.ess.ta** 'He wasn't home that day'.
   Ce alay ey se poni-kka, ney ka iss.ci anh.e! 'I looked from down there and who was it but you!'

2 A C (L/K) **Āmuli chac.e pwā to pang an ey iss.ci (lul / ka) anh.ta** 'Search as you will, it just isn't in the room'.
   Cip ey chayk i mānh.i iss.ci (lul / ka) anh.nun ya 'Aren't there lots of books in the house?'

3 A C (L/K) **Tŏn i iss.ci (lul / ka) anh.na, cip iss.ci (lul / ka) anh.na − musun kekceng i iss.keyss.e** 'Haven't you got money, haven't you got a house − what's your worry?' NOTE: Choice of **lul, ka,** or neither must be the same in both phrases.

1 M **Ku nal cip ey mŏs(q) iss.ess.ta** 'He couldn't stay home that day'.

1 M C **Ne kuleta ka n' hŏysa ey iss.ci mŏs hanta = (1 M) Ne kuleta ka n' hŏysa ey mŏs(q) iss.nunta** 'You keep on like that and you won't be able to stay on at the office'.

1 S M C **Ku pun kuleta ka n' hŏysa ey mŏs(q) iss.usinta (mŏs kyĕysinta, iss.ci mŏs hasinta) ko hay la** 'Tell him if he keeps on like that he won't be able to stay on at the office'.

1aux M **Kuleta ka n' yeki mŏs puth.e (tul) iss.nunta** 'You (guys) keep on like that and you won't be able to hold on here (you'll get fired)'.

1aux M C **Kuleta ka n' yeki mŏs puth.e (tul) iss.ci (lul) mŏs hanta** 'You (guys) keep on like that and you won't be able to "stick" here (you'll get fired)'.

3 M C (L/K) **Tŏn i mānh.i iss.ci (lul / ka) mŏs hata** 'He can't have much money (despite appearances or hopes)' − CF **Tŏn i mānh.i ĕps.ta** 'He hasn't got much money'.
   Silhem kikyey nun wuli hak.kyo ey to ĕps.ci n' anh.ta (/? anh.nunta) haci man ... 'They say it isn't that our school completely lacks laboratory equipment, but ... '.

11.7.4. Negative commands and propositions.

The negatives of commands and propositions are made with the auxiliary **mā-l-** 'desist; end':

> **Ponta.** → (**Poci mŏs hanta.** →) **Poci mal.e la!** 'Don't look!'
> **Ponta.** → (**Poci mŏs hanta.** →) **Poci mālca!** 'Let's not look!'
> **Iss.ta.** → (**Mŏs(q) iss.nunta.** →) **Iss.ci mal.e la!** 'Don't stay!'
> **Iss.ta.** → (**Mŏs(q) iss.nunta.** →) **Iss.ci mālca!** 'Let's not stay!'

There seems to be no negative from the pseudo-command form of the adjectival sentence used as an exclamation: **Cōh.a la!** 'How nice!' But above we have suggested that the order of application of the conversions is statement → strong negative → command (rather than, say, statement → command → negative), so that we would not expect such a form.

Negative preemphasis (§11.7.2) can occur with commands and propositions:

>   **Ponta.** → **Poci mōs hanta.** → **Poci lul mōs hanta.** → **Poci lul mal.e la!**
>   **Ponta.** → **Poci mōs hanta.** → **Poci lul mōs hanta.** → **Poci lul mālca!**

To say 'Don't V_1; do V_2 (instead)' or '(Please) V_2 instead of V_1' Korean has the expression V_1-**ulq kes ēps.i** V_2-**sey yo** (or V_2-**e la** etc.). Examples will be found in Pak Sengwen 297.

From the above remarks you would conclude that the imperative forms -**ci mōs hay la** and -**ci mōs hala** are ungrammatical, but they can appear when the speaker is putting a hex, as it were, on the listener: "May you be unable to do it! (= I pray that you not succeed!)". **Ikici mālla** means 'Don't win!' (pleading or commanding) but **Ikici mōs hay la** means 'I want you to be unable to win = I pray for your defeat'. That accounts for the otherwise perplexing sentence ([1]Yi Kitong 1988:61) **Nwu ka mōs kala ko hayss.na?** 'Did anyone tell you not to go?' meaning "Do you think I don't want you to go?!" or "Has anyone kept you from going?!" (= **Nwu ka mōs kakey hayss.na?**).

11.7.5. Negatives with verbal nouns.

Constructions of verbal noun + postnominal verb behave like ordinary simple verbs, except in the following cases. When the short version of the strong negative is applied, the **mōs** usually occurs BETWEEN the verbal noun and the postnominal verb in the case of most two-syllable verbal nouns and the one-syllable verbal noun **īl** 'work'. But in further conversions, the **mōs** may come before the verbal noun: despite the lack of *****mōs sayngkak hanta** as such, we hear **Kulen kes to mōs sayngkak hamyen, etteh.key!** 'You should think of things like that, at least'. For the one-syllable verbal nouns other than **īl** (including free and separable ones) the **mōs** MUST precede the verbal noun. Examples:

Group 1	**īl mōs hanta** (*****mōs īl hanta**) 'can't work'
	sayngkak mōs hanta (*****mōs sayngkak hanta**) 'can't think'
	salang mōs hanta (*****mōs salang hanta**) 'can't love'
	taycwung mōs hanta (*****mōs taycwung hanta**) 'can't estimate'
Also note:	**yenghwa kwūkyeng ul mōs hanta** =
	ul haci mōs hanta =
	haci mōs hanta =
	yenghwa lul kwūkyeng mōs hanta =
	haci mōs hanta 'can't see the movie'
Group 2	**mōs cēn hanta** (*****cēn mōs hanta**) 'can't transmit'
	mōs cheng hanta (*****cheng mōs hanta**) 'can't invite'
	mōs kūm hanta (*****kūm mōs hanta**) 'can't prohibit'
	mōs wēn hanta [rare] (*****wēn mōs hanta**) 'can't request'

The simple form is difficult to elicit in some cases, such as **mac.i mōs hanta** 'can't welcome' from **mac.i hanta**, but it turns up in the adverbialization **mac.i mōs hay se** 'unwillingly'.

According to my observations, **an(i)** does not appear before a free verbal noun (*****an(i) VN hanta** → **VN an(i) hanta** = **VN haci anh.nunta**) and the short negative does not appear at all with adjectival nouns: *****an(i) AN hata**, *****AN an(i) hata**. The Hamkyeng dialect is said to allow the local reflex of **ani**, pronounced [aĩi], to precede verbal nouns and to invade the V-e V structures more freely than Seoul.

Verbal-noun sentences often optionally drop the word **haci** before a negative auxiliary: **Kuleh.key māl (haci) anh.keyss.ta** 'I won't speak that way', [n]**Yĕm.lye (haci) māsey yo** 'Don't worry'. Compare the dropping of **ham**, **hako**, and **hakey** in the documentary style (p. 277, p. 300; Part II).

11.7.6. Double negatives.

The double negative (negative → negative) can have the meaning of a strong positive ('of course') or a reaffirmation ('to be sure'), but in Korean it is used primarily to make a positive statement less

direct, not unlike the expression "not unlike" = "rather like" in English. As far as truth value goes, ēps.ci anh.ta 'does not lack' = iss.ta 'has (got)', just as iss.ci anh.ta 'has not (got)' = ēps.ta 'lacks'. The sentence ēps.ci anh.ta apparently occurs only in further conversions such as ēps.ci anh.e iss.ta 'has (got) it without a doubt'. A stronger form can be made: ēps.ulq swu ēps.ta 'lacks the possibility of not having it' = iss.ta 'has (got) it' — CF iss.ulq swu ēps.ta 'lacks the possibility of having it' = ēps.ta 'lacks it'.

Double negatives are more common, perhaps, for adjectives. **Cōh.ci anh.ci anh.ta** or **An cōh.ci anh.ta** means 'It isn't that it isn't good; you can't say it isn't good'. Stronger: **Cōh.ci mōs haci anh.ta** or **Cōh.ci anh.ci mōs hata**. Still stronger: **Cōh.ci mōs haci mōs hata**.

The double negatives permitted by verbs are more limited, and usually have the focus of the suspective -ci subdued by the particle un/nun: **Acwu mekci anh.ci nun anh.nunta** 'It isn't that I don't eat at all (it's just that I eat so little)'; **Acwu mekci mōs haci n(un) anh.nunta** 'It isn't that I completely CAN'T eat (but I can only eat a little)'. The forms (?*)V-ci nun mōs haci mōs hanta and (?*)V-ci nun anh.ci mōs hanta seem not to occur, but there are examples of V-ci anh.ci mōs hanun such as **kaci anh.ci mōs hanun ipcang ey iss.ta** 'is in a position where one cannot afford not to go (= is obliged to go)'. For double negatives with 'know' see the entry **moluta** in Part II.

Negative preemphasis (§11.7.2) is rare with the double negative and it is only made with the particle ul/lul, never with i/ka.

A kind of periphrastic double negative is made with ⋯ key ani 'ta 'it is not the case that ⋯ ', in which key < kes i. An example: **Kup haci anh.un key ani 'ci man son i mō-cala se eccelq swu ēps.ta** 'Of course it is an urgent matter, but there's nothing we can do, being short of hands'. This is the only way a copular sentence can be rendered doubly negative: **Khunq īl i ani 'n key ani 'ci man eccelq tōli ka ēps.ta** 'Of course it is a serious matter, but there is nothing we can do about it'.

An amusing incident is told of old Dr Underwood and a Korean merchant who advertised **Ēps.nun kes ēps.ta** 'There is nothing we have not got' (= **Ēps.nun kes i ēps.ta**). When called to account for an item not carried, the merchant explained **Ēps.nun kes un ēps.ta** 'What we haven't got, we haven't got'. More examples of double negatives:

> **Kulenq īl i ēps.ci nun anh.ta** 'Such things DO (sometimes) happen'.

> **Haci anh.umyen an toykeyss.ta** 'It won't do if you don't do it' = **Hay ya toykeyss.ta** 'You'll have to do it'.

> **Kuleh.ci anh.umyen an toynta** 'It's no good unless it is that way' = **Kulay ya toynta** 'Only if it is that way is it all right = it has to be that way'.

11.7.7. Other negative expressions.

In addition to the particles ul/lul and i/ka, there are other elements which can intervene between the suspective -ci and the negative element. Aside from -ci nun anh-, -ci nun mōs ha-, and -ci to anh-, the only ones that have come to my attention are those listed in CM 1:284:

-ci man mōs hanta: **Mannale kaci man mōs haci, phyēnci 'na cēnhwa nun halq swu iss.ta** 'You can't just go see him (e.g. in jail, hospital, ...), but you can write him a letter or telephone him' — CF ⋯ **kaci mōs haci man, ⋯** .

-ci to mōs hanta: **Ilum ul ssuci to mōs hanta** 'He can't even write his name' — CF **Ilum to ssuci (lul) mōs hanta**; **Musewe se chac.e kaci to mōs hanun tey yo** 'He's so scared he dares not visit him!'

-ci ya mōs hal ya: **Tāy-hak.kyo lul na-wass.nun tey Yenge ccum ul haci ya mōs hal ya??** 'He is a college graduate — of course he can talk English!'

-ci 'na mālci: **Mili khun soli lul haci 'na mālci; (i key musun changphi ya)** 'He shouldn't have boasted beforehand; (what a shameful thing)!'

11.7.8. Negative sentences with positive force.

In negative questions used rhetorically the intended force is positive: **Kaci anh.e?!** 'Isn't he going?' or 'He's going, isn't he?' = 'Surely he is going'. Such sentences allow the suspective form of

the past and the future and even the copula: **Kass.ci anh.e?!** 'Surely he went', **Kakeyss.ci anh.e?!** 'Surely he will go', **Haksayng ici (iess.ci) anh.e?!** 'Surely he is (was) a student'. As statements (or nonrhetorical negative questions), these sentences must be **Kaci anh.ess.e, Kaci anh.keyss.e,** and **Haksayng i an' ye(ss.e).** (With the proper question intonation, those sentences can function rhetorically, too.) The **-ci anh-** structure is commonly shortened to **-c' anh-.** The rhetorical use of negative questions extends to expressions of doubt, fear, or anxiety: **Kass.ci anh.ulq ka kekceng sulepta** 'I am afraid / worried that he may have gone'. For more on this, see Kim Tongsik 1981.

11.8. Nominalizations.

Nominalization is the process of taking a sentence and turning it into a nominal phrase that can be used in some larger sentence as a single noun might be used:

Ponta 'He looks at it' → **Poki (ka cōh.ta)** 'Looking (is nice = is nice-looking)'.

Paywunta 'He learns it' → **Paywuki (ka elyepta)** 'To learn it (is hard)'.

Onta 'He is coming' → **Oki (lul palanta)** '(We hope) that he is coming'.

Chamka hanta 'He participates' → **Chamka haki (lul kēcel hanta)** '(He refuses) to participate'.

As these examples show, one common nominalization uses the SUMMATIVE form (stem + **-ki**): ponta → poki; cōh.ta → cōh.ki; cip ita → cip iki. Another common nominalization uses an ADNOMINALIZATION (§11.9) + **kes** 'thing, one, fact, act, ... ': **Cwunta** 'He gives it' → **Cwunun kes ul** (= **cwuki lul**) **cwuce hanta** 'He hesitates to give it'. (Earlier Korean used the substantive form -um for that kind of nominalization. See below.)

The nominalized sentence can be treated much like any noun. It can be followed by a particle, by another nominal which it modifies (**na-kaki cen** 'before going out', **ēps.ki ttaymun** 'because there were none'), by various particles, and occasionally by the copula: **ileh.key haki 'ta** 'Let's decide to do it this way'. Nominalizations with **kes** are especially flexible in use, and they occur freely predicated by the copula, sometimes with special meanings: **Yeki se n' tāmpay lul an phinun kes ita** 'It's a matter of not smoking here = It's No Smoking here'. For further examples, see **kes** and **-ki** in Part II.

The nominalized sentence may already contain adjuncts of its own (subjects, objects, etc.), so that when it is turned into a nominal that is used itself as an adjunct of the matrix sentence into which it is embedded you will sometimes find a sequence of phrases each marked with the same particle. In such cases the particle after the nominalization often drops: **Chayk ul ilk.ki (lul) cōh.a hanun ya?** 'Do you enjoy reading books?'; **Phyēnci lul ssuki (lul) sīcak hanta** 'He starts to write the letter'.

A less common nominalization is made with the SUBSTANTIVE form (stem + **-um / -m**). Aside from the sentence-final use in the DOCUMENTARY style (§11.3), and certain somewhat literary idioms (see **-um ey** and **-um ulo** in Part II), most cases of **-um** are single verbs or adjectives turned into nouns. But sometimes a larger source sentence is involved:

Māl i ani 'ta 'It is not language' → **Sayngkak i kot māl i ani 'm kwa kath.i ...** 'Just as thought is not language, ... '.

Yelq pen tut.nunta 'We hear it ten times', **Han pen ponta** 'We see it one time' → **Yelq pen tul.um i han pen pom man kath.ci mōs hata** 'Seeing once is better than hearing ten times'.

Ne uy sinpun i haksayng ita 'Your status is (that of) a student' → **Ne uy sinpun i haksayng im ul ic.ci mal.e la** 'Don't forget that you are (in the status of) a student'.

Kim Yengcwu 1985 explores the choice of -um vs. -ki and finds three semantic factors at work:

(1) influence − affecting the realization of the complement proposition;

(2) modified factivity − the truth value is presupposed for the complement proposition; or, if that precedes the time of the matrix act, the truth value is implied by the speaker;

(3) forward implication − the truth value is implied by the speaker for a complement proposition that follows the time of the matrix act.

Verbs of perception and discovery are found to occur with -um but not -ki; verbs of beginning, continuing, or stopping occur with -ki but not -um; verbs of helping occur with either, but with differing connotations. Kim Yengcwu (177) also notes that when the nominalizations with **kes** and with -ki are contrasted, **kes** tends to refer to concrete events and -ki to more abstract events.

Middle Korean made extensive use of the substantive, and the nominalizations it produced correspond in some cases to the modern structure of adnominalization + kes and in other cases to the modern use of the summative -ki. Other cases of -ki are equivalent to uses of - ˈti, the immediate ancestor of the suspective -ci, and there are a few examples of - ˈki, as well (see Part II).

Nominalizations can be made on the past (-ess.ki, -ess.um) and the future (-keyss.ki, -keyss.um), but these are used less freely than the constructions built on the postmodifier kes 'fact' following the various adnominalizations of tense-aspect conversions: hayss.ta → han kes, hatula → hatun kes, ...

To qualify as a sentential "nominalization" the construction must involve (or be able to involve) more than just a verb form shorn of adjuncts, for we treat cases of that sort as lexical derivations, nouns derived from the -ki summative form or made by the derived-noun suffix -i or the like. In the case of -um and -ki the nominalizations apparently do not enter into construction with the particle uy, as the lexically derived nouns would do; instead, they proceed directly to the adnominal function by simple juxtaposition. CF CM 1:384.

Among the special uses of nominalized conversions, attention should be directed to -ki to (ha-) and -ki nun (ha-) as a technique for highlighting or subduing the focus on the sentential nucleus, the verb or adjective itself, much as the particles to and un/nun are used to mark the focus on a noun or noun phrase (§10.5, §11.1). Special types of nominalization worthy of attention are adnominalizations + postmodifiers, especially those (ci, ka, tey, ya) which call for the complex -nun modifiers; some of these are used as full sentences, e.g. in the question conversions of §11.5.

There is a peculiar construction that we will call a POSTAPPOSITIONAL nominalization. It consists of a sentence adnominalized to a generalizing epitheme, typically kes 'thing/one' or Middle Korean ˈi 'one that ... ', which semantically echoes the subject or object in the adnominalized sentence. An example: ... yeki cěki so ka han mali twū mali iss.nun kes i po.yess.ta 'one or two cows were visible here and there' (Wagner 39). MK examples: ˈsalom pwoˈn i ˈmata (1447 Sek 24:13b) 'everyone he saw', ne y nay oy ... ˈTTWO-ˈTHWALQ honwo.n i lol pwono.n i ([1447→]1562 Sek 11:7-8, cited in He Wung 1975:356) 'you have seen me achieve salvation and deliverance'; ˈkil[h] maka ˈsˈnon [= maˈka ˈsˈnon] hon ˈpheˈki s ˈsaˈm i ˈpi ˈwonaˈtun kwos ˈphwuyˈGwo polom ˈkolˈkyeˈtun yeˈlum moys.non keˈs ˈye (ˀ1517- Pak 1:40a; moys.non ← moyc-non) 'a hemp plant blocking the road blossoms when it rains and bears fruit when the wind blows'. Similar examples in Japanese are discussed in Martin 1975:860-2 and in Kuroda 1974-7.

11.9. Adnominalizations; epithemes.

Any Korean sentence can be made adnominal to modify a nominal in some larger sentence (the matrix into which it is embedded) by replacing the final inflected form with the appropriate MODIFIER. See §9.3 for the forms. The patterns can be summarized for our nuclear sentences as follows:

(1) **Ponta.** → **Ponun** ··· ' ··· that one sees' or ' ··· that/who sees it' or ' ··· that one sees it'.
   Cŏh.ta. → **Cŏh.un** ··· ' ·· that is good' or ' ·· that it is good'
   Cip ita. → **Cip in** ··· ' ·· that is a house' or ' ·· that it is a house'

(2) **Ponta.** → **Pwass.ta.** → **Pon** ··· ' ··· that one saw' or 'that/who saw it' or 'that one saw it'
   → **Pwass.nun (ci, ka, tey, ya)** ···
   Cŏh.ta. → **Cŏh.ass.ta.** → − (Use **Cŏh.un** ··· ↑; or **Cŏh.tun** ··· ↓)
   → **Cŏh.ass.nun (ci, ka, tey, ya)** ···
   Cip ita. → **Cip iess.ta.** → − (Use **Cip in** ··· ↑; or **Cip itun** ··· ↓)
   → **Cip iess.nun (ci, ka, tey, ya)** ···

Co Sek.yen has suggested that we regard the simple modifier -un, when it is used to express the past for the verb, as an obligatory reduction of -ess.nun, so that: pwass.ta → *pwass.nun (sālam) → pon (sālam). Before ci, ka, tey, and ya it is obligatory NOT to reduce the form.

(3) **Ponta.** → **Potula.** → **Potun** ··· ' ·· that one saw(, it has been observed)' or ' ··· that/who was seeing it(, it has been observed)' or ' ·· that one saw(, it has been observed)'.
   Cŏh.ta. → **Cŏh.tula** → **Cŏh.tun** ··· ' ·· that was good(, it has been observed)' or ' ··· that it was

good(, it has been observed)'.

Cip ita. → Cip itula. → Cip itun ··· ' ·· that was a house(, it has been observed)' or ' ·· that it was a house(, it has been observed)'.

(4) Ponta. → Pwass.ta. → Pwass.tula. → Pwass.tun ··· ' ·· that one saw(, it has been observed)' or ' ·· that / who saw it(, it has been observed)' or ' ·· that one saw it(, it has been observed)'.

Cŏh.ta. → Cŏh.ass.ta → Cŏh.ass.tula. → Cŏh.ass.tun ··· ' ·· that was [or had been] good(, it has been observed)'.

Cip ita. → Cip iess.ta. → Cip iess.tula. → Cip iess.tun ··· ' ·· that was [or had been] a house(, it has been observed)' or ' ·· that it was [or had been] a house(, it has been observed)'.

(5) Ponta. → Pokeyss.ta. → Pol(q) ··· ' ·· that one will see' or ' ·· that / who will see it' or ' ·· that one will see it'.

                   → Pokeyss.nun (ci, ka, tey, ya) ···

                   → Pol.nun ci ···

    Cŏh.ta. → Cŏh.keyss.ta. → Cŏh.ul(q) ··· ' ·· that will be good' or ' ·· that it will be good'.

                   → Cŏh.keyss.nun (ci, ka, tey, ya) ···

                   → Cŏh.ul.nun ci ···

    Cip ita. → Cip ikeyss.ta. → Cip il(q) ··· ' ·· that will be a house' or ' ·· that it will be a house'.

                   → Cip ikeyss.nun (ci, ka, tey, ya) ···

                   → Cip il.nun ci ···

(6) Ponta. → Pwass.ta. → Pwass.keyss.ta. → Pwass.ul(q) ··· ' ·· that one probably saw' or ' ·· that / who probably saw it' or ' ·· that one probably saw it'.

                       → Pwass.keyss.nun (ci, ka, tey, ya) ···

                       → Pwass.ul.nun ci ···

    Cŏh.ta. → Cŏh.ass.ta → Cŏh.ass.keyss.ta → Cŏh.ass.ul(q) ··· ' ·· that probably was good' or ' ·· that it probably was good'.

                       → Cŏh.ass.keyss.nun (ci, ka, tey, ya) ···

                       → Cŏh.ass.ul.nun ci ···

    Cip ita. → Cip iess.ta → Cip iess.keyss.ta. → Cip iess.ul(q) ··· ' ·· that probably was a house' or ' ·· that it probably was a house'.

                       → Cip iess.keyss.nun (ci, ka, tey, ya) ···

                       → Cip iess.ul.nun ci ···

But the forms in -ess.ul(q) seem to be infrequent except when the prospective modifier is conventional with a particular noun (or postmodifier) such as ttay 'time (when ··)': elyess.ulq ttay 'when (one was) young' can be regarded as a conversion of (ku ttay) elyess.ta '(at that time) one was young' more easily than of (ku ttay) elyess.keyss.ta '(at that time) one probably was young'.

There are also past-future retrospective modifiers -ess.keyss.tun, presumably from something like Ponta. → Pwass.ta. → Pwass.keyss.ta. → Pwass.keyss.tula. → Pwass.keyss.tun ··· ' ·· that, according to observation, one probably saw' or ' ·· that / who, according to observation, probably saw it' or ' ·· that, according to observation, one probably saw it'. But, like the past-future retrospective, occurrences are rare, and I have been unable to find examples that native speakers feel happy with. (Choy Hyenpay lists examples, but they sound unnatural.)

The modern retrospective carries a restriction when it is predicative (rather than adnominal): the subject cannot be first person, because -tula is reporting the speaker's perceptual experience as evidence for his statement. This narrowing the retrospective to 'I observed that ·· ' was not present in Middle Korean, which used the retrospective to report recent past events in general; the requirement of perceptual observation by the speaker seems to have come in with the development of the past-tense marker -ess-. (That marker was made by contracting the infinitive-auxiliary conversion -e iss-, which also survived uncontracted as the modern perfect-resultative structure.) The MK sentence *na y ˇlwongtam ˙hota˙la* (1447 Sek 6:24b) 'I was joking' cannot be translated into modern *Nay ka

[1]nŏngtam hatula; instead, it must be rendered as Nay ka [1]nŏngtam hayss.ta (or hako iss.ess.ta). But the adnominalization carries no such restriction, so that you can say nay ka hatun [1]nŏngtam 'the joke I was making' for the (unattested) MK *na y `ho`tan "lwongtam*. On these interesting points, see Cang Sekcin 1973, Cang Kyenghuy 1985, Choy Tongcwu 1988, [1]Yi Hyosang 1991.

The quasi-processive verbs iss.ta and ēps.ta adnominalize in the same way as ponta, but their "past" adnominalizations iss.un and ēps.un are fairly rare. Where they are expected, we more often hear the "present" (iss.nun, ēps.nun) or the retrospective (iss.tun, ēps.tun).

Several characteristics of Korean adnominalizations should be pointed out. One is that the relationship between the adnominalized sentence and the nominal that it modifies is intrinsically ambiguous: ponun ayki can mean either 'the baby that is looking at it' (← Ayki ka ponta 'The baby looks at it') or 'the baby one is looking at' (← Ayki lul ponta 'One looks at the baby'). Expanding the adnominalized sentence sometimes clarifies the meaning: kŏng ponun ayki is certainly more likely to mean 'the baby that looks at the ball' than to mean 'the ball that looks at the baby'. But that is because the listener knows a lot about babies and balls. From what he knows about babies and dogs, kāy ponun ayki could mean either 'the baby that looks at the dog' or 'the baby that the dog looks at'. Adding grammatical specification to the adjuncts expressed in the expansion helps considerably: kāy ka ponun ayki could only mean 'the baby that the dog looks at', because direct object is the only role left available, and kāy lul ponun ayki could only mean 'the baby that looks at the dog' because it is the subject role that is now available and the object role is not. The relationship need not be subject or object: ku i ka kongpu hatun hak.kyo 'the school he has been studying at' is a conversion of Ku hak.kyo ey se ku i ka kongpu hatula 'He was studying at that school (as I recall)', and emeni ka tŏn ul cwun ai 'the child the mother gave the money to' is a conversion of Ku ai eykey emeni ka tŏn ul cwuess.ta 'Mother gave money to that child'. The noun that serves as the head of the structure (the target of the adnominalization) is an EPITHEME and epithemes are of several kinds:

(1) extruded from a constituent of the adnominalized sentence (and in the process losing any case particle that may have marked the source phrase)

(1a) from the subject (or other nominative-marked phrase): sinmun ul ponun namca 'the man (who is) looking at the newspaper' ← Ku namca ka sinmun ul ponta 'That man looks at the newspaper'; and, from the possessor in a possessive sentence: tŏn i ēps.nun haksayng 'a student (who is) without money' ← Ku haksayng i tŏn i ēps.ta 'That student lacks money'.

(1b) from the direct object (or other accusative-marked phrase): ku namca ka ponun sinmun 'the paper the man is looking at' ← Ku namca ka ku sinmun ul ponta 'That man looks at the newspaper'.

(1c) from the indirect object: nay ka sēnmul ul ponayl chinkwu 'the friend whom I'm sending a gift to' ← Nay ka ku chinkwu hanthey sēnmul ul ponaykeyss.ta 'I am going to send a gift to a friend'.

(1d) from an adverbialized phrase, or a phrase with oblique-case marking:

(TIME WHEN) Haksayng iess.tun yēys nal (ul sayngkak hanta) '(I think of) the old days when I was a student' ← (Nay ka) yēys nal ey haksayng iess.ta 'I was a student in the old days'.

(PLACE WHERE) wuli ka pap ul mek.un cip 'the house where we ate our meal' ← Wuli ka ku cip ey se pap ul mek.ess.ta 'We ate our meal in that house'.

(PLACE TO WHERE) um.ak-ka tul i kanun tapang 'a teashop that musicians go to' ← Um.ak-ka tul i ku tapang ey kanta 'Musicians go to that teashop'.

(INSTRUMENT WITH WHICH) nay ka yenphil man kkakk.nun khal 'the knife that I use only to sharpen pencils with' ← nay ka ku khal lo yenphil man kkakk.nunta 'I sharpen only pencils with that knife'.

(2) with a transitional epitheme

(2a) of time: Ku ka tte-nan ithut-nal (ey ku emeni ka cwuk.ess.ta) 'The day after he left (his mother died)'.

(2b) of place: mānh.un kawuntey se hana (lul kacinta) '(I take) one of many'.

(2c) of circumstance: Pi ka onun tey (com te kyēysita kasipsio) '(Stay a little longer); it's raining'.

(3) with a resultative epitheme: pi ka onun soli (lul tut.nunta) '(I hear) the sound of it raining'.

(4) with a summational epitheme − in various functions, including factual (or "extended") predication 'it's that ... ': **Il-nyen cen ey pon kes i ku lul macimak pon kes iess.ta** 'The last I saw of him was a year ago'.

In an identificational sentence, the Identified is the subject and the Identifier is the complement of the copula, unmarked in the affirmative but marked by the nominative particle in the negative: **Wuli ka Hānkwuk sālam ita** 'We are Koreans', **Wuli ka Ilponq sālam i ani 'ta** 'We are not Japanese'. The Identifier is not epithematized, but the Identified is freely extruded as an epitheme: **Hānkwuk sālam in wuli** 'we who are Koreans', **Ilponq sālam i ani 'n wuli** 'we who are not Japanese'. The epitheme can serve any role in a matrix sentence, including that of Identified. A sentence such as **Hānkwuk sālam in wuli 'ta** would seem to mean 'It is we who are Koreans', but it serves as a stylistic variant of the simple identificational sentence (**Wuli ka Hānkwuk sālam ita**) and it is to be translated as 'We are Koreans'. This phenomenon of EPITHEMATIC IDENTIFICATION, representing a stylistic inversion of the underlying subject (the Identified), can be found in Middle Korean texts:

KYWOW-KYWOW `ho.ya `pyel s kawon-toy s twu`lyewun `to.l isyas`ta (1482 Kum-sam 2:24b) 'brightly shining it is a round moon in the midst of clouds' = 'a round moon is shining in the midst of clouds'.

`alay `PALQ "CHOY-"NYE matco`Wa `PPEM-MA-LA `KWUYK LIM `CCYENG `SSO `lwo `kazo`Wwon `na `ylwo`n i (1459 Wel 8:92b) 'having met the eight comely maidens I went [with them] to Woods-Calm Temple in the land of the brahmans'.

cyens`kos "cywung i tu`le "nay`Gey hol `ss ol nil`Gwon `CCO-`CO `yla (1462 ¹Nung 1:29a) '[the word] `CCO-`CO (pravārana = end of restraint) means letting the monks express themselves as they will'.

e`nu `lol nil`Gwon `CYENG `PEP-"NGAN `kwo (1482 Kum-sam 2:69a) 'what does "the true Dharma Eye" mean?' [the copula modifier `in is ellipted before `kwo 'question'].
Similar epithematic identification is found in both modern and classical Japanese.

The particles in the adnominalized sentence (or what is left when a constituent is extruded as an epitheme) remain much the same as in the source sentence. In general, focus subdual of the subject or object of a modifying phrase is avoided, since the particle **un / nun** would usually set the word off as the subdued adjunct (subject, object, or whatnot) of the entire larger sentence, the matrix in which the adnominalized sentence is embedded. Compare **Ilk.e se nun an toynta** 'You mustn't read it' → **ilk.e se an toynun (chayk)** '(a book) that you mustn't read'. Instead of taking **i / ka**, the subject of an adnominalized sentence is sometimes marked by the particle **uy**. At first I thought this was due to the influence of Japanese, where the corresponding particle _no_ is sometimes used in place of _ga_ to mark the subject of an adnominalized sentence (see Martin 1975:659-64 for the details). But the Korean usage goes back to the earliest Hankul texts and is true not only for the particle **uy** (and its MK ancestors) but also for the now obsolete particle *s* of Middle Korean. The Middle Korean particles *`ᵘ⁄ₒy* and *s* can substitute for `i in adnominalized sentences, both when the epitheme (head noun) is extruded from one of the noun arguments and when it is a summational epitheme, including *t* and *s*:

`i `SYANG `on `YWOK-`QOY `uy "na`syan `t i a`ni `si`n i (1462 ¹Nung 1:42a) 'this aspect is not what desire is born from'.

ku `psk uy CYE-"CO y api `uy PPYEN-QAN `hi ancon `t ol "al`Gwo "ta a`p[i] oy key `ka a`p[i] oy key nil Gwo`toy (1463 Pep 2:138b) 'at that time the masters, finding that the father was seated comfortably, all went to the father and said to the father as follows − '.

`HHOYNG on `HHAK-ZIN `oy HHOYNG hol `s iGwo (1482 Kum-sam 2:20b) '[the word] `HHOYNG means that the scholar performs, and ... '.
I have not found an example of this phenomenon with `i as the epitheme, either as extruded ('the one that − ') or summational ('the fact that − '); it probably does not occur, though adnominal modification is possible, as in the passage *`SSYWOK `oy CAY-"KAY `yey `two mek`ti a`ni `khwo n' `homol`mye CIN-`SSILQ s tas.no`n i `sto`n ye* (1462 ¹Nung 8:4-5) 'when even in the fasts of commoners they refrain from eating them [the five forbidden roots], how much more so the true student (of the discipline)?' Nominalizations made with the substantive − `(ᵘ⁄ₒ)m*, corresponding to modern ---(u)n (-(u)lq, -nun,

-tun) kes 'the fact that ... ' permitted the option: *LWO-¨LWOW y kutuy s ¯wo˙m ol kitu˙li˙tela ho˙la* (1482 Nam 1:50b) 'he has been long waiting for you to come'; *¨twu ¨salo˙m oy ˙PWOK ˙TUK ¨etwu˙m i hon ka˙ci ˙˙n i ¨es˙tyey 'Ge˙n ywo* [< ˙hoke˙n ˙ywo] (1447 Sek 23:4a) 'how did it happen that two people's obtaining happiness and virtue was the same?'.

Middle Korean *kes* usually served as a generalized replacement for an extruded epitheme 'thing' or 'the one', as in *KWONG ˙oy nilku˙si˙nwon ke˙s un ¨es˙te ˙'n ¨ma˙l i-ngi s ˙kwo* (1465 Wen se:68a) 'what words are you reading, my Lord?', but like *t* or *s* it could also be used as a summational epitheme 'the fact that ... ':

KON ˙oy ¨nin ke˙s i a˙ni ˙'Gen ma˙lon (1462 ¹Nung 2:81b) 'it is not that a root arose, but ...˙.' ˙*mwo˙m ol ¨mwot mi˙tulq ke˙s i˙n i* (1447 Sek 6:11b) 'the body is not to be trusted'.

¨*syenghyen ti˙Gwuy ˙yey ¨mwot kal ˙ka pwun˙pyel a˙ni hol ke˙s i˙l i* (1518 Sohak-cho 8:13b) 'will not worry over whether one might be unable to go to the position of a sage'.

Examples in the role of extruded epitheme (replacing a more specific noun):

nonun ke˙s i˙m ye (1459 Wel 1:11a) 'things that fly and ... '.

poy˙hwo˙non ke˙s i mu˙su ¨i˙l in ˙kwo (1518 Sohak-cho 8:33b) 'what is it we learn?'.

SSIN-˙LUK [˙]uy ˙HWA ˙ho˙syan ke˙s un pas[k] ¨chyenlyang ˙ay ¨nam˙ti ¨mwot ho˙n i (1463 Pep 6:144a) 'what the supernatural power has brought into being is no more than external property'.

In contemporary Japanese the <u>no</u> option is largely stylistic, but earlier it appears to have involved focus and emphasis (the <u>ga</u> option being more emphatic), and that may be true of the Korean situation, too: marking the subject of the adnominalized sentence with **uy** rather than **i / ka** deemphasizes it much as the particle **un / nun** subdues the focus on the theme of the matrix sentence.

NOTE: Despite our translation, the ˙*uy* in ¨*ta QWUY-NGWANG ˙uy na˙mon KWONG a˙ni ˙ka* (1463 Pep se:13a) 'is it not all the achievement left by the mighty king?' is not marking the underlying subject, for the verb ¨*nam-* is normally intransitive, and the structure in question is probably to be treated as ... *na˙mon KWONG* 'the achievement that remained' with an epitheme extruded from the subject of [unattested] *QWUY-NGWANG ˙uy KWONG i na˙ma ˙'(y)s˙ta* 'the mighty king's achievement has remained' leaving the adnominal phrase behind, perhaps to avoid the construal 'the achievement of the king who remained' that would be suggested by *na˙mon QWUY-NGWANG ˙uy KWONG*.

We naturally expect an adnominalization to be followed by a noun or noun phrase as its head, but occasionally the structure will occur at the end of a sentence, usually with an implied nominal or an obviously ellipted noun, as in some of the question conversions (§11.5) and in certain set exclamations such as ¹**nāncang mac.ul** (or **chil**)! 'dammit!' where the implied nominal is probably **nom** 'rascal — to be beaten mercilessly!'. There are also constructions of modifier + postnoun and the like, perhaps to be treated as quasi-compounds (§10.3), since they usually involve verbs unaccompanied by adjuncts. An example: **nan cil** 'unchaste behavior (by women)' from the modifier of **na-** 'go out' (and not from *LAN* 'disorder').

The copula adnominalizations (... **in**, ... **ilq**, ...) are often replaced by adnominalizations based on quotations (§11.11) even when no actual quoting is intended. This is especially common in stating names of people or things: **Kim Poktong ila 'nun sālam** 'a man (they call) Kim Poktong', **wenca-than ila 'n kes** '(the thing called) the atom bomb'. Copula sentences can be adnominalized, in a sense, also by dropping the copula and letting the noun stand alone in adnominal position (or specifying the adnominal role with the particle **uy**). Compare the stylistic dropping of the copula mentioned in §11.1.

Adnominalization can be applied to quite complex sentences that are the result of prior conversions of various kinds, including other adnominalizations already embedded in the complex sentence to be adnominalized. When one confronts an unheralded epitheme in structures where English often uses a clarifying adnominalizer in the form of a relative pronoun or adverb, minimally "... that", problems of interpretation arise as one tries to decide both the scope and the role(s) of the epitheme, which may be extruded from more than one underlying role in a complex adnominalization. The grammar of Korean adnominalization is very similar to that of Japanese adnominalization, as described in Martin 1975.

11.10. Adverbializations.

An adverbialization turns a sentence into an adverbial phrase for a larger sentence by changing the final inflected form into some other form. Some of the adverbializations are often used to end a sentence that is not necessarily a truncation of a larger sentence, though that is probably the origin of such usages as sentence-final -e (yo), -ko (yo), -nun ke l' (yo), -nun tey (yo), -uni-kka (yo), ... Representative semantic types of adverbialization are listed below.

"and" forms

gerund -ko 'and also; and then' < ˙kwo

conjunctive -umye / -mye 'and also; and then' < - ˙ʷo˙m ye

sequential -uni / -ni (in some uses) 'and thereupon' < - ˙ʷo˙n i

infinitive -ᵉ⁄a (or -ᵉ⁄a + particle se) 'and then; and so' < - ˙ᵉ⁄a ˙sye

modifier -un / -n (etc.) + postmodifier **kes** + particle **i** 'and so (I infer)' (see Part II for examples)

"but" forms[1]

adversative -una / -na < - ˙ʷo˙na (and extended adversative -una-ma,
  tentative adversative -kena < - ˙ke˙na)

concessive -toy < accessive - ˙toy; -(u)toy (SEE p. 823)

literary concessive -kenul < - ˙ke˙nʷol

semi-literary concessive -ken man < - ˙ken ma˙non / ma˙lon

frustrated intentive -ulyenman / -lyenman

suspective -ci + particle **man**

infinitive -e + particle **to** 'even if ... ; though ... ' < - ˙e ˙two

conditional -umyen / -myen + particle **se** + particle **to**

modifier -un, -(ess-/keyss-)nun, -(ess-/keyss-)tun, -ulq / -lq + postmodifier **ke(s)** + particle **ul / l(ul)**[2]

modifier -un / -n, -(ess-/keyss-)nun, -(ess-/keyss-)tun + postmodifier **tey**
  + particle **to** 'even though (given the circumstance that) ... '

modifier -un / -n + postmodifier **tul** 'granted that ... , even though ... ' [literary] < - ˙ʷon ˙t ol

[1] Concessive conversions suggested by CM: hanta → hatula to, hayss.ta → hay to, hakeyss.ta → halq ci 'la to (or hal mangceng). Notice also halq ci enceng.

[2] Sometimes the particle i: Ilenq il i iss.ulq ka pwā se ilccik-i onta ko han kes i ... (nemu pappe se mōs wass.ta) 'I was afraid this kind of thing would happen, so I meant to come earlier, but ... (I was too busy to get here)'. See also -ta (ka) 'and/but then'. The -ulq ke l' forms are common in various extensions of meaning; see the entry in Part II.

"when / if" forms

sequential -uni / -ni < - ˙ʷo˙n i
  (and tentative sequential -keni < - ˙ke˙n i, prospective sequential -ulini < - ˙ʷo˙l i ˙'n i)

conditional -umyen / -myen < - ˙ʷo˙m ye n'

conditional -umyen / -myen + particle **se** 'while'

contingent -um / -m ey (-umay / -may) < - ˙(w)ʷo˙m ᵉ⁄ay

provisional -ketun < - ˙ke˙tun

tentative conditional -ketumyen

literary conditional -kentay

subjunctive assertive -ca 'as soon as', often + **māca** ← **mālca** 'no sooner ... than'

infinitive -e + particle **se** 'and then' < - ˙e ˙sye

infinitive -e + particle **ya** 'only if' < - ˙e ˙za

transferentive -ta (+ ka) 'and / but then' < - ˙ta (˙ka)

infinitive -e + **pwā (la)** or **posey (yo)** 'suppose ... ' = 'if'

"since / therefore" forms

sequential **-uni / -ni** — especially the extended sequential **-uni-kka / -ni-kka (n')**

infinitive **-e** + particle **se** 'and so' < - *e 'sye*

substantive **-(ess- / keyss-)um / -m** + particle **ulo / lo** < - *ᵘ∕ₒ 'm ᵘ∕ₒ 'lwo*

modifier **-un / -n** etc. + postmodifier **kes** + particle **i / ka**

modifier **-un / -n, -(ess- / keyss-)nun, -(ess- / keyss-)tun** + postmodifier **ke(s)** + particle **ul / l(ul)**

? modifier **-un / -n** etc. + postmodifier **kes** + particle **ulo / lo**

modifier **-un / -n** etc. + postmodifier **kkatalk** + particle **ulo / lo**

summative **-(ess- / -keyss-)ki** + particle **ey** or particle **ulo / lo**

summative **-(ess- / -keyss-)ki** + noun **ttaymun** + particle **ey**; **-killey (-killay)**

modifier **-un / -n, -(ess- / keyss-)nun, -(ess- / keyss-)tun** + postmodifier **tey** — see also §11.3.3

"so that, so as to" forms

adverbative **-key** (CF the uses in causative conversions) < - *'key*

derived adverb **-i** (for those adjectives that have the form)[1] < - *'i*

projective **-tolok** 'to the point that ... ' < - *'to 'lwok*

intentive **-ulye / -lye** < - *'ᵘ∕ₒ 'l ye*; purposive **-ule / -le**

processive adjunctive (+ particle) **-nula (ko)**

[1] Since the derived adverb can retain the syntactic properties of the underlying adjective, carrying its own adjuncts, such as a subject.

The above lists are by no means exhaustive. They could be considerably enlarged if we take into account all the adverbializations built on other conversions, such as the "when" form made by first adnominalizing the sentence with the prospective modifier **-ul(q)** and then adding the noun **ttay** 'time (when ...)', with or without the particle **ey** 'at'. Nor have we gone into all the various uses of these adverbializations, e.g. the use of the gerund **-ko** and the infinitive **-e** with auxiliaries (§7.5). See also the use of the summative **-ki** with the particle **to** or the particle **un / nun** to highlight or subdue the focus on the nominalization (mentioned in §11.8, §11.16).

More information on each adverbialization will be found in the individual entries of Part II. A great deal more needs to be said, in particular for the foreign student of Korean. One vexing question: how do we know when 'because' is to be expressed with **-uni(-kka)** and when with **-e (se)**? According to Lukoff and Nam (1982), **-uni-ikka** represents logical ARGUMENTATION derived from DISCOVERY and **-e se** represents a logical ASSERTION OF CAUSE derived from RELATED SEQUENCE. For more on this problem, see [1]Yi Cenglo 1975 and 1978, [1]Yi Cengmin 1979, and [1]Yang Insek 1972. The Korean situation is similar to the difference between the Japanese constructions ... **no de** and ... **kara**, which Mikami attributed to a difference between objective versus subjective reason (Martin 1975:857). The argumentation (objective) construction permits the insertion of the past tense, **-ess-uni(-kka)**, but that is difficult or impossible with the causal-assertion (subjective) construction: [1]Yi Cenglo rejects *** -ess.e se** and others say it sounds artificial and suggest replacement with just **-e se**, using the past only for the final verb of the sentence. In the meaning of causal assertion **-e se** cannot be followed by a command or a proposition (i.e. by another subjective form), a restriction similar to that for Japanese ... **kara**. If not asserting causality, **-e se** can be followed by a command or proposition: **Yeki anc.e se kitalisipsio** 'Please sit here and wait'. We can think of **-uni-kka** as a strengthened form of **-uni**, emphasizing the argument or discovery, and we can think of **-e** as a relaxed form of **-e (se)**, perhaps weakening the assertion or maybe just a contraction; but the longer and the shorter forms are not interchangeable in all situations.

A related problem is when to use **-e (se)** for the 'and (then)' meaning and when to use **-ko** or the emphasized version **-ko se**; see the entries in Part II. As with the adnominalizations, adverbializations of the copula are often built on the quotation conversion, so we sometimes find **ila 'myen**, ... **ila 'ni**, etc., where we might expect just **imyen, ini**, etc., with an added touch of the hypothetical.

11.11. Quotations; oblique questions; putative structures.

Quotations are frequent in Korean. Quoted is not only what people have said, but also what the speaker thinks or intends (**-ulye ko hanta**), and sometimes the "quotation" is merely a grammatical device that is used to lengthen, soften, or emphasize a sentence. Direct quotation — reporting the exact words — is not common in conversation, and in books it is usually introduced by the formula **A ka māl haki lul** ··· 'A's saying [as direct object]' and ended by the formula **hako (māl) hayss.ta** 'said' or just **hako** 'saying' as an afterthought sentence (§11.3.5). Another way to state a direct quotation is to append to the quoted sentence the expression ··· **(i)la ko (māl) hayss.ta** 'said ["that it is"]' or just ··· **hayss.ta** 'said' (King 1988a). This treats the quoted sentence (or fragment) as if it were a noun, and seems to be a fairly recent innovation. Since virtually all finite verb forms end in a vowel, the pseudo particle **ila ko** is nearly always heard in the postvocalic shape **'la ko**, and some speakers feel uncomfortable identifying it with **ila ko**. When a juncture is inserted between the quoted sentence and the quoting verb phrase, the abbreviation **'la ko** remains and is not restored to **ila ko**: "**Ēps.ˢup.nita**" │ **'la ko hayss.ta** 'said, "There are none"'. But that just shows that the juncture is inserted late in the process of phonetic realization and is somewhat artificial. When the quoted sentence ends in a consonant, only the full form **ila ko** can be pronounced: "**Son nim i osyess.kwumen**" **ila ko hayss.ta** or "**Son nim i osyess.kwun**" **ila ko hayss.ta** 'said, "Why, a guest has arrived!"'; "**Cāmqkan man kitalilyem**" **ila ko hayss.ta** 'said, "Why don't you just wait a little bit?"'.

Indirect quotations — reporting the gist — have the expected shift of specification, pronominal reference, honorifics, etc. A person will not use honorifics about himself, but in quoting what he has said I may well want to use honorifics about his acts and intentions, and I will remove any honorific references to me. The sentence is left in the PLAIN style — or reduced back to the plain style from whatever stylization it may have undergone. But in quotations the plain style copula changes from **ita** to **ila** and the command changes from **-e la** to the subjunctive attentive **-ula/-la**, as in these examples:

Cip ita. 'It is a house.'	**Cip ila ko hayss.ta** 'He said it is/was a house' or 'He called it a house'.
Mek.e la! 'Eat!'	**Mek.ula ko hayss.ta** 'He told me to eat'.

Notice that the English translation of **-ula ko hanta** is often 'tells one to do it' and the translation of **-ca ko hanta** is often 'suggests doing it'.

Quoted questions are always in the **-nun ya** version of the plain forms (**-nun ya, -keyss.nun ya, -ess.nun ya**) and **-un ya** is used only for the present adjectives and copula, so that **cōh.ta → cōh.un ya (ko)** but **cōh.keyss.ta → cōh.keyss.nun ya (ko)**. The form **-ul ya** is used only in literary questions, usually rhetorical. A somewhat bookish variant for quoting adjective and copula questions uses **-un ka** instead of **-un ya**: **Musun māl in ka (ko) mul.ess.ta = Musun māl in ya (ko) mul.ess.ta** 'He asked which word it was (or: what the talk was all about)'.

What is quoted is followed by a verb of saying (telling, inquiring) or of thinking (opinion, intention): **māl hanta** or just **hanta** 'says', **mūt.nunta (mul.e)** 'asks, inquires', **cwucang hanta** 'claims', **myēng.lyeng hanta** 'orders, commands', **sayngkak hanta** 'thinks', ... Optionally the particle **ko** can be attached to show the end of the quoted content. If the quoting verb is omitted the quotation is left as a fragment, or "afterthought", and the particle **ko** is used to end the sentence.

In addition to the sentence-final forms (statement, question, command, suggestion — but not the apperceptive), the intentive is also indirectly quoted: **-ulye (ko) hanta** 'feels that one would like to do; has it in mind (has the intention) to do; tries/starts to do; will do'. Common variants, often regarded as nonstandard, are **-ulya/-lya** and **-ulla/-lla** + **hanta** or an abbreviation of that structure which leads to the contracted forms **-ulla 'nta, -ulla 'y**, ... The familiar question form **-ulq ka** is quoted with the meaning 'is thinking of doing, is wondering whether to do', as in **Kalq ka hanta** 'I am thinking of going'. The intentive **-ulye/-lye**, it should be noted, probably comes from the prospective modifier **-ul** + a variant of **ya** 'question'. Quotation also underlies **-nula ko** and **-ulla ko**.

Since the quotation may, but need not, include the particle **ko**, we can speak of a SIMPLE quotation (**-ta hanta** etc.) and an EXPANDED quotation (**-ta ko hanta** etc.). In addition, there is an ABBREVIATED

quotation made with contracted forms of **ha-**: **-ta 'nta, -la 'nta, -ca 'nta, -nun ya 'nta**, ... The form **-ulye 'nta** is an abbreviated version of **-ulye hanta** and the expanded version is **-ulye ko hanta**.

These remarks refer to indirect quotation. In addition to the three kinds of indirect quotation — simple, expanded, and abbreviated — there is also direct quotation with the particle **hako** or the pseudo-particle **ila ko**. A direct quotation can be reported as SAID by anyone, including the speaker, but it can be reported as THOUGHT only by the speaker. An indirect quotation, on the other hand, can be reported as thought or said by anyone. In Middle Korean both direct and indirect quotations were made in the same several ways and could be differentiated only by the words within the quoted sentence, such as the pronouns, deictics, and verbal endings. The quotation was optionally marked by `ho`ya, the infinitive of °ho- 'do; be; say', here functioning like modern **hako**, and followed by a verb of saying; if the verb of saying was the minimal °ho- itself, the quotation stood unmarked; like modern **hako**, `ho`ya could not be used when immediately followed by a form of the same stem, and it was optional only before the other verbs of saying. Middle Korean also had a naming construction NAME `i`la °ho- 'say it is, say it to be' = 'call it NAME'. And there was a pattern - `toy` " ... " (°ho-), with the accessive form of a verb of saying (*nil`Gwo`toy* 'says', *mwu`lwo`toy* 'asks', *solang hwo`toy* 'thinks'), like modern **haki lul** " ... " **ha-** (or **hako māl ha-**) 'says / said as follows: " ... ". For more on the history of reported speech see the excellent survey in King 1988a and the works cited in his bibliography. The quotative particle **ko** (probably from an abbreviation of **hako**) is first attested in the 20th century (Kim Sungkon 1978:199), except for one case of **halya ko** in 1890 Starchevskiy (King 1991a:191).

The abbreviated quotations of statements are used with a special meaning in the following styles: plain (**-ta 'nta**), formal (**-ta 'p.nita**), semiformal (**-ta 'o**), familiar (**ta 'ney**). The special meaning is one of emphasis or insistence, something like 'I TELL you it is / does = it really is / does; mind you it is / does'. Sometimes the translation 'you see' or 'you know' or 'don't you know / see' is appropriate; and sometimes irony is implied. The common and rather vacuous Japanese expression ... (to iu) wa⌉ke desu 'I mean' has been suggested as a good translation.

Somewhat similar to quotation is the citing of OBLIQUE QUESTIONS. These are stated by changing the postmodifier **ya** to **ci**: **Kanun ya?** 'Is he going?' → **kanun ci** ... ' ... whether he is going (or not)', **Eti kass.nun ya** 'where did he go?' → **eti kass.nun ci** ... ' ... where he went', **Mues i pissan ya** 'What is expensive?' → **mues i pissan ci** ... ' ... what is expensive'. In addition to the future processive modifier **-keyss.nun** that we expect, there is an optional and more common form: the prospective processive modifier **-ul.nun**, and that form is restricted to use with the postmodifier **ci**. The pattern: **Mues ul pat.keyss.nun ya** 'What will we get?' → **mues ul pat.keyss.nun / pat.ul.nun ci** ... ' ... what we will get'. The oblique question is to be followed by an information verb such as **ā-l-** 'know', **molu-** 'not know', **ic-** 'forget', **kiek na-** 'remember', **sayngkak na-** 'recall', **kaluchi-** 'tell, teach', etc. These oblique questions — used in such sentences as 'I don't know whether he is coming', 'I forgot what I got', 'Do you recall how much it was?' — are the source of UNCERTAINTY sentences, which can be regarded as elliptical: **···-nun ci (to molunta)** 'maybe ... ' (§11.3.4).

In Japanese an adnominalized quotation (... to iu/itta ...) is sometimes used as a substitute for the adnominalized copula, identifying the following noun by the word or phrase that precedes the quotative particle, but such use in Korean is more limited, so that **Chelqswu ka ssess.ta 'nun chayk** means only 'the book that [someone] says Chelsswu wrote' and not *'the book that Chelsswu wrote' → **Chelqswu ka ssun chayk** (Whitman 1989:350); moreover, the quoting verb can be marked for exaltation, as in **Chelqswu ka ssess.ta 'sinun chayk** 'the book that [someone esteemed] says Chelsswu wrote'.

The term "putative structure" refers to ways of imputing to a noun a state (usually expressed by an adjective, but perhaps sometimes by an intransitive verb or a copula-predicated noun) through the use of a quotational sentence, which can take as a direct object the optionally raised subject of the putativized sentence: **elkwul i kopta ko hanta** 'says that the face is pretty' → **elkwul ul kopta ko hanta** 'says the face to be pretty'. If there are two nominative phrases only the first can be raised: **(na nun) ku ⁿyeca ka elkwul i kopta ko sayngkak hanta** 'I think she has a pretty face' → **ku ⁿyeca lul elkwul i kopta ko sayngkak hanta** 'I think her pretty of face (in the face)' but not *··· ⁿyeca lul

elkwul ul ··· . CF Choy Yengsek 1988:178:n8. We reject as unnatural the sentences offered by Yun Cengmi 1989 to justify the claim that adverbial elements can be similarly raised (*eykey lul).

11.12. Reflexive requests; favors.

Requests are ordinarily made with an honorific command form of the verb cwu- (→ cwu-si-) 'give' in one of the more polite styles: **I kes com cwusipsio (cwusey yo)** 'Please give this to me / him'; **I kes com hay cwusipsio (cwusey yo)** 'Please do this (for me / him)'. But in the plain and semiformal styles there is a special conversion used to make the request reflexive '(I ask you to) give it to me [rather than someone else] − or: to do it for me': **cwula → tālla** [plain], → **tao / tawu** [semiformal]. An emphatic synonym for **tālla** is **tāko / tākwu**. (On the irregular forms of this auxiliary verb, see Part II.) Requests are quoted in the expected way, (**cwusipsio ←**) **cwue la → cwula** (**ko ha-**), only if the request is for someone else's benefit. To say 'he requests it for himself' − that is, he says "do it for me" or "give it to me" − you apply the reflexive request conversion **cwula → tālla**. For examples, see the entries **tālla** and **tālla 'nta** in Part II.

Notice that FAVORS, not treated here as one of the conversions, are stated by using the infinitive **-e** + the auxiliary verb **cwu-** 'give' or **tuli-** 'give to a superior (hence never me)'; **A ka B eykey X lul hay cwunta / tulinta** 'A does X for B'. And favors can be requested: **B eykey X ul hay cwusey / tulisey yo** 'Please do X for B'. So the requested favor can be quoted: (**A eykey nun**) **B eykey X lul hay cwula /tulila ko hanta** 'asks A to do X for B'.

Some Korean dictionaries list a verb **tāllanta** 'requests', but that is misleading, for the form in question is an abbreviation of **tālla (ko) hanta**, as clearly shown by the past **tālla 'yss.ta**. (If there were such a verb as *tāllanta, the past would be *tāllass.ta.)

11.13. Sentence connectors.

There are a lot of phrases, mostly derived from adverbializations, that are frequently used to introduce and connect sentences. Below is a partial list of such "prologs" and "insertions" (CF Kim Pyengha 2:127-9) or "conjunctors" (CF [1]Yi Tongcay 1978), arranged very roughly by meaning.

Kuliko ··· 'And ··· '

Kulay se ··· 'And so ··· ' or 'And then ··· '

Kulemyen ··· 'Then ··· '

Kuleca ··· 'Thereupon ··· '

Kulemyen se ··· 'Meanwhile ··· '

Tongsi ey ··· 'At the same time ··· ', 'Also, ··· '

Han phyen ··· 'And (at the same time) ··· ', 'But ··· (on the other hand)', (**Han phyen ulo nun** ···) 'But perhaps ··· '

Kuleni ··· , **Hani** ··· 'Then ··· ' or 'So ··· '

Kuleni-kka (n') ··· 'Then ··· ' or 'So ··· '

Kulem ulo ··· 'So ··· '

Kulem ··· 'Well ··· ' or (= **Kulem ulo**) 'So ··· ' or (= **Kulemyen**) 'Then ··· '

Kuleki ey ··· , **Kuleki ttaymun ey** ··· 'So ··· ', 'Therefore ··· '

Way 'n ya hamyen ··· 'The reason is that ··· ; If I may explain why, ··· '

Kulen cuk ··· 'Then ··· ', 'Thereupon ··· '

Ttal^e**a se** ··· 'Consequently ··· '

Ili ha.ye ··· , **Ili hay se** ··· 'Thus ··· '

Yeki lo puthe ··· 'From here (this) ··· '

Ku / I wa hamkkey ··· 'Together with (on top of) that / this ··· '

Nay sayngkak kath.umyen (kath.e se nun) ··· 'If it were me ··· ', 'If you want my advice ··· '

Kath.un kaps imyen ··· 'If it's all the same ··· ', 'If you don't mind ··· ', 'If possible ··· ', 'If one or the other ··· ', 'If anything ··· '

Mupang hasimyen ··· 'If you don't mind ··· '

Nōllapkey to ··· 'To my amazement ··· '

Yath-kwuc.key to ··· 'Strange to tell ··· '

Caymi sulepkey to ··· 'Delightful to say ··· '

Tahayng hi to ··· 'Happily enough ··· '

Hayngpok sulepkey to ··· 'Luckily enough ··· '

Pulhayng hakey to ··· 'Unfortunately ··· '

Yukam sulepkey to ··· , **Yukam sulepci man** ··· 'Sad to tell ··· '

Sepsep hakey to ··· 'To my regret ··· ' or 'To my disappointment ··· '

Kwayssim hakey to ··· 'Outrageously enough ··· '

Sayngkak hakentay ··· , **Sayngkak hay poni-kka** ··· 'Come to think of it ··· '

Cimcak hakentay ··· 'Presumably ··· ', 'I presume that ··· '

Pokentay ··· 'Now that I look at it ··· '

Cāmsi tol.a pokentay ··· 'Looking back for a moment ··· '

Ppun (man) ani 'la ···, Ppun (man) tele ···
'What's more ··· ', 'Not only that but ··· ',
'Moreover ··· '

Tekwuntana ··· 'What's more ··· ', 'Moreover
··· ', 'Besides ··· '

X, keki ¹yen han Y "Y or X'; X, keki ¹yen
ha.ye, Y ··· 'X, together with Y, ··· '

Hok un ··· 'Or else ··· '

Tto nun ··· 'Or (else) ··· ; Nor ··· (either)'

Ku cwung ey to ··· 'Especially ··· '

Hamulmye ··· 'Much more / less ··· '

Kulelq swulok ··· 'All the more ··· '

Saysam sulepkey ··· 'Now ··· ', 'Again
(newly) ··· ', 'All the more ··· ', 'Specially ··· '

Ani na talulq ka ··· 'Sure enough, ··· ', 'Just
as I suspected, ··· '

Ani 'n key ani 'la ··· or Pipul ila ··· 'Sure
enough ··· ', 'To be sure ··· ', 'Of course ··· ',
'Not but what ··· ' (CF. §11.7.6)

Thullim ēps.i ···, Uysim ēps.i ··· 'Surely ··· ',
'Doubtless ··· , No doubt ··· '

Te twū mal ēps.i ···, Twū mal halq kes ēps.i
··· 'It goes without saying (repeating) ··· '

Molumciki ··· 'Preferably ··· ; Necessarily ··· '
(< molum cik 'i)

Māl hana māna ··· 'Needless to say ··· '

Payksa pulkyey hako ··· 'Regardless ··· '

Āmuli sayngkak hay to ··· 'In any case ··· '

Etteh.key hatun ci ··· 'In any event ··· '

Ama to ··· 'Maybe ··· ', 'Likely ··· '

Āmulye 'na (mān.il ey) ··· 'Maybe ··· '

Kulelq cintay ··· 'If that should happen ··· ',
'If that be true ··· '

Molumyen molutoy ··· 'I may be wrong but
··· ', 'If my guess is right ··· ', 'Perhaps ··· '

(...) molulq ka ··· '(...) unless perhaps (···)'

Kuleta ka ··· 'But / And then ··· '

Kulena ···, Hana ···, Hena ··· 'But ··· ',
'Still ··· '

Kuleh.ci man ··· 'But ··· '

Kulay to ··· 'Even so ··· '

Kulelq ci 'la to ··· 'Be that as it may ··· '

Kuleh.ta (ha)tula 'y to ··· 'Be that as it
may ··· '

Kulem ey to pulkwu hako ··· 'Nonetheless
··· ', 'Nevertheless ··· '

Kulel mangceng ··· 'Nevertheless ··· '

Way kulen ya (ha)myen ···, Way 'n ya
hamyen ··· 'The reason is that ··· '; 'If I
may explain (why) ··· '

Ches ccay lo ··· 'In the first place ··· ', 'First of
all ··· '

Twū ccay lo ··· 'In the second place ··· '

Kkuth ulo ..., Macimak ulo ··· 'Finally ··· '

¹Yēy / I lul tulmyen / hamyen ··· (also tulca
'myen, tul.e se) 'For example ··· '

¹Yēy khentay ··· 'For example ··· '

(...) ilul they 'myen ··· 'so to speak', 'as it
were', 'if we give it a name / label ··· '

Cuk ··· = Kot ··· 'To wit ··· '

I wa kath.i ··· 'In this / like manner ··· '

Ile han kwankyey ey se ··· 'In this respect ··· '

(Wuli ka) ponun pa wa kath.i ··· 'As we see ··· '

Tut.kentay ··· 'From what I hear ··· '

Sōmun ey uy hamyen ··· 'According to rumor
(to what they say) ··· '

Sālam tul i māl haki lul ··· (ila hap.nita) 'As
people say ··· '

Sinmun ey pōko han pa ey uy hamyen ···
'According to what was reported in the
newspaper ··· '

Yō nun ··· 'The point is ··· ', 'To summarize ··· '

Yō khentay ··· 'In outline ··· ', 'In summary ··· ',
'In brief ··· ', 'To be concise (succinct) ··· '

Yōyak hamyen ··· 'In sum ··· '

Kantan hi māl hamyen (māl hay se) ··· 'To
put it simply (briefly) ··· '

Han mati lo māl hay se ··· 'To put it in a word
(in a nutshell) ··· '

Tāychwung māl hamyen ··· 'Speaking roughly
··· ', 'In short ··· '

Khukey nun ··· 'More broadly (speaking) ··· '

Khukey cap.e se ··· 'At the largest / most ··· '

Te cenghwak hi māl hamyen ··· 'To put it
more precisely ··· '

Talli māl hamyen ···, Hwan.en hamyen ···
'To put it another way ··· '

Tasi māl hamyen (or hay se) ··· 'To repeat ··· '
or 'To put it another way ··· '

Pakkwe sayngkak hamyen ···, Tol.ikhye
sayngkak hako / hamyen ··· 'On second
thought ··· '

Māl ul pakkwe se ··· 'To change the subject ··· '

Yetam ici man ··· 'In this connection I may
add that ··· '

Yetam un ku man hako ··· 'To return to the
subject ··· '

··· iyo / yo?, ··· iyo / yo!, ··· ullang / llang ' ···
uh ··· ', 'you know, you see' (like Japanese ne)

Talum ani 'ko / 'la 'It's just that ··· ; just'

Māl haca 'myen ⋯ 'If you ask me – '   ⋯ māl ia (iya), ⋯ māl iey yo, ⋯ māl io (iyo),
Nay sayngkak ulo (se) nun ⋯ , Nay   ⋯ māl ici (yo), ⋯ māl ita, ⋯ māl iney 'I
sayngkak ey nun ⋯ 'In my opinion ⋯'   mean', 'you know', 'you see', 'don't you
Na poki ey nun ⋯ 'As I view the matter – '   know', 'don't you see?', 'uh ⋯ '

See also the use of -e pwā (la) and -e posey (yo) within a sentence (under the entry -e pota in Part II).

11.14. Apposition.

Apposition is the juxtaposition of two expressions (usually but not necessarily noun phrases) having the same reference ("A which is X"): **nay salang hanun atul [in] ne lul** 'you [who are] my beloved son' (Roth 279). This is the common type, the specifying apposition, in which the second expression gives a more detailed specification of the first expression, as clearly seen in **Kimchi ssel.un kes iss.e?** 'Do you have any ready-sliced kimchi?'. A distinction has been drawn between a summarizing apposition, in which the second noun phrase sums up a set of nouns, and a detailing apposition, in which the second phrase gives further information about the first (CM 2:167-9):

Sap, kwayngi, homi, kok-kwayngi, nas tul – cak.ep ey phil.yo han tōkwu tul ul kaciko chengnyen tul un tte-nass.ta 'The youths set out taking the tools necessary for the operation – spade, hoe, weeding hoe, pick-ax, sickle'.

Cak.ep ey phil.yo han tōkwu lul – sap, kwayngi, homi, kok-kwayngi, nas tul ul kaciko chengnyen tul un tte-nass.ta 'The youths set out taking spade, hoe, weeding hoe, pick-ax, sickle – the tools needed for the operation'.

11.15. Order and recurrence of conversions.

Since an infinite number of sentences can be made by applying a finite number of operations to our nuclear sentences, it follows that some of the operations can be applied repeatedly. Substitution alone, even with expansion, would give us a large number of sentences, but not an infinite number.

There can, of course, be increasing expansion of a nuclear sentence, supplying more and more of the possible kinds of adjuncts (**Ponta, Ayki ponta, Ayki emeni ponta, Ayki emeni cikum ponta, ...**), but there will be a limited number of slots available for a given verb. Each expansion can itself be expanded, by adnominal or adverbial modification of some sort: **ayki, wuli ayki** 'our baby', **kāy hako nōnun ayki** 'the baby playing with the dog', **kāy hako nōnun wuli ayki** 'our baby playing with the dog', and so on, to no easily discernible limit. An expansion can be grammatically specified with one of a small group of particles, and repeated specification is possible up to at least three (**ayki eykey** 'to the baby', **ayki eykey se** 'from the baby', **ayki eykey se pota** 'than from the baby'). The specified expansion can have its focus subdued with the particle **un / nun** or highlighted with **to**: **ayki eykey nun / to, ayki eykey se nun / to, ayki eykey se pota nun / to.** There are many gaps in the actual sequences that occur, as indicated in §6.5. In a very limited way the tense-aspect shift can be regarded as recurrent, for there is a past built on a past (**-ess-ess-**) and a future built on that (**-ess-ess-keyss-**), as well as a future built on a simple past (**-ess-keyss-**).

To some extent, an order lurks behind the sentences that result from applying the conversion processes. We can make a negative out of an honorific (**ponta → posinta → posici anh.nunta**) or an honorific out of a negative (**ponta → poci anh.nunta → poci anh.usinta**) or an honorific out of a negative-made-on-an-honorific (**ponta → posinta → posici anh.nunta → posici anh.usinta**). The first possibility is preferred, but the others are also heard.

It is possible to make a negative out of a periphrastic causative (**kanta → kakey hanta → kakey haci mōs hanta** 'can't let him go') or a causative out of a negative (**kanta → kaci mōs hanta → kaci mōs hakey hanta** 'makes it so he can't go'). A negative can be made out of a causative-made-on-a-negative (**kaci mōs hakey haci mōs hanta** 'can't make it so he can't go'), and a causative can be made out of a negative-made-on-a-causative (**kakey haci mōs hakey hanta** 'makes it so he can't let him go').

Negation can be applied to desiderative expressions (**-ko siph.ta**) in several ways. **Kako siph.ci anh.ta** (and **Kako siph.e haci anh.nunta**) is preferable to **An kako siph.ta** (and **An kako siph.e hanta**) for 'I do not want to go'; you can also say **Kaci anh.ko siph.ta** 'I want not to go' with a

slightly different implication. In Seoul you will not hear *Kako an siph.ta or *Kako siph.ci an hanta, but such structures are said to be used in Hamkyeng dialects. For the double negative **Kaci anh.ko siph.ci anh.ta** 'I do not want not to go' is possible and moreover better than (?*)**An kako siph.ci anh.ta**.

Some of the ambiguous sentences that show divergent constituency (IC cuts) result from the application of certain conversions before others: **an hwumchye mek.nunta** can be either **an + hwumchye mek.nunta** 'doesn't steal and eat' (= **hwumchye mekci anh.nunta**) or **an hwumchye + mek.nunta** 'eats without stealing' (= **hwumchici anh.e mek.nunta**).

Certain sentences seem to be derived by way of nonoccurring sentences: **Ānta** 'You know him' → *****Ālci anh.nunta** 'You don't know him' → **Ālci anh.nun ka** 'Don't you know him?! = Surely you know him?'. To make the statement 'You don't know him' Korean uses a suppletive negative (§11.7.3), yet we cannot say that the negative question derives from that, because we find both **Molunun ka** 'Don't you know him?' and **Moluci anh.nun ka** 'Of course you don't know him?'. It may well be argued that these facts indicate there are two kinds of negative questions: one in which the negativization is applied before the interrogativization (**Ānta** → **Molunta** → **Molunun ka**), producing a literal question, and the other in which the interrogativization is applied before the negativization (**Ānta** → **Ānun ka** → **Ālci anh.nun ka**), producing a rhetorical question. In the overwhelming majority of cases the result is formally the same for both types; the verb for 'know' is unusual. And there are other cases in which "along-the-way" sentences are rare or unelicitable, if not totally nonexistent. Since some of the verb paradigms are defective, we expect certain types of gap in sentence paradigms as well.

11.16. Sentence generation.

There would be several possible ways to convert the analysis of syntax made here into what is optimistically called a "generative" grammar. Since native speakers are more interested in the CONTENT of their remarks than in the form taken by the remarks, and they are concerned less with grammatical issues than with making sense, it is doubtful that any construct of a grammarian can seriously pretend to show how a given speaker actually goes about creating and producing a given sentence. On the other hand, the restatement of a syntactic description as an algorithm for the automatic production of sentences can sometimes reveal interesting things about the linguist's view of the language — and indirectly perhaps about the language itself.

One such ordering of the description into a "do it yourself" set of instructions, or decision procedures, can be presented in sketchy fashion as follows. Six groups of instructions are marked with Roman numerals; they embrace 19 general instructions, with further subgroups indicated within each.

I. 1. Choose a nuclear sentence:

> **Ponta** = VERBAL sentence
> **Cōh.ta** = ADJECTIVAL sentence
> **Cip ita** = COPULAR sentence

2. Substitute:

> **Ponta** → **Kanta**, → **Mek.nunta**, → ... (pick a verb)
> **Cōh.ta** → **Khuta**, → **Mānh.ta**, → ... (pick an adjective)
> **Cip ita** → **Sālam ita**, → **Onul ita**, → ... (pick a noun)

3. If the choice was copular, expand the noun with adnominal(s):

> **sālam** → **ku sālam** 'that person', → ...
> → **nay ka (cal) ānun sālam** 'a person I know (well)', → ...
> → **nay ka cal ānun ku sālam**, → ...
> → ...

4. Expand the sentence with adverbial adjunct(s):

> **Ponta.** → **Ayki ponta**, → **Emeni ponta**, → **Cikum ponta**, → ...
> → **Ayki emeni ponta**, → **Emeni ayki ponta**, →

→ Ayki emeni cikum ponta, → Emeni ayki cikum ponta,
→ Cikum ayki emeni ponta, → Cikum emeni ayki ponta,
→ Ayki cikum emeni ponta, → Emeni cikum ayki ponta
→ ...

5. Expand each sentence expansion with adnominal(s):
   ayki → wuli ayki, → (kāy hako) nōnun ayki, → ...
           → kāy hako nōnun wuli ayki, → ...
   (There are constraints: the expansion must be capable of 6; it must not be an adverb.)
6. Specify each expansion (with the role-appropriate particle):
   ayki → ayki ka, → ayki lul, ayki eykey, ...
           → ayki eykey se, → ...
           → ayki eykey se pota, → ...
   (The occurring sequences are restricted in various ways.)
7. Subdue (un / nun) or highlight (to) the focus of each expansion:
   ayki → ayki nun / to; cikum → cikum un / to; ...
   ayki eykey → ayki eykey nun / to; ...
   ayki eykey se → ayki eykey se nun / to; ...
   ayki eykey se pota → ayki eykey se pota nun / to

II. 8. Shift voice —
   if VERBAL, to causative:
      (A ka B lul) ponta → (C ka A eykey B lul) pointa
                                              pokey hanta
      or to passive:
      (A ka B lul) ponta → (B ka A eykey) pointa
   if ADJECTIVAL, to causative:
      (A ka) cōh.ta → (C ka A lul) cōh.key hanta
   if COPULAR, to nothing.
III. 9. Elevate the status of the subject:
      ponta → posinta; mek.nunta → capswusinta
      cōh.ta → cōh.usita
      sālam ita → sālam (or ... pun) isita
IV. 10. Negate:
   10a. ponta → an(i) ponta; ānta → (*)an ānta → molunta (§11.7.3)
         cōh.ta → an(i) cōh.ta
         cip ita → cip i ani 'ta
   10b. ponta → poci anh.nunta; ānta → (*)ālci anh.nunta → molunta
         cōh.ci → cōh.ci anh.ta
         —
   10c. ponta → mōs ponta; ānta → mōs ānta
         —
         —
   10d. ponta → poci mōs hanta; ānta → ālci mōs hanta
         —
         cōh.ta → cōh.ci mōs hata (But some adjectives cannot do this, e.g. **chwuw-**; p. 316.)
   9+10b   ponta → posinta → posici anh.nunta
   10b+9   ponta → poci anh.nunta → poci anh.usinta
   (9+10b)+9 ponta → posinta → posici anh.nunta → posici anh.usinta
   10a+10b   (cōh.ta →) chwupta → an chwupci anh.ta
   10b+10b   cōh.ta → cōh.ci anh.ta → cōh.ci anh.ci anh.ta
   10b+10d   cōh.ta → cōh.ci anh.ta → cōh.ci anh.ci mōs hata

11. Preemphasize negation:

10b+11	ponta → poci anh.nunta → poci lul anh.nunta
	cōh.ci → cōh.ci anh.ta → cōh.ci ka / lul anh.ta
10d+11	ponta → poci mōs hanta → poci lul mōs hanta
	cōh.ta → cōh.ci mōs hata → cōh.ci ka / lul mōs hata

But with certain passives, toy-, ci-, ... (p. 317) 10b+11 shows this pattern: pointa → poici anh.nunta → poici ka / lul anh.nunta. And there is no 10d (*poici mōs hanta 'can't be seen').

12. Subdue (un / nun) or highlight (to) the focus on the negation:

10b+12	ponta → poci nun / to anh.nunta
	cōh.ta → cōh.ci nun / to anh.nunta
10d+12	ponta → poci nun mōs hanta
	cōh.ta → cōh.ci nun / to mōs hata

V. 13. Shift tense-aspect:

13a. past	ponta → pwass.ta; mek.nunta → mek.ess.ta
	cōh.ta → cōh.ass.ta
	cip ita → cip iess.ta
13a+13a	ponta → pwass.ta → pwass.ess.ta; mek.nunta → mek.ess.ta → mek.ess.ess.ta
	cōh.ta → cōh.ass.ta → cōh.ass.ess.ta
	cip ita → cip iess.ta → cip iess.ess.ta
13b. future	ponta → pokeyss.ta
	cōh.ta → cōh.keyss.ta
	cip ita → cip ikeyss.ta
13a+13b	ponta → pwass.ta → pwass.keyss.ta
	cōh.ta → cōh.ass.ta → cōh.ass.keyss.ta
	cip ita → cip iess.ta → cip iess.keyss.ta
(13a+13a)+13b	ponta → pwass.ta → pwass.ess.ta → pwass.ess.keyss.ta
	cōh.ta → cōh.ass.ta → cōh.ass.ess.ta → cōh.ass.ess.keyss.ta

VI. 14. Shift mood:

14a. question	Ponta. → Poni?
	Cōh.ta. → Cōh.ni?, → Cōh.un ka?
	Cip ita. → Cip ini?, → Cip in ka?
14b. suggestion	Ponta. → Poca.
14c. command	Ponta. → Pwā la!
14d. apperception	Ponta. → Ponun kwun (a) / kwumen / kwulye!
	Cōh.ta. → Cōh.kwun (a)!, Cōh.kwumen!, Cōh.kwulye!
	Cip ita. → Cip i(lo)kwun (a)!, Cip i(lo)kwumen!, Cip i(lo)kwulye!
10d+14b	Ponta. → Poci mōs hanta. → Poci mālca.
10d+14c	Ponta. → Poci mal.e la.
10d+11	Ponta. → Poci mōs hanta. → Poci lul mōs hanta.
(10d+11)+14b	Ponta. → Poci mālca. → Poci lul mālca.
(10d+11)+14c	Ponta. → Poci mal.e la. → Poci lul mal.e la.

15. Adnominalize — 15+3, 15+5:

	Ponta. → ponun ···
	Cōh.ta. → cōh.un ···
	Cip ita. → cip in ···
	→ cip uy ···
	→ cip ···

16. Nominalize — 16+2, 16+4(+6):
16a. Summative **Ponta. → poki**
                Cōh.ta. → cōh.ki
                Cip ita. → cip iki
16b. Substantive **Ponta. → pom**
                Cōh.ta. → cōh.um
                Cip ita. → cip im

17. Adverbialize — 17+4(+6):
17a. Gerund **Ponta. → poko**
                Cōh.ta. → cōh.ko
                Cip ita. → cip iko
17b. Adverbative **Ponta. → pokey**
                Cōh.ta. → cōh.key
                Cip ita. → cip ikey
17—.
. . .

18. Quote (+6): **Ponta. → ponta (ko)**
                Cōh.ta. → cōh.ta (ko)
                Cip ita. → Cip ila (ko)
14b+18 **Ponta. → Poni? → ponun ya (ko)**
                Cōh.ta. → Cōh.ni? → cōh.un ya (ko)
                Cip ita. → Cip ini? → cip in ya (ko)
14c+18 **Ponta. → Pwā la! → pola (ko)**

19. Shift style:
19a. Formal **Ponta. → Pop.nita.**
                Cōh.ta. → Cōh.sup.nita.
                Cip ita. → Cip ip.nita.
19b. Semiformal ... ...
19—.
. . .

The instructions (or "rules") must be applied taking into account the constraints that are described in various sections of this book. Points of recursion can be seen in 14 (adnominalize) where the adnominalized sentence can be reapplied at 3 (expand the noun before the copula of a copula sentence) and/or at 5 (expand each sentence expansion):

       Ponta. → ponun (15) → Ponun cip ita. (3) ← Cip ita. (1)

Or again in 16 (nominalize) where the nominalized sentence can be reapplied at 2 (substitute — in the copular sentence) and/or at 4 (expand the sentence — which then can go on to 6 and 7, etc.). Or again in 17 (adverbialize) which can also be reapplied at 4.

To be sure, applying these rules will produce many sentences that do not occur. Further study will perhaps help refine the set of rules to eliminate those sentences whose failure to occur is not due to semantic accident.

Some of the rules could be looked upon as special cases of applying a series of the other rules. For example, 12 (subdue or highlight focus on negation) might be considered 16— (suspective: **Ponta.** → **poci**) + 7 (subdue or highlight the focus of the expansion: **poci** → **poci nun**) + 2 (substitute — in the verbal sentence: **Ponta. → Hanta.**) + 10a (**Hanta. → Ani hanta.**, abbreviated → ⋯ **anh.(nun)ta**). The abbreviation of **ani ha-** to **anh-** is the main reason for giving 11 and 12 as separate rules; notice also that the abbreviated form **anh.(nun)ta** cannot be used as a stand-alone sentence, unlike **Ani hanta**. A somewhat similar case may be seen in the following thinkable rule:

9´. Subdue (un / nun) or highlight (to) the focus on the sentence itself:

> Ponta. → Poki nun / to hanta.
>
> Cōh.ta. → Cōh.ki nun / to hata.
>
> Cip ita. → –

This rule of nuclear focus can be broken down into an application of 16a (summative: **Ponta.** → **poki**) + 7 (subdue or highlight the focus of the expansion: **poki** → **poki nun / to**) + 2 (substitute: **Ponta.** → **Hanta.** or **Cōh.ta.** → ⋯ **hata**). The only difficulty, aside from a vague feeling of unnaturalness, is the rather special nature of the dummy verb / adjective **hanta / hata**, which serves as a carrier for further conversions, much as English "do" serves to carry the inflection (and often the focus) in certain expressions, such as the inverted interrogative. We are also troubled by the parallelism between the expressions **poki nun poci man** 'looks at it, all right, but' and **cōh.ki nun cōh.ci man** 'is good, all right, but' and the synonymous expressions **poki nun haci man** and **cōh.ci nun haci man**, for along the way there seems to be no *poki nun ponta or cōh.ki nun cōh.ta, and even **Poki nun hanta** and **Cōh.ki nun hata** are a bit strange without further conversions.

The appropriate place for the nuclear-focus rule would seem to be between III (9) and IV (10). With 9 (status elevation of the subject) the order can apparently vary: **poki nun hasici man** or **posiki nun haci man** or even (reapplying 9) **posiki nun hasici man** 'DOES deign to deign to look but'.

It may well be that all situations calling for the dummy **ha-** should be set up as separate rules: **-ki to ha-, -ki man ha-, -ko nun ha-, -ta mōs ha-, ...** (See the entries in Part II.)

12.0. Mimetics.

Mimetics are strings of phonemes chosen (or thought to be chosen) so as to report immediate reactions to the sounds, the looks, or the feel of a situation. In Korean such strings enter into a set of structures that overlay the normal set and impart connotational meanings in addition to whatever other meanings may be present. CF G.A. Pak 1958, 1961; Fündling 1985.

12.1. Phonetic symbolism.

Korean makes rich use of a system of phonetic symbolism to create connotational variants of words. Many adjectives and adverbs, as well as some verbs and deictics, appear in several shapes that are systematically related in accordance with this system. In some cases the semantic relationship is weak or lost, so that the ties between the words are etymological rather than morphemic. For example, **nalk-** < *nolk-* 'is old = not new' and **nulk-** < *nulk-* 'is old = not young' would fit one of the patterns for word isotopes (§12.4) but the specialization of meaning, though understandable − the light isotope for "things", the heavy for "people" − is unique. Again, the verb stem **phu-** 'scoop out, dig' would seem to be a heavy isotope of **pha-** < *´pho-* 'dig', but the connotational relationship seems lost. The isotopic difference of meaning is practically gone from **yoli** 'this way', **koli** 'that way', **coli** 'that way (yonder)' in the directional meaning, though it is still present in the manner meaning. We can speculate that **kot-** < *kwot-* 'be straight' and **kwut-** < *kwut-* 'be hard' may once have been isotopes of the same etymon; and we can wonder about **nām-** < *˝nam-* (< *na´mo-*) 'remain, be left over' and **nēm-** < *˝nem-* (< *ne´mu-*)'be in excess', and perhaps even **mak-** < *mak-* '...; stop (fill) up' and **mek-** < *mek-* 'eat'.

12.2. Phonomimes and phenomimes.

There are about a thousand "impressionistic adverbs" in Korean. The group is traditionally divided into PHONOMIMES (**uyseng-e**) and PHENOMIMES (**uythay-e**). The reference of the phonomimes is primarily to a subjective impression of sounds, those of phenomimes to subjective impressions of sight, smell, taste, touch, or nonspecific reaction. The impressionistic adverbs are typically of one or two syllables, sometimes expanded into more. Many of them seem to be related, etymologically or morphemically, to more respectable items in the vocabulary (such as ordinary verbs and adjectives), but some appear to be pure creations of mimetic play. Many of the impressionistic adverbs appear in several related shapes. When the difference is one of reinforced rather than plain initial consonant we call the form an INTENSIVE (**sēyn māl**), and when the difference is one of aspirate rather than plain or

reinforced consonant we call the form a PARAINTENSIVE (keseyn māl). When the difference is a systematic alternation in medial vowels (a kind of "ablaut") we speak of WORD ISOTOPES. There is also a limited amount of phonetic symbolism in the codas of closed syllables, though we cannot find so clearcut a case for setting up a system. There are only a few paradigmatic sets, and they are incomplete. Even so, a case can perhaps be made for the following syllable-final symbolism:

···l smooth-flowing or liquid

kkol kkol 'bubble-bubble'	ping-kul(ulu) 'around smoothly'
kkwal kkwal 'gushing, gurgling'	posul 'in a drizzle, gently'
kkul kkul 'tsk tsk'	putul$_1$ 'quivering'
ppal ppal 'dripping freely'	putul$_2$ 'soft'
kantul 'gently swaying'	sāl sal 'gently, softly'
kapul 'moving lightly'	sōl sol 'soft-flowing, smoothly, effortlessly'
pal pal 'trembling, shivering'	swāl 'with a great flow, in torrents'
pancil 'slippery, slick'	senul 'cool (like air)' (CF sen-tul, sen-sen, sen-palam)

There may be a secondary association with the -(w)ul in mul 'water', swul 'wine', pul 'fire', pangwul 'bubble, drop', kay-wul 'river, stream', kewul 'mirror', kyel 'wave', ... ; wū-l- 'weep', hulu- 'flow', kwulu- 'roll', ...

···ng round, hollow, or open

ping, pping, phing 'around'	(p)pong / (p)pung 'with a poop (of flatulence)'
kkwung 'with a (hollow) thud'	p(h)otong 'chubby, plump'
kkwūng hata 'is gloomy, glum'	ssing 'whistle of the wind'
ppang 'pop, bang!; with a hole in it, glaring, gaping'	kkwang, khwang 'thump!'
(p)ang-kul, -sil, ... 'smiling'	kkwāyngkulang kkwāyng kkwāyng kkayng
(s)sang-kul, -sil, ... 'smiling'	'gong gong gong!'

There may be a secondary association with twungku-l- 'be round', kwungku-l- 'be hollow, empty', kwuleng 'pit', kwumeng 'hole', kwutengi 'hollow, dent', kwungtwungi 'buttocks', ...

···k abrupt, shrill, tight

ppayk / ppik 'whistling (steam), crying (birds, shrill voice)'	kkayk / kkik 'with a yell'
ppayk = ppaykppayk-i 'tightly packed'	kkwayk / kkweyk 'yelling, quacking'
	(k)kan(t)tak / (k)ku(n)(t)tek 'budging; bobbing'
(p)pakak / (p)ekek 'shrill sound as of two dry walnuts scraped together'	ka(t)tuk 'full'
	kkak 'tight, firm, fast'
pak 'with a rip'	kkaktwuk / kkektwuk 'slicing unevenly'
pak hata 'is tight; is stingy'	kkam(c)cak / kkum(c)cek 'being startled'
ppak ppak / ppek ppek hata 'is dry and hard, tight (like a wheel turning); narrow-minded'	kkam(p)pak / kkum(p)pek 'winking, blinking'
	kkyalwuk / kkilwuk 'craning one's neck'
	palak / pelek 'suddenly; insistently'
pūk / pōk 'with a scratch / rip'	palkkak / pelkkek 'in a sudden outburst of passion'
(p)pokcak / (p)pukcek 'bustling, thronging'	(p)palttak / (p)pelttek 'with a jerk, with a gulp'
	pasak / pesek 'rustle, crunch, crinkle'
sswuk / ssok 'abruptly'	(p)paykak / (p)pikek 'creaking, squeaking'
ssik 'with a sudden smile'	pokak / pukek 'bubble, pop (in fermenting)'
	ppyo(c)cok 'sharp-pointed'
ssak / ssek 'in one clean stroke / sweep'	pulsswuk / polssok 'popping/blurting out unexpectedly'
ssaktok / ssektwuk 'chopping, snip!'	(s)sakak / (s)sekek 'crisp, crunchy'

For ···p it is hard to find good examples, but I suspect it may work like ···k. For ···s (/t/), ···m, and ···n it is hard to find isolated examples. But in associated relationship with other finals, ···s seems to mean

something like 'in small, fine, pointed detail', ‑‑n to suggest 'a light, quick movement', and ‑‑m to imply 'over a large area' or 'amply, nicely':

SMOOTH	ROUND	ABRUPT	FINE	LIGHT	SPREAD
‑‑l	‑‑ng	‑‑k	‑‑s	‑‑n	‑‑m
(k)kamul 'blurred, hazy; flickery'		kkamak 'flickering, blinking, winking'	(k)kamus 'speckled, dotted with black'		
(k)kapul 'moving up and down; frivolous'			(k)kapus 'rather light'	(k)kapun 'light, nimble'	
kephul 'fluttering, flapping'			kephus 'flapping, fluttering'	kephun 'flapping, fluttering'	
		kkilccik 'rather long'		kilccum 'nice and long'	
				kyalum / kilum 'nicely oval'	
	(k)kiwu-twung 'tilting, rocking'		(k)kiwus 'slanting a bit'	(k)kiwu-tum 'slanting, sloping'	
			kkaykkus 'clean'		kkaykkum 'comely'
(k)kopul 'meandering'			(k)kopus 'slightly bent'	kopun 'submissive, compliant'	
(p)pang-kul[1] 'with a smile'			(p)pang-kus 'with a smile'		
			pekus 'loosened; slightly apart'	pekun 'loose'	ppekkum 'cracked, split'
santul 'blowing cool and gentle'		san(t)tuk 'with a sudden chill'	santtus 'clean, cool, neat, light'		
(s)soksal 'whispering'		soksak (s)soktak 'whispering'		(s)sokon 'whispering'	
				kalkun 'scratchy to the throat; greedy'	kkalkkum 'pricking, irritating'

[1] CF ping-kul 'around smoothly'.

The associations of final consonants are complicated by the derivative suffixes that end in various consonants: -um, -un, -ul, -us, -sulum, ... The elements nukus (XX, XXh = Xk) and nukul (Xk) mean much the same thing, 'feeling nauseated'; CF nukun / nakun (XX, XXh = Xk) 'flexible,

bending'. It is likely that some of the cases of mimetic ···n, ···l, and ···m represent reductions of an old version of **han**, **hal**, and **ham** from **ha-** 'be/do' (MK °*ho*-). We are tempted to wonder whether there is a relationship between the postnoun **cil** 'a process' and the noun **cīs** 'an act, a gesture' — CF **cī(s)-** 'make', even knowing that the noun was earlier ″*cus* (? < *ci'z-us*). But these are etymological speculations.

12.3. Intensives and paraintensives.

Connotational variants show the following set of relationships of initial consonants:

SIMPLE	p	t	s	c	k	0 [vowel][1]
INTENSIVE	pp	tt	ss	cc	kk	—
PARAINTENSIVE	ph	th	—	ch	kh	h

[1] As in **engkhu-l-** / **hengkhu-l-** 'entangle'.

Certain variants are dialect forms of words that have been standardized in one of the shapes and do not admit a connotational variant, such as the common use of **thuli-** for the postnominal verb with the standard form **ttuli-**. The intensive and paraintensive forms can be treated as having an infix, **-q-** and **-h-** respectively. And the infixes sometimes turn up in unexpected places, e.g. the intensive in **-e ppeli-** for **-e peli-** 'get it all done'; the paraintensive in **pul i nakhey** for **pul i nakey** 'so that sparks fly' = 'hastily', and **kulech'anh.e to** for **kulec'anh.e to** 'nevertheless'. In the KEd etymology I mistakenly assumed that /camcakho/ 'silently' was from **cam cako** 'sleeping (a sleep)' + **-h-**, but actually the word is **cam-ca' kho** < **cam-cam hako**.

12.4. Word isotopes.

Some Korean words have several shapes that vary in vowel quality. For the meaning 'with a moan or a groan' there are four shapes: **kkayng**, **kking**, **kkong**, and **kkwung**. **Kkayng** and **kkong** are used for light quiet moaning, **kking** and **kkwung** for heavy loud groaning; I doubt that **kkayng** and **kkong** are perfect synonyms, but I do not know what the difference is. The differences in connotation that we have managed to pin down I refer to in terms of "word isotopes": a given word may have a LIGHT isotope and a HEAVY isotope. Certain vowels (a, ay, o, oy) are typical of the light isotopes, others (e, ey, wu, wi < *wuy*) are typical of the heavy. The vowels u and i are either heavy or neutral. The isotopic difference of meaning is not always strongly present, and sometimes one isotope is felt to be "neutral" or "basic" (i.e. connotationally unmarked) — frequently the one with the heavy vowel, unless the underlying meaning is in itself strongly suggestive of the light vowel. Usually the more "neutral" isotope is etymologically older, but we cannot always be sure. Thus **payng**, **ppayng** and **phayng** are LIGHT isotopes to **ping**, **pping**, and **phing**, which seem to be more neutral than heavy; and **singtwung** (XX hata) is a HEAVY isotope to **sayngtong** 'fresh as a daisy, bright-eyed, hale-and-hearty' which seems to be more neutral than LIGHT. In the meaning 'damp-dry' **(p)potok** is definitely LIGHT in connotation, and **(p)putuk** is usually neutral, but occasionally HEAVY. In certain word families it is appropriate to recognize a neutral form in addition to the light and heavy isotopes: for 'limping, hobbling' the light isotope is **(c)calttok**, the heavy **(c)cilttwuk**, and **(c)celttwuk** appears to be neutral (CF **cē-l-** 'hobble').

The meanings of the isotopes range from 'petite' (good) to 'dinky' (bad) for the LIGHT and from 'ample' (good) to 'bulky, clumsy' (bad) for the HEAVY. Specifically, the LIGHT isotope is used of something light of weight, or tiny, or delicate, or fragile, or bright and airy; or again, it is used by a person who is (or wants to behave as if he were) light, airy, small, delicate, fragile. For this reason, the light isotopes are often used by or of women and children, the heavy by or of men. (Can this be correlated with preferences for **-a** vs **-e** to represent the infinitive ending after a stem-final syllable with the vowel /a/?) The weight of the isotope, as it were, may fall either on the referent of the particular word or, perhaps less often, on the person who does the talking. The light isotope is often extended to a pejorative connotation. From the meaning 'small' we move on to the meanings 'petty, paltry, insignificant, dinky' and from the meaning 'fragile' we move on to the meanings 'unsubstantial, flimsy, flighty, frivolous, silly'. So **ku nom** means just 'that guy' but **ko nom** means 'that silly guy,

that stupid fool, that worthless rascal'. And **kēcis mal** is a 'falsehood', but **kācis mal** is a 'dirty stinking lie'. The HEAVY isotope refers to things which are weighty, ponderous, serious, clumsy, unwieldy, and bulky — or which are dark, gloomy, or somehow inaccessible. We are tempted to link the vowel symbolism with the Chinese philosophical concept of **thaykuk** 'the great ultimate' which divides into **um** 'the dark side' and **yang** 'the bright side', as in the monad symbol on the flag of the Republic of Korea, and indeed the isotopic vowels are referred to by Korean linguists as 'bright' (yang) and 'dark' (um) sounds. But in Chinese thinking the male element is 'bright' and the female 'dark', so the Korean concept seems askew here, just as in its choice of LOWER vowels for the light isotopes and HIGHER vowels for the heavy isotopes runs counter to the notions of Edward Sapir, Roger Brown, and others, with respect to the non-culturally determined "naturalness" of phonetic symbolism. Moreover, the Chinese idea centers on brightness and energy or vitality, while the Korean seems to focus more on substance.

In some cases we have what look like isotopes, but the meanings are too divergent to class the words together. For example, **ssal ssal** means 'chilly, cold' and **ssul ssul** means 'lonely, dreary'. In some cases the word has both literal and figurative (or abstract) meanings; often the isotopic difference holds just for the literal meaning, and only one of the forms (often the light) occurs in a figurative sense, or else both forms occur, but as pure synonyms with no connotational feelings apparent. For example, **ssaktok ssaktok** is the light isotope and **ssektwuk ssektwuk** is the heavy isotope of a word that means 'chopping, snipping, slicing off', but in the figurative sense 'a choppy sentence' only the light isotope is used.

The isotopes are not limited to impressionistic adverbs. Observe the following pairs, in which the first word is neutral and the second a light isotope: **ek-swu, ak-swu** 'heavy rain'; **ekci, akci** 'stubbornness'; **yewi-, yawi-** 'get emaciated'; **ic.e peli-, yaca peli-** 'forget'; **inceng, yancang(-meli)** 'humaneness'. (There may be a similar etymological relationship between **enc-** 'put on top' and **anc-** 'sit'.) The Chinese vocabulary is not totally immune from the mimetic phenomena: **yamchi** is the light isotope of [1]**yemchi (ēps.ta)** '(has no) sense of shame', pejorative. The isotope is spelled with y··· in NKd, not [1]**y···** .

For the neutral deictics **i** 'this', **ku** 'that', and **ce** 'that (yonder)' we find the light isotopes **yo, ko,** and **co**; for **yeki** 'here', **keki** 'there', and **cēki** 'there (yonder)' we find the light isotopes **yoki, koki,** and **coki**. The verb **(h)opinta** has a light-heavy relationship with **(h)wupinta** 'scoops it out'. The adjective meaning 'small' is **cēkta**, but this form is now mainly used in the meaning 'small in number or quantity, few', and the light isotope **cākta** is used as the common adjective for 'small in size'. (There is also the form /cok/ in **cokum / cokom** 'a little', a derived substantive, from which is contracted the adverb **com** 'a little; please'.) The stem meaning 'be large' has a heavy vowel in its neutral form, and we are not surprised that it lacks isotopes: **khuta**. But perhaps the trace of a light isotope can be found in the obsolete adjective **hata** 'is much / great, are many', now limited to the modifiers **han** ··· and **hal** ··· 'great, grand' (as in **han kil** > **hayngkil** 'highway' and **hal-apeci** 'grandfather'), the gerund **hako (mānh.ta)** 'extremely (many)', **ha (to)** ··· 'extremely (indeed), muchly', and the first word in **hachi anh.ta** 'is trivial' — which is either a paraintensive or a variant of the suspective **haci**. The adjective 'heavy' (**mukepta**) has heavy vowels, as does the adjective 'dark' (**etwupta**); these have only the neutral forms. The all-purpose stem **ha-** 'do / be' is sometimes heard in a heavy isotope **he-**, especially in men's speech. This seems to be independent of the general vowel raising thought to be in process in the Seoul area.

A few sets of words show fronting (palatalization) used for mimetic effects independently from the isotopes, as seen in the pair **nōylah.ta / nwīleh.ta** (< *nwoy··· / nwuy···*) 'is a sickly yellow', derived from **nōlah.ta / nwūleh.ta** 'is yellow'.

12.5. Mimetic constructions.

The impressionistic — or "mimetic" — adverbs occur in constructions that can be symbolized as follows:

X	adverb or interjection (of 1, 2, or 3 syllables)
XX	iterated (repeated) adverb or interjection
X hata	adjectival noun + postnominal adjective
X hanta	verbal noun + postnominal verb
XX hata	iterated adjectival noun + postnominal adjective
XX hanta	iterated verbal noun + postnominal verb (= X kelinta = X täynta)
X inta	verbal noun + postnominal verb (usually = X hanta)[1]
X (h)i	adjectival noun + derived adverb ← postnominal adjective

[1] CM 1:408 implies that inta is the same in meaning as kelinta, and that X kelinta shows greater repetition that XX hanta.

We can set up form classes for the various shapes as follows. One group will occur only as adverbs (X, XX); one group only as adverbs and/or adjectival nouns (X, X hata, XX hata); one group only as adverbs and/or verbal nouns (X, X hanta = X kelinta / täynta, X inta). And, finally, one group can occur as either adjectival or verbal nouns. Within each of these four groups there are subgroups:

MAJOR CLASS	SUBCLASS	EXAMPLE (see KEd for meanings)
I. adverb	1. X	kkok
	2. X, XX	ken(t)tus
	3. XX	swung / song; (s)swungteng / (s)songtang
II. adjectival	4. X hata, (X hi, X 'i)	kapus
	5. XX hata, (XX hi, XX 'i)	?
	6. XX, XX hata	kamcak₁
	7. X hata, (X hi, X 'i), XX, XX hata	kapun
	8. X, X hata, (X hi, X 'i), XX, XX hata	colmak
	9. X, X hata, XX	kalssang; kkalkkun
	10. X hata, XX hata	?
	11. X, XX hata	?
III. verbal	12. X kelinta	kkaylkkak
	13. XX, X kelinta	kephun
	14. X hanta, XX, XX hanta = X kelinta	kachis
	15. X inta, XX, X kelinta	kkancak
	16. X, XX, X kelinta	kangcang
	17. X, X inta, XX, X kelinta	katak₁
	18. X, X hanta, XX, XX hanta = X kelinta	kkik
	19. X, X hanta, X inta, XX, XX hanta = X kelinta	kkam(c)cak₃
	20. X, X hanta	picwuk₁
	21. X, X kelinta	picwuk₂
IV. verbal / adjectival	22. X inta, XX, XX hanta = X kelinta; XX hata	kancil
	23. XX, XX hanta = X kelinta; X hata	kangtong
	24. X, XX, XX hanta = X kelinta; X hata, (X hi)	?
	25. X, XX, XX hanta = X kelinta; XX hata	pulsswuk
	26. X, X kelinta; X hata	?

12.6. Shapes of mimetic adverbs.

The mimetic adverbs occur in shapes of one or two syllables, for the most part. With respect to initials, there are three patterns of alternation:

(1) C plain, Cq intensive, Ch paraintensive: **ping, pping, phing** 'around'

(2) Cq intensive (or plain), Ch paraintensive: **kkwal, khwal** (XX, X kelinta) 'gushing, gurgling'

(3) C plain, Ch paraintensive: **wupi-cek, hwupi-cek** (XX, X kelinta) 'scooping out'

When there are two syllables, we find various subtype groupings:

(1) C-C, Cq-C: **kangtong, kkangtong** 'hopping up and down' (XX, X kelinta 'is too short')

   C-Ch, Cq-Ch: **komthul, kkomthul** (X, X hanta, XX, X kelinta) 'wriggling'

   C-Cq, Cq-Cq: **palttak, ppalttak** (X, XX, X kelinta) 'jerking, gulping'

   C-C, Ch-C: **potong, photong** (XX, XX hata) 'chubby, plump'

(2) C-C, C-Cq: **katun, kattun** (X hata, XX, XX hata) 'light, nimble'

   Cq-C, Cq-Cq: **kkampak, kkamppak** (X, X hanta, X inta, XX, X kelinta) 'winking, blinking, flickering'

   C-C, C-Ch: **sikum, sikhum** (X hata, XX hata) 'sourish'

   C-Cq, C-Ch: **palkkak, palkhak** (X = XX) 'in a sudden outburst, topsyturvy, in turmoil'; X kelinta 'it bubbles up; squashes it under foot'

(3) C-C, C-Cq, Cq-C: **pantuk, panttuk, ppantuk** (X, X hanta = X inta, XX, X kelinta) 'shining, glistening'

(4) C-C, Cq-C, Cq-Cq: **ka(n)tak, kka(n)tak, kka(n)ttak** (X, XX, X kelinta, X inta, X ēps.ta) 'budging, nodding, bobbing'

(5) C-C, C-Cq, C-Ch: **sapun, sappun, saphun** (XX, p X kelinta; pp, ph X) 'with soft muffled steps'

(6) C-C, Cq-C, C-Ch: **salkkang, ssalkang, salkhang** (XX, X kelinta) 'hard-chewing, lumpy'

(7) C-C, Cq-Cq, Cq-Ch: **kangcang, kkangccang, kkangchang** (X, XX, X kelinta) 'taking long strides'

(8) C-C, C-Cq, Cq-C, Cq-Cq: **pancak, panccak, ppancak, ppanccak** (X, X hanta = X inta, XX, X kelinta) 'sparkle, glitter, twinkle'

In the last example the intensive becomes more and more emphatic as (1) the reinforcement moves to the beginning, and (2) the reinforcement repeats.

Some of the vowel alternation patterns found in word isotopes are shown below, with the light vowel given first (and only it exemplified):

a/e	kkal (XX, X kelinta) 'laughing loudly'
a-a / e-e	sapak (XX, X kelinta) 'crunching'
a-o / e-wu	(k)kangtong (XX, X kelinta) 'jumping up and down'
a-wu / e-wu	(p)pantwung (XX, X kelinta) 'idling, loafing'
a-u / e-u	kasul (XX hata) 'rough, bristly; stubborn'
a-u-a / e-u-e	kantulang (XX, X kelinta) 'wobbling, swaying'
a-i / e-i	paksin (XX, X kelinta) 'swarming, crowding, thronging'
a-i-a / e-i-e	(k)kachicak (XX, X kelinta) 'getting in the way'
a-ay / e-ey	?
a/u ?< o/u	kkan (XX hata) 'sticky'
a-a / u-e	(k)a(n)(t)tak (X, XX, X kelinta, X inta) 'budging, bobbing'
a-u-a / u-u-e	(k)ka(t)tulak (XX, X kelinta) 'strutting, swaggering'
a-u / u-u	kkalkkum (X hata) 'dashing, smart; sharp, harsh'
a-u / (w)u-u	(p)patuk (XX) 'persistently, obstinately'
a-a / u-u	ssapsal (X hata) 'slightly bitter'
a/i	sam (XX hata) 'slightly flat, tasteless'
a-i-i / u-i-i	pacici(k) (X, X hanta, XX, X kelinta) 'rip; fizz'
a-i-e / u-i-e	pacilen (X hata) 'diligent'

ya···/i···	(k)kyawus (X hata) 'aslant'
	yalkus (X hata, XX, XX hanta = X kelinta) 'rickety'
ay/i ? < *oy/uy*	kkayk (X, X hanta, XX, XX hanta = X kelinta) 'cry, yell'
ay-a / i-e	kkaycak (XX, X kelinta) 'scribbling, scratching'
ay-u / i-u	(p)paythul (XX, X kelinta) 'staggering'
ay-wu / i-wu	saylccwuk (XX, X kelinta) 'distorted, out of shape'
ay-i / i-i	kaysin (XX, X kelinta) 'listless, languid'
ay/ey	?
ay-a / ey-e	kkaycak (XX, X kelinta) 'halfheartedly, unenthusiastically'
ay-i / ey-i	kkaycil (XX, X kelinta) 'halfheartedly, unenthusiastically'
ay-i-a / ey-i-e	kkaycilak (XX, X kelinta) 'halfheartedly, unenthusiastically'
o/wu	sōl (XX) 'soft-flowing, effortlessly'
	song (XX) 'minced; perforated'
o-o / wu-wu	(s)sokon (XX, X kelinta) 'whispering'
o-o-o / wu-wu-wu	ppyolothong (X, X hata, XX, XX hata) 'pouty, sulky'
o-a / wu-e	kkolttak (X, X hanta, X kelinta) 'gulping, swallowing'
o-i / wu-i	(k)kom(c)cil (X, XX, X kelinta, X mōs hanta, X ēps.ta, X inta) 'budging'
o-i-a / wu-i-e	(k)kom(c)cilak (X, XX, X kelinta, X mōs hanta, X ēps.ta, X inta) 'budging'
o-wu / wu-wu	(k)komul (XX, X kelinta) 'moving sluggishly'
o-wu-e / wu-wu-e	(k)komulak (XX, X kelinta) 'moving sluggishly'
o-u / wu-u	(k)komthul (X, X hanta, XX, X kelinta) 'w(r)iggle'
o-u-u / wu-u-u	kkoluluk 'rumbling, gurgling, snorting, cackling'
wa/wu	kkwang (X, X hanta) 'boom, rattle, roar'

It will be seen that a heavy isotope never contains a light vowel in its first or second syllable, and only rarely in the third syllable. A light isotope, however, can contain a heavy vowel in any noninitial syllable. Many of the two-syllable impressionistic adverbs have an etymologically recognizable morpheme, such as a verb or adjective stem, as the first syllable, and the second syllable is to be regarded as a derivative suffix. The most popular of the suffixes are the groups -(c)cak/-(c)cek, -chak/-chek; -(c)cok/-(c)cwuk; -(c)cik, -(c)cimak, -(c)cumak. These are probably all related to cāk-/ cēk- 'little'. We also find the diminutive suffixes -ak/-ek, -ang/-eng, etc., which have widespread use outside the mimetic system. Other derivative suffixes found are -kkak/-kkek, -mak/-mek, -(p)pak, -ppuk, -(s)sek, -sil, -sin, -sul, -(s)swuk, -swung, -ttak/-ttek, -ttuk, -ttwuk. And -ulu and -wulwu are adverb-deriving suffixes similar in kind. There are undoubtedly other suffixes which should be added to this list. In some cases I have hesitated because of uncertainty about the etymology of the prior syllable, in other cases there are syntactic factors which make the seeming "suffix" better handled as something else.

12.7. Iteration.

Sentences, phrases, and words are often repeated for emphasis or other special effects. When the repeat is partial, that is called (partial) REDUPLICATION. When the entire expression (or its verb) is repeated, that is called ITERATION or (especially when what is repeated is less than a word) total reduplication. When a noun is iterated it is often to be taken as plural or collective: cip cip mata '(each and) every house'. Iterated adjectives occur in several structures used to intensify the meaning: khuti khuta, khuki to khuta 'is ever so big'; khuna khun ··· , khuko khun ··· 'a really big ··· '; ... . Iterated processive verbs refer to repeated or habitual happenings: ilk.ko ilk.un ku phyēnci 'that letter which I read and read'; Kitaliko kitalitun nal i wass.ta 'The long-awaited day has come'; Ilum molulq sāy tul i nac.un hanul ul nal.e kako nal.e oko hayss.ta 'Birds of unknown name flew back and forth low in the sky'; Il.yoil mata na lul chac.e oko chac.e oko (chac.e oko n') hayss.ta (Dupont 125) 'He was in the habit of coming to see me every Sunday'.

Appendix 1. List of stem shapes.

The following lists attempt to include all shorter stems: those of one or two syllables, and in certain cases of three. Longer stems are usually compounds of more than one stem, as are some of the shorter stems cited here, or of noun + stem. In general, no meanings are given, only shapes; the same shape may correspond to a number of homonyms, and these sometimes differ in etymologies. Those shapes followed by ₐ are of adjective stems only, those followed by $_{VA}$ are of both adjective and verb stems. When the ₐ is in parentheses, the adjective is auxiliary or postnominal only. When the ᵥ is in parentheses, the shape is uncommon or questionable as a processive verb. The notation $_{Cop}$ marks the copula stem, and the irregular stem **ha-** is marked with ₁ . The lists are arranged according to the linguistically interesting features that they illustrate; within that frame of reference, the lists are alphabetical. For lists 4-8 (longer i-stems), variant forms are cited that are the result of vowel assimilation (§2.7.9). In most of the cases the "assimilated" form, while quite common in speech, is avoided in writing. In some cases the historically "assimilated" form has acquired independent status and either replaces or contrasts with the historically "unassimilated" form. Bracketed together are the several groups of verbs which are spelled differently but pronounced alike (owing to convergences of morphophonemic sequences). These mostly involve causative and passive stems, but in some cases also the normal verbs. List 7 (longer i-stems with sibilants) displays all the honorific verbs derived from one-syllable stems, with the source stem shown after "<". Normal stems that are homonyms of honorific verbs are shown in a separate column.

Guide to the lists

1 – 11. Vowel stems and h-stems

1. One-syllable vowel stems and ⋯h- stems

2. Longer vowel stems, except for ⋯wu- and ⋯i-

3. Longer ⋯wu- stems

4. Longer ⋯i- stems (except velar, palatal, sibilant, liquid)

5. Longer ⋯i- stems with velars: ⋯ki-, ⋯kki-, ⋯khi-

6. Longer ⋯i- stems with affricates: ⋯ci-, ⋯cci-, ⋯chi-

7. Longer ⋯i- stems with sibilants: ⋯ssi-, ⋯si-, honorifics in ⋯si-

8. Longer ⋯i- stems with liquids: ⋯li-, ⋯lli-

9. L-extending vowel stems (CF 1): ⋯a-l-, ⋯e-l-, ⋯o-l-, ⋯wu-l-, ⋯u-l-, ⋯i-l-

10. L-doubling vowel stems (CF 1, 9): ⋯alu-, ⋯elu-, ⋯olu-, ⋯wulu-, ⋯ulu-, ⋯ilu-

11. L-inserting vowel stems (CF 1, 10)

12 – 17. Consonant stems

12. Consonant stems: ⋯p- and ⋯w- (CF 3, 1 ⋯wu-)

13. Consonant stems: ⋯ss-, ⋯ps-, ⋯ph-, ⋯s-, ⋯(s)-, ⋯t-, ⋯t/l- (CF 9), ⋯lq-, ⋯c-

14. Consonant stems: ⋯ch-, ⋯th-, ⋯lth-, ⋯lh-, ⋯lph-, ⋯lp-, ⋯lw-

15. Consonant stems (velars): ⋯k-, ⋯kk-, ⋯lk-, ⋯ks-

16. Consonant stems (nasals): ⋯m-, ⋯lm-, ⋯n-, ⋯nc-, ⋯nh-

17. Ambivalent stems: ⋯a(h)-, ⋯ay(h)-, ⋯e(h)-

List 1. One-syllable vowel and ⋯h- stems

⋯a-	⋯ay-	⋯e-	⋯ey-	⋯o-	⋯oy-	⋯ah-	⋯eh-	⋯oh-	⋯wu-	⋯wey-	⋯wi-	⋯u-	"⋯uy-"	⋯i-
				o-	ōy-$_{VA}$									i-$_{VCop}$
														ī-
ca-	cāy-$_{VA}$				cŏy-			cōh-$_A$	cwu-		cwī-			ci-$_{V(A)}$
														cī-[11]
cca-$_{VA}$	ccāy-$_{VA}$			ccŏ-	ccŏy-	ccah- Dial.								cci-
cha-$_{VA}$	chăy-								chwu-					chi-
ha-$_{VA}$!		(he-)	hēy-	hō-							hwi-		huy-$_A$	
ka-	kăy-		kēy-[6]	kŏ-	kŏy-									
	khăy-	khe-[1]										khu-$_{VA}$		khi-[12]
		khye-[2]												
kka-	kkăy-			kko-	kkŏy-				kkwu-	kkwēy-	kkwi-	kku-		kkī-[13]
mă-	măy-		mēy-	mō-[8]	mŏy-									mī-
na-	năy-				nŏy-	nah-	neh-	noh-	nwu-		nwī-[9]			
	(pay-$_{VA}$)													
	pāy-		pēy-	po-	pŏy-									pī-[14]
pha-		phye-[3]	phyēy-[7]						phu-			(phu-)[10]		phi-
	ppay-					ppah-								ppī-
	ppāy-													
		se-[4]			soy-							su-		si-$_A$
	sāy-		sēy-$_{VA}$		sŏy-						swī-			
ssa-$_{VA}$	ssăy-	sse-[5]		sso-	ssoy-	ssah-			sswu-			ssu-		
	tăy-		tēy-$_{V(A)}$		toy-$_V$	tah-			twu-		twi-			
					tōy-$_A$									
tha-	thăy-										thwi-	thu-	thuy-	
tta-	ttăy-		ttēy-		ttoy-	ttah-					ttwi-	ttu-		tti-
												ttuy-		
														⋯ih-
														ccih-

1 = khu-   6 = kēywu-   8 = mou-   9 = nwui-   10 See ⋯wu-   11 = ciwu-
2 = khi-   7 = phī-, phii-   12 = khye-
3 = phi-   13 = kkī(i)-, kkiwu-
4 = su-   14 = pii-, piwu-
5 = ssu-

List 2. Longer vowel stems, except for ‑‑wu‑ and ‑‑i‑

‑‑a‑	‑‑ay‑	‑‑e‑	‑‑ey‑	‑‑o‑ na-o-	‑‑oy‑	‑‑wi‑	‑‑u‑ mou-	"‑‑uy‑" yeuy-
cam ca-								
ancha-$_A$	twichay-					pichw(i)i-		
pek cha-$_A$	anchay-							
kēl-cha-$_A$								
te-ka-	cc^{e}akay-					sakwi-	camku-	
na-ka-	pp^{e}akay-					y^{e}akwi-$_A$	nungku-	
samka-	ccokay-						cingku-	
	kaykay-					halkhwi-	taku-	
	pho-kay-					kalkhwi-		
						pakkw(u)i-		
				ilo-	aloy-		chilu-	
cala-	pokkay-	c^{u}ole-		(kalo-)	saloy-		ttalu-	
pala-	ukkay-	k^{u}ole-						
	kalay-	yole-/ile-						
tālla-	kalkay-							
nŏlla-	palay-							
	kallay-		selley-					
cīna-	tallay-		tulley-				tullu-[4]	
kas-na-	nŏllay-							
tte-na-	olay-$_A$							
kyek-na-	heymay-							
kep na-	cīnay-							
ǀmas na-	ponay-	kēnne-[2]	kēnney-			nanw(u)i-	kēnnu-	
ǀmanna-[1]							tenu-	
nēm-na-							kkonu-	
sin-na-							nonu-	
							kunu-	
							munu-	
	tē(-)say-	na-se-[3]	ek-sey-$_A$			ke-swi-	na-su-	
	ēps.ay-		ke-sey-$_A$				tŏ-su-	
			kwut-sey-$_A$				twī su-	
			ppe-sey-$_A$					
pissa-$_A$	nal-ssay-						āy ssu-	
cay-pssa-$_A$								
māta-	chi-tāy-			ho-toy-				
	kī-tay-			kotoy-				
....	....					....	....	
namula-						pācawi-	tatalu-	
nathana-	nathanay-						wulelu-	
VN + ha-ǀ							puluthu-	

[1] < mac-na- [2] = kēnnu- [3] = na-su- [4] = tulli-. Instead of the unique shape tullu- we would expect, if anything, an l-doubling tulu-. Tulli- is more common and better suited to be treated as "standard", but tullu- is also widely used and it is treated as standard by many authorities.

List 3. Longer ··wu- stems

(There are no stems that end in ···owu-, ···wiwu-, ···hwu-, ···sswu-, ···ttwu-, ···pu-, ···mu-.)

···awu-	···aywu-	···ewu-	···eywu-	···oywu-	···iwu-	("···uywu-")
ssawu-	caywu-	kewu-	eywu-	oywu-	iwu-	ttuywu-
	chaywu-		key(wu)-		ciwu-	ssuywu-
	kkaywu-		meywu-		cciwu-	
	paywu-		seywu-		chiwu-	
	saywu-		teywu-		kkiwu-	
	thaywu-				piwu-	
	ttaywu-				phiwu-	
	......				......	
	sisaywu-				kaliwu-	

···cwu-	···ccwu-	···chwu-	···kwu-	···khwu-	···kkwu-	···ngwu-
kyencwu-	yẽccwu-	chac.chwu-	angkwu-	mulkhwu-	kakkwu-[1]	sangwu-[2]
		|machwu-	engkwu-		pakkwu-	
		|mac.chwu-	heyngkwu-		sos.kwu-	
		kamchwu-	ilkwu-		tot.kwu-	
		nac.chwu-	talkwu-			
		nuc.chwu-				
		memchwu-				
		tulchwu-				

[1] < kac.kwu-   [2] = sang ha- (?< ˙[h]wu- < ˙hwo-, modulated stem of °ho- 'do')

···swu-	···twu-	···thwu-	···lwu-	···nwu-	···ppu-	···phu-
naswu-	katwu-	tathwu-	kalwu-	kanwu-	kappu-	aphu-
muswu-	ketwu-	yethwu-	palwu-	(kenwu-)	nappu-	hẽyphu-
pᵃ/ᵤswu-	tot.wu-		kel.wu-	kyenwu-	pappu-	kophu-
				kyelwu-		
				sulwu-	(yeyppu-)	puphu-
				ilwu-	ippu-	......
				milwu-	......	kanyalphu-
					mippu-	koktalphu-
					sippu-	kwusulphu-
					kwuppu-	sekulphu-
					......	ẽsulphu-
					(e.yeppu-)	nwiwuppu-

List 4. Longer ··i- stems (except oral velar, palatal, sibilant, liquid).

(There are no stems that end in ···ppi- or ···tti-.)

···ai-	···ayi-	···ei-	···eyi-	···oi-	···oyi-	···wui-
ccai-	kkayi-	khyei-[1]	eyi-	ccoi-	coyi-	kkwui-
sai-		?peyi-	kkoi-	koyi-	mui-
ssa(h).i-				moi-	kkoyi-	nwui-[2]
				poi-		......
				no(h).i-		nanw(u)i-
						pakkw(u)i-
						pichw(u)i-

···ui-	···ii-	···pi-	···phi-	···mi-
ssui-	chii-	h^{e}api- (→ h^{e}aypi-)	cap.hi- (→ cayphi-)	cemi- (→ ceymi-)
thui-	kii-	hopi-/hwupi- (→ hoypi-	palp.hi- (→ paylphi-)	yemi- (→ yeymi-)
	khii-[3]	/hwipi-)	salphi- (→ saylphi-)	kkwumi- (→ kkwimi-)
	kkii-	tempi- (→ teympi-)	s^{e}alphi-$_A$ (→ s^{e}aylphi-)	sumi- (→ simi-)
		nwupi- (→ nwipi-)	nelph.hi- (→ neylphi-)	
		pumpi- (→ pimpi-)	cep.hi- (→ ceyphi-)	
			tep.hi- (→ teyphi-)	
			cop.hi- (→ coyphi-)	
			noph.i- (→ noyphi-)	
			kwup.hi- (→ kwiphi-)	
			nwup.hi- (→ nwiphi-)	
			cip.hi-	
			ip.hi-	

···ti-	···thi-	···ni-	···ngi-	···hi-
mati-$_A$ (→ mayti-)	pethi- (→ peythi-)	ani [i]-$_{Cop}$	tongi- → toyngi-	ssah.i- (→ ssay[h]i-)
teti-$_A$ (→ teyti-)	tuthi- (→ tithi-)	tani- (→ tayni-,	(cangi- ←) cayngi-	noh.i- (→ noy[h]i-)
kyenti- (→ keynti-)		tayngki-)	pangi- (→ payngi-)	kkulh.i- (→ kkil[h]i-)
eph.ti- (→ eyptti-)		cini-	pacangi-/pecengi- (→	
muti-$_A$ (→ miti-)			pacayngi-/peceyngi-)	
titi-				

1 = khii-   2 = nwup.hi-   3 = khyei-

List 5. Longer ···i- stems with oral velars

···ki-	···khi-	···kki-
(maki- ←) mayki-	mak.hi- (→ maykhi-)	akki- (→ aykki-)
(paki- ←) payki-	(nakhi- ←) naykhi-	as.ki- (→ aykki-)
pak.i- (→ payki-)	pak.hi- (→ paykhi-)	math.ki- (→ maykki-)
(saki- ←) sayki-	kalk.hi- (→ kaylkhi-)	takk.i- (→ taykki-)
sak.i- (→ sayki-)	palk.hi- (→ paylkhi-)	(ppakki- ←) ppāys.ki-
kalki- (→ kaylki-)	cek.hi- (→ ceykhi-)	kkekk.i- (→ kkeykki-)
kkalki- (→ kkaylki-)	mek.hi- (→ meykhi-)	(kkekki- ←) kkeykki-
camki- (→ cayngki-)	elk.hi- (→ eylkhi-)	pes.ki- (→ peykki-)
kamki- (→ kayngki-)	engkhi- (→ eyngkhi-)	(pekki- ←) peykki-
namki- (→ nayngki-)	sok.hi- (→ soykhi-)	pokk.i- (→ poykki- →
tamki- (→ tayngki-)	mongkhi-/mungkhi- (→	pekki-)
tangki- (→ tayngki-)	meyngkhi-/mingkhi-)	(ekki- ←) eykki-
(tangki- ←) tayngki-	omkhi-/wumkhi- (→	sekk.i- (→ seykki-)
(sangki- ←) sayngki-	oyngkhi-/wingkhi-)	ccoch.ki- (→ ccoykki-)
pp^{e}aki- (→ pp^{e}ayki-)	olk.hi- (→ oylkhi-)	kwuc.ki- (→ kwikki-)
p^{e}alki- (→ p^{e}aylki-)	muk.hi- (→ mikhi-)	wus.ki- (→ wikki-)
s^{e}angki- (→ s^{e}ayngki-)	kwulk.hi- (→ kwilkhi-)	mukk.i- (→ mikki-)
(sengki- ←) seyngki-	chwukhi- (→ chwikhi-)	ttut.ki- (→ ttikki-)
semki- (→ seyngki-)	kulk.hi- (→ kilkhi-)	nukki- (→ nikki-)
eki- (→ eyki-)	nulkhi- (→ nilkhi-)	pikki-
mek.i- (→ meyki-)	tulkhi- (→ tilkhi-)	pis.ki-

yeki- (→ yeyki-)
engki- (→ eyngki-)
kemi- (→ keyngki-)
(ceki- ←) ceyki-
(khengki- ←) kheyngki-
koki- (→ koyki-)
kkoki- (→ kkoyki-)
nok.i- (→ noyki-)
ok.i- (→ oyki-)
sok.i- (→ soyki-)
komki- (→ koyngki-)
olm.ki- (→ oyngki-)
(thoki-/thwuki- ←)
  thoyki-/thwiki-
thongki-/thwungki- (→
  thoyngki-, thwingki-)
|wuki- (→ wiki-)|
|wuk.i- (→ wiki-)|
kwuki- (→ kwiki-)
kkwuki- (→ kkwiki-)
cwuk.i- (→ cwiki-)
|chwuki- (→ chwiki-)|
|chwuk.i- (→ chwiki-)|
nwuk.i- (→ nwiki-)
swuk.i- (→ swiki-)
phungki- (→ phingki-)
swumki- (→ swingki-)
kwulm.ki- (→ kwingki-)
ttwungki- (→ ttwingki-)

cikhi-
|ikhi-
|ik.hi-
ilk.hi-
pīkhi-
|sikhi-
|sik.hi-
......
kalikhi- (→ kaylikhi-)
(nalikhi- ←) naylikhi-
tol.ikhi- (→ toylikhi-)
il.ukhi- (→ ilikhi-)

mungki- (→ mingki-)
culki- (→ cilki-)
(culki- ←) cilki-
kwulm.ki- (→ kwingki-)
ttwungki- (→ ttwingki-)
mungki- (→ mingki-)
|culki- (→ cilki-)|
|(culki- ←) cilki-|
hulki- (→ hilki-)
|(sungki- ←) simki-
|(sungki- ←) sinki-
(ccungki- →) ccingki-
iki-
piki-

ssis.ki-
ccic.ki-
......
napukki- (→ napikki-)
ppay-as.ki- (→
  ppay-aykki-)
kelikki-
kali-kki-

kkoktuki- (→ kkoktiki-)
twutulki- (→ twutilki-)
ttwutulki- (→ ttwutilki-)
(poktaki- ←) poktayki-

helttek i- (→ heltteyki-)
sosak i- (→ sosayki-)
wumcik i-

List 6. Longer -i- stems with palatals

…ci-
cha-ci-$_A$ (→ chayci-)
(chaci- ←) chay-ci-
hay ci-
kaci- (→ kayci-)
ppā ci- (→ ppāyci-)
taci- (→ tayci-)
taci- (→ ttayci-)
kanci-$_A$ (→ kaynci-)
kkan-ci-$_A$ (→ kkaynci-)
manci- (→ maynci-)
sal-ci-$_A$ (→ saylci-)
sal-cci- (→ saylcci-)
che-ci- (→ cheyci-)
kkē ci- (→ kkēyci-)
peci- (→ peyci-)

penci- (→ peynci-)
tenci- (→ teynci-)
coci- (→ coyci-)
toci-$_A$ (→ toyci-)
tōci- (→ tōyci-)
mo ci-$_A$ (→ moyci-)
ōl-ci-$_A$ (→ ōylci-)
chwuci-$_A$ (→ chwici-)
phuci-$_A$ (→ phici-)
(twuci- ←) twici-
wuci-$_A$ (→ wici-)
ici-
cici-
tung ci-
thul ci-$_A$

ppye ci-_A (→ ppeyci-)
ph'ĕ ci- (→ phēyci-)
phye ci- (→ pheyci-)
mey-ci-_A
teci- (→ teyci-)
thē ci- (→ thēyci-)
kenci- (→ keynci-)

......
pule ci-
sala ci-
sule ci-
ssule ci-
ha.ye ci-
···-^{e}/_a ci-

···cci-
hoth ci-
pic ci-

nwukci- (→ nwikci-)
kyekci- (→ keykci-)
kkekci- (→ kkeykci-)

···chi-

cac.hi- (→ caychi-)
(chachi- ←) chaychi-
hwachi- (→ hwaychi-)
kat.hi- (→ kaychi-)
|machi- (→ maychi-)
|(machi- ←) mayc.hi-
|(machi- ←) maychi-/michi-
|pachi-
|pat.chi-
|pat.hi- (→ paychi-)
|path.i-
|path.chi-
ppachi- (→ ppaychi-)
|tachi-
|tat.chi-
|tat.hi- (→ taychi-)
|tah.chi-
kakchi- (→ kaykchi-)
sak-chi- (→ saykchi-)
kwut.hi- (→ kwichi-)
|puchi-
|puth.chi- (→ pichi-)
|puth.i-
|(puchi- ←) pichi-
(ppuchi- →) ppichi-
|muchi- (→ michi-)
|(muchi- ←) michi-
michi-/maychi-
(mulchi- ←) milchi-
cwuk-chi- (→ cwikchi-)
|hwulchi- (→ hwilchi-) |
|hwulth.i- (→ hwilchi-) |
takchi- (→ taykchi-)

halth.i- (→ haylchi-)
kal(u)chi- (→ kaylchi-)
tālchi- (→ taylchi-)
salchi- (→ saylchi-)
kāmchi- (→ kaymchi-)
|anchi-
|anc.hi- (→ aynchi-)
|an chi-
ānchi- (→ āynchi-)
mangchi- (→ mayngchi-)
capchi- (→ caypchi-)
cec.hi- (→ ceychi-)
(cechi- ←) ceychi-
|kechi- (→ keychi-)
|ket.hi- (→ keychi-)
techi- (→ teychi-)
(hechi- ←) heychi-
|ppechi- (→ ppeychi-)
|ppet.chi- (→ ppeychi-)
wumchi- (→ wimchi-)
nwungchi- (→ nwingchi-)
twungchi- (→ twingchi-)
mongchi-/mungchi- (→
   meyngchi-/mingchi-)
homchi-/hwumchi- (→
   hoymchi-/hwimchi-)
(twuchi- ←) twichi-
kuchi- (→ kichi-)
(kuchi- ←) kichi-
(kkuchi- ←) kkichi-
suchi- (→ sichi-)
tungchi- (→ tingchi-)
kēlchi- (→ kēylchi-)

ttelchi- (→ tteylchi-)
sel-chi- (→ seylchi-)
enc.hi- (→ eynchi-)
kēmchi- (→ kēymchi-)
eph.chi- (→ eypchi-)
yepchi- (→ yeypchi-)
cepchi- (→ ceypchi-)
phyelchi- (→ pheylchi-)
kyeng-chi- (→ keyngchi-)
kochi- (→ koychi-)
noh.chi- (→ noychi-)
tot.chi- (→ toychi-)
cokchi- (→ coykchi-)
holth.i- (→ hoylchi-)
nongchi- (→ noyngchi-)
copchi- (→ coypchi-)
kop-chi- (→ koyp-chi-)
kkop-chi- (→ kkoyp-chi-)
(ōchi- ←) ōychi-
chichi-
|ic.hi-
|ichi-

......

iachi- (→ iaychi-)
ellechi- (→ elleychi-)
chiwu-chi- (→ chiwichi-)
nwiwuchi- (→ nwiwichi-)
samuchi- (→ samichi-)
kal(u)chi- (→ kalichi-)
(pusuchi- ←) pusichi-
|(putuchi- ←) putic.hi- |
|(putuchi- ←) putic.chi-|

List 7. Longer ‑i-stems with sibilants

/ss/	olssi-	ceksi- (→ ceyksi-)		kapsi- (→ kaypsi-)

/s/ (There are no front-vowel homonyms in conflict with front-vowel honorifics.)

Homonym	Honorific	From	Front-vowel Honorific	From
	āsi-	‑ā-l-	(→ āysi-)	
casi-	ca-	ca-	(→ caysi-)	
	(cāsi- ←)		cāysi-	cāy-
	(cāsi- ←) causi-	cā(s)-	(→ cāsyi-)	
	ccasi-	cca-	(→ ccaysi-)	
	(ccāsi-)		ccāysi-	ccāy-
	(ccāsi- ←) cca(h.)usi-	ccah-	(→ ccāysi-)	
	chasi-	cha-	(→ chaysi-)	
	(chāsi- ←)		chāysi-	chāysi-
	hasi-	ha-	(→ haysi-)	
	lkasi-	ka-	(→ kaysi-)	
kasi-	lkasi-	ka-l-	(→ kaysi-)	
	kāsi-	kā-l-	(→ kāysi-)	
	lkkasi-	kka-	(→ kkaysi-)	
	lkkasi-	kka-l-	(→ kkaysi-)	
	(kkāsi- ←)		kkāysi-	kkāy-
	(khāsi- ←)		khāysi-	khāy-
	masi-	ma-l-	(→ maysi-)	
masi-	lmāsi-	mā-l-	(→ māysi-)	
	lmāsi-	mā-	(→ māysi-)	
	(māsi- ←)		māysi-	māy-
	lnasi-	na-	(→ naysi-)	
	lnasi-	na-l-	(→ naysi-)	
	(nāsi- ←)		nāysi-	nāy-
	(nāsi- ←) nausi-	nā(s)-	(→ nāysi-)	
	(nāsi- ←) na(h.)usi-	nāh-	(→ nāysi-)	
	(pasi- ←)	pay-	paysi-	pay-
	(pāsi- ←)	pāy-	pāysi-	pāy-
	(pāsi- ←) pausi-	pā(s)-	(→ pāysi-)	
	lphasi-	pha-	(→ phaysi-)	
	lphasi-	pha-l-	(← phaysi-)	
	(phasi- ←)		phaysi-	phay-
	(phāsi- ←)		phāysi-	phāy-
	ppasi-	ppa-l-	(→ ppaysi-)	
	(ppasi- ←)		ppaysi-	ppay-
	(ppāsi- ←)	ppah-	ppāysi-	ppāy-
	(ppāsi- ←) ppa(h.)usi-		(→ ppāysi-)	
	sasi-	sa-	(→ saysi-)	
	sāsi-	sā-l-	(→ sāysi-)	
	(sāsi- ←)		sāysi-	sāy-
	ssasi-	ssa-	(→ ssaysi-)	
	(ssāsi- ←) ssa(h.)usi-	ssah-	(→ ssāysi-)	
	(ssāsi- ←)		ssāysi-	ssāy-

tasi-	tasi-	ta-l-	(→ taysi-)	
	tāsi-	tā-l-	(→ tāysi-)	
	(tāsi- ←) ta(h.)usi-	tah-	(→ tăysi-)	
	(tāsi- ←)		tāysi-	tāy-
	thasi-	tha-	(→ thaysi-)	
	(thāsi- ←)		thāysi-	thāy-
	ttasi-	tta-	(→ ttaysi-)	
	(ttāsi- ←) tta(h.)usi-	ttah-	(→ ttāysi-)	
	(ttāsi- ←)		ttāysi-	ttāy-
	(ēsi- ←)		ēysi-	ēy-
	(ēsi- ←)		(ēysi- ←) eyisi-	eyi-
	(ēsi- ←)		(ēysi- ←) eywusi-	eywu-
	ēsi-	ē-l-	(→ ēysi-)	
	cēsi-	cē-l-	(→ cēysi-)	
	(cēsi- ←) ceusi-	cē(s)-	(→ cēysi-)	
	hesi-	he-	(→ heysi-)	
	(hesi- ←)		hēysi-	hēy-
	hēsi-	hē-l-	(→ hēysi-)	
	kēsi-	kē-l-	(→ kēysi-)	
	(kēsi- ←)		kēysi-	kēy-
	mēsi-	mē-l-	(→ mēysi-)	
	(mēsi-)		mēysi-	mēy-
	nēsi-	nē-l-	(→ nēysi-)	
	(nēsi- ←) ne(h.)usi-	neh-	(→ nēysi-)	
	pēsi-	pē-l-	(→ pēysi-)	
	sesi- = susi-	se- = su-	(→ seysi-)	
	(sēsi- ←)		sēysi-	sēy-
	ssēsi-	ssē-l-	(→ ssēysi-)	
k(y)ēysi-				
	tēsi-	tē-l-	(→ tēysi-)	
	thĕsi-	thĕ-l-	(→ thĕysi-)	
	ttēsi-	ttē-l-	(→ ttēysi-)	
	yēsi-	yē-l-	(→ yēysi-)	
	osi-	o-	(→ oysi-)	
	(ōsi- ←)		ōysi-	ōy-
	(cosi- ←)		coysi-	coy-
	cōsi-	cō-l-	(→ cōysi-)	
	(cōsi- ←) cō(h.)usi-	cōh-	(→ cōysi-)	
	ccōsi-	ccŏ-	(→ ccŏysi-)	
			ccoysi-	ccoy-
			ccŏysi-	ccŏy-
	hōsi-	hō-	(→ hōysi-)	
		kō-	(→ kōysi-)	
		kō-l-	(→ kōysi-)	
			(→ kōysi-)	
		kŏw-		
			kōysi-	kōy-
		kko-	(→ kkoysi-)	
			kkōysi-	kkōy-

mōsi-	mōsi- < mousi-	mō- < mou-	(→ mōysi-)
	mōsi-	mō-l-	(→ mōysi- → mēysi-)
			mōysi- (→ mēysi-) mōy-
		nō-l-	(→ nōysi-)
	nōsi- ← no[h.]usi-	noh-	(→ nōysi-)
			nōysi- nōy-
			posi- (→ poysi- → peysi-) po-
			(*pōysi- → peysi-)[1] pōy-
			*pōywusi-[1] pōyw-
	(sosi- ←)		soysi- soy-
	(sōsi- ←)		sōysi- sōy-
	sōsi-	sō-l-	(→ sōysi-)
	ssosi-	sso-	(→ ssoysi-)
	ssōsi-	ssō-l-	(→ ssōysi-)
	(ssōsi- ←)		ssōysi- ssōy-
	(tosi- ←)		toysi- toy-
	(tōsi- ←)		tōysi- tōy-
	tōsi-	tō-l-	(→ tōysi-)
	(tōsi- ←) towusi-	tow-	(→ tōysi-)
	wūsi-	wū-l-	(→ wīsi-)
	cwusi-	cwu-	(→ cwisi-)
	cwūsi-	cwū-l-	(cwīsi-)
	(cwūsi- ←) cwuwusi-	cwuw-	(→ cwīsi-)
	(cwūsi- ←) cwuusi-	cwu(s)-	(→ cwīsi-)
	(cwūsi- ←)		cwīsi- cwī-
	(ccwūsi- ←) ccwuusi-	ccwu(s)-	(→ cwīsi-)
	chwusi-	chwu-	(→ chwisi-)
	(chwūsi- ←) chwuwusi-	chwuw-	(→ chwīsi-)
	(hwusi- ←)		hwisi- hwi-
			|kīsi- kī-
			|kīsi- kī-l-
	(kīsi- ←) kiwusi-	kīw-	(→ kīsi-)
			khisi- khi-
			khīsi- khī-
			khiisi- khii-
			kkīsi- kkī-
			kkīisi- kkīi-
	(kkisi- ←) kkiwusi-	kkiwu-	(→ kkisi-)
	kwūsi-	kwū-l-	(→ kwīsi-)
	(kwūsi- ←) kwuwusi-	kwūw-	(→ kwīsi-)
	kkwusi-	kkwu-	(→ kkwisi-)
	(kkwusi- ←)		kkwisi- kkwi-
	(kkwēsi- ←)		kkwēysi- (→ kkwīsi-) kkwēy-
			|mīsi- mī-
			|mīsi- mī-l-
	(mīsi- ←) miwusi-	miw-	
	musi-	mu-l-	(→misi-)
	mūsi-	mū-l-	(→ mīsi-)

1 But *pōysi- and *pōywusi- do not occur because of the passive and inchoative meanings of this stem.

	nwusi-	nwu-	(→ nwisi-)
	(nwūsi- ←) nwuwusi-	nwuw-	(→ nwīsi-)
pusi-	pūsi-	pū-l-	
	(pūsi- ←) pwuusi-	pū(s)-	(→ pīsi-)
			pīsi- pī-
			pīsi- pī-l-
	(pīsi- ←) piwusi-	piwu-	
			phisi- phi-
	(phisi- ←) phusi-	phu-l-	(→ phisi-)
	(phīsi- ←) phiwusi-	phiwu-	
			ppīsi- ppī-
sswusi-	(sswisi- ←) sswusi-	sswu-	(→ sswisi-)
			swīsi- swī-
	(swīsi- ←) swiwusi-	swīw-	
	(twisi- ←) twusi-	twu-	(→ twisi-)
			twisi- twi-
			thwisi- thwi-
			ttwisi- ttwi-
			isi- i-
			(īsi- ←) iusi- i(s)-
			(īsi- ←) iusi- ī(s)-
			īsi- ī-
			īsi- ī-l-
			cisi- ci-
			cisi- ci-l-
			(cīsi- ←) ciusi- cī(s)-
			ecisi- cci-
			ccīsi- ccī-
			chisi- chi-
			hisi- = huysi- huy- = hi-
			sisi- si-A
			ttisi- tti-
			ttisi- = ttuysi- tti- = ttuy-
			thisi- = thusi- thi- = thu-
ttuysi- = ttisi-	ttuy- = tti-		
thuysi- = thisi-	thuy- = thi-		
(kūsi- ←) ku(u)si-	ku(u)-l-		
	kū(s)-		
khusi-	khu-		
kkusi-	kku-		
kkūsi-	kkū-l-		
nusi-	nu-l-		
susi- < sesi-	su- < se-		
ssusi-	ssu-VA		
tusi-	tu-l-		
thusi-	thu-l-		
thusi-	thu-		
ttusi-	ttu-		

¹ But *pōysi- and *pōywusi- do not occur because of the passive and humble meanings of the stems.

List 8. Longer -i- stems with liquids (-li-, -lli-)

...li-	...lli-	...li-	...lli-
ali-_A (→ ayli-)	alli- (→ aylli-)	ǀcwuli- (→ cwili-)	
ceᵃli-_A (→ ceᵃyli-)	calli- (→ caylli-)	ǀcwul.i-/col.i- (→	
chali- (→ chayli-)		cwili-/coyli-)	
ǀhali- (→ hayli-)		kwuli-_A (→ kwili-)	kwulh.li- (→ kwilli-)
ǀhᵃ/ᵤli-_A (→ hᵃy/ᵢli-)			kwūlli- (→ kwīlli-)
kali- (→ kayli-)	kalli- (→ kaylli-)	kkwuli- (→ kkwili-)	kkwulli- (→ kkwili-)
	kkalli- (→ kkaylli-)		mulli- (→ milli-)
	malli- (→ maylli-)		(mulli- ←) milli-
(nali- ←) nayli-	nalli- (→ naylli-)	nwuli-_A (→ nwili-)	nwulli- (→ nwilli-)
	peᵃlli- (→ peᵃlli-)	nwūli- (→ newīli-)	
	phalli- (→ phaylli-)	ǀpuli- (→ pili-)	
	ppalli- (→ ppaylli-)	ǀ(puli- ←) pili-/payli-_A	
seᵃli- (→ seᵃyli-)	salli- (→ saylli-)	ppuli- (→ ppili-)	(pulli- ←) pilli-
ǀtalli- (→ tayli-)	ǀtalli- (→ taylli-)		
ǀtal.i- (→ tayli-)	ǀtalh.li- (→ taylli-)		phulli- (→ philli-)
(ttali- ←) ttayli-	ttalli- (→ ttaylli-)		twulli- (→ twilli-)
yeᵃli-_A (→ yeᵃyli-)			ttwulh.li- (→ ttwilli-)
eli-_{VA} (→ eyli-)	elli- (→ eylli-)	(culi- ←) cili-_{VA}	(culli- ←) cilli-
ǀceᵃli-_A (→ ceᵃyli-)			(cculli- ←) ccilli-
ǀcel.i- (→ ceyli-)		ǀ(kuli- ←) kili-	hulli- (→ hilli-)
ǀceli- (→ ceyli-)		ǀkuli- (→ kili-)	(kulli- ←) killi-
ǀceli '- (→ ceyli-)		ǀkuli '- (→ kili-)	ku(u)lli- (→ killi-)
keli- (→ keyli-)	kelli- (→ keylli-)	(kkuli- ←) kkulh.i-	kkulli- (→ kkilli-)
kkēli- (→ kkēyli-)	kyelli- (→ keylli-)	(→ kkili-)	
	nelli- (→ neylli-)	ǀnuli-_A (→ nili-)	nulli- (→ nilli-)
		ǀnul.i- (→ nili-)	
pyeli- (→ peyli-)		(suli- ←) sili-_A	(sulli- ←) silli-
peli- (→ peyli-)		ǀtuli- (→ tili-)	ssulli- (→ ssilli-)
pēl.i- (→ pēyli-)		ǀtul.i- (→ tili-)	tulli- (→ tilli-)
teli-_A (→ teyli-)	thelli- (→ theylli-)	ttuli- (→ ttili-)	thulli- (→ thilli-)
(teli- ←) teyli-	ttelli- (→ tteylli-)	......	......
yᵘoli-_A (→ yeᵃli-)	yelli- (→ yeylli-)	pulali-	kkapsalli-
oli- (→ oyli-)	olli- (→ oylli-)	ssulali-_A	ikkulli-
ǀcoli- (→ coyli-)	colli- (→ coylli-)	tosali-	mongkulli-
ǀcoli '- (→ coyli-)		tasuli-	tongkulli-
ǀcol.i-/cwul.i- (→ coyli-		kenuli-	twungkulli-
/cwili-)		kēntuli-	kesulli-
holi-/hwuli- (→ hoyli-	holli- (→ holli-)	(t)twutuli-	kwusulli-
/hwili-)		eph-tuli-	ccotulli-
ǀkoli-_A (→ koyli-)	kolh.li- (→ koylli-)	omchuli-/wumchuli-	huntulli-
ǀkoli '- (→ koyli-)	kkolli- (→ kkoylli-)	omuli-/wumuli-	ku(u)lli-
	molli- (→ moylli- →	ccakuli-	kongkulli-
	meylli-)	ccikuli-	kwungkwulli-
noli-_{VA}	nolli- (→ noylli-)	swukuli-	amulli-
	ssolli- (→ ssoylli-)	twukuli-	pophulli-/puphulli-
toli- (→ toyli-)	tolli- (→ toylli-)	ccayngkuli-/ccingkuli-	awulli-/ewulli-
yoli '- (→ yeyli-)		ccongkuli-/ccwungkuli-	muncilli-
wuli- (→ wili-)	wulli- (→ willi-)	kamuli- *(continues)*	

(List 8 continued)

pemuli-
hwumuli-
(k)kopuli-/(k)kwupuli-
kophuli-/kwuphuli-
ccayphuli-/cciphuli-

List 9. L-extending vowel stems

···a-l-	···e-l-	···o-l-	···wu-l-	···u-l-	···i-l-
ā-l-	ē-l-	cŏ-l-	wū-l-	kū-l-	ī-l-
ca-l-$_A$	cĕ-l-	kŏ-l-	cwū-l-	(= kuu-l-)	ci-l-$_A$
ka-l-	hē-l-$_{VA}$	kko-l-	kwū-l-	kkū-l-	kī-l-$_A$
kā-l-	kē-l-	mō-l-	mu-l-	nu-l-	
kka-l-	mĕ-l-$_{VA}$	nŏ-l-$_{VA}$	mū-l-	su-l-	mī-l-
kwă-l-	nē-l-	sŏ-l-$_{VA}$	pū-l-	ssu-l-	pī-l-
ma-l-	pĕ-l-$_{VA}$	ssŏ-l-	phu-l-	tu-l-	......
mā-l-	sĕ-l-	tŏ-l-	......	thu-l-	nani-l-
na-l-	ssē-l-	......	(k)kyawu-l-/	......	canci-l-$_A$
	tĕ-l-	mu' so-l-	(k)kiwu-l-$_A$	ikku-l-	cha-ci-l-$_A$
pha-l-	thē-l-	ey-tō-l-	(kewu-l-)	kanu-l-	eci-l-$_A$
ppa-l-$_{VA}$	ttĕ-l-	kenmō-l-	setwu-l-	mantu-l-	kechi-l-$_A$
sā-l-$_{VA}$	yē-l-		(p)pittwu-l-$_A$	santu-l-	kēni-l-
ta-l-$_{VA}$	......		kkay-mu-l-	ketu-l-	chi-mi-l-
tă-l-	kămye-l-		ppay-mu-l-	kkē tu-l-	mōci-l-$_A$
......			amu-l-	tte-tu-l-	nōni-l-
ay ta-l-			kamu-l-	ttētu-l-	tōni-l-
oy-tta-l-$_A$			tamu-l-	ppye-tu-l-	kwumni-l-
is-ta-l-			emu-l-$_A$	engkhu-l-	(< kwupq-i-l-)
(kāmā-l-)			cemu-l-	hengkhu-l-	
			hemu-l-	ongku-l-	
			memu-l-	tongku-l-$_A$	
			pemu-l-	mongku-l-$_A$	
			tumu-l-$_A$	kwungku-l-$_A$	
			y^e/amul-$_A$	twungku-l-$_A$	
			kkapu-l-	wuku-l-$_A$	
			tepu-l-	twip(t)tu-l-	
			p^u/ophul-	pī-thu-l-/	
			kkē-twu-l-	pāy-thu-l-	
			(= kkē twulu-)	huntu-l-	
				cc^i/$_a$tu-l-	
				kuu-l-	

The dictionaries list one stem that ends in **ay-l-**, the mining term **kway-l-** 'seem a poor vein, seem low in ore content'. It is an oddity.

List 10. L-doubling vowel stems

···alu-	···elu-	···olu-	···wulu-	···ulu-	···ilu-
calu-	elu-	olu-	kwulu-	ulu-	ilu-ᵥₐ³
kalu-	kelu-	colu-	mulu-	hulu-	cilu-
malu-	nelu-ₐ	kolu-ᵥₐ	nwūlu-	kulu-	ccilu-
nalu-	pyelu-	molu-	pulu-	kkulu-	kilu-
palu-	pyēlu-	tolu-	twulu-	······	······
ppalu-ₐ			······	kᵉ⁄ₐyulu-ₐ	tacilu-
salu-¹			eᵉ⁄ₐwulu-	kunulu-	ecilu-
salu-²			kewulu-	kesulu-	mucilu-
talu-ₐ			cwumulu-	chwusulu-	mu-ccilu-
······			kkapulu-	twisulu-	muncilu-
kapcalu-			setwulu-		cicilu-
				sethwulu-	sicilu-
				sen-twulu-	
				cac.chwulu-	

¹ 'set afire'   ² 'winnow' said by NK sources to be l-doubling, but SK sources say it is regular. It is not the common term anywhere.   ³ 'say; early'

There are no stems with -ylu- except kᵉ⁄ₐylu-, contraction of kᵉ⁄ₐyulu-.

CF the regular vowel stems with the infinitive ···le rather than ···lle:
ttalu-, chilu-, tatalu-, mak-talu-, wulelu-; ? salu- 'winnow'.

List 11. L-inserting voĖwel stems

(kām-)phalu-ₐ	nolu-ₐ	nwulu-ₐ	ilu- 'reach'
		phulu-ₐ	

List 12. Consonant stems: ···p- and ···w-

(For ph and ps and for lp see 13. There is no stem ···pp-.)

···ap-	···aw-	···ayw-	···ep-	···ew-	···op-	···ow-	···oyw-
cap-	taw-ₐ	mayw-ₐ	ep-	kyēw-ₐ	cop-ₐ	kōw-ₐ	pōyw-
······	······	nayw-ₐ	cep-	tēw-ₐ	kop-ᵥₐ	low-ₐ	
tacap-	pat.caw-		······	······	kkop-	tōw-	
ket-cap-	tut.caw-		wucep-	swus cew-ₐ	ppop-	······	
keth-cap-	ttakaw-ₐ			ttukew-ₐ		say low-ₐ	
	akkaw-ₐ			mukew-ₐ		oy low-ₐ	
	kakkaw-ₐ			nukkew-ₐ		koy low-ₐ	
	kokkaw-ₐ			kikkew-ₐ		······	
	halkaw-ₐ			twukkew-ₐ		nalkhalow-ₐ	
	salkaw-ₐ			helkew-ₐ		kkatalow-ₐ	
	talkaw-ₐ			sulkew-ₐ		sasa low-ₐ	
	tālaw-ₐ			sēnkew-ₐ			
	hollaw-ₐ			sēlew-ₐ			
	kkol taw-ₐ			tēlew-₍ᵥ₎ₐ			
	kapyaw-ₐ			mulew-ₐ			
	sānaw-ₐ			pulew-ₐ			
	tothaw-ₐ			sulew-ₐ			
	(continues)			*(continues)*			

(List 12
continued) ......

kelyew-_A
malyew-_A
elyew-_A
twulyew-_A

anthakkaw-_A
cangkulaw-_A
alum-taw-_A
alittaw-_A

k^{e}apyew-_A
maysew-_A
musew-_A
mu'-tew-_A
sinkew-_A
ccin-tew-_A
huy-ttew-_A
twuthew-_A
kwīyew-_A
......

kaculew-_A
ecilew-_A
k$^a/_u$ncilew-_A
kkancilew-_A
tencilew-_A
p^{e}akkulew-_A
maykkulew-/
   mikkulew-_A
sikkulew-_A
cayngkulew-/
   cingkulew-_A
p^{e}antulew-_A
susulew-_A
kwun(ten)-
   cilew-_A

···wup-	···wuw-	···wiw-	···uw-	···ip-	···iw-	···lw-
kwup-_A	cwūw-_A	swīw-_A	—	ip-	kīw-	sēlw-_A
......	chwuw-_A	......	......	cip-	miw-_A	
ēcwup-_A[1]	kwūw-	aswiw-_A	(t)t$^a/_u$suw-_A	ssip-	......	
mecwup-_A	nwuw-		wusuw-_A	......	kūliw-_A	
swucwup-_A	nwūw-			heycip-	can-miw-_A	
	......			kko-cip-		
	etwuw-_{(V)A}			mocip-		
	(cesswuw-)			pho-cip-		
				kkucip-		
				pīcip-		
				wucip-		
				......		
				palkucip-		

[1] The NK dictionary Cosen-e so-sacen lists this as ēcwuw-_A, but NKd has it with the unleniting p. KEd gives both versions.

List 13. Consonant stems: ‑‑ss‑, ‑‑ps‑, ‑‑ph‑, ‑‑s‑, ‑‑(s)‑, ‑‑t‑, ‑‑t/l‑, ‑‑lq‑, ‑‑c‑

‑‑ss‑[1]	‑‑s‑	‑‑‑(s)‑	‑‑t‑	‑‑t/l‑ (CF 9)	‑‑c‑
iss‑	as‑	cā(s)‑	pat‑	tat‑/tal‑	cac‑$_A$
‑ess‑	ppāys‑	nā(s)‑$_{VA}$	tat‑	(cĕt‑/cel‑$_{Dial.}$)	chac‑
‑keyss‑	pes‑	?pā(s)‑[2]	et‑	kĕt‑/kel‑	kac‑
	(yes‑)	cē(s)‑	ket‑	kyĕt‑/kyel‑	mac‑$_{VA}$
	sos‑	cwu(s)‑	pet‑$_{VA}$	mūt‑/mul‑	nac‑$_A$
	wūs‑	mu(s)‑	ppet‑	pūt‑/pul‑	tac[i]‑
	kis‑	pū(s)‑	kot‑$_A$	nwūt‑/nwūl‑	mayc‑
	pis‑	kū(s)‑	(mot‑)	tut‑/tul‑	cec‑
	ssis‑	kkū(s)‑	ssot‑	kīt‑/kil‑	(mec‑$_{VA}$)
	......	ī(s)‑	tot‑	sīt‑/sil‑	ccoc‑
	pilus‑	cī(s)‑	kwut‑$_{VA}$	......	kkoc‑
		......	mut‑	kkaytat‑/kkaytal‑	kwuc‑$_A$
		(ceswu(s)‑)	ttut‑	(tatat‑/tatal‑)	nuc‑$_{VA}$
			mit‑		ccic‑
			tit[i]‑		ic‑
					pic‑ = pici‑
					......

‑‑ps‑ = /pss/	‑‑ph	‑‑lq‑ (< lu‑)	‑‑c‑
ēps‑	kaph‑	ilq‑$_A$	aykkwuc‑$_A$
......	eph‑		cīs‑kwuc‑$_A$
kā.yeps‑	teph‑		kkwucic‑
	noph‑		peluc‑
	thoph‑		seluc‑
	?puph‑ =		selkec‑
	puphu‑		mapic‑$_{?Dial.}$
	ciph‑		putic‑
	kiph‑$_A$[3]		......
	siph‑$_A$		pulu‑cic‑
	......		kŏm‑salkuc‑$_A$
	tu‑noph‑$_A$		

[1] There is also ssāyss‑$_A$, a contraction of ssah.ye iss‑. It lacks a modifier form, replacing *ssāyss.un by ssāyn, a contraction of ssah.in.   [2] = paswu‑.   [3] Also $_V$ in pam i kiph.ess.ta only.

List 14. Consonant stems: ‑‑ch‑, ‑‑th‑, ‑‑lth‑, ‑‑lh‑, ‑‑lph‑, ‑‑lp‑, ‑‑lw‑

‑‑ch‑	‑‑th‑	‑‑lth‑	‑‑lh‑	‑‑lph‑	‑‑lp‑	‑‑lw‑
coch‑	kath‑$_A$	halth‑	alh‑	ulph‑	pālp‑	sēlw‑$_A$
mich[i]‑	(nath‑$_{obs}$)	(hulth‑)	helh‑$_A$ (= hel ha‑)	......	cc^{e}alp‑$_A$	
(ssich‑$_{Dial.}$)	path‑	(holth‑)	olh‑$_A$	?aytalph‑$_A$	y^{e}alp‑$_A$	
......	yath‑$_A$	hwulth‑	kolh‑		nelp‑$_A$	
nwiwuch(i)‑	payth‑		kkolh‑$_{VA}$		ttēlp‑$_A$	
	yeth‑A		kkwulh‑$_{VA}$			
	huth‑		ttwulh‑			
	puth‑		kkulh‑			
	cith‑A		?kulh‑$_A$ (= kulu‑)			
	......		ssulh‑			
	puluth(u)‑		silh‑$_A$			
			ilh‑			

List 15. Consonant stems: velars (-k-, -kk-, -lk-, -ks-)

⁝-k-	-kk-	-lk-	-ks-
cāk-$_A$	kkakk-	k^a/$_u$lk-	(naks-$_{obs.}$)
mak-	nakk-	m^a/$_u$lk-$_A$	
pak-	takk-	palk-$_{VA}$	
sak-	yekk-	nalk-$_A$	
y^{e}ak-$_A$	kkekk-	elk-	
cek-	kyekk-	^{e}alk-	
cēk-$_A$	sekk-	olk-	
-ccek-$_A$	tekk-	*polk-/pulk-$_A$	
mek-$_{V(A)}$	pokk-	wulk-$_A$	
sek-	sokk-	pulk-$_{VA}$	
ssek-	mukk-	nulk-$_{VA}$	
ok-/wuk-		ilk-	
nok-			
sok-			
cwuk-	pik[i]-		
chwuk-	sik-		
muk-	......		
nwuk-$_A$	tulmek-$_A$		
ik-	simek-$_A$		
ccik-	heysik-$_A$		

Dictionaries list **sayngkak-** but that is just an abbreviation of **sayngkak ha-** and it lacks a full paradigm of its own: there is no infinitive *sayngkak.^{e}a, only sayngkak hay (ha.ye).

List 16. Consonant stems: nasals (-m-, -lm-, -n-, -nh-, -nc-)

-m-	-lm-	-n-	-nh-	-nc-
chām-	pālm-	ān-	anh-$_{VA}$ (= ani ha-)	anc-
kām-$_{VA}$	sālm-	non[u]-[1]	mānh-	enc-
kkam-$_A$	tālm-	?mun[u]-	kkonh-	......
nām-	cēlm-$_A$	kkun- (= kkunh-)	munh-	kki-enc-
sām-	ōlm-	sin- (< sīn-)	hunh-$_A$ (= hun ha-)	
tām-	kōlm-		kkunh-	
kēm-	kwūlm-	[1] and nan(u-) =	......	
nēm-	cilm-	nanwu- < *nan'hwo-	cemcanh-$_A$	
ppyēm-			enccanh-$_A$	
phum-			hachanh-$_A$	
ppum-			kichanh-$_A$	
swūm-			kwaynchanh-$_A$	
sīm-			kwichanh-$_A$	
......			......	
tatum-	potum-		ēcwup-canh-$_A$	
tetum-	......		katang-chanh-$_A$	
mekum-	katatum-		ansim-chanh-$_A$	
sesum-	malmiam-		...-chanh-$_A$	

List 17. Ambivalent stems

All are adjectives, so "ₐ" is omitted.

...a(h)- -ta(h)-[2] -tala(h)-[3]	...ay(h)-[1] colay(h)- kolay(h)- yolay(h)-	...e(h)- cele(h)-/cole(h)- kule(h)-/kole(h)- ile(h)-/yole(h)- ette(h)- āmule(h)-
nōla(h)-		nwūle(h)-
nōyla(h)-		nwīle(h)-
palka(h)-		pelke(h)-
ppalka(h)-		ppelke(h)-
kkama(h)-		kkeme(h)-
phala(h)-		phule(h)-, phele(h)-
pō.ya(h)-		pū.ye(h)-
ppō.ya(h)-		ppū.ye(h)-
ha.ya(h)-		he.ye(h)-
malka(h)-		melke(h)-
myalka(h)-		milke(h)-senule(h)-
sanula(h)-		senule(h)-
ssanula(h)-		ssenule(h)-
ttongkula(h)-		twungkule(h)-
		(teng)tengkule(h)-
		ssangkule(h)-
cᵉakuma(h)-, cokuma(h)-		
say-kkama(h)-		si-kkeme(h)-
say-khama(h)-		si-kheme(h)-
say-ppalka(h)-		si-ppelke(h)-
say-phala(h)-		si-phele(h)-
say(q)-nola(h)-[4]		si(q)-nwule(h)- /si(n)nwu···/
say(q)-ha.ya(h)-[5]		si(q)-he.ye(h)- /si(t)he···/
say(q)-malka(h)-[6]		si(q)-melke(h)-

[1] These three stems are colloquial variants of the more standard forms in the column to the right.

[2] Abbreviation of -tala(h)-: khe-ta(h)-, ? ...

[3] ki-tala(h)- (← kī-l-), khe-tala(h)- (← khu-); kop-tala(h)-, kiph-tala(h)-, noph-tala(h)-, kwulk-tala(h)-, nelp-tala(h)-, nelq-tala(h)- (spelled nel-ttala(h)- in SK but nel-tala(h)- in NK; ?← nelu- rather than nelp-), ? ...

[4] Pronounced /say(n)no···/.

[5] Pronounced /say(t)ha···/.

[6] Pronounced /say(m)mal···/.

Appendix 2. Korean surnames.

The following list of 284 Korean surnames is ordered by frequency, from the most to the least popular. It is followed by an alphabetized list. The data come from Kwuk.e kyoyuk yenkwu-hoy 1960:99-100. An obvious error (left unchanged): 桂 Kyey is given both for 81 and for 246.

1 李 ^{1}Yi	35 南 Nam	69 馬 Ma_1	103 董 Tong
2 金 Kim	36 康 $Kang_2$	70 愼 Sin_3	104 琴 Kum
3 朴 Pak	37 田 Cen_2	71 明 Myeng	105 印 In
4 崔 Choy	38 任 Im	72 蘇 So_1	106 皇甫 Hwangpo
5 鄭 $Ceng_1$	39 河 Ha_1	73 周 Cwu_2	107 靜 $Chen_2$
6 趙 Co_1	40 郭 $Kwak_1$	74 薛 Sel_1	108 芮 Yey
7 尹 Yun	41 禹 Wu_1	75 魏 Wi_1	109 史 Sa_1
8 姜 $Kang_1$	42 丁 $Ceng_2$	76 卓 Thak	110 慶 $Kyeng_1$
9 張 $Cang_1$	43 羅 ^{1}Na	77 延 Yen_1	111 庾 Yu_2
10 韓 Han_1	44 池 Ci_1	78 奇 Ki	112 睦 Mok
11 吳 O_1	45 元 Wen_1	79 表 $Phyo_1$	113 昔 Sek_2
12 林 ^{1}Im	46 閔 Min	80 宣 Sen_1	114 程 $Ceng_3$
13 安 An	47 具 Kwu_1	81 桂 Kyey = 246	115 皮 Phi
14 宋 Song	48 嚴 Em	82 王 Wang	116 卜 Pok
15 徐 Se_1	49 方 $Pang_1$	83 孟 Mayng	117 智 Ci_2
16 黃 Hwang	50 成 $Seng_1$	84 玉 Ok	118 公 $Kong_2$
17 洪 Hong	51 辛 Sin_2	85 秦 Cin_2	119 獨狐 Tok.ko
18 全 Cen_1	52 兪 Yu_1	86 余 Ye_1	120 景 $Kyeng_2$
19 權 Kwen	53 蔡 $Chay_1$	87 太 Thay	121 賈 Ka
20 柳 $^1Yu_1$	54 玄 Hyen	88 奉 $Pong_1$	122 溫 On
21 高 Ko	55 陳 Cin_1	89 承 $Sung_1$	123 胡 Ho_1
22 文 Mun_1	56 咸 Ham	90 片 $Phyen_1$	124 晉 Cin_3
23 白 Payk	57 邊 $Pyen_1$	91 潘 Pan_1	125 邢 Hyeng
24 梁 ^{1}Yang	58 千 $Chen_1$	92 蔣 $Cang_2$	126 賓 Pin_1
25 申 Sin_1	59 廉 $^1Yem_1$	93 南宮 Namkwung	127 陰 Um
26 孫 Son	60 楊 $Yang_1$	94 陸 ^{1}Yuk	128 杜 Twu
27 劉 $^1Yu_2$	61 孔 $Kong_1$	95 諸 Cey	129 章 $Cang_3$
28 許 He	62 吉 Kil	96 鮮于 Sen.wu	130 弓 Kwung
29 裵 Pay	63 石 Sek_1	97 魚 E_1	131 韋 Wi_2
30 曹 Co_2	64 呂 ^{1}Ye	98 牟 Mo_1	132 甘 Kam
31 盧 $^1No_1$	65 魯 $^1No_2$	99 殷 Un_1	133 簡 Kan_1
32 朱 Cwu_1	66 卞 $Pyen_2$	100 鞠 $Kwuk_1$	134 葛 Kal
33 沈 Sim	67 秋 $Chwu_1$	101 龍 ^{1}Yong	135 扈 Ho_2
34 車 Cha	68 都 To_1	102 房 $Pang_2$	136 左 Cwa

137 司空 Sakong	174 花 Hwa_1	211 汝 Ye_2	248 珠 Cwu_3
138 錢 Cen_3	175 萬 Man	212 謝 Sa_2	249 敦 Ton_2
139 彭 Phayng	176 馮 Phung	213 介 Kay	250 呑 Tham
140 邵 So_2	177 燕 Yen_2	214 漢 Han_2	251 干 Kan_2
141 尙 $Sang_1$	178 頓 Ton_1	215 鳳 $Pong_2$	252 竿 Kan_3
142 范 Pem_1	179 浪 ^1Nang	216 舍 Sa_3	253 垣 Hwan
143 楔 Sel_2	180 阿 A	217 閻 Yem	254 炭 Than
144 諸葛 Ceykal	181 强 $Kang_3$	218 單 Tan_2	255 遷 $Chen_3$
145 唐 Tang	182 班 Pan_2	219 扁 $Phyen_2$	256 鮮 Sen_2
146 夏 Ha_2	183 墨 Muk	220 濂 $^1Yem_2$	257 先 Sen_3
147 莊 $Cang_4$	184 段 Tan_1	221 斤 Kun	258 標 $Phyo_2$
148 西門 Semun	185 及 Nay_1	222 星 $Seng_2$	259 召 So_3
149 施 Si_1	186 袁 Wen_2	223 丘 Kwu_2	260 則 Chuk
150 柴 Si_2	187 包 Pho_1	224 襄 $Yang_2$	261 肖 Cho_2
151 慈 Ca	188 判 Phan	225 鮑 Pho_2	262 何 Ha_3
152 陶 To_2	189 梅 May	226 旁 $Pang_5$	263 那 ^1Na
153 龐 $Pang_3$	190 倉 $Chang_2$	227 恩 Un_2	264 和 Hwa_2
154 甄 Kyen	191 夫 Pu	228 要 Yo	265 賀 Ha_4
155 昇 $Sung_2$	192 麻 Ma_2	229 西 Se_2	266 瓜 Kwa
156 邦 $Pang_4$	193 大 Tay	230 菜 $Chay_2$	267 甞 $Sang_2$
157 弼 $Phil_1$	194 喬 ?= 缺 Kyek	231 應 Ung	268 桑 $Sang_3$
158 鄔 Ong_1	195 芸 Wun_1	232 剛 $Kang_4$	269 仰 Ang
159 東方 Tongpang	196 姚 Co_3	233 俊 Cwun	270 廣 Kwang
160 楚 Cho_1	197 彬 Pin_2	234 凡 Pem_2	271 卿 $Kyeng_3$
161 平 Phyeng	198 國 $Kwuk_2$	235 道 To_3	272 井 $Ceng_4$
162 荀 $Swun_1$	199 伊 I_2	236 端 Tan_3	273 勝 $Sung_2$
163 昌 $Chang_1$	200 丕 Pi	237 眞 Cin_4	274 敬 $Kyeng_4$
164 毛 Mo_2	201 雲 Wun_2	238 永 Yeng	275 靈 ^1Yeng
165 鍾 $Cong_1$	202 海 Hay	239 鄒 $Chwu_2$	276 守 Swu
166 執 Cip	203 舜 $Swun_2$	240 仇 Kwu_3	277 谷 Kok
167 葉 Yep	204 雍 Ong_2	241 翁 Ong_3	278 畢 $Phil_2$
168 異 I_1	205 占 Cem	242 貢 $Kong_3$	279 骨 Kol
169 氷 Ping	206 米 Mi	243 江 $Kang_5$	280 釋 Sek_3
170 夜 Ya	207 奈 Nay_2	244 於 E_2	281 郁 Wuk
171 路 $^1No_3$	208 艾 Ay	245 伍 O_2	282 律 ^1Yul
172 于 Wu_2	209 宗 $Cong_2$	246 桂 Kyey = 81	283 藿 $Kwak_2$
173 雷 ^1Noy	210 后 Hwu	247 門 Mun_2	284 席 Sek_4

Alphabetical list of surnames followed by rank

阿 A 180	陳 Cin_1 55	后 Hwu 210	權 Kwen 19
安 An 13	秦 Cin_2 85	玄 Hyen 54	具 Kwu_1 47
仰 Ang 269	晋 Cin_3 124	邢 Hyeng 125	丘 Kwu_2 223
艾 Ay 208	眞 Cin_4 237	異 I_1 168	仇 Kwu_3 240
慈 Ca 151	執 Cip 166	伊 I_2 199	鞠 $Kwuk_1$ 100
張 $Cang_1$ 9	趙 Co_1 6	林 [1]Im 12	國 $Kwuk_2$ 198
蔣 $Cang_2$ 92	曹 Co_2 30	任 Im 38	弓 Kwung 130
章 $Cang_3$ 129	姚 Co_3 196	印 In 105	喬 ?= 缺 Kyek 194
莊 $Cang_4$ 147	鍾 $Cong_1$ 165	賈 Ka 121	甄 Kyen 154
占 Cem 205	宗 $Cong_2$ 209	葛 Kal 134	慶 $Kyeng_1$ 110
全 Cen_1 18	左 Cwa 136	甘 Kam 132	景 $Kyeng_2$ 120
田 Cen_2 37	朱 Cwu_1 32	簡 Kan_1 133	卿 $Kyeng_3$ 271
錢 Cen_3 138	周 Cwu_2 73	干 Kan_2 251	敬 $Kyeng_4$ 274
鄭 $Ceng_1$ 5	珠 Cwu_3 248	竿 Kan_3 252	桂 Kyey 81 = 246
丁 $Ceng_2$ 42	俊 Cwun 233	姜 $Kang_1$ 8	桂 Kyey 246 = 81
程 $Ceng_3$ 114	魚 E_1 97	康 $Kang_2$ 36	麻 Ma_2 192
井 $Ceng_4$ 272	於 E_2 244	強 $Kang_3$ 181	馬 Ma_1 69
諸 Cey 95	嚴 Em 48	剛 $Kang_4$ 232	萬 Man 175
諸葛 Ceykal 144	河 Ha_1 39	江 $Kang_5$ 243	梅 May 189
車 Cha 34	夏 Ha_2 146	介 Kay 213	孟 Mayng 83
昌 $Chang_1$ 163	何 Ha_3 262	奇 Ki 78	米 Mi 206
倉 $Chang_2$ 190	賀 Ha_4 265	吉 Kil 62	閔 Min 46
蔡 $Chay_1$ 53	咸 Ham 56	金 Kim 2	牟 Mo_1 98
菜 $Chay_2$ 230	韓 Han_1 10	高 Ko 21	毛 Mo_2 164
千 $Chen_1$ 58	漢 Han_2 214	谷 Kok 277	睦 Mok 112
静 $Chen_2$ 107	海 Hay 202	骨 Kol 279	墨 Muk 183
遷 $Chen_3$ 255	許 He 28	孔 $Kong_1$ 61	文 Mun_1 22
楚 Cho_1 160	胡 Ho_1 123	公 $Kong_2$ 118	門 Mun_2 247
肖 Cho_2 261	扈 Ho_2 135	貢 $Kong_3$ 242	明 Myeng 71
崔 Choy 4	洪 Hong 17	琴 Kum 104	羅 [1]Na 43
則 Chuk 260	花 Hwa_1 174	斤 Kun 221	那 Na 263
秋 $Chwu_1$ 67	和 Hwa_2 264	瓜 Kwa 266	南 Nam 35
鄒 $Chwu_2$ 239	垣 Hwan 253	郭 $Kwak_1$ 40	南宮 Namkwung 93
池 Ci_1 44	黃 Hwang 16	藿 $Kwak_2$ 283	浪 [1]Nang 179
智 Ci_2 117	皇甫 Hwangpo 106	廣 Kwang 270	及 Nay_1 185

奈 Nay_2	207	標 Phyo_2	258	申 Sin_1	25	禹 Wu_1	41
廬 ¹No_1	31	丕 Pi	200	辛 Sin_2	51	于 Wu_2	172
魯 ¹No_2	65	賓 Pin_1	126	愼 Sin_3	70	郁 Wuk	281
路 ¹No_3	171	彬 Pin_2	197	蘇 So_1	72	芸 Wun_1	195
雷 ¹Noy	173	氷 Ping	169	邵 So_2	140	雲 Wun_2	201
吳 O_1	11	卜 Pok	116	召 So_3	259	夜 Ya	170
伍 O_2	245	奉 Pong_1	88	孫 Son	26	梁 ¹Yang	24
玉 Ok	84	鳳 Pong_2	215	宋 Song	14	楊 Yang_1	60
溫 On	122	夫 Pu	191	承 Sung_1	89	襄 Yang_2	224
邕 Ong_1	158	邊 Pyen_1	57	昇 Sung_2	155	呂 ¹Ye	64
雍 Ong_2	204	卞 Pyen_2	66	勝 Sung_3	273	余 Ye_1	86
翁 Ong_3	241	史 Sa_1	109	守 Swu	276	汝 Ye_2	211
朴 Pak	3	謝 Sa_2	212	荀 Swun_1	162	廉 ¹Yem_1	59
潘 Pan_1	91	舍 Sa_3	216	舜 Swun_2	203	濂 ¹Yem_2	220
班 Pan_2	182	司空 Sakong	137	段 Tan_1	184	閻 Yem	217
方 Pang_1	49	尙 Sang_1	141	單 Tan_2	218	延 Yen_1	77
房 Pang_2	102	甞 Sang_2	267	端 Tan_3	236	燕 Yen_2	177
龐 Pang_3	153	桑 Sang_3	268	唐 Tang	145	永 Yeng	238
邦 Pang_4	156	徐 Se_1	15	大 Tay	193	靈 ¹Yeng	275
旁 Pang_5	226	西 Se_2	229	卓 Thak	76	葉 Yep	167
裵 Pay	29	石 Sek_1	63	呑 Tham	250	芮 Yey	108
白 Payk	23	昔 Sek_2	113	炭 Than	254	李 ¹Yi	1
范 Pem_1	142	釋 Sek_3	280	太 Thay	87	要 Yo	228
凡 Pem_2	234	席 Sek_4	284	都 To_1	68	龍 ¹Yong	101
判 Phan	188	薛 Sel_1	74	陶 To_2	152	柳 ¹Yu_1	20
彭 Phayng	139	楔 Sel_2	143	道 To_3	235	劉 ¹Yu_2	27
皮 Phi	115	西門 Semun	148	獨狐 Tok.ko	119	兪 Yu_1	52
弼 Phil_1	157	鮮于 Sen.wu	96	頓 Ton_1	178	庾 Yu_2	111
畢 Phil_2	278	宣 Sen_1	80	敦 Ton_2	249	陸 ¹Yuk	94
包 Pho_1	187	鮮 Sen_2	256	董 Tong	103	律 ¹Yul	282
鮑 Pho_2	225	先 Sen_3	257	東方 Tongpang	159	尹 Yun	7
馮 Phung	176	成 Seng_1	50	杜 Twu	128	王 Wang	82
片 Phyen_1	90	星 Seng_2	222	陰 Um	127	元 Wen_1	45
扁 Phyen_2	219	施 Si_1	149	殷 Un_1	99	袁 Wen_2	186
平 Phyeng	161	柴 Si_2	150	恩 Un_2	227	魏 Wi_1	75
表 Phyo_1	79	沈 Sim	33	應 Ung	231	韋 Wi_2	131

Appendix 3. Korean provinces

North Korea	Province	Abbreviation	Capital city
	Hamkyeng puk to	Ham-Puk	Chengcin
	咸鏡北道	咸北	靑津
	Hamkyeng nam to	Ham-Nam	Hamhung
	咸鏡南道	咸南	咸興
	[1]Yāngkang to	–	Hyēysan
	兩江道	–	惠山
	Cakang to	–	Kangkyey
	慈江道	–	江界
	Phyengan puk to	Phyeng-Puk	Sin-Uycwu
	平安北道	平北	新義州
	Phyengan nam to	Phyeng-Nam	Phyengyang
	平安南道	平南	平壤
	Hwanghay puk to	Hwang-Puk	Saliwen / Kayseng
	黃海北道	黃北	沙里院 / 開城
	Hwanghay nam to	Hwang-Nam	Haycwu
	黃海南道	黃南	海州
	[puk] Kangwen to	–	Wensan
	[北] 江原道	–	原山
South Korea	[nam] Kangwen to	–	Chwunchen
	[南] 江原道	–	春川
	Kyengki to	–	Sewul
	京畿道	–	–
	Chwungcheng puk to	Chwung-Puk	Chengcwu
	忠襄北道	忠北	靑州
	Chwungcheng nam to	Chwung-Nam	Taycen
	忠靑南道	忠南	大田
	Kyēngsang puk to	Kyēng-Puk	Taykwu
	慶尙北道	慶北	大丘
	Kyēngsang nam to	Kyēng-Nam	Pusan
	慶尙門道	慶南	釜山
	Cen.la puk to	Cen-Puk	Cencwu
	全羅北道	全北	全州
	Cen.la nam to	Cen-Nam	Kwangcwu
	全羅南道	全南	光州
	Cēycwu to	–	Cēycwu
	濟州 '	–	濟州

Appendix 4. Japanese placenames

The modern trend is to transliterate Japanese placenames from kana (or Japanese pronunciation) into Hankul: **Took(h)yoo** or **Tokkyo** 'Tōkyō', **Oosak(h)a** 'Ōsaka', **Nakasak(h)i** 'Nagasaki', ... But because the names are usually written with Chinese characters, it is still common to follow the tradition of using the Korean readings of those characters: **Tongkyeng** 'Tōkyō', **Tāyphan** 'Ōsaka', **Puk.hay-to** 'Hokkaidō', ... Below is an alphabetically ordered list of the 42 prefectures (ke'n = hyēn) of Japan with the Korean readings to the right. That is followed by a cross-reference list arranged according to the Korean versions.

Japanese prefectures with the Korean readings of the characters (⋯'-ken 県 = ⋯ hyen 縣):

愛智 Aichi	**Āyci**	岩手 Iwate	**Amswu**	岡山 Okayama	**Kangsan**
秋田 Akita	**Chwucen**	香川 Kagawa	**Hyangchen**	佐賀[5] Saga	**Cwaha**
青森 Aomori[1]	**Chengsam**	神奈川[3]Kanagawa	**Sinnaychen**	埼玉 Saitama	**Kiok**
千葉 Chiba	**Chen.yep**	鹿児島[4] Kagoshima	**[1]Nok.ato**	滋賀 Shiga	**Caha**
愛媛 Ehime	**Āywen**	高知 Kōchi	**Koci**	島根 Shimane	**Tōkun**
福井 Fukui	**Pokceng**	熊本 Kumamoto	**Wungpon**	静岡[6] Shizuoka	**Cengkang**
福岡 Fukuoka	**Pok.kang**	三重 Mie	**Samcwung**	栃木 Tochigi	**Manmok**
福島 Fukushima	**Pokto**	宮城 Miyagi	**Kwungseng**	徳島 Tokushima	**Tekto**
岐阜 Gifu	**Kipu**	宮崎 Miyazaki	**Kwungki**	鳥取 Tottori	**Cōchwi**
群馬 Gumma	**Kwunma**	長野 Nagano	**Cangya**	富山 Toyama	**Pusan**
広島[2] Hiroshima	**Kwāngto**	長崎 Nagasaki	**Cangki**	和歌山 Wakayama	**Hwakasan**
兵庫 Hyōgo	**Pyengko**	奈良 Nara	**Naylyang**	山形 Yamagata	**Sanhyeng**
茨城 Ibaraki	**Chaseng**	新潟 Niigata	**Sinsek**	山梨 Yamanashi	**San.li**
石川 Ishikawa	**Sekchen**	大板 Ōita	**Tāyphan**	山口 Yamaguchi	**Sankwu**

[1] = 青森   [3] = 神奈川   [5] = 嵯峨

[2] = 廣島   [4] = 鹿兒島   [6] = 靜岡

Korean readings of characters used to write Japanese prefectures:

Amswu	Iwate	**Hyangchen**	Kagawa	**Pokto**	Fukushima
Āyci	Aichi	**Kangsan**	Okayama	**Pusan**	Toyama
Āywen	Ehime	**Kiok**	Saitama	**Pyengko**	Hyōgo
Caha	Shiga	**Kipu**	Gifu	**Samcwung**	Mie
Cangki	Nagasaki	**Koci**	Kōchi	**San.li**	Yamanashi
Cangya	Nagano	**Kwungki**	Miyazaki	**Sanhyeng**	Yamagata
Cengkang	Shizuoka	**Kwungseng**	Miyagi	**Sankwu**	Yamaguchi
Chaseng	Ibaraki	**Kwunma**	Gumma	**Sekchen**	Ishikawa
Chen.yep	Chiba	**Kwāngto**	Hiroshima	**Sinnaychen**	Kanagawa
Chengsam	Aomori	**Manmok**	Tochigi	**Sinsek**	Niigata
Chwucen	Akita	**Naylyang**	Nara	**Tekto**	Tokushima
Cwaha	Saga	**[1]Nok.ato**	Kagoshima	**Tōkun**	Shimane
Cōchwi	Tottori	**Pok.kang**	Fukuoka	**Tāyphan**	Ōita
Hwakasan	Wakayama	**Pokceng**	Fukui	**Wungpon**	Kumamoto

Appendix 5. Radical names

Chinese characters are put into dictionaries according to a system of 214 "radicals", which were set up to represent the semantically significant components of characters. The radical may appear as the top, the bottom, or the right part of the character; sometimes it wraps all around the rest of the character, and sometimes it is enclosed inside the character. But most often it appears as the left-side part. What remains is quite often a hint about the pronunciation of the character, and that graphic hint is called the "phonetic" of the character. Whether the non-radical part of the character is a phonetic or not, the traditional number of strokes required to write it is important, for it determines the order of the characters under the radical; that number is known as the "residual stroke count". The radicals themselves are ordered according to the number of strokes it takes to write their traditional shapes, but today some of those shapes are abbreviated, so that not all of the simpler-looking radicals are found toward the beginning of the dictionary, though most of the complicated ones are toward the end.

Foreigners like to refer to the radicals by their number, but East Asians are used to referring to them by a name that reflects the meaning. While our reference to a character is "64,4", meaning one of the characters with four residual strokes under Radical 64, the Korean will think of it as "HAND, 4". The names of the radicals are often given category designators or titles according to where the graphic element is found in the character. The word for 'radical' is puswu and this is shortened to ‑ pu as a designator. The specific category designators are the following nouns, used with specialized meanings:

> pyen 'left-side radical'
> mith ("beneath", also alay 'below') or meli ("head") 'top-piece radical, roof'
> pat.chim ("prop" or "pedestal") 'bottom-piece radical'
> mom ("body") 'right-side radical; dominant-size radical'
> an ("within") 'a loose wrapper' (such as 104 and 169)
> sŏk ("deep inside") 'a tight wrapper' (such as 20 and 30)

Because the pyen are so common, the term is sometimes generalized to mean just "radical" (= pu). When a radical frequently occurs in more than one position, several designators are given for it in the list below. The list was compiled from several sources; it aims to be comprehensive, but there probably exist other terms that could be added. Among the western names are some common terms from Japanese, prefaced by "[J]"

Shape(s)	Num.	Name(s)	Meaning, western names / mnemonics
一	1	il-hoyk, "han"-il pyen	one
		"han"-il mith	"one" roof
|	2	"ttwulh.ulq"-sen/-kon mom	rod
		"sēymq-tay seywqulq"-sin pu	"counting stick"
ヽ	3	"pul-ttong"-cwu pu; cem	spark; dot
		han cem mith	top dot
ノ	4	ppichim pyen	slant; [J] kana <u>no</u>
乙, 乚	5	"sāy"-ul pyen / mom	"bird"; fishhook, 2d Stem
亅	6	kalkol(ang)i mom	barb
		"kalk⁰/ᵥᵤli"-kwel pu	
二	7	"twū"-ī mom / pyen / pu	two
亠	8	twū mith, mun kas-meli	"two top, gate hat-head"; lid
		"twāyci"-hay mith	"the roof in Sign of the Boar"
亻	9	("sālam"-)in pyen	man (left side)
𠆢		napcak "sālam"-in pyen / alay	"spread-out man" (top / bottom)
儿, 丿乚	10	"ecin sālam"-in pyen / pat.chim / pu	"kindly man"; Legs

入		11	"tulq"-ip mith / pu / pyen	enter(ing)
八,	八	12	"yetelph"-phal (mith)	eight (roof)
冂		13	"mālq"-kyeng pyen, "mēlq"-kyeng pu	roll up; upside-down box, 3-sided frame
冖		14	mīn kas-meli (CF 40)	"bald hat-head"; bald roof, [J] kana wa
冫		15	ī-swu pyen	two waters; ice
几,	几	16	"kwey"-kwey mom, ansek-"kwey" mom	table; windy
凵		17	pēllin "ip"-kwu (CF 22, 30)	spread "mouth"; open box
			wi thē-cin "ip"-kwu	top open "mouth"
刀		18	"khal"-to pyen	sword, knife
刂			sen / sun "khal"-to (mom)	"standing sword" (right)
力		19	"him"-lyek pyen / mom	strong, strength
勹		20	"ssal"-pho pyen / sōk	wrap(ping)
匕		21	"piswu"-pi mom	"dagger"; spoon, [J] kana hi
匚		22	thē-cin "ip"-kwu (CF 17, 30)	open "mouth"; box on side
匸		23	"thē-cin eywun tam" pyen (CF 31)	"open enclosure wall"
			"kamchwul"-hyey sōk	hide, hiding
十		24	"yel"-sip pu / mom	ten; cross
卜,	⼘	25	"cem"-pok mom / pu	divination; [J] kana to
卩,	己	26	pyeng pūcel pyen	(military) seal; stiff ear
厂		27	ēmho pyen	cliff
			mīn ēmho pyen[1]	bald cliff
			kileki an / mith	inside / below goose; trailing goose
厶		28	"manul"-mo (mith)	garlic (roof); [J] kana mu
			sasa mith	private (roof)
又		29	"tto"-wu mith / pyen	again
口		30	"ip"-kwu pyen / sōk	mouth
囗		31	"eywun-tam" pyen / sōk (CF 23)	"enclosure wall"; box
			khunq "ip"-kwu pyen	big mouth
土,	⼟	32	"hulk"-tho pyen / mith / pat.chim	earth
士		33	"senpay"-sa pyen / mith	scholar; warrior, samurai
			"senpi"-sa pyen	scholar
夂		34	"twīcil"-chi mith	lag; winter (roof), summer legs
			"twī-cye ol" chi pyen	
夊		35	"chēnchen-hi kel.ulq"-soy pyen	slow walk; winter variant
夕		36	"cenyek"-sek pyen	evening; [J] kana ta
大		37	"khun / khulq"-tāy mom	big
女		38	"kyēycip"-nye pyen	woman
子		39	"atul"-ca pyen	child
宀		40	kas meli (mith)	"hat head"
寸		41	"mati"-chōn mom / pyen	inch
小		42	"cek.ulq"-sō mom / pu	little
			"cak.ulq"-sō pyen	

尤	43	"tewuk"-wu pyen	more; crooked big
		cellwum-pal.i wang pyen	"lame king radical"
尸	44	"cwukem"-si mith	corpse; flag
屮	45	"ōyn son"-cwa pyen	left hand; old grass
山	46	"moyq"-san pyen, "meyq"-san pu / pyen	mountain
巛, 川	47	kāymi-heli mith	"ant waist" (top)
		"nāy"-chen pyen	river; curving river
工, 工	48	"cangin"-kong mom	artisan; carpenter square,
			[J] kana e
己, 已, 巳	49	"mom"-ki mom	self; snake
巾	50	"swūken"-ken pyen	towel; cloth, napkin
干	51	"pangphay"-kan mom / pyen	shield; one-ten, dry(ing)
幺	52	"cak.ulq"-yo pyen	little; short thread
广	53	ēmho mith / pyen[1], "pawi cip"-em mith	cliff; dotted cliff, dot-goose
			roof, MA-roof
辶	54	cem ēps.nun chayk-pat.chim (CF 162)	"undotted book-prop"
		mīn chayk-pat.chim	"bald book-prop"
		"tangkil"-in pat.chim	"go"; stretch(ing), long stride
廾	55	mith-sumul (c)ip / sip	"bottom-twenty"; bottom grass,
			twenty legs, letter H
弋	56	cwū'-sal uy pu, "cwū'-sal"-ik pyen	"string-attached arrow"; ceremony
弓	57	"hwal"-kwung pyen	(archery) bow
⺕, 彐, 彑	58	thē-cin "kalo"-wal	open "flat"-wal (Radical 73);
			pig's head, kana yo
彡	59	"thelek"-sam (pyen)	(short) hair; three hairs,
		"ppichin sēk"-sam (pyen)	slanting three
彳	60	twū in-pyen, cwūng in-pyen	double man; going man
心; 忄	61	"maum"-sim pyen, simpang pyen (left)	heart
忄		"mith maum" sim (bottom)	bottom heart
戈	62	"chang"-khway mom, "chang"-kwa pyen	tassled spear
戶	63	"cikey"-ho pyen	door(frame)
手	64	"son"-swū pyen	hand
扌		cay-pang pyen (left)	[looks like] side of cay ("talent")
扌		mith "son"-swū pu (bottom)	bottom hand
支, 辶	65	"cithayng (halq)"-ci pyen	support
		"cici"-ci pyen	branch (12 Earth's Branches)
攴, 攵	66	"tung-kul.wel" mun (mom / pu),	back(wards) letter; folding chair;
		tung "ke'l" mun	[J] to-mata, (right) no-bun
文	67	"kul.wel" mun (pu / pyen)	letters; literary
斗	68	"mal"-twu pu / pyen	peck, bushel; dots-and-cross
斤	69	"nal"-kun pyen; "nās"-kun pyen	blade, ax; scythe
		nāth-kun pyen	(unit of weight)

方	70	"mo"-pang pyen	direction; square
无	71	"imi"-ki mom	already; crooked heaven
日	72	"nal"-il pyen	day; sun
曰	73	"kal(o)"-wal pyen[2]	flat sun; (Confucius-)say
检	74	"tal"-wel pyen	moon
木	75	"namu"-mok pyen	tree
欠	76	"haphum"-hum pyen	yawn(ing)
止	77	"kuchilq"-ci pyen	stop(ping)
歹	78	"cwuk.ulq"-sa pyen	death; [J] ichi-ta
殳	79	kac.un "tung-kul.wel" mun (CF 67)	the whole back(wards) letter; [J] ru-mata
母, 毋	80	"emi"-mŏ pyen	mother
		"māl"-mu pu / pyen	desist
比	81	"kyencwulq"-pī mom / pyen	compare, comparing
		"kolulq"-pī pu	?
毛	82	"thelek"-mo pat.chim / pu / pyen	fur
氏	83	"kak"-ssi ssi (pyen)	clan
气	84	"kiwun"-ki mith / pyen	steam
氵	85	samswu pyen (left)	three waters
水		"mul"-swu pyen	water
氺, 氷		"alayq mul" swu(/ pyen) (bottom)	bottom water
火	86	"pul"-hwa pyen	fire
灬		[1]yenhwa (pyen) (bottom)	row-fire; bottom fire
		nēk-cem (bottom)	four dots
爪, ⺥, 爫	87	"son-thop"-co pyen / mom	claw
父	88	"api"-pu mith / pyen	father
爻, 爻	89	"sakwil"-hyo pu	socialize; double X
		"cemqkway"-hyo pyen	(divination sign)
爿	90	"cāngswu"-cang pyen	general; bed; left side
		tung "cokak"-phyen pyen (CF 91)	reversed slice
片	91	"cokak"-phyen pyen	slice; right side
牙	92	"ekumq-(n)i"-a pyen	tusk; big tooth
牛, 牜	93	"so"-wu pyen	ox, cow
犬, 犭	94	"kāy sasum"-lok pyen, "kāy"-lok pyen	dog / animal
		"kāy"-kyen pu / pyen	
玄	95	"k^eam.ul"-hyen pyen	dark
玉, 王	96	"īm-kum"-wang pyen	king
		"kwusul"-ok pyen	jewel, jade
瓜	97	"oi"-kwa pyen	melon
瓦	98	"kiwa"-wa mom / pu / pyen	tile
甘	99	"talq"-kam mom / pyen	sweet
生	100	"nalq"-sayng pyen / pu	birth

用	101	"ssul(q)"-yŏng mom / pu / pyen	use, using
田	102	"path"-cen pyen	field; rice field
疋	103	"ccal"-phil mom, "phil"-phil pyen	roll of cloth; [J] animal counter
疒	104	pyēngcil an / mith	sick, ill
		?pyēngnyek (= ?pyēngq-yek) an	[Kim Minswu 1961]
癶	105	"philq"-pal mith	develop (roof); dotted tent
		"kel.ulq"-pal (pyen)	north
		"pukpang"-kyey mith	roof of the Tenth Heaven's Stem
白	106	"huyn / huylq"-payk pyen	white
皮	107	"kacwuk"-phi pyen	skin
皿	108	"kulus"-myeng (pat.chim / pu)	dish, saucer, plate
目	109	"nwun"-mok	eye
罒		"nwun"-mok mith = "nĕk"-sa mith	eye roof = top four, net (122)
矛	110	"chang"-mo pyen	spear, bayonet
矢	111	"sal"-si pyen	arrow
石	112	"tōl"-sek pyen	stone
示	113	"poilq"-si pyen	show(ing)
禸	114	"cimsung palq-cakwuk"-yu pyen	(animal) footprint
禾	115	"pye"-hwa pyen	grain; two-branch tree, [J] no-gi
穴	116	"kwumeng"-hyel mith	cave (roof)
立	117	"selq / sulq"-lip pyen	stand(ing)
竹,	118	"tay"-cwuk pyen / meli	bamboo
米	119	"ssal"-mi pyen	rice
糸	120	"sīl"-sa pyen	(long) thread, silk
缶	121	"cangkwun"-pu pyen[3]	jar
网	122	"kumul"-mang	net; side-eye
		"nĕk"-sa mith, napcak "nĕk"-sa	top four, squat four
羊	123	"yang"-yang pyen	sheep
羽	124	"kis"-wu pyen / pu	wing
耂	125	"nulk.ul"-lō (pyen / mith)	old (man)
而	126	"mati"-ī mom	joint, (conjoiner) word
		"māl i(u)lq"-ī pyen	phrase to continue
		"tto"-ī pyen	and also, furthermore
耒	127	"cayngki"-loy pyen	plow, three-branch tree
		"posup"-loy pyen	plow(share)
耳	128	"kwi"-ī pyen	ear
聿	129	"ōcik"-lyul pyen	merely; brush
		"iyey"-lyul pyen = "i ey"-lyul pyen	whereupon, immediately
肉	130	"koki"-yuk pyen	meat
月		"yuk tal"-wel pyen (left)	meat-moon
臣	131	"sinha"-sin pyen	statesman; subject
自	132	"susulo"-ca pyen / pu	self; dotted eye

至		133	"ilulq"-ci pyen	arrive, arriving
白		134	"celkwu"-kwu pyen	mortar
舌		135	"hye"-sel pyen	tongue
舛		136	"ekil"-chen pyen	dance, dancing legs
舟		137	"pay"-cwu pyen	ship, boat
艮		138	"kuchilq"-kan pu / pyen	end; (dot-less) good
色		139	"pich"-sayk mom / pyen	color
艸, 艹, 艹		140	chotwu (mith)	grass-top (roof)
			"phul"-cho mith	grass roof
虎		141	"pĕm"-hŏ (mith), pĕm meli	tiger (roof)
虫		142	"pelley"-chwung pyen	bug, insect
血		143	"phi"-hyel pyen / pu	blood; dotted dish
行		144	"tanil"-hayng pyen	go(ing)
衣		145	"os"-uy pyen /otipyen/	clothing, clothes
襾, 西, 襾		146	"senyekh"-se mith	west roof
			"teph.ul"-a pu	cover
見		147	"polq"-kyĕn mith	see(ing)
角		148	"ppul"-kak pyen	horn
言		149	"māl-ssum"-en pyen	speak(ing), speech
谷		150	"kol"-kok pyen / pu	valley
豆		151	"phath"-twu pyen, "khong"-twu pyen	bean
豕		152	"twāyci"-si pyen	pig, hog
豸		153	kac.un "twāyci"-si pyen	the whole hog; clawed dog
貝		154	"cokay"-phāy pyen	small shell
赤		155	"pulk.ulq"-cek pyen	red
走		156	"tal.a-nalq"-cwū pyen / pat.chim	run(ning)
足, ⻊		157	"pal"-cok pyen	foot
身		158	"mom"-sin pyen	body
車		159	"swuley"-ke pyen	car
辛		160	"maywulq"-sin pyen	bitter
辰		161	"pyēl"-cin mom / pyen	star; small dragon (5th of 12 Earth's Branches)
辵, 辶		162	(kac.un) chayk pat.chim	the whole book-prop (CF 54)
			"swīmye kalq" chak	slowly go; road, [J] shinnyū
邑		163	"koul"-up pyen	big village
阝			wū pupang (mom) (CF 170)	right(-side) village
酉		164	"talk" yu pyen	rooster (10th of 12 Earth's Branches); wine
采		165	"punpyel-hal"-chay pyen	discriminate
			"namul"-chay pyen	vegetables; topped rice, [J] no-gome
里		166	"maul"-lī pyen	village(-mile)
金		167	"soy"-kum pyen	metal

至	168	"kīn / kīlq"-cang pyen	long
門	169	"mun"-mun (an)	gate
阜	170	"entek"-pu pyen	hillock
阝		cwā pupang (CF 163)	left(-side) village; small village
隶	171	"michil(q)"-i pu, "mith"-i pyen	slave
隹	172	"sāy" chwu (pyen)	old bird, short-tailed bird
雨, ⻗	173	"pi"-wū pyen / mith	rain (roof)
青	174	"phulul"-cheng pyen	blue
非	175	"ani 'lq"-pi mith / pyeth	not; negative
		"ani"-pi pu	
面	176	"nach"-myēn pyen, "myēn"-myēn pyen	face
革	177	"kacwuk"-hyek pyen	shoe leather, rawhide
韋	178	"kacwuk"-wi pyen	tanned leather; different
韭	179	"puchwu"-kwu pyen	leek
音	180	"soli"-um pyen / pu	sound, noisy
頁	181	("meli"-hyen →) "meli"-hyel pu / pyen	head; big shell, page (CF 154)
飛	182	"nalq"-pi pyen / pu	fly(ing)
風	183	"palam"-phung pyen / mom / pu	wind
食	184	"pap"-sik pyen	food, eat(ing)
首	185	"meli"-swu	head; neck
香	186	"hyangki"-hyang pyen / pu	perfume
馬	187	"mal"-mā pyen	horse
骨	188	"ppye"-kol pyen	bone
高	189	"noph.ulq"-ko pyen / pu	high
髟	190	"thelek"-pal mith / pyen	long hair
鬥	191	"ssawul"-thwu (mith / sōk)	battle; broken gate
鬯	192	"hwalq"-cip-chang pu	bow case; herb
		"swul"-chang pyen	wine
鬲	193	"tanci"-kyek pyen	jar; tripod (cauldron)
		"oci-pyeng"-kyek pyen	
鬼	194	"kwīsin"-kyek pyen	devil
魚	195	"koki"-ē pyen	fish
脤	196	"sāy"-cŏ pyen	bird
鹵	197	"sokum-path"-lo pyen	salt
鹿	198	"sasum"-lok pu	deer
麥	199	"poli"-mayk pat.chim / mom / pyen	wheat, barley
麻, 广	200	"sam"-ma pu / pyen	hemp
黃	201	"nwul^u/_el"-hwang pyen / pu	yellow
黍	202	"kicang"-se pyen	miller
黑	203	"kem.ul"-huk pyen / pu	black
黹	204	"panu'-cil"-chi pu	sew(ing), embroidery
黽	205	"mayngkkongi"-mayng mom / pu / pyen	frog

鼎	206	"soth"-ceng pyen / mom / pu	kettle
鼓	207	"pul"-ko pyen / mom	drum
鼠	208	"cwi"-sē pat.chim / mom / pyen	rat
鼻	209	"kho"-pi pyen	nose
齊	210	"kacilen-halq"-cey mom[4]	even, alike; [J] <u>Saitō no sai</u>
齒	211	"i"-chi (pyen)	tooth
龍	212	"¹yong"-lyong pyen	big dragon
龜, 亀	213	"kepuk"-kwi mom / pu / pyen	turtle
龠	214	"phili"-yak pu / pyen, "ce"-yak pyen	flute

[1] Kim Minswu 1961 uses the dialect variant **umho** = **ēmho** (Radicals 27 and 123).

[2] **Kalo** is an obsolete form of a defective verb **kalu-** 'say' (MK *kolo-* / *kolG-* < **kolok-*) that is found only in the forms **kalotoy** < *kol´G-wo-´toy* 'as [he] says' and **kalasitay** < *ko´lo-´sya-´toy* 'as he deigns to say', but underlies the stem **kalu-chi-** 'teach' (MK *kolo´chi-*).

[3] There is a mistake in KEd ("cangkwu") that was copied from a misprint in Kim Minswu 1961 (Radical 121).

[4] Kim Minswu 1961 uses a dialect variant "kancilen-hal".

Appendix 6. Korean grammatical terms.

Korean grammarians have created quite a few new terms to refer to phenomena in Korean grammar. Some of the terms are intended to replace Chinese compounds used by grammarians in Japan or China. The following list is intended as an aid to reading works by the grammarians and correlating the various synonyms found in the literature. The list is long but far from exhaustive.

an mayc.um ssi-kkuth nonfinal suffix / ending

an nophim (nonhonorific =) plain style; status-unmarked forms

an wullimq soli = museng-um unvoiced sound, surd

cakyek kyek ?qualificative case ("as, in the role / capacity of" = ···ulo)

cali = kyek (grammatical) case

cali pakkwum = cen.wi transposition, inverted order (of morphemes), inversion, anastrophe

caliq pep case (formation / marking)

cali(q pep) tho-ssi = kyek cosa case marker / particle

calip hyengyong-sa a free adjective

calip hyengsik a free form

calip ilum-ssi = calip myengsa a free noun

calip imca-ssi a free indeclinable

cap.um ssi = ciceng-sa = kyeysa copula (noun predicator)

catong(sa) = cey wumcik-ssi an intransitive verb

caum = tah-soli a consonant

caum cep.pyen consonant assimilations (between syllables)

cenchey kwuseng the total structure

cenhwan hyeng = cwungtan hyeng = kuchim kkol the transferentive form

cenhwanq pep the transferentive (mood)

censeng = phumsa censeng

censeng-e a word converted from some other part of speech

censeng emi function-converting suffixes (e.g. nominalizers, adnominalizers, adverbializers)

cen.wi = cali pakkwum transposition, inverted order (of morphemes), inversion, anastrophe

cep.mi-sa = cep.mi-e = twiq kaci suffix

cepsa = cep.e = kaci affix

cepsok-pep conjoining, conjunction

cepsok pusa = ium ecci-ssi a conjunctive (conjunctional) adverb

cepsok-sa = ium ssi = is-ssi a conjunction, a connective

ceptwu-sa = ceptwu-e = aph kaci prefix

cep.yo-sa = sap.yo-e = sap.ip-e/-sa = sok kaci an infix

cey-i inching second person ("you, you people")

cey-il inching first person ("I / me, we / us")

ceylo uy pyen.i hyengthay a zero allomorph

cey-sam inching third person ("he/him, she/her, they / them")

cey wumcik.im pyenhyeng the intransitivized or passivized form (-e ci-), intransitivization

cey wumcik-ssi = catong(sa) an intransitive verb

ceyyak-pep = kwusok-pep conditional (mood)

chalyey seym-ssi an ordinal numeral

cha.yong-e a borrowed word, a borrowing; a loanword

cheq-kyek locative or allative case

chep.e a reduplication, an iterative word

ches ccay cali a primary case

ches ccay cali tho-ssi a primary case marker / particle

chesoq kyek locative or adessive case

ches soli = choseng (syllable-)initial sound

chey style

cheyen = imca ssi indeclinables (other than particles); nouns

chium = iq soli a sibilant or affricate

choseng = ches soli (syllable-)initial sound

choyso calip hyengsik a minimal free form

chwucengq pep = micengq pep the presumptive (indefinite) mood

chwuk.lyak /chwungnyak/ → chwuk.yak

chwukso toyn mati = tanphyen-cek in mati a contracted phrase

chwuk.yak /chwukyak/ [*not in the dictionaries*] contraction, contracting, contracted: ~ hata contracts it, ~ toyta it gets contracted; ~ hyeng a contracted form, a contraction; ~ pyenhyeng a contracted alternant, a contracting transformation

chwusang myengsa = kkol eps.nun ilum-ssi an abstract noun

ciceng-sa = kyeysa = cap.um ssi copula (noun predicator)

cikcep imca mal direct subject

cikcep in.yong direct quotation

cikcep sengpun an immediate constituent

cokak = sengpun part (of a sentence)

coq-kyek the instrumental case

concay-sa quasi-verb of existence (iss-, ĕps-, kyĕysi-)

congciq-pep = machimq pep = ūyhyangq pep (sentence-)final form, conclusive, predicative (mood)

congkyel ĕmi final / finite suffix

congseng = kkuth soli (syllable-)final sound

congsok-cek hapseng-e = swusik-cek hapseng-e a subordinate compound

conkyengq pep honorification, exaltation; (use of) honorifics

con-piq pep stylizations, speech styles

contayq māl honorifics, an honorific

contayq pep honorification

cōsa = tho ssi particle

coseng mōum = kolwum holq-soli an epenthetic vowel

coum harmony; euphony

coum-so = kolwumq soli an epenthetic sound / phoneme

cwuchey the subject (of a sentence)

cwuchey kyem.yang subject deference (humilification)

cwuchey noph.im(q pep) subject honorification (exaltation)

cwucheyq pep subject (formation / marking)

cwue = īmca māl subject (phrase)

cwuq-kyek cōsa = īmca cali tho-ssi a subject marker; a nominative-case particle

cwuq-kyek hyeng = īmca kkol the subject form, the nominative

cwul.im contraction, compression, abbreviation, shortening

cwul.im kkol contracted form

cwulki = ēkan stem

cwūn-kwulkok pep the declension of a noun, quasi-inflection

cwungching near-distant reference = mesial; second person

cwungseng medial sound = syllable nucleus; (glide and) vowel

cwungtan hyeng = cēnhwan hyeng = kuchim kkol the transferentive form

cwungum sayng.lyak syncope

cwupu the subject (element / part)

cwu-sengpun = uttum cokak a main constituent

cwutong(sa) active (verb), active voice

ecci kkol adverbial form; derived adverb

ecci māl = pūsa-e adverbial (phrase)

ecci māl mayin ilum-ssi adverbial bound noun

ecci ssi, ec-ssi = pūsa adverb

ĕcel = mati = iun māl = kwu a phrase; a clause

ēhyeng (word) form

ēkan = cwulki stem

ēkun = ppuli root

ēmi = ssi kkuth suffix; an (inflectional) ending, a verb ending

ēswun word order

etteh-ssi, et-ssi = hyengyong-sa an (inflected) adjective

etten ssi, en-ssi = kwanhyeng-sa = maykim ssi an adnoun, a prenoun, a determiner

haim = sā.yek causative

haim kkol the causative (form) of a verb

haim māl = sā.yek-e a causative (verb)

haimq pep causative voice; causativization

hakey chey familiar style

hănceng-e/-sa a determiner, an adnoun, a prenoun

hănceng pyēnhyeng a noun-modifying form; an adnominalization

hănceng-swu the adnominal form of a numeral (han ⋯ , twū ⋯ , sēy ⋯ , ‥)

han-kinungq pep a single-function mood

hao chey the semiformal (authoritative) style

hapseng-e a compound (word)

hapseng ecci-ssi a compound adverb

hapseng(q) īmca-ssi a compound indeclinable

hapsengq pep compounding

hapseng phul.i-ssi = hapseng yōngen a compound predicative (verb)

hapsyo chey the formal style

hap.yong pyēngse combining two or more letters to write initial consonant clusters

hasose chey obsolete literary style

hay-la chey plain style

hĕlak pep the permissive mood

hesa a grammatical word, a marker, a particle, an affix (vs silqsa a content-word, a stem)

he.yong-cek haim māl a permissive causative

hiathwusu = holq-soli chwungtol hiatus

him-cwum māl an emphatic / intensive word

him-cwumq pep the emphatic mood (= -'two; -ᵘ⁄o'na)

hoq-kyek = pulumq cali vocative case; ~ cōsa vocative marker / particle

hol-lo ilum-ssi = ko.yu myengsa proper noun

hol-lo māl / ssi = tok.lip-e/-sa absolutes (such as interjections, vocatives)

holq-soli = mōum vowel

holq-soli chwungtong = hiathwusu hiatus

holq-soli cohwa = mōum cohwa vowel harmony

holq-soli ssi-kkuth an ending that begins with a vowel, a vowel ending

holq-soli tho-ssi a particle that begins with a vowel, a vowel particle

hōnhap-e a hybrid word

hoth holq-soli a simple vowel

hoysangq pep = kyenghemq pep the retrospective mood

hupsaq pep the (re)semblative mood (-tus < -ʾtos)

hwakcengq pep = kicengq pep the definitive (definite) mood

hwaktay hyeng = hwaktay toyn hyengthay = nul.e nan hyengthay enlarged / expanded form

hwal.yong = kkuth pakkwum conjugation

hwal.yong hyeng = kkuth pakkwum kkol a conjugational form

hwal.yong (uy) ssi-kkuth a conjugational ending

hwuum laryngeal (glottal) sounds

hyāngcinq kyek the prolative or allative case

hye-kkuth soli an apical (tongue-tip) sound

hyēncay (the) present

hyengsik myengsa a "formal" noun = quasi-free noun, quasi-noun

hyengthay a (morphological) form

hyengthay-cek kwuseng morphological structure

hyengthay-cek pyēn.i hyengthay a morphophonemic alternant

hyengthay-lon morphology

hyengthay-so a morpheme

hyengthay umso a morphophoneme

hyengthay-umso-cek pyēntong / pyēn.i morphophonemic alternation

hyengthay umwun-so a morphophoneme (?); a morpheme (shape), an allomorph

hyengyong-sa = etteh-ssi, et-ssi an (inflected) adjective

hyēnsilq pep the processive mood

hye-yeph soli a lateral sound

hyusik pause

īcwung mōum = twū kyep holq-soli diphthong

ihwa (cak.yong) dissimilation

ilum kkol a noun form, a nominalization

ilumq pep = myengsaq pep nominalization; the substantive and summative forms

ilum ssi, im-ssi = myengsa noun

īmca cali tho-ssi = cwuq-kyek cōsa a subject marker; a nominative-case particle

īmca cokak the subject (constituent / phrase)

īmca kkol = cwuq-kyek hyeng the subject form, the nominative

īmca māl = cwue subject (phrase)

īmcaq pep subject formation, subject marking

īmca ssi = cheyen indeclinables (other than the particles); nouns, pronouns, and numbers

īm.uy pyēntong an optional transformation / variation

īm.uy pyēntong hyeng = īm.uy-cek pyēn.i hyengthay an optional variant (form)

inching(q pep) grammatical person

in tāymyengsa personal pronoun

in.yen affinity, motivation

īn.yong-e = īn.yong māl a quotational phrase, a quotation

ip-seng the "entering" tone = ʾ-P, ʾ-LQ, ʾ-K (treated as kĕ-seng)

ip-swulq soli a labial sound

ip.um(q pep) = phītong the passive (voice)

ip.um kkol the passive (form) of a verb

ip.um māl = phītong-e/-sa a passive (verb)

ip.um uy kaci the passive affix

iq soli = chium a sibilant or affricate

is-ssi = ium ssi = cepsok-sa a conjunction, a connective

ium ecci-ssi = cepsok pūsa a conjunctive (conjunctional) adverb

iumq pep = cepsok-pep conjunction, the conjunctive mood(s)

ium ssi = is-ssi = cepsok-sa a conjunction, a connective

iun māl = kwu = ĕcel = mati a phrase; a clause

kaci = cepsa = cep.e an affix

kachiq pep the evaluative mood (-um cik)

kac.un phul.i ssi a full-paradigm verb (a nondefective verb)

kal.i soli = machal-um a fricative (sound)

kalimq pep = sĕnthayk-pep the selective mood (-una, -kena)

kāmthan cōsa an interjectional particle, an exclamatory particle

kāmthanq pep the exclamatory mood

kāmthan-sa = nukkim ssi, nuk-ssi an interjection

kāncep īmca māl indirect subject = topic

kāncep īn.yong indirect quotation

kāncep noph.im indirect honorification (exalta-
tion)

kangco yēngthanq pep ("emphatic exclama-
tory") the effective aspect (-ˈke-)

kangsey stress, emphasis, accent

kangsey-e an emphatic word

kangsey-hyeng an emphatic form

kapyewun soli a "light" (= lenited, weakened)
sound

kāsang-cek (hyengthay-so, kaci) hypothetical /
fictive (morpheme, affix)

kaykchey an object

kaykchey noph.im object honorification (exalta-
tion); ∼ māl an object honorific; ∼ q pep the
object-honorific (-exalting) mood

kellim ssi = kwankyey-sa a relative (pronoun /
adverb); a relativizer

kě-seng the "going" tone (high), in MK texts
marked with a dot (ˈ)

keseyn soli = kyek.um = yūki-um an aspirated
sound, an (a heavy) aspirate

keth kwuco (outer structure =) surface structure

kicengq pep = hwakcengq pep the definitive
(definite) mood

kincang holq-soli = kincang moum a tense
(fortis) vowel

kinung = kwusil function

kipon hyeng = uttum kkol the basic (tenseless)
form; the dictionary form (of a verb)

kipon hyengthay basic form

kipon-swu cardinal numbers

kipon wel basic sentence

kkol form

kkol ēps.nun ilum-ssi = chwusang myengsa an
abstract noun

kkol ēps.nun kaci an ellipted particle, a zero
(form of a) particle

kkol ēps.nun pyēn.i hyengthay a zero allomorph

kkol pakkwum morphophonemic alternations,
alternations in form

kkoyimq pep the hortative (mood), the proposi-
tive

kkuth soli = congseng = (syllable-)final sound

kkuth pakkwum = hwal.yong conjugation

kkuth pakkwum kkol = hwal.yong hyeng a
conjugational form

kkuth pakkwum phyo a conjugational paradigm
(chart)

kkwumim = swusik modification

kkwumim māl = swusik-e a modifier (phrase)

kkwumim ssi = swusik-sa = kwansa a modifier,
a modifying word [adnouns, adverbs, modifier
(= adnominal) and adverbative forms of
inflected words]

kok.yong declension

kolwum: holq-soli ∼ vowel epenthesis

kolwumq soli = coum-so an epenthetic sound /
phoneme

kolwum holq-soli = coseng mōum an epen-
thetic vowel

kōngtay māl honorific words / speech, honorifics

kōngtayq pep = noph.imq pep status marking,
respect language, honorifics and humilifics

kōngtongq pep the propositive (= the hortative)
mood

kos tāy-ilum-ssi a locative pronoun

ko.yu myengsa = hol-lo ilum-ssi a proper noun

kuchim kkol = cwungtan hyeng = cēnhwan
hyeng the transferentive form

kūlim ssi an adjective

kul.wel = wel a sentence

kunce-e = mith māl a root (word)

kūnching near reference = proximal; first person

kwāke past

kwāke-mīwan "past imperfect" = retrospective

kwanhyengq kyek = maykimq cali the adnomi-
nal (genitive) case

kwanhyengq kyek cōsa = maykimq cali tho-ssi
the adnominal (genitive) particle

kwanhyeng-e = maykim māl an adnominal
phrase, a modifier (phrase),

kwanhyengq pep adnominalization, the adnomi-
nal mood

kwanhyeng pu an adnominal (phrase)

kwanhyeng-sa = maykim ssi = etten ssi, en-ssi
an adnoun, a prenoun, a determiner

kwanhyeng-sa hyeng an adnominal form, a
modifier

kwankyey-sa a relative (pronoun / adverb); a
relativizer

kwankyey pūsa a relative adverb

kwankyey tāymyengsa a relative pronoun

kwansa = swusik-sa = kkwumim ssi a modifi-
er, a modifying word [adnouns, adverbs, the
modifier (= adnominal) and adverbative forms
of inflected words]

kwāto-um a glide, a transitional sound

kwu = iun māl = ēcel = mati a phrase; a clause

kwukay-um a palatal sound

kwukayum-hwa palatalization

kwulkok (uy) kaci an inflectional affix

kwulkok pep inflection (= conjugation and declension)

kwulkok uy pĕmcwu inflectional category

kwusil = kinung function

kwusok hyengsik a bound form

kwusok myengsa = pul-wancen myengsa = mayin ilum-ssi a bound noun

kwusok-pep = ceyyak-pep the conditional mood [includes sequential, temporal infinitive, etc.]

kyek = cali case

kyek cōsa = cali tho-ssi case marker / particle

kyek.um = yūki-um = keseyn soli an aspirated sound, an (a heavy) aspirate

kyek.um-hwa aspirating, adding aspiration (to a sound)

kyemsa māl humble speech, self-humbling words, humilifics, obsequities

kyemsonq pep humilifics, self-humbling words, obsequities

kyem.yangq pep = sangtay noph.im(q pep) = tul.u.l i noph.im deferential (formal style)

kyencwumq cali tho-ssi = tāypiq kyek cōsa comparison-complementizer, particle marking the complement (= standard) of a comparison

kyencwum māl = tāypi-e the complement of a comparison

kyencwumq pep = pīkyoq pep comparison; the comparison mood

kyenghemq pep = hoysangq pep the retrospective mood

kyengum = toyn soli "hard" (= reinforced, tensed, fortis, crisply unaspirated) sounds

kyengum-hwa fortition, reinforcement, tensification

kyep congseng a syllable-final consonant cluster

kyep hapseng-e a double compound

kyep holq-soli SEE twū ~ , sēy ~

kyep ip.um māl a double passive (phrase / verb)

kyep nam wumcik-ssi a double-transitive verb

kyēysa = cap.um ssi = ciceng-sa copula (noun predicator)

kyuchik tōngsa a regular verb

kyuchik yŏngen regularly inflected words

machal-um = kal.i soli a fricative (sound)

machimq pep = congciq-pep = ūyhyangq pep (sentence-)final form, conclusive, predicative (mood)

māl mith a word root

māl pon = munqpep grammar

mati = ēcel = iun māl = kwu a phrase; a clause

mati ¹yenkyel tho-ssi phrase-conjoining particle, a phrase-conjoiner

mayc.um ssi-kkuth a (verb-)final ending

mayin ilum-ssi = kwusok myengsa = pul-wancen myengsa a bound noun

mayin phul.i ssi a bound verb / adjective / copula

maykimq cali = kwanhyengq kyek the adnominal (genitive) case

maykimq cali tho-ssi = kwanhyengq kyek cōsa the adnominal (genitive) particle

maykim kkol (verb-)modifier form, adnominal form, participle

maykim māl = kwanhyeng-e an adnominal phrase, a modifier (phrase)

maykimq pep adnominal modification; adnominalization

maykim pyĕnhyeng adnominal transformation, adnominalization; adnominalized form

maykim ssi = kwanhyeng-sa = etten ssi, en-ssi an adnoun, a prenoun, a determiner

mīcengq pep = chwucengq pep the presumptive (indefinite) mood

michimq pep the projective (mood)

minkan ēwen folk etymology

mith māl = kunce-e root (word)

mokcek-e = pulim māl object (phrase)

mokcek kyek = pulimq cali the accusative case

mokcek kyek cōsa = pulimq cali tho-ssi a (direct-)object marker, an accusative particle

mon tāy-ilum-ssi = sāmul tāymyengsa an inanimate pronoun (He Wung 274)

mōum = holq-soli vowel; ~ cohwa vowel harmony

mul.um māl = uymun-sa an interrogative (word); an indeterminate

mul.umq pep = uymunq pep the interrogative (mood); interrogation

mul.um(q pep) tho-ssi an interrogative particle, a question particle

muncheyq pep (grammatical) mood

munqpep = māl pon grammar

munqpep pĕmcwu grammatical category

munqpep-so grammatical element

museng-um = an wullimq soli unvoiced sound, a surd

myĕng.lyengq pep the imperative (mood)

myengsa = ilum ssi, im-ssi noun

myengsa hyeng a nominalization (made by the substantive / summative), the nominalized form

myengsaq pep = **ilumq pep** nominalization; the substantive and summative forms

mĭci-ching indeterminate (reference), unknown (interrogative)

mĭlay future

nam wumcik-ssi = **thatong(sa)** a transitive verb

[1]na[1]yelq pep the continuative / coordinative / conjunctional mood; the gerund (as a continuative)

nukkim ssi, nuk-ssi = **kămthan-sa** an interjection

năth mal = **tan.e** word

năth mal [1]yenkyel tho-ssi a word-conjoining particle, a (noun-)conjoiner

noph.imq pep = **kŏngtayq / contayq pep** status marking, respect language, honorifics and humilifics

nul.e nan (= **hwaktay toyn**) **hyengthay** = **hwaktay hyeng** an expanded / extended form

nungtong(sa) active (verb), active voice

păn holq-soli = **păn moum** a semivowel

pangq-cem side dots = tone (accent) marks beside a Hankul syllable of Middle Korean

pangphyenq cali = **pangphyenq kyek** the instrumental case

pangphyenq cali tho-ssi = **pangphyenq kyek cŏsa** an instrumental marker / particle

pangphyen-e = **pangphyen măl** an instrumental (phrase)

pangphyenq kyek cŏsa = **pangphyenq cali thossi** an instrumental marker / particle

pangphyen măl = **pangphyen-e** an instrumental (phrase)

pangwiq kyek locative or adessive case

păn mal intimate (-e) and polite (-e yo) styles

panpok hyeng repetitive form

pat.chim Hankul syllable-final consonant(s)

pĕmcwu category; SEE **kolkok ~ , munqpep ~**

pep mood (of a verb); mode, category; marking / formation; device(s)

phachal-um = **puth-kal.i soli** an affricate

phasayng derivation(al), deriving, derivative

phasayng-cek hapseng-e a derivative compound

phasayng cepsa a derivational affix

phasayng ecci-ssi a derived adverb

phasayng ilum-ssi a derived noun

phasayng ĭmca-ssi a derived indeclinable

phasayng ium-ssi a derived conjunction

phasayng (uy) kaci a derivational affix

phasayngq pep derivation

phasayng phul.i-ssi a derived inflected word (predicative)

phasayng tho-ssi a derived particle (= a particle derived from a verb form etc.)

phasayng yŏngen a derived inflected word (predicative)

phĭtong = **ip.um(q pep)** the passive (voice)

phĭtong-e / -sa = **ip.um măl** a passive (verb)

phul.e ssuki linearized Hankul

phul.i cokak the predicate (constituent)

phul.i măl = **sĕswul-e/-pu** a predicate

phul.i ssi = **yŏngen** the inflected words [verbs, adjectives, copula], predicatives

phŭmsa = **ssi** a part of speech

phŭmsa censeng change of the part of speech, conversion of the grammatical function

phyeng-seng the "even" tone (low), normally unmarked

phyengum plain sounds, the lax obstruents (of Korean: **p t c s k**)

phyengum-hwa the conversion of an aspirated or reinforced obstruent to its plain counterpart (the corresponding lax obstruent)

phyomyen kwuco surface structure

pĭkyoq kyek the comparative case ("than, as much as")

pĭkyoq pep = **kyencwumq pep** comparison; the comparison mood

pĭlyeyq pep the proportional (mood) ["the more ... the more ..."]

pi seng-cel.um nonsyllabicity, nonsyllabic

pi-thŏnge-cek hapseng-e an asyntactic compound

pŏchwung-e a complement

pŏchwungq pep (?) suppletion; (?) complementation

pŏco cŏsa = **towum tho-ssi** auxiliary/ancillary particle(s); delimiters (and focus particles)

pŏco ĕkan bound auxiliary, stem formative

pŏco yŏngen = **towum phul.i-ssi** auxiliary verb or adjective

pok.hap-e a compound (word)

pok.hap myengsa a compound noun

pok.hap tŏngsa a compound verb

pon- basic; (= **uttum**) main

pon-mun = **uttum wel** the main clause / sentence

ponti ecci-ssi a basic adverb (i.e. not a derived adverb)

pon-tong(sa) = **uttum wumcik-ssi** the main verb; CF **uttum phul.i-ssi**

pŏthong myengsa = **twulwu ilum-ssi** a common noun

ppuli = **ĕkun** a root

puceng-ching indefinite reference

pulimq cali = mokcek kyek the accusative case

pulimq cali tho-ssi = mokcek kyek cŏsa = a (direct-)object marker, an accusative particle

pulim māl = mokcek-e object (phrase)

pulimq pep the accusative (formation), object marking

pulkwu(-cek) hyengthay(-so) a defective form (morpheme)

pulkwu(q) kaci an adversative or concessive affix

pulkwuq pep = yāngpoq pep the adversative or concessive (mood)

pulkwu phul.i-ssi a postnominal verb or adjective

pulumq cali = hoq-kyek the vocative case; ~ tho-ssi a vocative marker / particle

pul-wancen myengsa = kwusok myengsa = mayin ilum-ssi a bound noun

pul-wancen tŏngsa a defective verb

pūsa = ecci ssi, ec-ssi an adverb

pūsa-e = ecci māl an adverbial (phrase)

pūsa hyeng an adverbialization (made by the infinitive, adverbative, gerund, ...)

puth-kal.i soli = phachal-um an affricate

pyēnchik tŏngsa an irregular verb

pyēnchik yŏngen irregularly inflected words

pyēnhwa change, shift

pyēnhyeng transformation, conversion

pyēn.i hyengthay a morpheme alternant, an allomorph

pyēn.i umso a morphophonemic alternant (?), a morphophoneme

pyēnsengq kyek the mutative (= factive) case

sālam tāy-ilum-ssi a personal pronoun

samcwung mōum = sēy kyep holq-soli a triph-thong [such as yey]

sāmul tāymyengsa = mon tāy-ilum-ssi an inanimate pronoun

sangcing-cek ppuli a symbolic (mimetic) root

sangcing-e a symbolic word; a mimetic

sāng-seng the "rising" tone (low-high and long), in MK texts marked with two dots ":" and transcribed as ¨ in MK examples cited here

sangtayq kyek the confrontational dative case; the reciprocal case

sangtay noph.im(q pep) = tul.u.l i noph.im = kyem.yangq pep deferential (formal style)

sap.ip-e/-sa = sap.yo-e = cep.yo-sa = sŏk kaci an infix

sā-seng the four tones (of Middle Chinese): phyeng-seng, sāng-seng, kē-seng, ip-seng

sātong(sa) causative (verb), causative voice

sā.yek = haim causative

sā.yek-e = haim māl a causative (verb)

sayng.lyak pyēnhyeng a deletion transformation; ellipsis

sā.yongq kyek the instrumental case

selmyengq pep the explanatory (mood) = the accessive (- toy)

seng-cel.um syllabicity, syllabic

sengco tone, a toneme; accent

sengpun = cokak part (of a sentence)

sēnthayk-pep = kalimq pep the selective mood (-una, -kena)

sēswul-e/-pu = phul.im māl the predicate

sēswulq pep predication

sēy ccay cali a tertiary case

sēy ccay cali tho-ssi a tertiary case marker

sēy kyep holq-soli = samcwung mōum a triph-thong [such as yey]

sēym ssi = swūsa a numeral

sicey tense (system)

sikhimq pep the imperative (mood)

silqcil myengsa a real (? substantive) noun

silqsa a content-word (vs hesa a grammatical word, a marker, a particle)

simchung kwuco = sŏk kwuco deep structure

sŏk kaci = sap.ip-e/-sa = sap.yo-e = cep.yo-sa an infix

sok-kyek genitive (possessive) case

sŏk kwuco = simchung kwuco (inner structure =) deep structure

sŏk ttus (inner =) deep meaning / structure

soli hyungnay sound mimicry, phonomimesis, onomatopoeia

sŏ.yuq kyek cōsa a genitive (possessive) particle

ssi = phūmsa a part of speech

ssi kkuth = ēmi suffix; an (inflectional) ending, a verb ending

ssi kkuth pakkwum inflection, conjugation

swūn.[1]yel normal order

swūnse-swu ordinal numbers

swusik-e adnominal (word), (noun) modifier

swū tan.wi mayin ilum-ssi (number unit bound noun =) a counter, a numerary adjunct or auxiliary; a classifier

swū tāymyengsa numerary pronouns = numerals

swūlyang tāymyengsa numerary-quantitative pronouns

swūsa = sēym ssi a numeral

swusik = kkwumim modification

swusik-cek hapseng-e = congsok-cek hapseng-e a subordinate compound; ~ ilum-ssi a sub-

ordinate compound noun, a bahuvrihi

swusik-e = **kkwumim māl** a modifier (phrase)

swusik-sa = **kkwumim ssi** = **kwansa** a modifier, a modifying word [adnouns, adverbs, the modifier (= adnominal) and adverbative forms of inflected words]

swutong = **ip.um** passive; ~ **thay, swutongq pep** passive voice

tah-soli = **caum** a consonant; ~ **ie pakkwim** sandhi (alternations) = adjustments to consonants at morpheme boundaries; ~ **ssi kkuth** an ending beginning with a consonant; ~ **tho-ssi** a particle (shape) beginning with a consonant; ~ **ttey** a consonant cluster

tan.e = **nāth mal** word

tānphyen-cek in mati = **chwukso toyn mati** a contracted phrase

tanswun-e a simple word

tāy-ilum-ssi = **tāymyengsa** a pronoun

tāy-kwake past-past

tāymyengsa = **tāy-ilum-ssi** a pronoun

tāypi-e = **kyencwum māl** the complement of a comparison

tāypiq kyek cōsa = **kyencwum cali tho-ssi** a comparison-complementizer, a particle marking the complement (= standard) of a comparison

tāysangq pep object (formation / marking)

tāytung-cek hapseng-e a coordinative (dvandva) compound

tāytung-cek hapseng ilum-ssi a coordinative noun compound

thalq-kyek the ablative case

thallak elision; deletion

thatong(sa) = **nam wumcik-ssi** a transitive verb

thatongq seng transitivity

thōnge syntax, syntactic

thōnge-cek hapseng-e syntactic compound

thōnge-cek kwuseng syntactic structure

thōnge-lon syntax

thōngelon-cek kinung syntactic function

tho ssi = **cōsa** a particle

thukswu cōsa special particles = particles of emphasis and focus

tok.lip-e/-sa = **hol-lo māl / ssi** absolutes (such as interjections, vocatives)

tonghwa (cak.yong) assimilation

tong.lyuq kyek the similative case ("like, as")

tōngmyengsa a verbal noun (= a nominal verb)

tōngsa = **wumcik-ssi, wum-ssi** a verb

tongsiq pep the simultaneous mood

tongum sayng.lyak haplology; simplification of geminates

towum phul.i-ssi = **pōco yōngen** an auxiliary verb or adjective

towum tho-ssi = **pōco cōsa** auxiliary / ancillary particle(s); delimiters (and focus particles)

to.[1]yel inverted order, inversion

tōyn soli = **kyengum** "hard" (= reinforced, tensed, fortis, crisply unaspirated) sounds

toy-phul.iq pep the repetitive / iterative (mood)

ttan i the Hankul letter ㅣ (y or i) standing alone with no initial

ttay maykim(q pep) ? tense / time modification; modifier tense(/ aspect)

ttuye ssuki writing with spaces (to separate the words)

twīq kaci = **cep.mi-sa** = **cep.mi-e** a suffix

tul.u.l i noph.im = **sangtay noph.im(q pep)** = **kyem.yangq pep** deferential (formal style)

twū-kinungq pep a double-function mood

twū kyep holq-soli = **Icwung mōum** a diphthong

twūl ccay cali a secondary case

twūl ccay cali tho-ssi a secondary case marker / particle

twulwu ilum-ssi = **pōthong myengsa** a common noun

umcel a syllable

umseng a Yin (= dark, heavy) vowel (= *u*, *e*, *wu*); CF **yangseng**

umseng-cek pyĕn.i hyeng(thay) a heavy isotope (of a word)

umso a phoneme

umwun phonemes and prosodemes, the phonology (of a language); rime

uttum (···) = **pon-** main, chief

uttum cokak = **cwu-sengpun** a main constituent

uttum kkol = **kipon hyeng** basic form

uttum phul.i-ssi the main predicative; = **uttum wumcik-ssi** = **pon-tong(sa)** the main verb

uttum sēym-ssi = **[1]yāng-swūsa** the cardinal numerals

uttum wel = **pon-mun** the main clause / sentence

uttum wumcik-ssi = **pon-tong(sa)** the main verb; CF **uttum phul.i-ssi**

uycon hyengyong-sa a dependent adjective = an auxiliary adjective

ūyhyangq pep = **congciq-pep** = **machimq pep** (sentence-)final form; conclusive, predicative

uymunq pep = **mul.umq pep** the interrogative (mood); interrogation

uymun-sa = **mul.um māl** an interrogative (word); an indeterminate

uyseng-e a phonomime, an onomatope

uythay-e a phenomime, a descriptive mimetic

ūytoq pep intention moods: the intentive, purposive, and desiderative

wancen tōngsa a full-paradigm verb, a non-defective verb

wel = **kul.wel** sentence

wel sengpun sentence constituents

wenhyeng basic (original) form

wen.inq kyek causal (causal ablative) case

wēnching distant reference = distal; third person

wichi cali = **wichiq kyek** the locative case; ~ **tho-ssi** a locative marker / particle

wichi-cek cōsa a locational (locative) particle

wichi-e = **wichi māl** a locative (phrase)

wichiq kyek = **wichi cali** the locative case; ~ **cōsa** locative marker / particle

wichi māl = **wichi-e** a locative (phrase)

wichi māl mayin ilum-ssi a locative bound noun

wichiq pep locative(/ allative) marking

wichiq pep tho-ssi a locative(/ allative) particle

wullim voicing, being voiced (sonant)

wullimq soli = **yūseng-um** a voiced sound, a sonant

wumcik-ssi, wum-ssi = **tōngsa** a verb

wūnso a prosodeme

wūnso pyēntong prosodic morphophonemics; morphotonemics; accent alternations

[1]**yak.e** = **cwūn mal** an abbreviation, a contraction, a shortening,

yaksok pep the promissory or cajolative mood (= **-ulye 'm**)

yăngpoq pep = **pulkwuq pep** the adversative or concessive (mood)

yangseng a Yang (= light) vowel (= *o, a, wo*); CF **umseng**

yangseng-cek pyēn.i hyeng(thay) a light isotope (of a word)

[1]**yăng-swūsa** = **uttum sēym-ssi** the cardinal numerals

[1]**yăng tăymyengsa** counters, numerary adjuncts, (noun) classifiers and quantifiers

yĕq-kyek cōsa a dative particle

yelin soli = **yēn.um** lax (lenis) consonants, plain consonants (**p t k s c**)

[1]**yelkeq kyek** the enumerative (= concatenative, "and") case

[1]**yencep** junction, juncture

[1]**yenkyelq pep** conjoining; the conjunctive mood; the infinitive (as continuative)

[1]**yenkyel(q pep) tho-ssi** a conjunctive / conjoining particle

[1]**yenkyel ēmi** a continuative (nonfinite) suffix

yen.um a prolonged sound; a long vowel or syllable

yēn.um = **yelin soli** lax (lenis) consonants, plain consonants (**p t k s c**)

yetelp pat.chim the eight syllable finals in 1446 Hwunmin cengum: *k ng t n p m s l*

[1]**yēysa māl** ordinary words / speech

yōngen = **phul.i ssi** inflected words [verbs, adjectives, copula]

yōngpanq kyek the comitative case

[1]**yūchwu** analogy

yūki-um = **kyek.um** = **keseyn soli** an aspirated sound, an (a heavy) aspirate

yulayq kyek the elative or ablative case

[1]**yusa cepsa** = **pisus han kaci** a quasi-affix

yūseng-um = **wullimq soli** a voiced sound, a sonant

yūyen-hwa motivated: **cal ~ toyci anh.nunta** is not well motivated

yūyenq-seng motivation; motivated

Appendix 7. English index to the list of Korean grammatical terms.

abbreviation **cwul.im;** [1]**yak.e = cwūn mal**

ablative case **thalq-kyek;** (elative or ~) **yulayq kyek**

absolutes **tok.lip-e/-sa = hol-lo māl/ssi**

abstract noun **kkol ēps.nun ilum-ssi = chwusang myengsa**

accent alternations **wūnso pyēntong**

accent (= stress) **kangsey;** (= tone) **sengco**

accessive (= - `toy`) **selmyengq pep**

accusative (formation) **pulimq pep**

accusative case **pulimq cali = mokcek kyek**

accusative particle **mokcek kyek cōsa = pulimq cali tho-ssi**

active (verb) **cwutong(sa), nungtong(sa)**

adessive case **chesoq kyek**

adjective **kūlim ssi;** (inflected) **hyengyong-sa = etteh-ssi, et-ssi**

adjustments to consonants at boundaries **tah-soli ie pakkwim**

adnominal (word) **swusik-e**

adnominal case **kwanhyengq kyek = maykimq cali**

adnominal form **kwanhyeng-sa hyeng = maykim kkol;** ~ of a numeral **hānceng-swu**

adnominal marker/particle **kwanhyengq kyek cōsa = maykimq cali tho-ssi**

adnominal modification **maykimq pep**

adnominal mood **kwanhyengq pep**

adnominal phrase **kwanhyeng-e = maykim māl; kwanhyeng pu**

adnominal transformation **maykim pyēnhyeng**

adnominalization **kwanhyengq pep = maykimq pep; maykim pyēnhyeng; hānceng pyēnhyeng**

adnominalized form **maykim pyēnhyeng**

adnoun **kwanhyeng-sa = maykim ssi = etten ssi, en-ssi; hānceng-e/-sa**

adverb **pūsa = ecci ssi, ec-ssi;** derived ~ **ecci kkol**

adverbial (phrase) **pūsa-e = ecci māl**

adverbial bound noun **ecci māl mayin ilum-ssi**

adverbial form **ecci kkol**

adverbialization (form) **pūsa hyeng**

adversative or concessive (mood) **yāngpoq pep = pulkwuq pep**

adversative or concessive affix **pulkwu(q) kaci**

affinity **in.yen**

affix **cepsa = cep.e = kaci; hesa**

affricate (sound) **phachal-um = puth-kal.i soli**

allative or prolative case **hyāngcinq kyek**

allomorph: an ~ **hyengthay umwun-so; pyēn.i hyengthay**

alternations: morphophonemic (form) ~ **kkol pakkwum**

analogy [1]**yūchwu**

anastrophe **cali pakkwum = cen.wi**

ancillary particle = auxiliary particle

apical (tongue-tip) sound **hye-kkuth soli**

aspirate: an (a heavy) ~ **keseyn soli = kyek.um = yūki-um**

aspirated sound **keseyn soli = kyek.um = yūki-um**

aspirating, adding aspiration **kyek.um-hwa**

assimilation **tonghwa (cak.yong)**

asyntactic compound **pi-thōnge-cek hapseng-e**

authoritative (semiformal) style **hao chey**

auxiliary (verb or adjective) **pōco yōngen = towum phul.i-ssi**

auxiliary particle **pōco cōsa = towum tho-ssi**

bahuvrihi **swusik-cek hapseng-e ilum-ssi**

basic **pon-, kipon ··· = uttum ···**

basic adverb (= underived adverb) **ponti ecci-ssi**

basic form **kipon hyengthay,** (= original form) **wenhyeng;** (of a verb) **kipon hyeng = uttum kkol**

basic sentence **kipon wel**

borrowed word, borrowing **chā.yong-e**

bound auxiliary (stem formative) **pōco ēkan**

bound form **kwusok hyengsik**

bound noun **kwusok myengsa = pul-wancen myengsa = mayin ilum-ssi**

bound verb(/adjective/copula) **mayin phul.i ssi**

cajolative or promissory mood **yaksok pep**

cardinal numbers **kipon-swu**

cardinal numerals [1]**yāng-swūsa = uttum sēym-ssi**

case (formation/marking) **caliq pep**

case (grammatical) **cali = kyek**

case marker/particle **kyek cōsa = cali tho-ssi**

category **pep; pēmcwu**

causal (causal ablative) case **wen.inq kyek**

causative (verb) **sātong(sa); sā.yek-e = haim māl**

causative (voice) **haim = sā.yek, sātong**

causative voice **haimq pep**

causative: the ~ (form) of a verb **haim kkol**

causativization **haimq pep**

change **pyēnhwa**

change of part-of-speech (**phūmsa**) **censeng**

chief **uttum** (···) **= pon-**

classifier swū tan.wi mayin ilum-ssi

classifiers, counters, numerary adjuncts, and quantifiers [1]yāng tāymyengsa

clause iun māl = kwu = ēcel = mati

combining two or more letters to write (initial) consonant clusters hap.yong pyēngse

comitative case yōngpanq kyek

common noun pōthong myengsa = twulwu ilum-ssi

comparative case pīkyoq kyek

comparison: ~ mood kyencwumq pep = pīkyoq pep; complement of a ~ tāypi-e = kyencwum māl

comparison-complementizer kyencwumq cali tho-ssi = tāypiq kyek cōsa

complement pōchwung-e; ~ of a comparison kyencwum māl = tāypi-e

complementation (?) pōchwungq pep

compound (word) hapseng-e, pok.hap-e

compound adverb hapseng ecci-ssi

compound indeclinable hapseng(q) īmca-ssi

compound noun pok.hap myengsa

compound predicative (= verb) hapseng phul.i-ssi = hapseng yōngen

compound verb pok.hap tōngsa

compounding hapsengq pep

compression cwul.im

concatenative: the ~ (= enumerative, "and") case [1]yelkeq kyek

concessive or adversative (mood) pulkwuq pep = yāngpoq pep

concessive or adversative affix pulkwu(q) kaci

conclusive (mood) machimq pep = congciq-pep = ūyhyangq pep

conclusive congciq-pep = machimq pep = ūyhyangq pep

conditional (mood) ceyyak-pep = kwusok-pep

confrontational dative case sangtayq kyek

conjoiner: (noun) ~ nāth mal [1]yenkyel tho-ssi

conjoining [1]yenkyelq pep

conjoining, conjunction cepsok-pep

conjugation (of a verb) hwal.yong = kkuth pakkwum

conjugation, inflection ssi kkuth pakkwum

conjugational ending hwal.yong (uy) ssi-kkuth

conjugational form hwal.yong hyeng = kkuth pakkwum kkol

conjugational paradigm (chart) kkuth pakkwum phyo

conjunction cepsok-sa = ium ssi = is-ssi

conjunction iumq pep = cepsok-pep; derived ~ phasayng ium-ssi

conjunctional mood [1]na[1]yelq pep

conjunctive (conjunctional) adverb cepsok pūsa = ium ecci-ssi

conjunctive mood [1]yenkyelq pep

conjunctive mood(s) iumq pep = cepsok-pep

conjunctive / conjoining particle [1]yenkyel(q pep) tho-ssi

connective cepsok-sa = ium ssi = is-ssi

consonant caum = tah-soli

consonant assimilations (between syllables) caum cep.pyen

consonant cluster tah-soli ttey; syllable-final ~ kyep congseng

consonant(s): syllable-final in Hankul pat.chim

content-word silqsa

continuative (nonfinite) suffix [1]yenkyel ēmi

continuative mood [1]na[1]yelq pep

contracted alternant chwuk.yak pyēnhyeng

contracted form chwuk.yak hyeng = cwul.im kkol

contracted phrase: a ~ chwukso toyn mati = tānphyen-cek in mati

contracting transformation (form) chwuk.yak pyēnhyeng

contraction (contracting, contracted) chwuk.yak = cwul.im

contraction: a ~ [1]yak.e = cwūn mal

conversion pyēnhyeng

conversion of grammatical function (phūmsa) censeng

converted: SEE word converted ...

converting an aspirated or reinforced obstruent to its plain counterpart (the corresponding lax obstruent) phyengum-hwa

coordinative (dvandva) compound tāytung-cek hapseng-e

coordinative mood [1]na[1]yelq pep

coordinative noun compound: a ~ tāytung-cek hapseng ilum-ssi

copula (noun predicator) cap.um ssi = ciceng-sa = kyēysa

counter swū tan.wi mayin ilum-ssi

counters, numerary adjuncts, (noun) classifiers and quantifiers [1]yāng tāymyengsa

dative particle yēq-kyek cōsa

declension kok.yong; ~ of a noun (= quasi-inflection) cwūn-kwulkok pep

deep meaning / structure sōk ttus

deep structure sŏk kwuco = simchung kwuco

defective: a ~ form (morpheme) pulkwu(-cek) hyengthay(-so)

defective verb pul-wancen tōngsa

deferential (= formal style) kyem.yangq pep = sangtay noph.im(q pep) = tul.u.l i noph.im

definitive (definite) mood hwakcengq pep = kicengq pep

deletion thallak

deletion transformation sayng.lyak pyēnhyeng

delimiters (and focus particles) pōco cōsa = towum tho-ssi

dependent adjective (= an auxiliary adjective) uycon hyengyong-sa

derivation phasayngq pep

derivation(al), deriving, derivative phasayng

derivational affix phasayng cepsa = phasayng (uy) kaci

derivative compound phasayng-cek hapseng-e

derived adverb phasayng ecci-ssi; ecci kkol

derived conjunction phasayng ium-ssi

derived indeclinable phasayng īmca-ssi

derived inflected word (predicative) phasayng phul.i-ssi = phasayng yōngen

derived noun phasayng ilum-ssi

derived particle phasayng tho-ssi

descriptive mimetic uythay-e

determiner maykim ssi = kwanhyeng-sa = etten ssi, en-ssi; hānceng-e/-sa; SEE adnoun

device(s) pep

dictionary form (of a verb): the ~ kipon hyeng = uttum kkol

diphthong twū kyep holq-soli = īcwung mŏum

diphthong īcwung mŏum = twū kyep holq-soli

direct-object marker/particle mokcek kyek cōsa = pulimq cali tho-ssi

direct quotation cikcep īn.yong

direct subject cikcep īmca māl

dissimilation ihwa (cak.yong)

distal (reference) wēnching

distant reference wēnching

double compound kyep hapseng-e

double passive (phrase/verb) kyep ip.um māl

double-function mood twū-kinungq pep

double-transitive verb kyep nam wumcik-ssi

dvandva tāytung-cek hapseng ilum-ssi

dvandva compound tāytung-cek hapseng-e

effective aspect kangco yēngthanq pep

elative or ablative case yulayq kyek

elision thallak

ellipsis sayng.lyak pyēnhyeng

ellipted particle kkol ĕps.nun kaci

emphasis kangsey

"emphatic exclamatory" kangco yēngthanq pep

emphatic form kangsey-hyeng

emphatic mood (= -ʾtwo; -ᵁ⁄ₒʾna) him-cwumq pep

emphatic word kangsey-e

emphatic/intensive word him-cwum māl

ending: inflectional ~, verb ~ ssi kkuth = ĕmi

ending beginning with a consonant tah-soli ssi kkuth

ending beginning with a vowel holq-soli ssi-kkuth

enlarged form hwaktay hyeng = hwaktay toyn hyengthay = nul.e nan hyengthay

"entering" tone ip-seng

enumerative (= concatenative or "and") case ¹yelkeq kyek

epenthesis: vowel ~ holq-soli kolwum

epenthetic sound/phoneme kolwumq soli = coum-so

epenthetic vowel kolwum holq-soli = coseng mŏum

euphony coum

evaluative mood kachiq pep

"even" tone phyeng-seng

exaltation conkyengq pep; (subject honorification) cwuchey noph.im(q pep)

exclamatory mood kāmthanq pep

exclamatory particle kāmthan cōsa

existence: quasi-verb of ~ concay-sa

expanded form nul.e nan hyengthay = hwaktay toyn hyengthay = hwaktay hyeng

explanatory (mood) selmyengq pep

extended form nul.e nan hyengthay = hwaktay toyn hyengthay = hwaktay hyeng

factive (= mutative) case pyĕnsengq kyek

familiar style hakey chey

fictive/hypothetical (morpheme, affix) kāsang-cek (hyengthay-so, kaci)

final ending (of verb) mayc.um ssi-kkuth

final form: (sentence-)~ machimq pep = congciq-pep = ūyhyangq pep

final sound (of a syllable) kkuth soli = congseng

final/finite suffix congkyel ĕmi

first person ("I/me, we/us") cĕy-il inching; (= proximal) kūnching

folk etymology minkan ĕwen

form kkol; (of a word) ĕhyeng; (morphological

~) hyengthay
form alternations kkol pakkwum
"formal" noun hyengsik myengsa
formal style hapsyo chey
formation pep
fortis sounds tōyn soli = kyengum
fortition kyengum-hwa
free adjective calip hyengyong-sa
free form calip hyengsik
free indeclinable calip īmca-ssi
free noun calip ilum-ssi = calip myengsa
fricative (sound) kal.i soli = machal-um
full-paradigm verb wancen tōngsa = kac.un
   phul.i ssi
function kwusil = kinung
function-converting suffixes censeng ēmi
future mīlay
geminates: the simplification of ~ tongum
   sayng.lyak
genitive (adnominal) case maykimq cali =
   kwanhyengq kyek; (possessive) sok-kyek
genitive marker / particle kwanhyengq kyek cōsa
   = maykimq cali tho-ssi
genitive (possessive) particle sō.yuq kyek cōsa
gerund (as continuative) ¹na¹yelq pep
glide kwāto-um; ~ and vowel cwungseng
"going" tone kě-seng
grammar māl pon = munqpep
grammatical category munqpep pěmcwu
grammatical element munqpep-so
grammatical mood muncheyq pep
grammatical person inching(q pep)
grammatical word hesa
Hankul letter ㅣ (y or i) standing alone with no
   initial ttan i
Hankul syllable-final consonant(s) pat.chim
haplology tongum sayng.lyak
"hard" sounds tōyn soli = kyengum
harmony coum
heavy isotope (of a word) umseng-cek pyēn.i
   hyeng(thay)
hiatus holq-soli chwungtong = hiathwusu
honorific words / speech kōngtay māl
honorification conkyengq pep, contayq pep
honorifics and humilifics noph.imq pep =
   kōngtayq pep
honorifics kōngtay māl, contayq māl
honorifics: the use of ~ conkyengq pep
hortative (mood) kkoyimq pep; kōngtongq pep
humble speech kyemsa māl

humilification (= subject deference) cwuchey
   kyem.yāng
humilifics kyemsa māl; kyemsonq pep
hybrid word hōnhap-e
hypothetical / fictive (morpheme, affix) kāsang-
   cek (hyengthay-so, kaci)
immediate constituent cikcep sengpun
imperative (mood) myēng.lyengq pep = sikhimq
   pep
impersonal (authoritative) style hao chey
inanimate pronoun sāmul tāymyengsa = mon
   tāy-ilum-ssi (He Wung 274)
indeclinable: derived ~ phasayng īmca-ssi
indeclinables (other than particles) īmca ssi =
   cheyen
indefinite (presumptive) mood mīcengq pep =
   chwucengq pep
indefinite reference puceng-ching
indeterminate uymun-sa = mul.um māl
indeterminate, interrogative (word) mul.um māl
   = uymun-sa
indeterminate (reference) mīci-ching
indirect honorification (exaltation) kāncep
   noph.im
indirect quotation kāncep in.yong
indirect subject = topic kāncep īmca māl
infinitive (as continuative) ¹yenkyelq pep
infix sōk kaci = sap.ip-e/-sa = sap.yo-e =
   cep.yo-sa
inflected words [= verbs, adjectives, copula]
   yōngen = phul.i ssi
inflection kwulkok pep; ssi kkuth pakkwum
inflectional affix kwulkok (uy) kaci
inflectional category kwulkok uy pěmcwu
inflectional ending ssi kkuth = ēmi
initial sound (of syllable) ches soli = choseng
instrumental: the ~ case pangphyenq cali =
   pangphyenq / sā.yongq kyek = cōq-kyek; ~
   phrase pangphyen māl = pangphyen-e
instrumental marker / particle pangphyenq cali
   tho-ssi = pangphyenq kyek cōsa
intensive / emphatic word him-cwum māl
intention moods (the intentive, purposive, and
   desiderative) ūytoq pep
interjection kāmthan-sa = nukkim ssi, nuk-ssi
interjectional particle kāmthan cōsa
interrogative (mood); interrogation mul.umq
   pep = uymunq pep
interrogative (word) mul.um māl = uymun-sa
interrogative particle mul.um(q pep) tho-ssi

intimate style and polite style **păn mal**

intransitive verb **catong(sa)** = **cey wumcik-ssi**

intransitivization, an intransitivized form **cey wumcik.im pyĕnhyeng**

inversion, inverted order **cali pakkwum** = **cen.wi**; **to.[1]yel**

irregular verb **pyĕnchik tŏngsa**

irregularly inflected words **pyĕnchik yŏngen**

iterative (= repetitive) mood **toy-phul.iq pep**

iterative word **chep.e**

junction, juncture **[1]yencep**

labial sound **ip-swulq soli**

laryngeal (glottal) sounds **hwuum**

lateral sound **hye-yeph soli**

lax (lenis) consonants **yelin soli** = **yĕn.um**

lax obstruents **phyengum**

lenis (lax) consonants **yelin soli** = **yĕn.um**

lenited sound **kapyewun soli**

light isotope (of a word) **yangseng-cek pyĕn.i hyeng(thay)**

"light" (= lenited, weakened) sound **kapyewun soli**

linearized Hankul **phul.e ssuki**

literary style: obsolete ~ **hasose chey**

loanword **chā.yong-e**

locational (locative) particle **wichi-cek cōsa**

locative (phrase) **wichi māl** = **wichi-e**

locative bound noun **wichi māl mayin ilum-ssi**

locative case **wichi cali** = **wichiq kyek**; **chesoq kyek, cheq-kyek, pangqiq kyek**

locative marker / particle **wichi cali tho-ssi** = **wichiq kyek cōsa**

locative pronoun **kos tāy-ilum-ssi**

locative(/allative) marking **wichiq pep**

locative(/allative) particle (marker) **wichiq pep tho-ssi**

long syllable / vowel **yen.um**

main clause **pon-mun** = **uttum wel**

main constituent **cwu-sengpun** = **uttum cokak**

main sentence **pon-mun** = **uttum wel**

main **pon-** = **uttum ⋯**

main predicative / verb **uttum phul.i-ssi** = **uttum wumcik-ssi** = **pon-tong(sa)**

marker **hesa**; SEE particle

marking (⋯) **pep**

medial sound **cwungseng**

mesial = near-distant reference **cwungching**

mimetic (symbolic) root **sangcing-cek ppuli**

mimetic (word) **sangcing-e**

mimicry: sound ~ **soli hyungnay**

minimal free form **chŏyso calip hyengsik**

mode **pep**

modification **kkwumim** = **swusik**

modifier (noun ~) **swusik-e**

modifier (phrase) **kkwumim māl** = **swusik-e**; **maykim māl** = **kwanhyeng-e**

modifier **kwansa** = **swusik-sa** = **kkwumim ssi**; **kwanhyeng-sa hyeng**

modifier form (of verb) **maykim kkol**

modifier tense(/aspect) **ttay maykim(q pep)**

modifier = a modifying word **swusik-sa** = **kkwumim ssi** = **kwansa**

mood: grammatical ~ **muncheyq pep**; ~ (of a verb) **pep**

morpheme **hyengthay-so**; ~ (shape) **hyengthay umwun-so**

morpheme alternant **pyĕn.i hyengthay**

morphological form **hyengthay**

morphological structure **hyengthay-cek kwuseng**

morphology **hyengthay-lon**

morphophoneme **hyengthay umso**; (?)**hyengthay umwun-so**

morphophonemic alternant **hyengthay-cek pyĕn.i hyengthay**; (?) **pyĕn.i umso**

morphophonemic alternation **hyengthay-umso-cek pyĕntong** / **pyĕn.i**; **kkol pakkwum**

morphotonemics **wŭnso pyĕntong**

motivated: is not well ~ **cal yūyen-hwa toyci anh.nunta**

motivation **in.yen**

motivation; motivated **yūyenq-seng**

mutative (= factive) case **pyĕnsengq kyek**

inanimate pronoun **mon tāy-ilum-ssi** = **sāmul tāymyengsa**

near reference = proximal **kŭnching**

near-distant reference = mesial **cwungching**

nominalization (= noun form) **ilum kkol**

nominalization (made by the substantive or the summative) **myengsa hyeng**

nominalization; the substantive and summative forms **myengsaq pep** = **ilumq pep**

nominalized form **myengsa hyeng**

nominative (form) **īmca kkol** = **cwuq-kyek hyeng**

nominative **cwuq-kyek hyeng** = **īmca kkol**

nominative-case particle **īmca cali tho-ssi** = **cwuq-kyek cōsa**

nonfinal suffix / ending **an mayc.um ssi-kkuth**

nonsyllabicity, nonsyllabic **pi seng-cel.um**

nondefective verb **kac.un phul.i ssi** = **wancen tŏngsa**

nonhonorific = an nophim
normal order swūn.[1]yel
noun myengsa = ilum ssi, im-ssi
noun: derived ~ phasayng ilum-ssi
noun conjoiner nāth mal [1]yenkyel tho-ssi
noun form ilum kkol
noun modifier swusik-e
noun-modifying form hānceng pyēnhyeng
noun predicator: SEE copula
nouns (indeclinables) cheyen = īmca ssi
nouns, pronouns, and numbers īmca ssi = cheyen
nucleus: syllable ~ cwungseng
number unit bound noun (= counter) swū tan.wi mayin ilum-ssi
numbers, nouns, and pronouns īmca ssi = cheyen
numeral swūsa = sēym ssi
numerary adjunct / auxiliary swū tan.wi mayin ilum-ssi
numerary adjuncts, counters, (noun) classifiers and quantifiers [1]yāng tāymyengsa
numerary pronouns = numerals swū tāymyengsa
numerary-quantitative pronouns: the ~ swūlyang tāymyengsa
object kaykchey
object (formation / marking) tāysangq pep
object (phrase) pulim māl = mokcek-e
object exaltation kaykchey noph.im
object honorific kaykchey noph.im māl
object honorification kaykchey noph.im
object marker: SEE direct-object marker
object marking pulimq pep
object-exalting (object-honorific) mood kaykchey noph.imq pep
obsequities kyemsa māl; kyemsonq pep
obsolete literary style hasose chey
onomatope (onomatopoetic word) uyseng-e
onomatopoeia soli hyungnay
optional transformation īm.uy pyēntong
optional variant (form) īm.uy pyēntong hyeng, īm.uy-cek pyēn.i hyengthay
optional variation īm.uy pyēntong
order (of words) ēswun
ordinal numbers swūnse-swu
ordinal numeral chalyey sēym-ssi
ordinary words / speech [1]yēysa māl
palatal sound kwukay-um
palatalization kwukayum-hwa
part (of a sentence) cokak = sengpun
part of speech ssi = phūmsa
participle maykim kkol

particle cōsa = tho ssi, hesa; a derived ~ phasayng tho-ssi
particle beginning with consonant tah-soli tho-ssi
particle beginning with a vowel holq-soli tho-ssi
passive verb ip.um māl = phītong-e/-sa
passive ip.um(q pep) = phītong, swutong; the ~ (form) of a verb ip.um kkol
passive affix ip.um uy kaci
passive voice swutong thay, swutongq pep
passivized form cey wumcik.im pyēnhyeng
past kwāke
"past imperfect" (= retrospective) kwāke-mīwan
past-past tāy-kwake
pause hyusik
permissive causative he.yong-cek haim māl
permissive mood hēlak pep
person: grammatical ~ inching(q pep)
personal pronoun in tāymyengsa = sālam tāy-ilum-ssi
phenomime uythay-e
phoneme umso
phonemes and prosodemes umwun
phonology (of a language) umwun(-lon)
phonomime uyseng-e
phonomimesis soli hyungnay
phrase mati = ēcel = iun māl = kwu
phrase-conjoiner, phrase-conjoining particle mati [1]yenkyel tho-ssi
plain consonants yelin soli = yēn.um
plain sounds phyengum
plain style hay-la chey; (= nonhonorific) an nophim
possessive case sok-kyek
possessive particle sŏ.yuq kyek cōsa
postnominal verb or adjective pulkwu phul.i-ssi
predicate phul.i māl = sēswul-e, -pu
predicate sēswul-e/-pu = phul.im māl
predicate: the ~ (constituent) phul.i cokak
predication sēswulq pep
predicative (mood) machimq pep = congciq-pep = ūyhyangq pep
predicatives phul.i ssi = yōngen
prefix aph kaci = ceptwu-sa = ceptwu-e
prenoun SEE adnoun
present (time) hyēncay
presumptive (indefinite) mood chwucengq pep = mīcengq pep
primary case ches ccay cali; ~ marker / particle ches ccay cali tho-ssi
processive mood hyēnsilq pep

projective (mood) **michimq pep**

prolative or allative case **hyāngcinq kyek**

prolonged sound **yen.um**

promissory or cajolative mood **yaksok pep**

pronoun **tāymyengsa** = **tāy-ilum-ssi**

pronouns, nouns, and numbers **īmca ssi** = **cheyen**

proper noun **ko.yu myengsa** = **hol-lo ilum-ssi**

proportional (mood) ["the more ~ the more ... "] **pīlyeyq pep**

propositive mood **kkoyimq pep** = **kōngtongq pep**

prosodeme **wūnso**

prosodic morphophonemics **wūnso pyēntong**

proximal **kūnching**

qualificative case ("as, in the role / capacity of" = ~ **ulo**) **cakyek kyek**

quantifiers, counters, numerary adjuncts, and (noun) classifiers **[1]yāng tāymyengsa**

quasi-affixes **[1]yusa cepsa** = **pisus han kaci**

quasi-free noun **hyengsik myengsa**

quasi-inflection (the declension of a noun) **cwūn-kwulkok pep**

quasi-noun **hyengsik myengsa**

question particle **mul.um(q pep) tho-ssi**

quotation, quotational phrase **īn.yong māl** = **īn.yong-e**

real (? substantive) noun **silqcil myengsa**

reciprocal case **sangtayq kyek**

reduplication **chep.e**

regular verb **kyuchik tōngsa**

regularly inflected words **kyuchik yōngen**

reinforced sounds **tōyn soli** = **kyengum**

reinforcement **kyengum-hwa**

relative: a ~ (pronoun / adverb) **kellim ssi** = **kwankyey-sa**

relative adverb **kwankyey pūsa**

relative pronoun **kwankyey tāymyengsa**

relativizer **kellim ssi** = **kwankyey-sa**

repetitive form **panpok hyeng**

repetitive (= iterative) mood **toy-phul.iq pep**

resemblative (= semblative) mood **hupsaq pep**

respect language **noph.imq pep** = **kōngtayq pep** = **contayq pep**

retrospective mood **hoysangq pep** = **kyenghemq pep**

rime **umwun**

"rising" tone **sāng-seng**

root (word) **mith māl** = **kunce-e**

root **ppuli** = **ēkun**

sandhi (alternations) **tah-soli ie pakkwim**

second person ("you, you people") **cĕy-i inching**; (mesial reference) **cwungching**

secondary case **twūl ccay cali**; ~ marker / particle **twūl ccay cali tho-ssi**

selective mood **kalimq pep** = **sēnthayk-pep**

self-humbling words **kyemsa māl**; **kyemsonq pep**

semblative (= resemblative) mood **hupsaq pep**

semiformal (authoritative) style **hao chey**

semivowel **pān holq-soli** = **pān moum**

sentence **kul.wel** = **wel**

sentence constituents **wel sengpun**

sentence-final form **machimq pep** = **congciq-pep** = **ūyhyangq pep**

shift **pyēnhwa**

shortening **cwul.im**; **[1]yak.e** = **cwūn mal**

sibilant: ~ or affricate **iq soli** = **chium**

side dots (beside a MK syllable) **pangq-cem**

similative case **tong.lyuq kyek**

simple vowel **hoth holq-soli**

simple word **tanswun-e**

simplification of geminates **tongum sayng.lyak**

simultaneous mood **tongsiq pep**

single-function mood **han-kinungq pep**

sonant (being ~) **wullim**

sonant (= voiced sound) **wullimq soli** = **yūseng-um**

sound mimicry **soli hyungnay**

special particles (= particles of emphasis and focus) **thukswu cōsa**

speech styles **con-piq pep**

status marking **noph.imq pep** = **kōngtayq / contayq pep**

status-unmarked forms **an nophim**

stem **cwulki** = **ēkan**; (= content-word) **silqsa**

stem formative (bound auxiliary) **pŏco ēkan**

stress **kangsey**

style **chey**

stylizations **con-piq pep**

subject (constituent / phrase) **īmca cokak**

subject (element / part) **cwupu**

subject (formation / marking) **cwucheyq pep**

subject (of a sentence) **cwuchey**

subject (phrase) **cwue** = **īmca māl**

subject exaltation **cwuchey noph.im(q pep)**

subject deference **cwuchey kyem.yang**

subject form **īmca kkol** = **cwuq-kyek hyeng**

subject formation **īmcaq pep**

subject humilification **cwuchey kyem.yang**

subject marker **īmca cali tho-ssi** = **cwuq-kyek cōsa**; subject marking **īmcaq pep**

subordinate compound swusik-cek hapseng-e = congsok-cek hapseng-e; ~ noun swusik-cek hapseng-e ilum-ssi

substantive and summative forms ilumq pep = myengsaq pep

suffix twīq kaci = cep.mi-sa = cep.mi-e; ssi kkuth = ēmi

summative and substantive forms ilumq pep = myengsaq pep

suppletion (?) pŏchwungq pep

surd an wullimq soli = museng-um

surface structure keth kwuco = phyomyen kwuco

syllabicity, syllabic seng-cel.um

syllable umcel

syllable-final consonant cluster kyep congseng

syllable-final consonant(s) in Hankul pat.chim

syllable-final sound kkuth soli = congseng

syllable-initial sound choseng = ches soli

symbolic (mimetic) root sangcing-cek ppuli

symbolic word sangcing-e

syncope cwungum sayng.lyak

syntactic compound thŏnge-cek hapseng-e

syntactic function thŏngelon-cek kinung

syntactic structure thŏnge-cek kwuseng

syntax thŏnge-lon

syntax, syntactic thŏnge

tense (fortis) vowel kincang holq-soli = kincang moum

tense (system) sicey

tense / time modification ? ttay maykim(q pep)

tensed sounds tōyn soli = kyengum

tenseless form (of a verb) kipon hyeng = uttum kkol

tensification kyengum-hwa

tertiary case sēy ccay cali; ~ marker / particle sēy ccay cali tho-ssi

third person ("he / him, she / her, they / them") cēy-sam inching; (distal reference) wēnching

tone, toneme sengco

tones: the four ~ (of Middle Chinese) sā-seng

tongue-tip (apical) sound hye-kkuth soli

topic = indirect subject kāncep īmca māl

total structure cenchey kwuseng

transferentive: ~ mood cēnhwanq pep; ~ form cēnhwan hyeng = cwungtan hyeng = kuchim kkol

transformation pyēnhyeng

transitional sound kwāto-um

transitive verb nam wumcik-ssi = thatong(sa)

transitivity thatongq seng

transposition cali pakkwum = cen.wi

triphthong: a ~ sēy kyep holq-soli = samcwung mŏum

unaspirated sounds tōyn soli = kyengum

unknown / interrogative mīci-ching

unvoiced sound an wullimq soli = museng-um

verb tōngsa = wumcik-ssi, wum-ssi

verb ending ssi kkuth = ēmi

verb-final ending mayc.um ssi-kkuth

verb modifier form maykim kkol

verbal noun (= nominal verb) tōngmyengsa

vocative case pulumq cali = hoq-kyek

vocative marker / particle pulumq cali tho-ssi = hoq-kyek cōsa

voiced (being ~) wullim

voiced sound wullimq soli = yūseng-um

voicing wullim

vowel ending holq-soli ssi-kkuth

vowel epenthesis holq-soli kolwum

vowel harmony holq-soli(= mŏum) cohwa

vowel holq-soli = mŏum

vowel particle holq-soli tho-ssi

vowel: (glide and) ~ cwungseng

vowel: ending beginning with a ~ holq-soli ssi-kkuth

vowel: particle beginning with a ~ holq-soli tho-ssi

weakened sound kapyewun soli

word nāth mal = tan.e

word-conjoining particle nāth mal [1]yenkyel tho-ssi

word converted from some other part of speech censeng-e

word form ēhyeng

word order ēswun

word root māl mith (= ēkun = ppuli)

writing (initial) consonant clusters by combining two or more letters hap.yong pyēngse

writing with spaces (between words) ttuye ssuki

Yang (= light) vowel (= o, a, wo) yangseng

Yin (= dark / heavy) vowel (= u, e, wu) umseng

zero (form of a) particle kkol ēps.nun kaci

zero allomorph ceylo uy pyēn.i hyengthay, kkol ēps.nun pyēn.i hyengthay

Appendix 8. Chronological list of texts.

This finder list is based on several sources, primarily the lists in LCT and NKW, edited for practical reference. Some of the dates are best guesses and may be cited differently by other scholars. (The earliest date given is when the work was created or first published, but extant versions may be later.)

Abbreviation	Date	Title. (Author. Notes.)
Kyunye	1075	Kyunye cen
Kyeylim	1103	Kyeylim [1]yusa. Son Mok = Sūn Mù. repro Hankwuk kocen chongse 3
Saki	1145	Samkwuk saki. Kim Pusik
Hyang-kup	1250	Hyangyak kwukup-pang
Yusa	1285	Samkwuk yusa. Il.yen
Taymyeng	1395	Taymyeng-lyul cik.hay. [[1]Itwu]
Kwan-yek	1400+	Cosen-kwan yek.e. repro Hankwuk kocen chongse 3
Yangcam	1415	Yangcam kyenghem chwal.yo. [[1]Itwu]
Wellyeng	1431	Hyangyak chaychwu wellyeng
[1]Yong	1445	[1]Yongpi echen ka: 1-10, songs 1-125. Kwen Cey, Ceng [1]Inci, An Ci; notes by Seng Sammun, Pak Pangnyen, [1]Yi Kay
Hwun	1446	Hwunmin cengum haylyey. Seycong, Ceng [1]Inci
Sek	1447	Sekpo sangcel: 6, 9, 13, 19; 11; 23, 24. Swuyang (> Seyco)
TC	1448	Tongkwuk cengwun: 1-6. Choy Hang et al. [compiled 1447]
Kok	1449	Wel.in chenkang ci kok: songs 1-194. Seycong
Hwun-en	1451	Hwunmin cengum enhay. CF ?1750-
Hong	1455+	Hongmu cengwun sek.hwun: 1-16
Wel	1459	Wel.in sekpo: 1, 2, 7, 8, 9, 10; 11; 13, 14, 17, 18, 21, 23
[1]Nung	1462	[1]Nungem kyeng enhay: 1-10. Seyco. Translation of Surangama sūtra
Pep	1463	Pep-hwa = Myopep [1]yenhwa-kyeng enhay: 1-7. Yun Salo, Hwang Swusin, et al. Translation of Saddharma pundarīka sūtra
Yeng	1463/4	[Sencong] Yengka-cip enhay: 1-2. Sin Mi et al.
Sim	1464	[Pan.ya paramilta] Simkyeng enhay. Han Kyeyhuy et al. Translation of Prajñā pāramitā hṛdaya sūtra
Kumkang	1464	Kumkang [pan.ya phalamil] kyeng [enhay]. Han Kyeyhuy et al.
Sangwen	1464	Otay-san Sangwen-sa chwungchang kwensen-mun = Sangwen-chep = Taysan echep
Amitha	1464	Amitha kyeng enhay = Pul-sel Amitha kyeng enhay. Seyco. Translation of Sukhavatīvyūha
Wen	1465	Wenkak kyeng enhay: 1-12. Sin Mi, Hyolyeng, Han Kyeyhuy. Translation of Mahā-vaipulya pūrṇa-buddha sūtra prasannārtha sūtru
Mok	1466	Mok.wuca-swusim-kyel [cho-kan]. Sin Mi. CF 1500
Kup	1466	Kwukup-pang enhay: 1-2. CF 1608; 1489
Sapep, Pep.e	1467→1517	Pep.e = Sapep.e. Sin mi. [first edition not extant]
Mong	?1468-	Mongsan hwasang pep.e [1]yaklok enhay. Sin Mi. LKM 1972: "1472"
Nay	1475	Nayhwun: 1, 2:1, 2:2, 3. Nagoya (Ōsa-bunko) text 1522; Kyucang-kak text 1611. CF 1656, 1736
Twusi	1481	Twusi enhay [cho-kan]: 5-10; 11; 12-13; 15-25. Co Wi, Uy Chim. Translation of poems of Dùfǔ. CF 1632
Samkang	1481	Samkang hayngsil-to: 1-3. CF 1511, 1514, 1617
Nam	1482	[Yengka-taysa cungto-ka] Nammyeng-chen [sensa] kyeysong enhay: 1-2. Seycong, Seyco
Kum-sam	1482	Kumkang kyeng samka-hay: 2-5. Han Kyehuy, [1]No Sacin
Kwan	1485	Kwan.um kyeng enhay = Pulceng-sim talani-kyeng enhay: 1-3

Otay	1485	Otay-cin.en (with Hanmun text of [1]Yenghem [1]yakcho, CF 1550). Later editions 1536, 1550. CF 1568 Cin-en-cip
Kup-kan	1489	Kwukup kan.i-pang: 1, 3, 6 (of 8). CF 1466.
Ilopha	1492	Ilopha (= Irofa = Iroha). Hankul pronunciation of Japanese syllabary
Ak-kwey	1493	Ak.hak kweypem: 1-9. Seng Hyen, Pak Kon. Hankul pp 211-35 only
[1]Yuk	1496	[1]Yukco [taysa] pep po-tan kyeng enhay: 1-3
Kwenkong	1496	Cin.en kwenkong = Kongyang sisik-mun (= Sisik kongyang-mun) enhay = Sisik kwenkong enhay = Pem-um kyeng
Mok-cwung	1500	Mok.wuca-swusim-kyel: cwung-kan. CF 1466
Sam-cwung	1511	Samkang hayngsil-to: cwung-kan. CF 1481; 1514; 1554, 1606, 1729
Sok-Sam	1514	Sok Samkang hayngsil-to. CF 1481, 1511; 1554, 1606, 1729
Sa, Saseng	1517	Saseng thonghay: 1-2. Choy Seycin
Sapep, Pep.e	1517←1467	Pep.e = Sapep.e. Sin Mi. [2d edition; also 1543. 1st edition lost]
Pak	?1517-	Pak thongsa enhay [cho-kan] = Pen.yek Pak thongsa: 1 (of 3). Choy Seycin. CF 1677
[1]No	?1517-	[1]Nokeltay [cho-kan] = Pen.yek [1]Nokeltay: 1-2. Choy Seycin. CF 1670
[1]No-Pak	?1517-	[1]No-Pak ciplam [cahay]. Choy Seycin. [Chinese words explained.] SEE [1]Yi Pyengcwu, [1]No-Pak ciplam ko (Cinswu-tang 1966)
Sohak-cho	1518	Pen.yek Sohak: 6, 7; 8, 9, 10. Kim Cen, Choy Swuksayng. CF 1586
[1]Ye-yak	1518	[1]Ye-ssi hyangyak enhay. Kim Ankwuk
Ilyun	1518	Ilyun hayngsil-to [cho-kan]. CF 1539
Pyek(.on)	1518	Pyek.on-pang enhay
Kan-Pyek	1525	Kan.i Pyek.on-pang. (lacks tone marks)
C, Cahoy	1527	Hwunmong cahoy: 1-3. Choy Seycin. Two versions in 1971 Tankwuk tay-hak.kyo edition with indexes by LKM
Siyong	?1530	Siyong hyangak po
Ilyun-cwung	1539	Ilyun hayngsil-to: cwung-kan. CF 1518; 1606, 1729
Wuma	1541/3	Wuma-yangce yem.yek-pyeng chilyo-pang
Pun-on	1542	Punmun on.yek ihay-pang. Kim Ankwuk
Sapep, Pep.e	1543	Pep.e = Sapep.e. Sin Mi. [2d (3d?) edition; Kwangmun-kak 1979]
Akcang	?1544-	Akcang kasa
[1]Yenghem	1550	[Pen.yek] [1]Yenghem [1]yakcho. Hankul transl of 1485 Hanmun text
Uncwung	1553	Uncwung kyeng [enhay] = [Pulsel taypo] Pumo uncwung kyeng [enhay]; CF 1564, 1592, ?1778-1800
Kwuhwang	1554	Kwuhwang chwal.yo
—	1554	later edition of 1511 Samkang hayngsil-to: cwung-kan
Sek 3, 11	1562←1447	Sekpo sangcel, 2d edition.
Uncwung[2]	1564	later edition of 1553 (Uncwung kyeng); CF ?1778-1800
Cin.en	1568	Cin.en-cip. (Choy Hyenpay 1961:244-5.) CF 1688, 1689, 1800
Cicang	1569	Cicang kyeng enhay: 1-3. Hakco taysa
Chiltay	1569	Chiltayman-pep: Cin.ye-seykyey, Samsin-yelay, Hwangcek-tungci
Kwang-Chen	1575	Kwangcwu Chenca-mun. CF 1583, 1804
[1]Yuhap	1576	Sincung [1]Yuhap: 1-3. CF 1838 (Siebold edition)
Kyeycho	1577	Kyeycho-simhak.in-mun
Palsim	1577	Palsim-swuhayng-cang
Yawun	1577	Yawun cakyeng
Kwikam	1579	Senka Kwikam enhay: 1-2. (Written 1564 in Chinese by Sesan taysa, Hankul translation by Kim Hwa toin 1579, date of printing 1610)
Sek-Chen	1583	Sekpong Chenca-mun. CF 1575, 1804
Sohak	1586	Sohak enhay: 1-6. CF 1517; 1744. (6 of 1586 = 9 and 10 of 1517)

Tayhak	1588	Tayhak enhay
Cwung	1588	Cwungyong enhay
[1]Non	1588	[1]Non.e enhay: 1-4
Si	1588	Sikyeng enhay: 1-20
Cwuyek	1588	Cwuyek enhay: 1-9
Secen	1588	Secen enhay: 1-5
Mayng	1588	Mayngca enhay: 1-14
Hyo	1588	Hyokyeng enhay. Sonkei-kaku Bunko, Tōkyō (LKM 1972)
Si-mul	1588	Sikyeng mulmyeng enhay
Uncwung3	1592	later edition of 1553 (Uncwung kyeng); CF ?1778-1800
—	1606	later edition of 1511 Samkang hayngsil-to: cwung-kan
En-Kup	1608	Enhay Kwukup-pang. CF 1466
Twu-cip	1608	Twuchang cip.yo [enhay]: 1-2
Thay	1608	Thaysan cip.yo [enhay]
Twu-hem	?1608+	Twuchang kyenghem pang
Nay-cwung	1611	Nayhwun: ?cwung-kan, Kyucang-kak text. CF 1475; 1656, 1736
[1]Yenpyeng	1612	[1]Yenpyeng cinam
Tonguy	1613	Tonguy pokam: 1-25
Sin-Sok	1617	Tongkwuk Sinsok Samkang hayngsil-to: hyoca 0, 00, 1-8; chwungsin 0, 00, 1; lyel.nye 0, 00, 1-8. CF 1481, 1511; 1514, 1606, 1729
T-cwung	1632	Twusi enhay: cwung-kan: 1-25. CF 1481
Kalyey	1632	Kalyey enhay: 1-10
Hwapho	1635	Hwapho-sik enhay: 1-2. CF 1685
Kwennyem	1637	Kwennyem yolok. (LKM 1972)
Makyeng	1649-	Makyeng chocip enhay: 1-2. CF 1682
Kyeng-hwun	?1650	Kyengsey hwunmin cengum [tosel]. Myeng Kok, Choy Sekceng. repro Hankwuk kocen chongse 3
Elok-chong[1]	1652	Elok chonglam. CF. 1669. repro Tayhak-sa
Pyek-sin	1653	Pyek.on sinpang
Nay-cwung	1656	Nayhwun: cwung-kan. (? later edition of 1611) CF 1475, 1611, 1736
Kyengmin	1656	Kyengmin-phyen enhay: se, 1, 2:se
Elok	1657	Elok-hay. About Chinese
Hwang-po	1660	Kwuhwang po.yu-pang
Kyeychwuk	?1660-	Kyeychwuk ilki. Includes fictional events of 1623 and earlier.
Elok-chong[2]	1669	Elok chonglam. CF. 1652. repro Tayhak-sa
[1]No-cwung	1670	[not extant] → 1795; CF 1517-, 1795
Swukcong	?1674-1720	Swukcong enkan. Letters of the era; cited by LCT 715a:5.
Sin.e	1676	Chep.hay sin.e: 1-10. CF 1781. About Japanese
Pak-cwung	1677	Pak thongsa enhay: cwung-kan: 1-3. CF 1517-. About Chinese
Kyeng-wun	1678	Kyengsey cengwun. Choy Sekceng
Ma-cwung	1682	Makyeng chocip enhay: cwung-kan: 1-2. CF 1649-
Hwa-cwung	1685	Hwapho-sik enhay: cwung-kan: 1-2. CF 1635
Cin.en[2]	1688	Cin.en-cip: 3 vols of mantras. [1]Nang Kyu. (Pulkyo sacen 832b.) CF 1568, 1689
Cin.en[3]	1689	Cin.en-cip. (Choy Hyenpay 1961:244-5.) CF ?1568, 1688. mantras
Yek, Yek.e	1690	Yek.e [1]yuhay: 1-2. Sin Ihayng, Kim Kyengcwun. CF 1775. About Chinese
Cacho	1698	Sincen Cacho-pang enhay. CF 1796
Phal	1703	Phalsey-a. Later edition 1774. About Manchu
Cheng-Lo	1703	Chenge [1]Nokeltay: 1-8. CF 1765. About Manchu

Sam-yek	1703	Sam-yek chonghay: 1-10. Choy Hwuthayk. CF 1774. About Manchu
Soa	?1720-	Soa-lon. Sin Kyeyam. Later edition 1774. About Manchu
Yahwa	?1720-	Yolo-wen yahwa-ki. Pak Twusey. (Published by Ul-yu 1949)
Tongmong	?1720-	Tongmong sensup samhay. Pak Seymu
Way, Waye	?1720-	Waye [1]yuhay: 1-2. English translation Medhurst 1835. About Japanese
Thayphyeng	?1720+	Thayphyeng kwangki enhay: 1, 3-5. (Should be dated earlier?)
Payklyen	?1723-	Payklyen-chohay
Kwu-Tay	1728	Chengkwu yengen: Tayhak pon. Chen Thayk, ed. CF 1730
–	1729	later edition of 1511 Samkang hayngsil-to: cwungkan. CF 1539
Kwu-O	1730	Chengkwu yengen: O-ssi pon. CF. 1728
E-Nay	1736	[Nayhwun: cwung-kan =] Ecey Nayhwun. 1974 repro Aseya munhwa-sa. CF 1481; 1611, 1656
[n]Ye, [n]Ye-sa	1736	[n]Ye-sase enhay: 1-3
Mong-Lo	1741	Monge [1]Nokeltay: 1-8. Also 1766, 1790. About Mongolian
E-So	1744	Ecey Sohak enhay: 1-6. CF 1518, 1586
Sanghwun	1745	[Ecey] Sanghwun enhay
Songkang	1747	Songkang kasa: 1-3. Ceng Chel. (Pages numbers run through book.)
Hwatong	1747	Hwatong cengum thongsek-wun ko
Tongmun	1748	Tongmun [1]yuhay. Hyeng Munhang. Manchu vocabulary
Hwun-wun	?1750-	Hwunmin cengum wunhay. [[1]Ye Am] Sin Kyengcwun [Swunmin].
Sam.wun	1751	Sam.wun senghwi
Wanglang	1753	Wanglang panhon cen
Colam	1755	Chen.uy Colam enhay: 1-5
E-Hwun	1756	Ecey Hwunse enhay
Haytong	1763	Haytong ka.yo. [1]No Kacay, Kim Swucang
Kokum	1764	Kokum kakok
Iltong	1765	Iltong cangyu-ka. Kim Inkyem
ChL-sin	1765	Chenge [1]Nokeltay sinsek
Pak-sin	1765	Pak thongsa sinsek enhay: 1-3. CF 1517-, 1677
Monge	1768	Monge [1]yuhay: 1-2. [1]Yi Ekseng. CF 1790. Mongolian vocabulary
Sipkwu	1772	Sipkwu-salyak enhay
Sam-yek cwung	1774	Sam.yek chonghay: cwung-kan. CF 1703
Yek-po	1775	Yek.e [1]yuhay po. CF 1690
Han-Cheng	?1775	Han-Cheng munkam: 1-15. [1]Yi Swu. Chinese-Korean-Manchu glossary
[n]Yempul	1776	[n]Yempul pokwen-mun
Myenguy	1777	Myenguy-lok enhay: 1-3. Kim Chiin et al. CF 1778
Pangen	1778	Pangen cipsek: 1-4. Manchu, Mongolian, Japanese
Sok-Myeng	1778	Sok Myenguy-lok enhay: 1-2. CF 1777
Uncwung$_{4,5}$	?1778-1800	later editions of 1553 (Uncwung kyeng); CF 1564, 1592
Mulpo	1780	Mulpo. [1]Yi Caywi
Sin.e-cwung	1781	Chep.hay sin.e: cwung-kan: 1-12. CF 1676
Cahyul	1783	Cahyul cenchik
Pyeng-ci	1787	Pyenghak cinam [enhay]: 1-2
Tonghan	1789	Kokum seklim 8: Tonghan yek.e. [1]Yi Uypong
Samhak	1789	Samhak yek.e. About Mongolian. (LCT 1972)
Monge-po	1790	Monge [1]yuhay pophyen. CF 1768
Chep-Mong	1790	Chep.hay Monge. About Mongolian
Mu.yey	1790	Mu.yey pothong-ci enhay = Mu.yey topho thongci enhay
[1]In.e	1790	[1]In.e taypang. Choy Kuylyeng. K version of Ringotaihō, Japanese
Muwen	1792	[Cungswu] Muwen-lok enhay: 1-3. (LCT 1973: "1791")

[1]No-cwung [P]	1795←1670	[1]Nokeltay enhay: cwung-kan [Phyengan kam.yeng]: 1-2. CF ?1517-
[1]No-cwung [K]	1795←1670	[1]Nokeltay enhay: cwung-kan [Kyucang-kak]: 1-2. CF ?1517-
Chengcang	1795	Chengcang-kwan cense
Cacho-cwung	1796	Sincen Cacho-pang enhay: cwung-kan
Olyun	1797	Olyun hayngsil-to: 1-5. CF 1859; 1884
[1]Nap-ya	1799	[Enhay] [1]Nap-yak cengchi-pang
[1]Yun.um	1800-	[1]Yun.um enhay
Tongen	1800-	Tongen kolyak: 1-2. Ceng Kyo
Cwu-Chen	1804	Cwuhay Chenca-mun. CF 1575, 1583
Cung-sam	1805	[Sin-kan] Cungpo Samlyak cik.hay: 1-3. (LCT 1973: "enhay")
Aen	1819	Aen kakpi: 1-3
Enmun-ci	1824	Enmun-ci. [1]Yu Huy. repro Hankwuk kocen chongse 3
[1]Yu-mul	?1834-	[[1]Yu-ssi] Mulmyeng-ko: 1-5. (Chōsen gakuhō 15-20)
Medhurst	1835	Translation of a comparative vocabulary of the Chinese, Corean, and Japanese languages. W.H. Medhurst ("Philo Sinensis"). Batavia.
Siebold	1838	Lui-Ho sive Vocabularium Sinense in Kôraïanum conversum. Batavia
Cheksa[1]	1839	Cheksa [1]yun.um. (Different book with same name 1881.)
Ocwu	?1840	Ocwu yenmun cangcen sanko
Thaysang	1852	Thaysang kam.ung-phyen tosel enhay: 1-5. (LCT 1973: "1851")
Myengseng	1855	[Kwanseng ceykwun] Myengseng kyeng enhay
Olyun[2]	1859	later edition of 1797
Kosan	?1864-	Kosan yuko: 1-6. Yun Sento
Kyuhap	1869	Kyuhap chongse
Kakok	1876	Kakok wenlyu. Pak Hyokwa, An Min.yeng
Han.yang	1880	Han.yang-ka
Hancwung	?1800	Hancwung-[man]lok
Cin.en[4]	1800	later edition of 1568
Kyengsin	1880	Kyengsin-lok enhay
Samseng	1880	Samseng-hwun kyeng
Kwahwa	1880	Kwahwa consin
Cokwun	1881	Cokwunlyeng cekci
Cheksa[2]	1881	Cheksa [1]yun.um. (Different book with same name 1839.)
E-Chek	1881	[Ecey-yu tayso minlyo kup woyin tung] Cheksa [1]Yun.um
E-Phal	1882	Ecey-yu Phal-to sa-to kilo inmin tung [1]Yun.um
Hwa-en	1883+	Hwaum kyeymong enhay: 1-2. [1]Yi Unghen
Kwan-Olyun	1884	Kwanseng ceykwun Olyun kyeng. CF 1797
Camsang	1886	Camsang cip.yo
Chenswu	1889	Chenswu kyeng enhay
Ak-kasa	1893	Ak-kasa
Uy-lok	1893	Uy[1]yel-pi chwung-hyo-lok
Hwae	?1895	Hwae [1]yucho
Toklip	1896	Toklip sinmun: 1-150
Nongka	?1900	Nongka wellyeng-ka

Appendix 9. Alphabetical list of texts.

(Alphabetized by the abbreviations.)

Abbreviation	Date	Title. (Author. Notes.)
Aen	1819	Aen kakpi: 1-3
Ak-kasa	1893	Ak-kasa
Ak-kwey	1493	Ak.hak kweypem: 1-9. Seng Hyen, Pak Kon. Hankul pp 211-35 only

Akcang	?1544-	Akcang kasa
Amitha	1464	Amitha kyeng enhay = Pul-sel Amitha kyeng enhay. Seyco. Translation of Sukhavatīvyūha
Cacho	1698	Sincen Cacho-pang enhay. CF 1796
Cacho-cwung	1796	Sincen Cacho-pang enhay: cwung-kan
Cahoy	1527	Hwunmong cahoy: 1-3. Choy Seycin. Two versions in 1971 Tankwuk tay-hak.kyo edition indexed by LKM
Cahyul	1783	Cahyul cenchik
Camsang	1886	Camsang cip.yo
ChL-sin	1765	Chenge [1]Nokeltay sinsek
Cheksa[1]	1839	Cheksa [1]yun.um. (Different book with same name 1881.)
Cheksa[2]	1881	Cheksa [1]yun.um. (Different book with same name 1839.)
Chengkwu	1730	Chengkwu yengen: O-ssi pon. CF. 1728
Chengcang	1795	Chengcang-kwan cense
Cheng-Lo	1703	Chenge [1]Nokeltay: 1-8. CF 1765. About Manchu
Cheng-O	1730	Chengkwu yengen: O-ssi pon. CF. 1728
Cheng-tay	1728	Chengkwu yengen: Tayhak pon. Chen Thayk, ed. CF 1730
Chenswu	1889	Chenswu kyeng enhay
Chep-Mong	1790	Chep.hay Monge. About Mongolian
Chiltay	1569	Chiltayman-pep: Cin.ye-seykyey, Samsin-yelay, Hwangcek-tungci
Cicang	1569	Cicang kyeng enhay: 1-3. Hakco taysa
Cin.en	1568	Cin.en-cip. (Choy Hyenpay 1961:244-5.) CF 1688, 1689, 1800
Cin.en[2]	1688	Cin.en-cip: 3 vols. [1]Nang Kyu. (Pulkyo sacen 832b.) CF 1568, 1689
Cin.en[3]	1689	Cin.en-cip. (Choy Hyenpay 1961:244-5.) CF ?1568, 1688
Cin.en[4]	1800	later edition of 1568
Cokwun	1881	Cokwunlyeng cekci
Colam	1755	Chen.uy Colam enhay: 1-5
Cung-sam	1805	[Sin-kan] Cungpo Samlyak cik.hay: 1-3. (LCT 1973: "enhay")
Cwu-Chen	1804	Cwuhay Chenca-mun. CF 1575, 1583
Cwung(yong)	1588	Cwungyong enhay
Cwuyek	1588	Cwuyek enhay: 1-9
E-Chek	1881	[Ecey-yu tayso minlyo kup woyin tung] Cheksa [1]Yun.um
Elok	1657	Elok-hay. About Chinese
Elok-chong	1652	Elok chonglam. CF 1669. repro Tayhak-sa
Elok-chong[2]	1669	Elok chonglam. CF 1652. repro Tayhak-sa
E-Hwun	1756	Ecey Hwunse enhay
E-Nay	1736	[Nayhwun: cwung-kan =] Ecey Nayhwun. 1974 repro Aseya munhwa-sa. CF 1481; 1611, 1656
E-Phal	1882	Ecey-yu Phal-to sa-to kilo inmin tung [1]Yun.um
E-So	1744	Ecey Sohak enhay: 1-6. CF 1518, 1586
En-Kup	1608	Enhay Kwukup-pang. CF 1466
Enmun-ci	1824	Enmun-ci. [1]Yu Huy. repro Hankwuk kocen chongse 3
H, H-haylyey		SEE Hwun
H-en		SEE Hwun-en
H-wun		SEE Hwun-wun
Han-Cheng	?1775	Han-Cheng munkam: 1-15. [1]Yi Swu. Chinese-Korean-Manchu glossary
Hancwung	?1800	Hancwung-[man]lok
Han.yang	1880	Han.yang-ka
Haytong	1763	Haytong ka.yo. [1]No Kacay, Kim Swucang

Hong	1455+	Hongmu cengwun sek.hwun: 1-16
Hwa-cwung	1685	Hwapho-sik enhay: cwung-kan: 1-2. CF 1635
Hwae	?1895	Hwae [1]yucho
Hwa-en	1883+	Hwaum kyeymong enhay: 1-2. [1]Yi Unghen
Hwang-po	1660	Kwuhwang po.yu-pang (also: Kwu-po)
Hwapho	1635	Hwapho-sik enhay: 1-2. CF 1685
Hwatong	1747	Hwatong cengum thongsek-wun ko
Hwun	1446	Hwunmin cengum haylyey. Seycong, Ceng [1]Inci
Hwun-en	1451	Hwunmin cengum enhay. Later edition ?1750⁻
Hwunmong		SEE Cahoy
Hwun-wun	?1750⁻	Hwunmin cengum wunhay. [[1]Ye Am] Sin Kyengcwun [Swunmin]. CF 1451
Hyang-kup	1250	Hyangyak kwukup-pang
Hyo	1588	Hyokyeng enhay. Sonkei-kaku Bunko, Tōkyō (LKM 1972)
Ilopha	1492	Ilopha (= Irofa = Iroha). Hankul pronunciation of Japanese syllabary; LKM repro 1965 Tose 8: - (Ul-yu munhwa sa)
Iltong	1765	Iltong cangyu-ka. Kim Inkyem
Ilyun	1518	Ilyun hayngsil-to [cho-kan]. CF 1539
Ilyun-cwung	1539	Ilyun hayngsil-to: cwung-kan. CF 1518; 1606, 1729
[1]In.e	1790	[1]In.e taypang. Choy Kuylyeng. Korean version of Japanese Ringotaihō
Kakok	1876	Kakok wenlyu. Pak Hyokwa, An Min.yeng
Kalyey	1632	Kalyey enhay: 1-10
Kan-Pyek	1525	Kan.i Pyek.on-pang. (lacks tone marks) CF 1518
Kok	1449	Wel.in chenkang ci kok: songs 1-194. Seycong
Kokum	1764	Kokum kakok
Kosan	?1864⁻	Kosan yuko: 1-6. Yun Sento
Kumkang	1464	Kumkang [pan.ya phalamil] kyeng [enhay]. Han Kyeyhuy et al.
Kum-sam	1482	Kumkang kyeng samka-hay: 2-5. Han Kyehuy, [1]No Sacin
Kup	1466	Kwukup-pang enhay: 1-2. CF 1608
Kup-kan	1489	Kwukup kan.i-pang: 1, 3, 6 (of 8)
Kwahwa	1880	Kwahwa consin
Kwan	1485	Kwan.um kyeng enhay = Pulceng-sim talani-kyeng enhay: 1-3
Kwan-Olyun	1884	Kwanseng ceykwun Olyun kyeng. CF 1797
Kwan-yek	1400+	Cosen-kwan yek.e. repro Hankwuk kocen chongse 3
Kwang-Chen	1575	Kwangcwu Chenca-mun. CF 1583, 1804
Kwenkong	1496	Cin.en kwenkong = Kongyang sisik-mun (= Sisik kongyang-mun) enhay = Sisik kwenkong enhay = Pem-um kyeng
Kwennyem	1637	Kwennyem yolok. (LKM 1972)
Kwikam	1579	Senka Kwikam enhay: 1-2. (Written 1564 in Chinese by Sesan taysa, Hankul transl by Kim Hwa toin published 1579, printing date 1610)
Kwuhwang	1554	Kwuhwang chwal.yo
Kwu-po	1660	Kwuhwang po.yu-pang (also: Hwang-po)
Cheng-Tay	1728	Chengkwu yengen: Tayhak pon. Chen Thayk, ed. CF 1730
Kyeng-hwun	?1650	Kyengsey hwunmin cengum [tosel]. Myeng Kok, Choy Sekceng. repro Hankwuk kocen chongse 3
Kyeng-wun	1678	Kyengsey cengwun. Choy Sekceng
Kyengmin	1656	Kyengmin-phyen enhay: se, 1, 2:se
Kyengsin	1880	Kyengsin-lok enhay
Kyeycho	1577	Kyeycho-simhak.in-mun
		Kyeychwuk ilki. Includes fictional events of 1623 and earlier.

Kyeychwuk	?1660-	
Kyeylim	1103	Kyeylim [1]yusa. Son Mok = Sūn Mù. repro Hankwuk kocen chongse 3
Kyunye	1075	Kyunye cen
Kyuhap	1869	Kyuhap chongse
L...		→ [1]N... , → [1]Y... , → [1]I...
Ma, Makyeng	1649-	Makyeng chocip enhay: 1-2. CF 1682
Ma-cwung	1682	Makyeng chocip enhay: cwung-kan: 1-2. CF 1649-
Mayng	1588	Mayngca enhay: 1-14
Medhurst	1835	Translation of a comparative vocabulary of the Chinese, Corean, and Japanese languages. W.H. Medhurst ("Philo Sinensis"). Batavia. CF ?1720- Waye [1]yuhay
Mok	1466	Mok.wuca-swusim-kyel [cho-kan]. Sin Mi. CF 1500
Mok-cwung	1500	Mok.wuca-swusim-kyel: cwung-kan. CF 1466
Mong	?1468-	Mongsan hwasang pep.e [1]yaklok enhay. Sin Mi. LKM 1972: 1472
Monge	1768	Monge [1]yuhay: 1-2. [1]Yi Ekseng. CF 1790. Mongolian vocabulary
Monge-po	1790	Monge [1]yuhay pophyen. CF 1768
Monge-Lo	1741	Monge [1]Nokeltay: 1-8. Also 1766, 1790. About Mongolian
Mulpo	1780	Mulpo. [1]Yi Caywi
Muwen	1790	[Cungswu] Muwen-lok enhay: 1-3. (LCT 1973: "1791")
Mu.yey	1792	Mu.yey pothong-ci enhay = Mu.yey topho thongci enhay
Myengseng	1855	[Kwanseng ceykwun] Myengseng kyeng enhay
Myenguy	1777	Myenguy-lok enhay: 1-3. Kim Chiin et al. CF 1778
Ny...		→ [n]Y...
Nam	1482	[Yengka-taysa cungto-ka] Nammyeng-chen [sensa] kyeysong enhay: 1-2. Seycong, Seyco
[1]Nap-yak	1799	[Enhay] [1]Nap-yak cengchi-pang
Nay	1475	Nayhwun: 1, 2:1, 2:2, 3. Nagoya (Ōsa-bunko) text 1573; Kyucang-kak text 1611. CF 1656, 1736.
Nay-cwung	1656	Nayhwun: cwung-kan. (? later edition of 1611) CF 1475, 1611, 1736
Nay-cwung[0]	1611	Nayhwun: ?cwung-kan, Kyucang-kak text. CF 1475; 1656, 1736
[1]No	?1517-	[1]Nokeltay [cho-kan] = Pen.yek [1]Nokeltay: 1-2 [unavailable to LCT]. Choy Seycin. CF 1670
[1]No-cwung	1795	[1]Nokeltay enhay: cwung-kan: 1-2 [= LCT "No"]. CF ?1517-. Two versions: P = Phyengan kam.yeng and K = Kyucang-kak [in which the language looks newer]
[1]Non	1588	[1]Non.e enhay: 1-4
Nongka	?1900-	Nongka wellyeng-ka
[1]No-Pak	?1517-	[1]No-Pak ciplam [cahay]. Choy Seycin. [Chinese words explained.] See [1]Yi Pyengcwu, [1]No-Pak ciplam ko (Cinswu-tang 1966)
[1]Nung	1462	[1]Nungem kyeng enhay: 1-10. Seyco. Translation of Surangama sūtra
Ocwu	?1840	Ocwu yenmun cangcen sanko
Olyun	1797	Olyun hayngsil-to: 1-5. CF 1884
Otay	1485	Otay-cin.en (with Hanmun text of [1]Yenghem [1]yakcho, CF 1550). Later editions 1536, 1550. CF 1568 Cin-en-cip
Pak	?1517-	Pak thongsa enhay [cho-kan] = Pen.yek Pak thongsa: 1 (of 3). Choy Seycin. CF 1677
Pak-cwung	1677	Pak thongsa enhay: cwung-kan: 1-3. CF 1517-. About Chinese
Pak-sin	1765	Pak thongsa sinsek enhay: 1-3. CF 1517-, 1677
Palsim	1577	Palsim-swuhayng-cang
Pangen	1778	Pangen cipsek: 1-4. Manchu, Mongolian, Japanese

Payklyen	?1723-	Payklyen-chohay
Pep	1463	Pep-hwa = Myopep [1]yenhwa-kyeng enhay: 1-7. Yun Salo, Hwang Swusin, et al. Translation of Saddharma pundarīka sūtra
Pep.e = Sapep	1467→1517	Pep.e = Sapep.e. Sin mi. Also 1543
Phal	1703	Phalsey-a. Later edition 1774. About Manchu
Pokwen		SEE [n]Yempul
Pun-on	1542	Punmun on.yek ihay-pang. Kim Ankwuk
Pyek(.on)	1518	Pyek.on-pang enhay. CF 1525
Pyek-sin	1653	Pyek.on sinpang
Pyeng-ci	1787	Pyenghak cinam [enhay]: 1-2
Sek	1447	Sekpo sangcel: 6, 9, 13, 19; 23, 24. Swuyang > Seyco
	→1562	(2d edition): 3, 11
Saseng	1517	Saseng thonghay: 1-2. Choy Seycin
Saki	1145	Samkwuk saki. Kim Pusik.
Sam-cwung	1511	Samkang hayngsil-to: cwung-kan. CF 1481; 1514; 1554, 1606, 1729
Samhak	1789	Samhak yek.e. About Mongolian. (LCT 1972)
Samkang	1481	Samkang hayngsil-to: 1-3. CF 1511; 1514, 1617
Samkwuk		SEE Saki, Yusa
Samseng	1880	Samseng-hwun kyeng
Sam.wun	1751	Sam.wun senghwi
Sam-yek	1703	Sam-yek chonghay: 1-10. Choy Hwuthayk. CF 1774. About Manchu
Sam-yek cwung	1774	Sam.yek chonghay: cwung-kan. CF 1703
Sanghwun	1745	[Ecey] Sanghwun enhay
Sangwen	1464	Otay-san Sangwen-sa chwungchang kwensen-mun = Sangwen-chep = Taysan echep
Sapep, Pep.e	1467→1517	Pep.e = Sapep.e. Sin Mi. [2d edition; also 1543. 1st edition lost]
Saseng	1517	Saseng thonghay: 1-2. Choy Seycin
Secen	1588	Secen enhay: 1-5
Sek	1447	Sekpo sangcel: 6, 9, 13, 19; 23, 24. Swuyang (> Seyco)
	1447→1562	(2d edition): 3, 11
Sek-Chen	1583	Sekpong Chenca-mun. CF 1575, 1804
Si	1588	Sikyeng enhay: 1-20
Si-mul	1588	Sikyeng mulmyeng enhay
Siebold	1838	Lui-Ho sive Vocabularium Sinense in Kôraïanum conversum. Batavia. CF 1576 [1]Yuhap
Sim	1464	[Pan.ya paramilta] Simkyeng enhay. Han Kyeyhuy et al. Translation of Prajñā pāramitā hṛdaya sūtra
Sin.e	1676	Chep.hay sin.e: 1-10. CF 1781. About Japanese
Sin.e-cwung	1781	Chep.hay sin.e: cwung-kan: 1-12. CF 1676
Sin-Sok	1617	Tongkwuk Sinsok Samkang hayngsil-to: hyoca 0, 00, 1-8; chwungsin 0, 00, 1; lyel.nye 0, 00, 1-8. CF 1481, 1511; 1514, 1606, 1729
Sipkwu	1772	Sipkwu-salyak enhay
Siyong	?1530	Siyong hyangak po
Soa	?1720-	Soa-lon. Sin Kyeyam. Later edition 1774. About Manchu
Sohak-cho	1518	Pen.yek Sohak (6, 7; 8, 9, 10). Kim Cen, Choy Swuksayng. CF 1586
Sohak	1586	Sohak enhay: 1-6. CF 1518; 1744. (6 of 1586 = 9 and 10 of 1518)
Sok-Myeng	1778	Sok Myenguy-lok enhay: 1-2. CF 1777
Sok-Sam	1514	Sok Samkang hayngsil-to. CF 1481, 1511; 1554, 1606, 1729
Songkang	1747	Songkang kasa: 1-3. Ceng Chel. (Page numbers run through book.)
Swukcong	?1674-1729	Swukcong enkan. Letters of the era; cited by LCT 715a:5

T-cwung	1632	Twusi enhay: cwung-kan: 1-25. CF 1481
Tayhak	1588	Tayhak enhay
Taymyeng	1395	Taymyeng-lyul cik.hay. [[1]Itwu]
Thaysan	1608	Thaysan cip.yo [enhay]
Thayphyeng	?1720+	Thayphyeng kwangki enhay: 1, 3-5. (Should be dated earlier?)
Thaysang	1852	Thaysang kam.ung-phyen tosel enhay: 1-5. (LCT 1973: "1851")
Toklip	1896	Toklip sinmun: 1-150
Tongen	1800-	Tongen kolyak: 1-2. Ceng Kyo
Tonghan	1789	Kokum seklim 8: Tonghan yek.e. [1]Yi Uypong
Tongkwuk, TC	1448	Tongkwuk cengwun: 1-6. Choy Hang et al. [compiled 1447]
Tongmong	?1720-	Tongmong sensup samhay. Pak Seymu
Tongmun	1748	Tongmun [1]yuhay. Hyeng Munhang. Manchu vocabulary
Tonguy	1613	Tonguy pokam: 1-25
Twu-cip	1608	Twuchang cip.yo [enhay]: 1-2
Twu-hem	?1608+	Twuchang kyenghem pang
Twusi	1481	Twusi enhay [cho-kan]: 5-10; 11; 12-13; 15-25. Co Wi, Uy Chim. Translation of poems of Dùfǔ. Cwung-kan (1-25) 1632
Twusi-cwung	1632	Twusi enhay: cwung-kan: 1-25. CF 1481
Uncwung	1553	Uncwung kyeng [enhay] = [Pulsel taypo] Pumo uncwung kyeng
Uncwung$_2$	1564	Uncwung kyeng [enhay] = [Pulsel taypo] Pumo uncwung kyeng
Uncwung$_3$	1592	Uncwung kyeng [enhay] = [Pulsel taypo] Pumo uncwung kyeng
Uncwung$_{4,5}$	?1778-1800	Uncwung kyeng [enhay] = [Pulsel taypo] Pumo uncwung kyeng
Uy-lok	1893	Uy[1]yel-pi chwung-hyo-lok
Wanglang	1753	Wanglang panhon cen
Way, Waye	?1720-	Waye [1]yuhay: 1-2. English translation Medhurst 1835. About Japanese
Wel	1459	Wel.in sekpo: 1, 2, 7-8, 9-10, 13-14, 17-18, 21, 23; 11-12 found 1987
Wellyeng	1431	Hyangyak chaychwu wellyeng
Wen	1465	Wenkak kyeng enhay: 1-12. Sin Mi, [1]Nonyeng, and Han Kyeyhuy. Translation of Mahā-vaipulya pūrṇa-buddha sūtra prasannārtha sūtru
Wuma	1541/3	Wuma-yangce yem.yek-pyeng chilyo-pang
Yahwa	?1720-	Yolo-wen yahwa-ki. Pak Twusey. (Published by Ul-yu 1949)
Yangcam	1415	Yangcam kyenghem chwal.yo. [[1]Itwu]
Yawun	1577	Yawun sakyeng
[n]Ye, [n]Ye-sa	1736	[n]Ye-sase enhay: 1-3
Yek, Yek.e	1690	Yek.e [1]yuhay: 1-2. Sin Ihayng, Kim Kyengcwun. CF 1775
Yek-po	1775	Yek.e [1]yuhay po. CF 1690
[n]Yempul	1776	[n]Yempul pokwen-mun
Yeng, Yengka	1463/4	[Sencong] Yengka-cip enhay: 1-2. Sin Mi et al.
[1]Yenghem	1550	[Pen.yek] [1]Yenghem [1]yakcho. Hankul translation of 1485 Hanmun text
[1]Yenpyeng	1612	[1]Yenpyeng cinam
[1]Ye-yak	1518	[1]Ye-ssi hyangyak enhay. Kim Ankwuk
[1]Yong	1445	[1]Yongpi echen ka: 1-10, songs 1-125. Kwen Cey, Ceng [1]Inci, An Ci; notes by Seng Sammon, Pak Pangnyen, [1]Yi Kay
[1]Yuhap	1576	[Sincung] [1]Yuhap: 1-3. CF 1838 (Siebold edition)
[1]Yuk = [1]Yukco	1496	[1]Yukco [taysa] pep po-tan kyeng enhay: 1-3
[1]Yu-mul	?1834-	[[1]Yu-ssi] Mulmyeng-ko: 1-5. (Chōsen gakuhō 15-20)
[1]Yun.um	1800-	[1]Yun.um enhay
Yusa	1285	Samkwuk yusa. Il.yen

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Table of abbreviations

A adjective
abbr, ABBR abbreviation; abbreviated
adj adjective
adj-n adjectival noun
adn adnoun
adv adverb
advers adversative
alt, ALT alternant
AN adjectival noun
ANT antonym
assert assertive
attent attentive
AUTH authoritative (style)
aux auxiliary
bnd, BND bound
C consonant; copula
CM Cosen-e munqpep 1, 2
colloq colloquial
cop copula
count, Count counter
cpd compound
decl declarative
der derived
der adv derived adverb
der n derived noun
dial, DIAL dialect
dimin diminutive
esp especially
fut future
ger gerund
H high (pitch)
HEAVY heavy isotope
hon, HON honorific
IC(s) immediate constituent(s)
indic indicative
intent intentive
insep inseparable
interj interjection
irreg irregular
KBC Korean Basic Course
KEd A Korean-English dictionary
L low (pitch)
LIGHT light isotope
lit, LIT literary
LCT [1]Yu Changton (1964)
LHS [1]Yi Hisung (1961) [Lee, Hi-seung]
LKM [1]Yi Kimun [Lee, Ki-moon]

LR Language Research; low-rise (pitch)
LSN [1]Yi Swungnyeng [Lee, Sung-Nyong]
M Myŏngdo; Myŏngdo's Korean
MK Middle Korean
Mkk Māl kwa kul
mod modifier
n, N noun
N noun; North
N/S North and South
neg, NEG negative
NK North Korea
NKd North Korean dictionary
NKW Nam Kwangwu (1979) [Nam, Gwang U]
num numeral
obs, OBS obsolete
pcl particle
polite
postadnom postadnominal
postn postnoun
postnom postnominal
postsubst postsubstantive
pref prefix
prepcl preparticle
proc processive
prosp prospective
qvi quasi-intransitive verb
R rise, rising (pitch)
retr retrospective
semi-lit semi-literary
sep separable
S South
SK South Korea
SNU Seoul National University
subj subjunctive
subst substantive
suf suffix
SYN synonym
v, V verb
V verb; vowel
var, VAR variant
vc, VC causative verb
vi intransitive verb
vn, VN verbal noun
vni intransitive verbal noun
vnt transitive verbal noun
vp, VP passive verb
vpt transitive passive verb
vt transitive verb

Providing a wealth of information, *A Reference Grammar of Korean* is invaluable to all those with a serious interest in the Korean language

By one of the world's leading scholars of East Asian Languages, this is the first comprehensive book on Korean grammar in English. Professor Martin gives a detailed analysis of modern Korean as it is spoken in both North and South Korea, providing explanations, sample sentences, and translation tips for virtually all the grammatical structures and usage patterns that puzzle the student. He places modern usage in a historical context by tracing its development back to the Middle Korean of the fifteenth century, making this book essential to those who wish to read older Korean texts.

The history and use of Korean writing systems, both Hankul and Chinese characters, are delineated with admirable clarity. Tables of Chinese characters in common use, including those with multiple readings, and a valuable appendix of the radicals and their names will prove indispensable to students seeking help in identifying and understanding the characters.

This comprehensive volume deserves a place in every research library. It is the definitive reference work for all those involved in Korean studies.

Includes the following useful features:

Historical overview of phonological developments

Detailed listings of parts of speech and their functions

Description of verb stems and endings

Explanation of sentence construction and translation difficulties