DOUGLAS LAKE OKANAGAN: PHONOLOGY AND MORPHOLOGY by IOIS CORNETIA PATTISON
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## ABSTRACT

This thesis describes aspects of the grammatical structure of Douglas Lake Okanagan, an Indian language spoken in British Columbia, Canada. It is in three parts: phonology, morphophonemics and morphology. The field research on which this study is based was conducted on the Quilchena Reserve near Merritt, B.C. during the summer of 1977.

There are thirty-seven consonants defined by three manners: stop, spirant and resonant; and six points of articulation: labial, apical, lateral, velar, post velar and glottal. A contrast of glottalized and unglottalized occurs in the stop and resonant series and a contrast of labialized and unlabialized in the velar and post velar positions. In general, each series shows a full set of oppositions except there is no plain lateral stop in the stop series, no labial spirant in the spirant series and no labialized post velars in the resonant series. The vowels are $\underline{i}$, $\underline{a}$ and $\underline{u}$.

Morphophonemic changes involve consonants, vowels, sỳllables and stress. They include processes of assimilation, dissimilation, fusion, loss, epenthesis, metathesis and stress shift.

The morphology deals with the structure of words. Words can be simple roots or roots extended by affixes to form stems. Stems may be classified as transitive or intransitive on the basis of accompanying affixes. Transitive suffixes mark stems which express the action of a subject on an object. Intransitive suffixes mark stems which express an activity or state of a subject with no reference to an object.

Affixes also express four aspects: unrealized, continuative, customary and inchoative. Other prefixes are directional, locational, nominal, possessive and agentive. Other suffixes are instrumental and lexical. Reduplicated stems express iteration, plurality, diminuitivity and intensity. Two roots can be linked to form a compound stem.

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## INTRODUCTION

The Salish linguisitic family has three large divisions: the Tsamosan, Central Salish and Interior Salish groups. The Interior Salish languages can be further classified according to a North-South division.

Okanagan is part of the Southern Interior language group which consists of Columbian, Okanagan, Kalispel and Coeur d'Alene. It is bordered on the north by Shuswap, a Northern Interior Salish language; on the east by Kutenai and on the south by Sahaptin. Its southeastern and southwestern neighbors are Salish speaking: Kalispel (southeast) and Thompson and Columbian (southwest).

Okanagan is spoken in south-central British Columbia to the Columbia River in north-central Washington. The dialect described here is spoken in the Douglas Lake area by members of the Quilchena and Douglas Lake Reserves. These reserves are among five in the Nicola Valley where most of the Indians speak Thompson and on these two reserves in particular, many speak both Okanagan and Thompson.

My principal informant has been Julia Paul. Previous to my contact with her, Julia had been recording material in her own language in order to teach a relative who speaks a southern dialect of Okanagan. Julia kindly allowed me the use of the tapes and this material provided the basis for elicitation.

## 1. Phonology

1.1 Okanagan distinguishes thirty-seven consonants, defined by three manners and six points of articulation.

## 






Stops

| Plain | p | t | c |  | k | kw | q | qw | $?$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Glottalized | ${ }^{\text {p }}$ | $t^{2}$ | c | $\star$ | $\mathrm{k}^{\text {k }}$ | fin | $\stackrel{3}{9}$ | $\mathrm{q}^{\text {q }}$ |  |
| Spirants |  |  |  | $\pm$ | x | x ${ }^{\text {N }}$ | X | ${ }^{\text {x }}$ | h | Resonants


| Plain | m | n | r | 1 | y | w |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Glottalized | $\stackrel{\text { m }}{ }$ | $\stackrel{\sim}{n}$ | $\stackrel{?}{r}$ | 17 | y | $\stackrel{?}{\text { w }}$ |

1.2 There is a fundamental division between voiceless obstruents and voiced resonants. Obstruents can be divided into stops and spirants. Both stops and resonants occur in a plain and glottalized series. The glottalization is usually articulated during the articulation of the consonant.
1.21 In general, the obstruents show a full set of oppositions. The only asymmetry in the stop series is the lack of a contrastive plain lateral stop. $\mathrm{C}, \underline{\dot{E}}$ and $\underset{\text { de }}{ }$ are affricates. The plain apical affricate has a palatalized allophone [č] with which it is in free variation. Final plain stops are generally released with aspiration.

Before vowels, these stops are only lightly aspirated and following a homorganic resonant, they are sometimes unreleased. Glottalized stops rarely occur word final.

Spirants occur in all positions except labial. The apical spirant is in free variation with its palatalized allophone [š].
1.22 Resonants include the nasals $\underline{m}, \underline{n}$; liquids $\underline{r}$, $\underline{1 ;}$; semivowels $\underline{w}, \underline{y}$; and the pharyngeal $\underline{G}$. They parallel the obstruents exactly back to the simple post velar position. There are no labialized equivalents to the simple post velar resonants. Glottalized resonants rarely occur initially. The liquid resonant $\underline{r}$ occurs only as the second consonant of a root, not initially or in an affix.

### 1.3 Consonant Positions

1.31 Labials

| p | plal | grow |
| :---: | :---: | :---: |
|  | tupl | spider |
|  | xlilp | floor |
| $\underline{\mathrm{p}}$ | prum | brown |
|  | sṗsaqs | nose |
| $\underline{\mathrm{m}}$ | magt | maybe |
|  | qumáp | Tate |
|  | tilm | drying fish |
| $\underline{\text { m }}$ | milt | visit |
|  | ktans | eyerashes |
|  | $q^{w i y l}{ }^{\text {m }}$ | songs |

1.32 Apicals

| t | timı | eight |
| :---: | :---: | :---: |
|  | xwtip | wild rhubarb |
|  | zat | wet |
| $\underline{t}^{2}$ | tap | dirty |
|  | Eiterm | easy |
| $\underline{\mathrm{n}}$ | nak ${ }^{2} m$ | sew |
|  | xpumt | hurt |
|  | $q^{\text {win }}$ | green |
| $\underline{\text { ñ }}$ | cán̉can̉ | grasshopper |
|  | ${ }^{3} \mathrm{P}$ lan | eyebrows |
| C | citxw | house |
|  | sncaqmín | oven |
|  | sic | new |
| $\stackrel{\text { c }}{ }$ | Całt | cold |
|  | sċaqu | flowers |
| $\underline{r}$ | xwrap | chilled |
|  | yar | smooth |
| $\xrightarrow{\underline{r}}$ | çaŕt | tangy sour |
| s | swit | who |
|  | xast | good |
|  | pus | cat |

### 1.33 Laterals

| $\pm$ | Axap | grow |
| :---: | :---: | :---: |
|  | $x$ fut | rock |
| 王 | łála? | raspberries |
|  | kwułn | borrow |
|  | płaz | thick |
| $\underline{1}$ | liplíp | corn |
|  | xwpal | in a hurry |
| $\underline{1}$ | spplína? | rabbit |
|  | $\mathrm{q}^{\mathbf{W}} \mathrm{wal}^{\text {P }}$ | sunny |

### 1.34 Velars

Velars show an opposition of simple and labialized.

| $\underline{\mathrm{k}}$ | ktmap | clouds |
| :---: | :---: | :---: |
|  | cilkst | five |
|  | x P mink | want |
| ${ }^{\text {k }}$ | kwaćqn | hat |
|  | mkwiwt | mountain peak |
|  | siwłkw | water |
| $\underline{k}$ | kiwlx | old |
|  | nikmn | knife |
|  | $t^{\prime} \mathrm{ik}^{2}$ | young |
| $\underline{N}^{\mathbf{N}}$ | k ${ }^{\text {w }}$ k ${ }^{\text {w }}$ | dog |
|  |  | Zake |


| $\underline{x}$ | xxPap | cool |
| :---: | :---: | :---: |
|  | skmxist | bear |
|  | snik̉ ${ }^{\text {a }}$ | son-in-Zaw |
| x ${ }^{\text {w }}$ | xwuy | go |
|  | tixwt | tongue |
|  | $\mathrm{k}^{\mathrm{w}}$ Sixw | geese |
| $\underline{\mathrm{Y}}$ | yult | thick tree |
|  | layán | fabric |
|  | çuy | dark |
| $\stackrel{?}{\underline{y}}$ | p̉i¢̧úsm | frown |
|  | waỷ | (positive response) |
| w | wi?cín | finished eating |
|  | ${ }^{\text {cha wak }}$ | burned |
|  | nskiw | brother's wife |
| $\underline{\text { wh }}$ | niw̉lm | wave |
|  | xwuwa ${ }^{\text {a }}$ | $d r y$ |

### 1.35 Post Velars

Post velars also show the opposition of simple and labialized. Post velar resonants are frequently contiguous with $\mathfrak{a}$. They are rare and occur exclusively in root morphemes. In some cases, little pharyngeal friction is discernable and the a vowel appears lengthened. The glottalized pharyngeal is very poorly documented in this data.

|  | $\underline{1}$ | qlaxw | night |
| :---: | :---: | :---: | :---: |
|  |  | naqs | one |
|  |  | pnimq | Iiver |
|  | $\underline{\underline{W}}$ | qway | blue |
|  |  | smqwaqu | age |
|  | $\underline{\text { q }}$ | q̇ilt | sick |
|  |  | ptởin̉ | mushroom |
|  | $\underline{\text { q }}{ }^{\text {w }}$ | q̛ar | warm |
|  |  | c ${ }^{\text {²w }}$ i ${ }^{\text {p }}$ | fir tree |
|  | $\underline{\underline{x}}$ | xact | hard |
|  |  | yáxa? | crow |
|  |  | Łsax | dress |
|  | x ${ }^{\text {w }}$ | $\mathrm{x}^{\mathbf{w}}$ sap | fast |
|  |  | Paxwnt | sweep |
|  |  | náxwnay ${ }^{\text {n }}$ | wife |
|  | $\underline{G}$ | Gan | magpie |
|  |  | cpsáqya? | no good |
|  |  | $q^{\text {wa }}$ a | drunk |
|  | $\underline{c}^{2}$ | macit | broken |
| 1.36 | Glottals |  |  |
|  | ? | Pitx | sleep |
|  |  | spiłn | meal time |
|  |  | Pahá? | a cold |
|  | $\underline{\mathrm{h}}$ | ha | (interrogative) |
|  |  | Pihí? | over there |

1.4 The consonants form complex clusters. Many affixes are themselves single consonants or consonant clusters so when combined with roots, complex clusters are inevitable. The most common types of clusters found in roots are:
a. initial clusters consisting of an obstruent followed by another obstruent or resonant

| qlaxw | night |
| :--- | :--- |
| xlap | morning |
| xpal | clean |
| cmay | maybe |

b. final clusters consisting of a resonant followed by an obstruent

| milt | visit |
| :--- | :--- |
| timł | eight |
| tarq | kick |
| npayp | always |

Such consonant clusters in roots produce the root shapes CCVC and CVCC. However, forms such as the following indicate that such root structures may be reductions of CVCVC roots by vowel loss.

| citxw | house |
| :--- | :--- |
| ccítaxw | bathroom |


| xast | good |
| :---: | :---: |
| xaxásat | very pretty |
| kast | bad |
| k kajasat | ugly |
| ${ }_{\text {c }}{ }^{\text {chaxw }}$ | smezz |
| q̇iyx*ún | I can smell something |

The most cormonly occuring root shape is CVC.
1.5 The vowels are $\underline{i}, \underline{a}$ and $\underline{u}$. Each vowel has a range of realizations.
1.51 i is usually [i]. Stressed, it may be realized phonetically in a range from [i] to $[\boldsymbol{\varepsilon}]$. Following a post velar it is closer to [e] or [e]. Unstressed, it tends to become lowered or lost altogether.
[ỉnčá] Pincá me
[IInčákən] Pincákn me
[ q̉áélt] qiilt sick
[čéqualx] cíqwalx tomarac
[?æ焦] Pasíl two
[Pæ Slášq̆t] Paslás̛̛t Tuesday
[nqwalqwéltən] nqwiqwíltn Tanguage
1.52 a is basically a low, central vowel with frequent variation to a more front allophone [æ] or lost when unstressed and to a more mid central allophone [ $\mathrm{\partial}$ ] when stressed in a short stem.

| $[$ xást] $\sim$ [xást] | xast | good |
| :--- | ---: | :--- |
| [spæ láw̉olx ] spaláw̉lx | hazy |  |
| $[$ sxalxált] | sx̣lxált | day |

1.53 u ranges from a mid to high back rounded vowel. The lower allophone [o] is often contiguous to a post velar but there are cases of free variation between [u] and [o].
[ x̣ənúmt] ~ [x̣ənómt] xnumt hurt

[ntox̣ox̣qén] ntux̣ựqín noon
1.54 Two types of schwa occur in Okanagan words. The stressed schwa varies freely with stressed a in short stems. Unstressed schwas are epenthetic and largely predictable; therefore, they are omitted in the phonemic transcription.
1.55 The vowels usually occur with pre-glottalization when they are in initial position.

| Piłn | eat |
| :--- | :--- |
| Pasíl | two |
| Puc | (interrogative) |

All of the vowels occur in an unstressed syllable preceding and following stress; although vowels are often lost in those environments. Frequently epenthetic schwa rules will apply when the vorvel is lost.

| stimtíma? | grandmother |
| :--- | :--- |
| límlime | thank you |
| lkapú | coat |
| náx̣naẹw | wife |
| nkwupíls | Zonely |
| r.tílus | flat surface |

All of the vowels occur in absolute final position; however, they commonly have a glottalized coda.

| Pincá | me |
| :--- | :--- |
| Pácqa? | go out |
| táłki | very |
| Pihíp | over there |
| kwu | me |
| Kusu? | pig |

1.6 Each word has a single primary stress. Other syllables, are weakly stressed.

## 2. Morphophonemics

Morphophonemic changes affect full words and particles. Full words consist of a root and optional affixes. Particles are not accompanied by affixes.

### 2.1 Consonant Changes

### 2.11 Consonant Assimilation

One consonant is assimilated by a like following consonant in a different morpheme.
łumn łum-mn spoon
snkłmutn sn-kł-mut-tn chair
Palá Pi siwłkw Palá? Pi siwłkw Here is the water
2.12 Consonant Loss

The suffix -t transitive is lost after $\underline{n}$ before $\underline{n}$ or $\underline{s}$. nlkipn nl-kip-n-t-n $\quad I$ open $i t$ An $\underline{n}$ followed by an $\underline{s}$ is usually lost. nlkips nl-kip-n-t-s He opens it The $\underline{n}$ of the prefixes in- first person singular possessive and an- second person singular possessive may be optionally lost before s .
Pisxílwi $\sim$ Pinsxílwi my husband
ask²wíst your nome
ansk'wúy your mother

The $\underline{\text { I }}$ of the prefix kz- possessive is lost before s- nominalizer .
kn kslaxt $k n$ kł-s-lax-t $\quad I$ have a friend
Root final ? is lost in the reduplicated element of a reduplicated stem.
kwakwápm chewing
q̉iq̉íl xn cold feet
Glottalized resonants in reduplicated stems lose glottalization in the reduplicated element.
$k^{k} w k^{k} w u ́ l m n$ tools
smamím women
stmtim clothes
2.13 Consonant Fusion

The prefix c- customary aspect combines with a following ? to form $\stackrel{?}{\mathrm{C}}$.
kwu ciln $\quad$ kwu c-Piłn We're eating
Transitive -t and a following s become $\underline{c}$.
plscut pul-s-t-sut suicide
wikncn $\quad$ wik-n-t-s-n $\quad$ I see you

### 2.2 Vowel Changes

2.21 Unstressed morphemes often lose their vowel. That vowel is usually replaced by an epenthetic schwa.

Gilt [ $\dot{q} \mathrm{elt}]$ sïck
qٌlspius [qٌəlspə?us] discouraged, depressed
citxw [xitxw] house
ctcitxw [Catcitxw houses
citxwtt [Citxwtat] our house
A schwa may also be inserted between morphemes. It is commonly inserted before a resonant or between two identical obstruents. Pitxx [Pitxax] Go to sleep!
kn sqiclx [kən sqecolx] I'm running pixm [pixam] hunting
2.22 Evidence of vowel dissimilation is seen in several reduplicated stems.
xíxutm young girz
lalústn eyegrasses
2.3 Metathesized Roots

Metathesis of root final -VC to -CV occurs with suffixes such as -p non-control and -m middle.
xal ${ }^{2} \quad$ Zight
xlap morning

| kwint | Take it! |
| :--- | :--- |
| kwnim take |  |

### 2.4 Stress Changes

It has not yet been possible to analyze fully the operation of stress in this dialect but the data indicates that roots may or may not be stressed according to the suffixes which accompany them. Prefixes are never stressed.

Some suffixes appear to be always stressed. These suffixes then will attract stress from the root.

Gac̉nt Look!'
Gaćncút look at oneself
Other suffixes are sometimes stressed and sometimes unstressed. When stressed, they draw the stress from the root.
mulmn fish net
sncaqmín oven
Other suffixes are never stressed; therefore, the root to which they are attached will retain the stress.
ksí́txaix He's going to sleep
ksmik'wta? It's going to snow
Unstressed roots and suffixes often lose their vowel and in that case, frequently epenthetic schwa rules will apply.

## 3. Morphology

The root is the essential element of the morphological system. Roots are usually extended by affixes to form stems but they may stand alone as full words. Such unextended roots are all predicative.
q'wac It's sunny
citxw It's a house
Most stems consist of a single root accompanied by affixes. Reduplicated stems consist of a reduplicated root with optional affixes. Two combined roots with optional affixes form a compound stem.

### 3.1 Voice

Stems generally fall into two categories, transitive and intransitive, when voice is considered; that is, when the position of the subject in relation to the activity or state is considered. Several subcategories may be described within each of the two major divisions.
3.11 Transitive

Roots which appear as transitive stems are marked by the transitive suffix -t. These forms make reference to a subject and an object. Transitive stems generally take this form -

Root | $-n$ | $-t$, Object Subject |
| :---: | :---: |
|  | $-s$ |

tarqntís He kicked him
kwu papasílxstx You make me worried
3. 111 Transitive stems in $-n$ may be called active stems. They involve an action of a subject upon an object. kwu capntís He hit me
3.112 Transitive stems in -s may be called causative stems. These stems involve an action or state resulting from the activity of another.
kwu c̉agstísw You make me ashomed
3.113 The reflexive suffix -sut marks a stem when the action of the subject is directed toward itself. This suffix always follows -t transitive.
tarqncút tarq-n-t-sut kick oneself
3.12 Intransitive

Stems which express an activity or state of a subject but take no object may remain unmarked or take one of several intransitive suffixes.
3.121. The suffix $-m$ indicates that the subject is engaged in an activity. It may be called the middle suffix.
kn Paxwm I am sweeping
Ikalátm She is making bread
snc̉ixm He is frying something
3.122 Intransitive roots may add the stative suffix -t to indicate an integral or natural characteristic of that root.

| dik' $^{2}$ | burn |
| :--- | :--- |
| dikt | burned |
| mac' | break |
| ma9't | broken |

Many intransitive stems occur only in their stative form.

| faxt | fast |
| :--- | :--- |
| xact | hard |
| Zalt | cold |
| limt | happy |
| q̊mact | fat |
| slaxt | friend |

3.123 The suffix -lx indicates that the subject is engaged in an activity involving motion.

| qiclx | mun |
| :--- | :--- |
| lkwilx | move away |
| caccalx | bathing |
| tkiwlx | climbing |

3.124 The suffix -ils expresses a state of mind.
nk ${ }^{\text {ºupupíls }}$ Zonely
nqwạíls crazy
3.125 Intransitive roots may suffix -p to express a lack of control on the part of the subject.

| fixap | grow |
| :---: | :---: |
| fixup | win |
| çsap | finished |
| kmap | darkening |

3.13 A root may appear as more than one type of stem.

| kwakwápm | chewing. (intransitive) |
| :--- | :--- |
| kwakwapntís | He is chewing on it (transitive) |
| kn Pax̣m | I am sweeping (intransitive) |
| Paxwntís | She is sweeping it (transitive) |
| čuc̉áwt | clean (intransitive) |
| čawsm | wash face (intransitive) |
| cawnt | Wash it! (transitive) |

### 3.2 Imperatives

Transitive and intransitive stems may be further distinguished by their imperative form.

Transitive stems without personal reference markings indicate the imperative.

| nlkipnt | Open it! |
| :--- | :--- |
| Paxwnt | Sweep it! |
| kwu cunt | Tell me! |

Intransitive stems express the imperative by suffixing -x.

| Pitx | sleep |
| :--- | :--- |
| Pitxx | Go to sleep! |
| caccálx | bathing |
| calcálxx | Take a bath! |
| xwuy | go |
| xwuyx | Go! |

Transitive and intransitive negative imperative forms regularly prefix the second person pronoun affix followed by the unrealized aspect marker and nominalizer.

| lut akşancút | Don't laugh! |
| :--- | :--- |
| lut akskwním | Don't take it! |
| lut aksxwíyapx | Don't go! |

3.3 Personal Reference System

Transitive and intransitive stems take distinctive personal reference markers. These markers distinguish first, second and third person and singular and plural number.
3.31 Intransitive Pronouns

The intransitive pronouns are dependent elements which may be described in two sets. The subject pronouns include three proclitic particles and one suffix. The possessive pronouns include two prefixes and four suffixes.

Subject Pronouns

| kn | first person singular |
| :--- | :--- |
| kw | second person singuzar |
| kwu | first person plural |
| -lx | third person plural |
| kwu xwuy | I go |
| ha kw Pahá? | Do you have a cold? |
| ha Páha?lx | Do they have a cold? |

The third person plural suffix -lx serves in both the transitive and intransitive paradigms. In intransitive stems it refers to the subject. In transitive stems, this suffix indicates the plural form of the third person subject and object.

Possessive Pronouns

| Pin- | first person singular |
| :--- | :--- |
| an- | second person singular |
| -s | third person singular |
| -tt | first person plural |
| $-m p$ | second person plural |
| -slx | third person plural |

In an unusual derivation with the reflexive suffix -sut, these possessive words are formed with the possessive pronoun affixes:

| isútn | It's mine |
| :--- | :--- |
| ansútn | It's yours |
| sutns | It's his/hers |
| sutntt | It's ours |
| sutnmp | It's yours (plural) |
| sutnslx | It's theirs |

3.32 Transitive Pronouns

The following transitive pronouns indicate the subject in an active transitive stem when the object is third person singular. Third person singular object is unmarked.

| Stressed | Unstressed |  |
| :--- | :--- | :--- |
| -in | -n | first person singular |
| -ixw | -xw | second person singular |
| -is | -s | third person singular |
| -im | -m | first person plural |
| -islx | -slx | third person plural |
|  |  |  |
| wtntin | I put it there |  |
| nlkipn | I open it |  |


| wtntixw | You put it there |
| :--- | :--- |
| ma'ntxw | You broke it |
| Paxwntís | She is sweeping it |
| nlkips | He opens it |
| xpntim | We are eating it up |
| kwtłqintm | We uncover it |
| nlkipslx | They open it |
| kwakwaintíslx | They are chewing on it |

When the object is other than third person singular, these affixes and a proclitic particle are used.

| kwu | first person |
| :--- | :--- |
| kwu cunt | Tell me/us! |
| -s | second person |
| cuncn | cu-n-t-s-n |
| I tell you |  |
| $-l x$ |  |
| cuntlx | third person plural |
|  | Tell them! |

3.4 The Aspectual System
3.41 Unrealized

Stems may be marked by the prefix $k$ - which expresses an intentional future action or state. It is usually translated as

I am going to ... or I am getting ... . It always accompanies and precedes s- nominalizer and often occurs with the continuative suffix -apx.

| kn ksqúlıtapx | I'm getting sick |
| :---: | :---: |
| ksqưítapx | It's going to rain |
| kn ksácqa? | I want to go to the bathroom |

### 3.42 Continuative

Continuative aspect is marked by the suffix -aix when an action or state is considered in progress.

| kn scpútaix | $I$ am celebrating |
| :--- | :--- |
| snćíxapx | He is frying something |
| kn kscącálxa?x | I am going to take a bath |

### 3.43 Customary

Customary aspect is marked on a stem by the prefix c- to indicate a usual or expected action or state.

| asckiwul? | How is your job? |
| :--- | :--- |
| n?ayp cmqwaqw | It's always snowing |
| asc̊ítx | How was your sleep? |

3.44 Inchoative

The infix - $\boldsymbol{7}$ - before the root vowel denotes a development to a state.

| q'wuct | fat |
| :---: | :---: |
| ${ }_{\text {qup }}{ }^{\text {w u uc }}$ | He got fat |
| q̛alt | sick |
| q'ilt | He got sick |

A developmental suffix - wil ${ }^{2} x$ expresses the notion of becoming.
x̣ast good
xastwilıx getting better
çałt cold
c̉ałtwílx get cold
3.5 Further Stem Modification by Affixes

Word formation involves other systems of grammatical affixes and a special group of lexical affixes. They are presented here according to affixal type.
3.51 Prefixes
3.5ll Directional prefixes include $\ddagger$ - movement back, c- movement toward speaker and kł- down, under. Two directional prefixes may co-occur.

| xwuy | go |
| :--- | :--- |
| łxwuy | return |
| cxwuy | come |
| łcxway | come back |
| mutx | Sit! |
| kłmutx | Sit down! |
| kłł? |  |
|  | kł-kísa? |

3.512 The prefix s- forms nominal stems.

| mqwaqw | It's snowing |
| :--- | :--- |
| smqwaqw | age (how many snowfatls) |
| Piłn | eat |
| SPiłn | mealtime |
| pul' | smoking |
| spur' | smoke |

Many roots occur consistently with s- nominalizer.

| słaqw | meat |
| :--- | :--- |
| sqPim | milk |
| skłł | bees |
| slaqw | hawk |
| sčwin | salmon |
| snína? | owl |

3.513 The locative prefix $n$ - indicates that a location is specified.

| qiilt | sick |
| :--- | :--- |
| nq̉ilqn | His head aches |
| c̉ix | fry |
| nćixmn | kettle |

When $s$ - nominalizer and $n$ - locative are both prefixed to a stem, a nominative instrumental function is expressed. An instrumental suffix usually co-occurs with this prefix combination.

| sncaGcálxtn | bathtub |
| :--- | :--- |
| snkłmutn | chair |
| sncaqmín | oven |
| snkiwlxtn | Zadder, stairs |

3.514 The possessive is marked by the prefix kz-.

3.515 The prefix sx- expresses an agent. It always co-occurs with the suffix -m middle.

| sxkỉwul'm | worker |
| :--- | :--- |
| sxmamáym | teacher |
| sxtrqam | dancer |

### 3.52 Suffixes

3.521 The suffixes $-\min$ and $-\operatorname{tn}$ form nominative instrumental stems. These suffixes may co-occur.

| mulmn | fish net |
| :--- | :--- |
| nim̉nn | fan |
| kłalmín | fence |
| karmín | scissors |
| klłtmintn | fishing rod |
| tkikstn | cane |
| nx̣alsáxwtn | window |

3.522 A special group of suffixes add lexical information to the root.

| -a? | animate |
| :--- | :--- |
| sáma? | white man |
| skkára? | birds |
| kiláwnar | male grizzly bear |


| -qin | head |
| :---: | :---: |
| kwaçqn | hat |
| qapqíntn | hair |
| wl'qintn | cover, Iid |
| -cin | mouth |
| splimen | mouth |
| wicín | finished eating |
| malmaccín | You talk too much |
| -ikst | manual |
| ${ }^{\text {chawkstm }}$ | wash hands |
| stumkst | thumb |
| łpikst | grove |
| -xan | feet |
| sulxn | frozen feet |
| snsísuxn | socks |
| qٌaxán | shoe |
| -us | eyes |
| sqwtus | face |
| ṗi y̌usm | frown |
| lalústn | eyeglasses |


| -ank | stomach |
| :---: | :---: |
| n̛̉ilnk | stomach ache |
| nđ̧̛̛Gánk | terribly frightened |
| -ikn | back |
| snkmikn | back |
| -uł | individual |
| titimúł | lazy person |
| nqwnqwmuł | thief |
| çaçaxłz | shy person |
| -mixw | man |
| sqltmixw | man |
| ilmíxwm | chief |
| -úaw̉x | space, an area |
| tmxulawx | world |
| xxpúlaw̉x | a cool prace |
| cílaw̉x | shade |
| -ilp | base, bottom |
| swiplp | sheets |
| stkivilp | mattress |
| sxalílp | floor |


| -asq̊t | day |
| :--- | :--- |
| smasq̉t | Thursday |
| tqmkstasq̉t | Saturday |
| sc̉akásq̛̉t | calendar |

### 3.6 Survey of Affixes

There is insufficient contrastive material to assure an accurate description of the relative order of affixes but the available data suggests the following order from the closest to the root to the farthest from the root.

## Prefixes

1. C - directional
2. $\mathbf{~ - ~ d i r e c t i o n a l ~}$
3. $\mathrm{kz-}$ directional
4. $\mathrm{sx}-\quad$ agentive
5. kł- possessive
6. c- customary aspect
7. n - Iocative
8. s- nominalizer
9. k- unrealized aspect
10. possessive pronouns

Infix

$$
-P-\quad \text { inchoative }
$$

## Suffixes

1. lexical
2. -p non-control
3. -m midale
4. -t stative
5. -lx motion
6. -n active
-s causative
7. -t transitive
8. transitive pronouns
9. -sut reflexive
10. -x imperative
11. -willx developmental
12. -ils state of mind
13. -min instrumental
14. -tn instrumental
15. -aix continuative aspect
16. possessive pronouns

Examples of stem types where both prefixes and suffixes occur or where more than one prefix or suffix occurs will be illustrated here.

1. asčáqw your flowers
a-s-c̉aqw possessive pronoun-nominalizer-root
2. snởaymín writing equipment
s-n-q̉ay-min nominalizer-locative-root-instrumental
3. Pinq̉a?xán my shoes

Pin-q̉al-xan possessive pronoun-root-lexical
4. ckwulm always working
c-k'mul'm customary aspect-root-middle
5. snc̉ixm He is frying something
$\mathrm{s}-\mathrm{n}-\stackrel{\mathrm{c}}{\mathrm{c}} \mathrm{x}-\mathrm{m}$ nominalizer-locative-root-midale
6. anqapqíntn your hair
an-qap-qin-tn possessive pronoun-root-lexical-instrumental
7. askíst your nome
a-s-kwis-t possessive pronoun-nominalizer-root-stative
8. scilkstásq̉t Friday
s-cil-kst-asq̆t nominalizer-root-lexical-Iexical
9. nsámapocn speak EngZish
n-sam-a?-cn Zocative-root-lexical-lexical
10. ksłxwuya?x He's going to return home
k-s-ł-xwuy-aPx unrealized aspect-nominalizer-directional-rootcontinuative aspect

### 3.7 Reduplicated Stems

Complete and partial reduplication processes occur to form complex stems.
3.71 Complete Reduplication

Complete reduplication can function to express qualities, intensity, iteration and plural. In some cases the function of the reduplication is not apparent.

```
a. \(C_{1} \bar{V}_{1} C_{2}-C_{1} V_{1} C_{2}\)
    caxt hot
    cáxcax̣t very hot
    limt happy
    límlimt thank you
b. \(C_{1} V_{1} C_{2}-C_{1} V_{1} C_{2}\)
    citxw house
        ctcítxw houses
        k'wul work
        k \({ }^{2} w^{2} k^{2} w u l^{\prime} m n \quad\) tools
        sáma? white man
        smsámar white people
```

A number of stems belong formally to this reduplication type but contrasting non-reduplicated forms are lacking.

```
    qwnqwant poor
    maЯmáqt tiresome
    liplíp corm
     ẹwátx̣wat ducks
    náx̣wnaxww wife
    klkilx arms
    c. }\mp@subsup{C}{1}{}\mp@subsup{V}{1}{\prime}-\mp@subsup{C}{1}{}\mp@subsup{V}{1}{
    sq̉it rain
    qáq̉at a rainshower
    d. }\mp@subsup{C}{1}{}\mp@subsup{\textrm{V}}{1}{}-\mp@subsup{C}{1}{}\mp@subsup{\textrm{V}}{1}{
    scuxán foot
    scucúxn feet
```

3.72 Partial Reduplication
a. Diminutive forms occur with the reduplication of $\mathrm{C}_{1}$ of the root.

| kkẏıma? | little |
| :---: | :---: |
| $k^{\prime} \mathrm{N}^{\prime} \mathrm{w}_{\text {ap }}$ | dog |
| sk'wkiwímalt | $b a b y$ |
| ttw̉it | boy |
| sccmíla? | children |
| ccítaxw | bathroom |

b. Plural can be indicated by the reduplication of $\mathrm{C}_{1}$ of the root.

| xmał | $f l y$ |
| :--- | :--- |
| xxmał | flies |

### 3.73 Multiple Reduplication

A stem may be modified by more than one reduplicative process.

| fexap | grow |
| :---: | :---: |
| Jax ${ }^{\text {xa }}$ áp | old person |
| faxaxtlıáp | old people |
| skkáka? | birds |

3.8 Compound Stems

Compound stems consist of two roots and optional affixes.
q̉lsp̉?us discouraged, depressed
g̉il - sp’?us sick - heart
sncáxtlkalat fried bread
s-n- caxt - Ikalát hot - bread
lptmtithw rippling of the water
lpimt - tikwt ripples - lake

Some suppletive stems for plural imperative form compounds with the root xwuy go.

| púl’̉way | Go to bed! | (plural) |
| :--- | :--- | :---: |
| twístxwuy | Get up! | (plural) |
| fwílxwuy | Sit down! | (plural). |

The following numeral compounds combine ?upnkst ten with the digits one to nine.

1. naqs
2. taqmkst
3. Pasíl
4. $\operatorname{sisplk}$
5. kałís
6. timz
7. mus
8. yxnut
9. cilkst

The numbers eleven to nineteen consist of Pupnkst ten as the first element followed by the digits with the connecting morpheme $\ddagger$.
11. Pupnkst $\ddagger$ náqs
12. Pupnkst Z Pasíl
13. Pupnkst $\nexists$ kałís
14. Pupnkst $\ddagger$ mús
15. Pupnkst $\ddagger$ cílkst
16. Pupnkst $\ddagger$ tááqmkst
17. Pupnkst $\ddagger$ sísplk
18. Pupnkst $\ddagger$ tímł
19. Tupnkst $¥$ xxnnút

In multiples of ten, ?upnkst ten is preceded by the digits.
20. Pasil Púpnkst
30. kał Púpnkst
40. mus $\ddagger$ Púpnkst
50. cilk $\not$ P úpnkst
60. ťqm $\ddagger$ ? úpnkst
70. sisplk $\ddagger$ ?úpnkst
80. timł ? úpnkst
90. Xẹnut $¥$ ?ưpnkst

One hundred is xccikst.

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