INFORMATION TO USERS

This reproduction was made from a copy of a document sent to us for microfilming. While the most advanced technology has been used to photograph and reproduce this document, the quality of the reproduction is heavily dependent upon the quality of the material submitted.

The following explanation of techniques is provided to help clarify markings or notations which may appear on this reproduction.

1. The sign or "target" for pages apparently lacking from the document photographed is "Missing Page(s)". If it was possible to obtain the missing page(s) or section, they are spliced into the film along with adjacent pages. This may have necessitated cutting through an image and duplicating adjacent pages to assure complete continuity.

2. When an image on the film is obliterated with a round black mark, it is an indication of either blurred copy because of movement during exposure, duplicate copy, or copyrighted materials that should not have been filmed. For blurred pages, a good image of the page can be found in the adjacent frame. If copyrighted materials were deleted, a target note will appear listing the pages in the adjacent frame.

3. When a map, drawing or chart, etc., is part of the material being photographed, a definite method of "sectioning" the material has been followed. It is customary to begin filming at the upper left hand corner of a large sheet and to continue from left to right in equal sections with small overlaps. If necessary, sectioning is continued again—beginning below the first row and continuing on until complete.

4. For illustrations that cannot be satisfactorily reproduced by xerographic means, photographic prints can be purchased at additional cost and inserted into your xerographic copy. These prints are available upon request from the Dissertations Customer Services Department.

5. Some pages in any document may have indistinct print. In all cases the best available copy has been filmed.

University
Microfilms
International

300 N. Zeeb Road
Ann Arbor, MI 48106

Boynton, Sylvia S.

MIKASUKI GRAMMAR IN OUTLINE

The University of Florida PH.D. 1982

MIKASUKI GRAMMAR IN OUTLINE

BY

SYLVIA S. BOYNTON

A DISSERTATION PRESENTED TO THE GRADUATE COUNCIL
OF THE UNIVERSITY OF FLORIDA IN
PARTIAL FULFILLMENT OF THE REQUIREMENTS
FOR THE DEGREE OF DOCTOR OF PHILOSOPHY

UNIVERSITY OF FLORIDA

1982

To My Parents

ACKNOWLEDGEMENTS

During the course of my graduate study many people and institutions have contributed to my study of Mikasuki. They have my profound gratitude.

Teresa Osceola and Joe Frank worked hard to teach me about Mikasuki.

Many other Seminole and Miccosukee people contributed significantly to my understanding of the language.

The Department of Anthropology and the Center for Latin American Studies of the University of Florida and a grant from the Phillips Fund supported my education and research.

Maria T. Derrick-Mescua and David West shared their data and work on Mikasuki with me.

M. J. Hardman-de-Bautista taught me to be a linguist.

TABLE OF CONTENTS

SYMBOLS AND CONVENTIONS

Diacritics

/:/ vowel length

/Ṽ/ nasalization

{'} stress

{N} syllablic nasal

{ʔ} glottal stop

{ } phonetic transcription

/ / phonemic transcription

( )
( ) morpheme

{.} divides morphemes in examples and texts

{-} before or after morpheme boundary indicate that it is bound

Pitch

/́/ high pitch

/̄/ mid pitch

/̀/ low pitch

Other

C any consonant

V any vowel

K any obstruent

L any sonorant

, , infix boundary

↓ ↑ same subject

↓...↑ different subject

[ ] phoneme occurs only to prevent impossibe consonant cluster

( ) phoneme drops if its occurrence would result in impossible consonant cluster

Abstract of Dissertation Presented to the Graduate Council of the University of Florida in Partial Fulfillment of the Requirements for the Degree of Doctor of Philosophy

MIKASUKI GRAMMAR IN OUTLINE

By

Sylvia S. Boynton

August 1982

Chair: M. J. Hardman-de-Bautista
Major Department: Anthropology

Mikasuki is a Muskogean language spoken by approximately 2000 Indians in Florida. This grammar is a description of the phonology, morphological processes, and syntax of Mikasuki. It is based on data collected during a total of about two years between 1973-1977. Research was done with a Mikasuki-English bilingual student at the University of Florida, with Mikasuki speakers living in Naples, and during a period of residence at the Big Cypress Seminole Indian Reservation.

The phonology chapter contains a phonemic inventory and description of Mikasuki consonants, vowels, and suprasegmental phenomena. The suprasegmentals include nasalization, pitch, and stress.

The morphological structure of Mikasuki is treated in the morphology chapter. The nominal system is composed of noun root classes and affixes, which include prefixes, an infix, and suffixes. Mikasuki verb roots are derived into verb stems which then undergo processes of inflection and derivation to produce the Mikasuki verb phrase. Inflectional and derivational processes in Mikasuki include

affixation and ablaut. Affixation refers to prefixes, infixes, and suffixes; and ablaut includes nasalization, significant pitch, reduplication, and suppletion. The discussion of the morphology concludes with a description of the particles or independent roots.

The final chapter provides an introduction to Mikasuki syntax, which is characterized by a system of switch reference. The typical sentence in Mikasuki consists of a string of clauses with the verb of each clause marked morphologically to indicate that it has the same subject as or a different subject from the next verb. It is possible, however, to subordinate verbs without this switch reference system and the alternative methods are described. The chapter concludes with a folk tale in Mikasuki which illustrates the syntactic systems that have been described.

CHAPTER I

INTRODUCTION

1.0 Mikasuki and the Florida Seminole

The purpose of this study is to describe the morphology of Mikasuki, one of two languages spoken by American Indians in Florida today. Mikasuki is spoken by all of the 300 members of the Miccosukee Tribe and by three quarters of the more than 2000 members of the Seminole Tribe. The second language, a dialect variation of Creek known as Seminole, is spoken by most other members of the Seminole Tribe, with a few members speaking English only.

Mikasuki is a member of the Muskogean family of languages. In 1941, Mary R. Haas published a study in which she classified the Muskogean languages into two groups, Eastern and Western (1941a:41-56). She further grouped the languages into dialect pairs with Choctaw-Chickasaw the Western dialect pair and Hitchiti-Mikasuki, Alabama-Koasati and Creek-Seminole the Eastern pairs. Haas' classification system deduced from a systematic study of sound correspondences that Choctaw-Chickasaw broke away early and developed somewhat independently of the other languages (see Figure 1).

The speakers of these languages today are spread all over the southeastern United States. In addition to Seminole and Mikasuki in Florida, Creek is spoken in Oklahoma by both Creek and Seminole Indians, Alabama is spoken in Texas, Koasati in Texas and Louisiana, Chickasaw in Oklahoma, and Choctaw is spoken in Oklahoma, Louisiana and

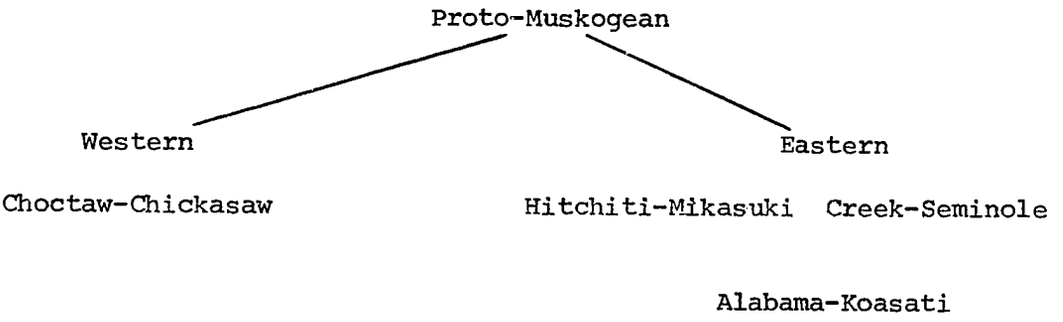


Figure 1

The Muskogean Languages (after Booker 1980)

Mississippi (Crawford 1975:25-44). Hitchiti is considered to be extinct.

The Florida Seminole and Miccosukee Tribes are post-European phenomena. The Seminoles were originally members of the Creek Confederacy that replaced the 100-200,000 aboriginal inhabitants of Florida. The Creeks began to migrate into Florida on a large scale between 100 and 200 years after initial contact with the Spanish, to fill the population void left after the elimination of the original population primarily by diseases introduced by Europeans and secondarily by British and Creek slave raids. Historical documents show that by about 1711 the aboriginal population of Spanish Florida had essentially disappeared (Fairbanks 1973:4).

Impetus for this Creek migration into Florida originated with the unsuccessful attempt by Indians of the Creek Confederacy to drive the British out of Georgia and the Carolinas in the Yamasee War of 1715. Defeat of the Indians by the British considerably weakened the Creek Confederacy. This deteriorating position, coupled with the population vacuum in Spanish Florida, encouraged Indian migration to the South. By the end of the 18th century, Indians from the Creek Confederacy were well established in Florida. A substantial number of these people, perhaps a majority, spoke Hitchiti.

During the period 1763-1783, Florida passed from Spanish to English control and the British method of dealing with Indians replaced the Spanish one. In contrast to the Spanish, the British established an overall Indian policy and signed formal treaties with the Indians. Evidence for the growing autonomy of the Florida Indians from the Northern Creeks is indicated by the fact that the Florida Indians acted independently in the signing of the Treaty of Picolata in 1765. The

term "Seminole," which distinguished Creeks in Florida from those to the north, came into general use at about this time.

According to Fairbanks (1973:6), the Spaniards originally referred to the Indian migrants in Florida as "cimarrones" (wild ones) because they lived in unoccupied and wild territory. Muskogean languages have no /r/ so the term was borrowed into Muskogean as (roughly) "semilones" which underwent metathesis and became "seminoles."

Indian wars of the 19th century resulted in major changes among the Florida Indians. After the "Red Stick" wars of 1813, for example, Creek speaking refugees from the north entered Florida in large numbers. Fairbanks (pers comm) estimated the Creek population of Florida to have been about 6000 after this influx of refugees, evenly divided between Creek and Mikasuki speakers. In 1817 Andrew Jackson entered Spanish Florida to fight what is called the First Seminole War. While the pretext for this conflict was Indian raids on American supply boats, in reality the war allowed the American government to demonstrate the ineffectiveness of the Spanish government of Florida. In fact, Spain ultimately ceded Florida to the United States and in 1823 by the Treaty of Moultrie Creek, the Florida Indians gave up all claims to Florida land except for a reservation in the center of the state. Local white settlers opposed the treaty, however, because they were anxious to be rid of the Indian population entirely.

From 1835-1842 the United States government fought the Florida Indians in a guerrilla war known as the Second Seminole War. Perhaps the two major effects of the war were territorial dislocation and massive population loss. During the war, over 4000 Seminoles were sent to Oklahoma and an unknown number died. In the aftermath of the war there

were between 300 and 500 Seminoles left in Florida who sought refuge in the Everglades.

Between 1855-58 there was a minor uprising between Seminoles and white surveyors resulting in more Indians being sent to Oklahoma. By 1960 there were fewer than 200 Seminoles left in Florida from whom the Florida Seminole of today are all descended (Sturtevant 1971:124).

At the end of this conflict, with the population reduced and forced to move into the swamps, Seminole culture changed drastically. The subsistence base was broadened to include the plants, animals and fish of the Everglades. The Seminoles entered a period of relative isolation during which the primary residential pattern became one of extended family camps which formed the nucleus of the local band. The traditional Creek pattern of matrilineal orientation seems to have been strengthened during the period. Although the matrilineal clans and phratries persisted, they were much reduced in number. Medicine bundles, a non-Creek feature developed since the Second Seminole War, became the focus of the Seminole ceremonial organization, and the primary ceremony was the Busk or Green Corn Dance, held in June or July to celebrate the ripening of the corn and to welcome a new annual agricultural cycle.

The beginning of white settlement in South Florida ended this period of relative Indian isolation. White traders began to supply Indians with goods and Seminoles began to adopt a money economy, at least in their relationships with whites. The Federal government began to purchase land for reservations.

Additional cultural change occurred during the 1930's with the introduction of Christianity and conversion of many of the

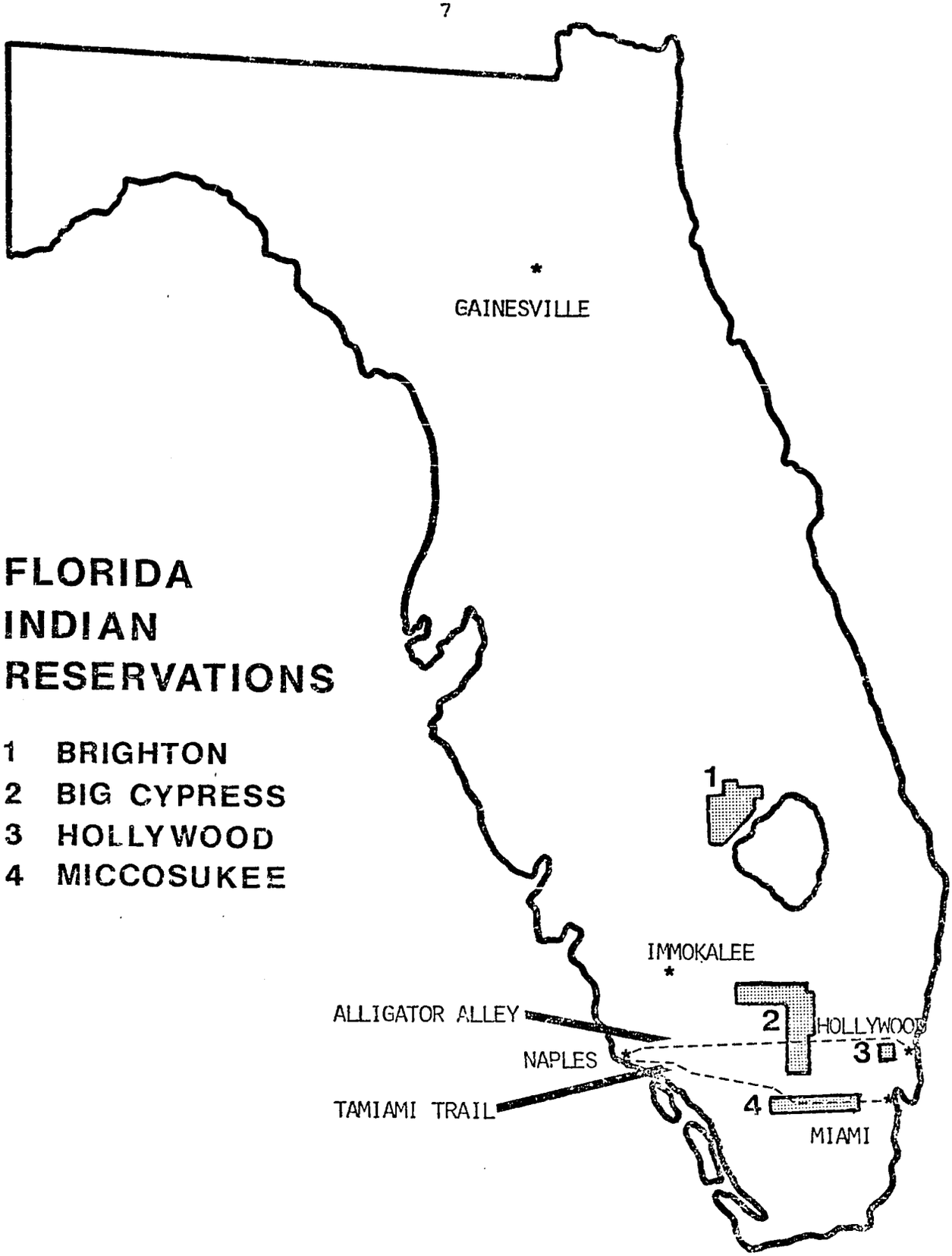
Seminoles. Along with the introduction of Christianity, the opening up of South Florida to land development and tourism resulted in dislocation of the Indian population. Conversion meant abandonment of the Busk organization by Christian Indians, which made living with the more traditional Indians difficult. Thus the Indian population became differentiated into two groups: Christian Indians moved onto the reservations and traditional Indians established their camps along the Tamiami Trail to take advantage of the tourist trade. Eventually, this led to the establishment of separate tribes of Indians. The Seminole Tribe, primarily on reservations, was established in 1958 and the Miccosukee Tribe, primarily along the Trail, in 1965 (see Figure 2).

Despite the polarization of the two Indian groups because of conflict over Christianity, elements of traditional culture, such as the Green Corn Dance, still persist and serve to preserve a unified Indian identity in South Florida.

For more information about the history and development of the Florida Seminole Indians, see Fairbanks 1957, 1973 and 1978; Mahon 1967, and Sturtevant 1971.

1.1 Description of Study

Initial data for this study of Mikasuki began at the University of Florida in 1972 when a Mikasuki speaker, a freshman at the university, agreed to spend several hours a week as an informant for a class of advanced anthropological linguistic students. Additional data were gathered during a yearlong period of residence as director of the Seminole Bilingual Education Project at the Big Cypress Reservation, infrequently visited and isolated about midway between Naples and Hollywood, off the "Alligator Alley." Subsequent to this period of



1 IN. = 47.5 MI.

Figure 2

Map of Florida Indian Reservations

residence, data were collected from people on periodic trips back throughout 1977 as well as from several Mikasuki speakers living in Naples.

Two people were the principal teachers of the language and sources of data for this analysis. Their invaluable assistance is gratefully acknowledged.

J. F. Male, 21, bilingual in Mikasuki and English

T. O. Female, 28, bilungual in Mikasuki and English

Many other Mikasuki speakers, both monolingual and bilingual, also contributed data and gratitude is hereby expressed to them all.

1.2 Scope of Study

This work is a descriptive grammar of Mikasuki because no complete grammar of the language has previously been published. The organization of material here is standard for a descriptive grammar.

Chapter I contains a short history of the development of the Seminole people, an outline of the contents of the present study and a review of the most recent linguistic literature about Mikasuki.

Chapter II is an overview of Mikasuki phonology, a synopsis of a previous phonological analysis (Derrick-Mescua 1980), which provides the basic information necessary for the morphological analysis which follows. The segmental phonemes, consonants and vowels, together with the suprasegmental phonemes; especially nasalization, contrastive pitch and stress; make up the phonological structure of Mikasuki.

Chapter III treats the morphological structure of Mikasuki and is a complement to the phonological analysis upon which Chapter II is based. Roots and morphological processes interact to produce noun phrases and verb phrases. Most roots are clearly distinguishable as nominal or

verbal although a few are ambiguous. Similarly, most of the morphological processes are analyzable as nominal or verbal, although some affixes appear in both the noun phrase and in the verb phrase. Nouns and noun affixes are shown to compose the noun system. The processes of verb modification and their relationships to the verb root are also dealt with in this chapter. Finally, the particles, or independent roots, are analyzed.

Chapter IV reviews the syntactic suffixes of Mikasuki and the role of these suffixes in the conjoining and subordinating of verbs. The typical Mikasuki sentence contains a string of verbs morphologically joined together. The effect of interrogation on Mikasuki syntax is explained in this chapter. Finally, three Mikasuki texts are broken down into morpheme segments with both a literal interlinear translation and a free translation.

1.3 Review of Recent Literature

A thorough review of all linguistic literature relevant to the study of Mikasuki is presented by Derrick-Mescua (1980:50-118). Her study, as well as one other (Booker 1980), constitute the most important recent work on Mikasuki and are reviewed here as they are relevant to the study of Mikasuki morphology.

A Phonology and Morphology of Mikasuki (M. T. Derrick-Mescua 1980) deals primarily with a phonological analysis of Mikasuki. However, the first chapter includes a complete review of all literature dealing with Mikasuki published between 1774-1978. Chapter 2 presents a phonemic inventory of consonants and vowels, their distribution within the syllable and their positions of contrast and neutralization. Of particular significance to the analysis of Mikasuki morphology is

Derrick-Mescua's division of the consonants into sonorants and obstruents. She notes that sonorants occur within the vocalic core of the syllable and obstruents occur on the outer limit, and further, that three-consonant clusters must begin with a sonorant other than a nasal. These observations about consonant distribution are essential to the analysis of morphophonemic vowel dropping in verbal suffixes. Chapters 3, 4, and 5 describe suprasegmental phenomena. The three contrastive pitches which occur on both nouns and verbs, the phonetic and phonemic aspects of vowel length and nasalization, contrastive stress and its relationship to the syllable and the acoustic phonetic details of stress are all treated in these chapters. Of particular relevance to the study of Mikasuki morphology is Derrick-Mescua's analysis of contrastive stress and nasalization. The tense and aspect marking systems of Mikasuki verbs are characterized by their use of suprasegmentals. A brief morphological sketch in Chapter 6 explains the grammar of the examples used in the preceding chapters.

Comparative Muskogean: Aspects of Proto-Muskogean Verb Morphology (K. M. Booker 1980) provides an outline of the Proto-Muskogean verb phrase. According to the author, a secondary purpose is to present an overall view of the modern Muskogean languages of general interest to students of American Indian languages.

The first chapter is an introduction to the Muskogean languages: their origins, genetic affiliations, and geographic distribution.

In Chapter 2 the author presents a reconstruction of two sets of person affixes: actor (agent) and patient.

Number marking in Muskogean is the topic of Chapter 3. The author demonstrates that, although contemporary Muskogean languages contain a

large class of verbs which have suppletive roots for number, number suppletion was not characteristic of the proto-language. Of special significance to the analysis of number marking in Mikasuki is her contention that the term suppletion in Muskogean has been used to refer to two different types of stem formation.

In Chapter 4, the morphology of aspect of the Muskogean languages is compared and four aspect markers are reconstructed for Proto-Muskogean. She points out that all Muskogean languages, including Mikasuki, use internal change or change within the root to convey aspectual meanings.

Tense is marked morphologically in all Muskogean languages today. However, Booker contends, in Chapter 5, that these markers are reconstructable as nontemporal morphemes.

Chapter 6 presents the proto-Muskogean sentence as a string of verbs morphologically joined by a switch-reference system. The discussion of switch-reference marking is helpful in the analysis of this phenomenon in Mikasuki. The suffixes that coordinate and conjoin the verbs are reconstructed for Proto-Muskogean.

Auxiliaries, the active, mediopassive, causative and one other that Booker translates as "be, do," are described in Chapter 7. The description of "be, do" is especially enlightening for the analysis of the Mikasuki auxiliary root.

The evolution of modern directional prefixes from conjoined verbs of motion and from the incorporation of body-part nouns is explained in Chapter 8.

Chapter 9 is a discussion of negation in Proto-Muskogean. Verbs could be negated both by the negative prefix plus an emphatic suffix or a negative auxiliary could take the negative morphology.

Interrogation and a reconstruction of two interrogative suffixes are presented in Chapter 10. Muskogean question formation is complex. Choice of one of several possible question indicators appears to be based on the expectations of the speaker. Her analysis of interrogation in Muskogean is helpful for its analysis in Mikasuki.

A summary of the Proto-Muskogean verb system is found in Chapter 11.

A bibliography that includes all known linguistic material dealing with the Muskogean languages incorporates both published and unpublished sources.

CHAPTER II

PHONOLOGY

2.0 Introduction

The phonological system of Mikasuki includes consonants, vowels, and the suprasegmental phonemes: vowel length (V:), nasalization (Ṽ), and contrastive pitch (´, ¯ , `). Mikasuki has fourteen consonants, three vowel qualities, contrastive vowel length, phonemic nasalization, and three distinctive pitches.

A description of the syllable is a fundamental part of an analysis of Mikasuki phonology. Syllables may be classified as light or heavy with corresponding implications for pitch occurrence and verb inflection. Syllable structure in Mikasuki is referred to throughout this study because it is a basic unit for the morphology as well as the phonology. Similarly, the role and distribution of stress in the phonemic system of Mikasuki is examined in this section because it plays an important role in both the phonology and the morphology. Stress as a component of the grammatical system is mentioned briefly in this chapter and described in greater detail in later chapters.

2.1 Phonemic Inventory

Table I is a chart of the phonemes of Mikasuki: the consonants, the vowels, and the suprasegmental phonemes.

Table I

The Phonemes of Mikasuki

Consonants

	Bilabial	Alveolar	Palatal	Glottal
Occlusive:	p b	t	k	
Affricate:		č *		
Fricative:	f	ɬ	š *	
Nasal:	m	n		
Resonant:	w	l	y	h

Vowels

	Front	Mid	Back
High:	i, i:		o, o:
Low:		a, a:	

Pitch

/high/ /mid/ /low/

Nasalization

/ṽ/, /ṽ:/

*In the following sections /č/ and /š/ are written /c/ and /s/ respectively.

2.2 Phonemic Description

2.21 Consonants

Mikasuki consonants are divided into three groups according to their behavior in specific phonetic environments: one class of strong consonants and two classes of weak consonants based on the extent of permitted allophonic variation (Derrick-Mescua 1980:122).[1]

Strong Consonants	Weak Consonants
/f, χ, c, s/	Weak 1. /p, b, t/
/m, n/	Weak 2. /k, h/
/w, l, y/	

Strong consonants do not vary in voicing and are never dropped. Weak consonants have both voiced and voiceless allophones and are sometimes dropped in intervocalic position. Weak 1. consonants /p, b, t/ do not vary in voicing in intervocalic position. In consonant clusters they are subject only to anticipatory voicing assimilation. Weak 2. consonants /k, h/ are voiced in intervocalic position and in consonant clusters they are subject both to anticipatory and conservative voicing assimilation.

2.211 Strong voiceless consonants: /f, χ, s, c/

1. /f/---labiodental or bilabial fricative.

Younger bilingual Mikasuki speakers use the labiodental fricative while older monolingual speakers use the bilabial version.

---

[1]For more information about all aspects of Mikasuki phonology consult Derrick-Mescua (1980).

Word Initial /fòksī:k.ī/ 'skirt'

{f} {fokši:g.ι?}

Intervocalic /pàfàks.i/ 'smoke'

{f} {pəfəkš.ι?}

Consonant Cluster /hò:cifk.ī/ 'name'

{f} {ho:čifk.ι?}

2. /ƛ/---dento-alveolar lateral fricative

Word Initial /ƛā:m.om/ 'one'

{ƛ} {ƛa:m. m̩}

Intervocalic /i:ƛ.i.ksá/ 'sit down!'

{ƛ} {i:ƛ.i.kša?}

Consonant Cluster /am.bāƛ.k.om/ 'it's broken'

{ƛ} {m.baƛ.k.m̩}

3. /s/---palatal fricative

Word Initial /sa:l.k.óm/ 'already lying down'

{š} {ša:l.g.m̩}

Intervocalic /pō:s.ī/ 'cat'

{š} {po:š.ι?}

Consonant Cluster /pàlàst.ī/ 'bread'

{š} {pələšt.ι?}

4. /c/---palatal affricate

Word Initial /cō:b.ī/ 'big'

{č} {čo:b.ι?}

Intervocalic /hā:c.ī/ 'tail'

{č} {ha:č.ι?}

Consonant Cluster /yòkc.ī/ 'turtle'

{č} {yokč.ι?}

Word Initial /kō:s.l.om.ic/ 'are you cutting?'

{č} {ko:š.l.ʊm.ɩč}

2.212 Strong nasal consonants: /m, n/

When a nasal consonant occurs in word final position preceded by a short vowel, the vowel drops and the nasal consonant becomes syllabic. The syllabic nasal is then simultaneously an allophone of the short vowel and of the nasal consonant. For more discussion of this phenomenon see Section 2.22.

1. /m/---bilabial nasal

Word Initial /mìk.ī/ 'king'

{m} {mɩk.ɩʔ}

Intervocalic /hòmō:c.ì/ 'pepper'

{m} {homo:c.ʟʔ}

Consonant Cluster /lāmp.ī/ 'stomach'

{m} {lāmp.ɩʔ}

Word Final /co:p.á:m/ 'she will buy (it)'

{m} {co:p.a:m}

/m/ /kō:s.l.om/ 'cuts'

{m} {kō:s̀.l.m̩}

2. /n/---alveolar nasal

This phoneme /n/ assimilates to the point of articulation of the following consonant in consonant clusters.

Word Initial /nòkb.ī/ 'neck'

{n} {nugb.ɩʔ}

Intervocalic /cī.nòk.ī/ 'your heart'

{n} {čī.nogʟʔ}

Consonant Cluster /nàkn.ī/ 'man'

{n} {nəgn.ɩ ʔ}

/n/ /ān.kíl.ī/ 'my cat'

{n} {ən.gil.ɹʔ}

Word Final /híχ.on/ 'it's good'

{n} {hĩχ.on}

/n/ /mā:h.on/ 'then'

{n} {ma:h̃.n̥}

2.213 Strong voiced continuants: /w, y, l/

1. /w/---bilabial continuant

Word Initial /wìl.ī/ 'shoes'

{w} {wil.ɩ ʔ}

Intervocalic /ta.wã̄:ck.om/ 'cuts'

{w} {tə.wã:c̆k.m̥}

Consonant Cluster /pōn.wác.ī/ 'our mother'

{w} {pʋn.wac̆.ɩ}

2. /y/---palatal continuant

Word Initial /yā:t.ī/ 'people'

{y} {ya:t.ɩʔ}

Intervocalic /kòwā:y.ī/ 'horse' (Spanish)

{y} {kowa:y.ɩʔ}

Consonant Cluster /pāy.l.om/ 'rubs'

{y} {pey.l.m̥}

3. /l/---alveolar lateral continuant

Word Initial /lō:c.ī/ 'black'

{l} {lo:c̆.ɩʔ}

Intervocalic /làlàpk.ī/ 'all'

{l} {lɔlɔpk.ʟ?}

Consonant Cluster /ōkl.ì/ 'town'

{l} {ogl.ʟ?}

2.214 Weak l. Consonants: /p, b, t/

In clusters weak l. consonants are subject to anticipatory voicing assimilation.[2] The contrast between /p/ and /b/ is neutralized when either occurs word initially in a consonant cluster; the contrast between the two phonemes is only discoverable morphologically.

1. /p/---voiceless bilabial occlusive

Word Initial /pós.ī/ 'female relative'

{p} {pus.ʟ?}

Intervocalic /sā:p.ī/ 'cypress'

{p} {ša:p.ʟ?}

Consonant Cluster /tòχp.ī/ 'knee'

{p} {toχp.ʟ?}

/p/ /yitap.l.ik/ 'hit'

{b} {yitab.l.ik}

/p/ /ci.ya:tap.hō.l.om.li/ 'I hit you all'

{p} {či.ya:tɔp.ho.l.um.li}

2. /b/---voiced bilabial occlusive

Word Initial /bō:l.ī/ 'bream'

{b} {bo:l.ʟ?}

---

[2]There is a trend in the direction of more voiced allophones in Mikasuki. The youngest, most bilingual informant for this study (age 20) had voiced allophones in intervocalic position for weak l. consonants.

Intervocalic /cóːb.ī/ 'big'

{b} {čoːb.ʟ ʔ}

Consonant Cluster /kăb.l.om/ 'bites' (plural)

{b} {kăb.l.m̥}

/b/ /kab.hŏ.l.om/ 'bite' (plural)

{p} {kap.ho.l.m̥}

3. /t/---voiceless alveolar occlusive

Word Initial /tāyk.ī/ 'girl'

{t} {teyg.ʟ ʔ}

Intervocalic /yā:t.ī/ 'people'

{t} {ya:t.ʟ ʔ}

Consonant Cluster /yàt.hátk.i/ 'white people'

{t} {yət.hətk.ʟ ʔ}

/t/ /yàt.nákn.oːs.i/ 'old man'

{d} {yəd.nəgn.oːš.ʟ ʔ}

Word Final /ī:f.ōt/ 'dog'

{t} {i:f.ut}

2.215 Weak 2. Consonant: /k, h/

These consonants are voiced in intervocalic position and are subject to both anticipatory and conservative voicing assimilation in consonant clusters.

1. /k/---voiceless velar occlusive

Word Initial /kòwāːy.ī/ 'horse'

{k} {kowaːy ʟ ʔ}

In nonnasal environments {g} and{ɣ}occur in free variation with each other.

Intervocalic /nī:ɬàk.ī/ 'night'

{g} {ni:ɣəgɿʔ}

/k/ /wā:k.ī/ 'cow'

{ɣ} {wa:ɣ.ɿʔ}

When a long, nasalized vowel precedes /k/, the /k/ may optionally be realized as {ŋ}. Note that the long vowel will then become short.

/k/ /yalã̄:.k.om.li/ 'I'm going back'

{ŋ} {yalãŋ.um.li}

Consonant Cluster /oksã̄h.l.om/ 'washing'

{k} {ʊkšaɦ.l.m̩}

/k/ /nòkb.ō:n/ 'it's a neck'

{g} {nugb.o:n}

/k/ /ā:h.kómósk.ī/ 'sweet potato'

{k} {a:h.komošk.ɿʔ}

/k/ /nā:k.ōn.ców.k.ī/ 'diploma'

{g} {na:g.in.čow.gɿʔ}

Word Final /òpàks.īk/ 'tomorrow'

{k} {upʊkš.ɿk}

2. /h/---voiceless glottal continuant

Word Initial /halb.i/ 'skin'

{h} {hə̄lb.ɿ̄ʔ}

Intervocalic /àh.ī/ 'tree'

{ɦ} {aɦ.ɿʔ}

Consonant Cluster /pīhɣ.ī/ 'boat'

{h} {pihɣ.ɿʔ}

/h/ /àcāhb.ī/ 'young'

{h} {ǝčahb.ɩʔ}

/h/ /tāyk.hòmōhc.ī/ 'old woman'

{h} {teyk.humohč.ɩʔ}

/h/ /cāyh.om/ 'grows'

{ɦ} {čeyh.m̩}

In a consonant cluster with another voiceless consonant, this phoneme /h/ may be fronted to {x} .

/h/ /hīm.nīhtàk.ī/ 'today'

{x} {him.nixteg.ɩʔ}

2.22 Vowels

Mikasuki has three contrastive vowel qualities: /i/, /o/, and /a/. Vowel length is phonemic: /i:/, /o:/, and /a:/, as is nasalization: /ĩ/, /õ/, /ã/, /ĩ:/, /õ:/,and /ã:/. Short vowels,especially, vary allophonically due to the influence of pitch, stress, syllable structure, and free variation. Mikasuki vowels do not cluster. The following are examples of the vowels.

1. /i/---front high vowel

Short /ìt.ī/ 'eye'

{ɩ} {ɩt.ɩʔ}

Long /ī:f.ī/ 'dog'

{i:} {i:f.ɩʔ}

Short Nasal /ĩ̄sk.om/ 'drinking'

{ɩ̃} {ɩ̃̌sk.m̩}

Long Nasal /hĩ̄:c.om/ 'seeing'

{ĩ:} {hĩ:č.m̩}

2. /a/---low mid vowel

Short	/hālpát.ī/	'alligator'
{ə}	{həlpət.ɾ?}	
Long	/ā:p.ī/	'stem'
{a:}	{a:p.ɾ?}	
Short Nasal	/bã̀ck.on/	'longer'
{ə̃}	{bə̃nc̆k.n̥}	
Long Nasal	/hã́:c.ī/	'deaf'
{a:}	{hã:c̆.ɾ?}	

3. /o/---high back vowel

Short	/ò̀kl.ī/	'town'
{u}	{ukl.ɾ?}	
Long	/ō:c.ī/	'son'
{o:}	{o:c̆.ɾ?}	
Short Nasal	/tõ̀fk.om/	'spitting'
{õ}	{tõfk.m̥}	
Long Nasal	/cokȭ:l.om/	'sitting'
{õ:}	{c̆ugõ:l.m̥}	

2.221 Nasalization

Nasalization is a complex phenomenon in Mikasuki, being both phonemic and morphemic. There are two nasal consonants: /m/ and /n/, and the vowels, both long and short, may be distinctively nasalized. In addition, the morphophoneme of nasalization /N/ is a component of various morphemes e.g. the possessive prefixes and the progressive infix of active verbs.

2.222 Minimal Pairs for Vowels

/i/ ≠ /i:/

/ìc.ī/ 'mouth'

/ī:c.ī/ deer'

/o/ ≠ /o:/

/pós.ī/ 'female relative'

/pō:s.ī/ 'cat'

/a/ ≠ /a:/

/hàc.ī/ 'tail'

/hā:c.ī/ 'moon'

/a/ ≠ /i/

/cā.nō:t.ī/ 'my tooth'

/cī.nō:t.ī/ 'your tooth'

/a/ ≠ /o/

/àkn.ī/ 'meat'

/òkl.ī/ 'town'

/o/ ≠ /i/

/ō:c.ī/ 'son'

/ī:c.ī/ 'deer'

/i:/ ≠ /ī:/

/hi:c.óm/ 'saw'

/hī:c.om/ 'seeing'

/o:/ ≠ /ŏ:/

/fō:s.ī/ 'grandfather'

/fŏ̀:s.ī/ 'bird'

/a:/ ≠ /ă:/

/wā:k.ī/ 'cow'

/wă̄:k.ī/ 'baby'

2.23 Pitch

Mikasuki has a pitch accent prosodic system, i.e. contrastive pitch is found only on certain key syllables in a word. Nonkey syllables have noncontrastive pitch (Haas 1977:1). There are three contrastive pitches-- low /ˋ/, mid /¯/, and high /ˊ/-- the distribution of which is determined morphologically. All syllables in noun roots are key syllables and tend to have /low/ and /mid/ pitch. Uninflected verb roots have no key syllables. Inflected verb roots have a minimum of one key syllable known as the prominent syllable which, in addition to the contrastive pitch, has nasalization and/or vowel length which mark the tense or aspect of the verb form (Derrick-Mescua 1980:191). /Mid/ and /high/ pitch predominate on verb forms. Some affixes have inherent pitch while others do not. The following are examples of the pitches of Mikasuki.

1. /ˋ/---low pitch

   /pàfàks.ī/ 'smoke'

   /tòɣp.ī/ 'knee'

2. /¯/---mid pitch

   /bō:l.ī/ 'bream'

   /kab.hō.l.om/ 'are biting'

3. /ˊ/---high pitch

   /có:b.ī/ 'big'

   /kalás.l.om/ 'has cut'

2.3 Syllable Structure

The syllable is a basic unit for the analysis of Mikasuki phonology and grammar. All words in Mikasuki have at least two syllables; the canonical form of the minimum word is VCV. A syllable

must contain a vowel and may include vowel length and consonants: (C)V(:)(C)(C). Syllable types may be classified according to the contents of the coda position. A light syllable has nothing ∅ in coda position, (C)V, while all other types of syllables are heavy. A short syllable has ∅ or an obstruent (K) in coda position, (C)V or (C)VK, and a long syllable has vowel length or a sonorant (L) in coda position, (C)V: or (C)VL. The obstruents include /p, b, t, k, f, s, ɣ, c/; the sonorants are /w, y, h, m, n, l/. Figure 1. displays schematically the relationships among the syllable types in Mikasuki.

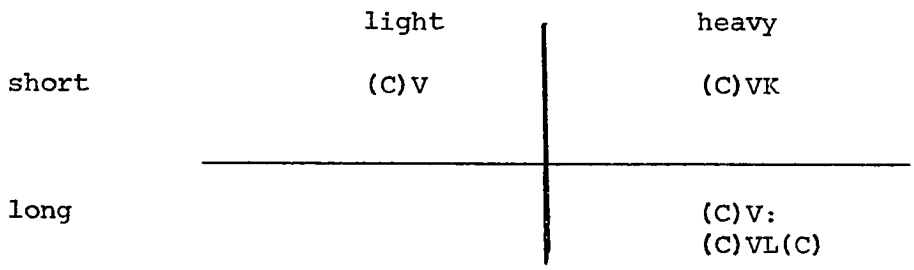


Figure 3

Syllable Types in Mikasuki

These syllable types operate on both the phonological and the morphological level. All three pitches may occur on long syllables but short syllables may have only /high/ or /low/ pitch. In the inflectional system, all inflected verbs must have one heavy syllable and the preferred syllable sequence is a light syllable followed by a heavy one (Derrick-Mescua 1980:192). When the heavy syllable is nonkey, i.e. it carries no contrastive pitch, it will have /high/ pitch if it is short (CV or CVK) and /mid/ pitch if it is long (CV: or CVL).

2.4 Stress

Speech in Mikasuki is stress-timed. The rhythm of the language is characterized by the contrast of stressed and unstressed syllables. Stress is both linguistic and paralinguistic and distinctive speech "styles" may result from the idiosyncratic use of stress. Stressed syllables may be emphasized by lengthening the vowel, raising the phonetic pitch, or by a falling pitch contour. Unstressed syllables are often reduced or even eliminated stylistically. However, there are certain obligatory stress patterns in Mikasuki. A word may have only one stressed syllable and this stressed syllable will have either /mid/ or /high/ pitch. Specific grammatical restrictions operate on stress, as in the case of the imperative suffix, which must be stressed. Stress as part of an intonation pattern may indicate the interrogative and changes in the location of the stressed syllable alter an adjective to form the comparative and superlative.

In addition to the above-mentioned uses of stress there are certain typical distributional patterns of stress according to the root class of the word. Stress on a noun will fall on the first syllable of the word if that syllable has /high/ or /mid/ pitch:

/ˈlāmp.ī/ 'stomach'

/ˈtá:t.ī/ 'father'

Stress may occur on the first syllable of the word that has a rise in pitch:

/cik.ɪ/ 'house'

Stress in noun roots is not contrastive, however.

Stress is one of the features of the prominent syllable in inflected verbs. Prominent syllables will also have /high/ or /mid/ significant pitch and be heavy. The vowel of the syllable will be long if the syllable is open and short if it is closed. The contrast between stressed and unstressed syllables in verbs is especially important because it forms part of the tense and aspect marking systems of the language. Examples of stress patterns in verbs are:

/hi:c.om.li/ 'I saw'

/hi:c.om.li/ 'I see'

/co:p.om/ 'bought'

/co:p.om/ 'buy'

2.5 Conclusion

The phonological system of Mikasuki includes fourteen consonants, three vowel qualities, contrastive vowel length, phonemic nasalization, and three distinctive pitches. The consonants are divided into three groups according to the amount of permitted allophonic variation: one class of strong and two classes of weak consonants. Single consonants occur word initially, medially, and finally; consonant clusters occur only medially. The three vowels occur distinctively as long and short vowels with greater allophonic variation found

among the short vowels. Both long and short vowels may be contrastively nasalized. Vowels do not cluster in Mikasuki.

Phonemic pitch, in Mikasuki, is found only on key syllables. Nonkey syllables have predictable but nondistinctive pitch. All syllables in noun roots are key; uninflected verb roots have no key syllables, and inflected verbs have a minimum of one key syllable termed the "prominent" syllable.

The pitches, both phonemic and nonphonemic, that may occur are partially determined by syllable type. There are four overlapping types of syllables and each places certain restrictions on pitch occurrence.

Speech, in Mikasuki, is stressed-timed. Stress is both linguistic and paralinguistic. Certain characteristic stress patterns occur, which have been mentioned briefly here and are dicussed more fully in later chapters.

CHAPTER III

MORPHOLOGY

3.0 Introduction

This chapter provides a description of the morphology of Mikasuki. Roots and morphological processes comprise the two components of Mikasuki morphology. Roots are divided into nouns (3.2) and verbs (3.3). A few independent roots form a small class of particles (3.4).

The morphological processes of Mikasuki include affixation and ablaut. The affixes are prefixes, infixes, and suffixes. Ablaut, as the term is used by investigators of the Muskogean languages, refers to all types of internal change or change within the root (Haas 1940a). Morphologically significant ablaut includes nasalization, pitch change, reduplication, and suppletion.

3.1 Morphophonemic Variation

Because of the morphological processes of Mikasuki the cannonical patterns of words are enormously variable. Consonant clusters occur medially only. Two-consonant clusters are common both within the root and across morpheme boundaries. Three-consonant clusters are rare in roots and almost always arise morphologically. When a three-consonant cluster occurs, there are constraints: (a) the first consonant must be a sonorant (w, y, h, m, n, l); (b) the second and third consonants may be any consonant. However, if there are two contiguous sonorants in a three-consonant cluster, the first cannot be a nasal. If an unacceptable cluster arises morphologically, either (a) one of the consonants

drops, or (b) an epenthetic /i/ is inserted. For more information about consonant clusters and restrictions on their occurrence, see Derrick-Mescua (1980:159-83).

Mikasuki has no vowel clusters. If a vowel cluster arises through the application of a morphological process, one vowel drops. Morpheme-final vowel dropping is indicated in two ways: a vowel in parenthesis (V) means that the vowel will drop if the following morphene within the words begins with a vowel. [V] means that the vowel will occur only to prevent an unacceptable consonant cluster.

In addition to the above-mentioned kinds of vowel dropping, an unstressed vowel may fall in rapid speech if the result is not an unacceptable consonant cluster.

3.2 Nouns

3.20 Introduction

The Mikasuki noun phrase is composed of noun roots and affixes. Roots are divided into subclasses depending both upon their permitted occurrence with noun affixes and upon their syntactic distribution. The subclasses are noun roots (3.21), postpositions (3.22), time nouns (3.23), person pronouns (3.24), and compound nouns (3.25). Nominal affixes include the inflectional person prefixes (3.261), the derivational prefix/infix for human plural (3.262), and five order classes of derivational suffixes (3.263).

3.21 Noun Roots

Mikasuki noun roots are all bound forms. The root ends in a consonant. In citation, the noun root usually occurs within the citation suffix (3.263). The following examples of noun roots all have the citation suffix.

/lā:mp.ī/ 'stomach'

/lamp-/ 'stomach'

/-i/ citation suffix

/cìk.ī/ 'house'

/kót.ī/ 'frog'

/tānskìl.ī/ 'bluejay'

/sàkàpō:n.ī/ 'buzzard'

All syllables in noun roots are key syllables; that is, they all have contrastive pitch (Haas 1977:95). /Mid/ and /low/ pitch predominate on nouns. The length of a single morpheme noun root varies from one to three syllables: (C)V(:)C(C)((V)(:))(C)(V)(:)(C)- is the cannonical form of the Mikasuki noun root. The following are examples of one-, two-, and three-syllable noun roots.

one-syllable:

/àsp.ī/ 'corn'

/hālk.ī/ 'wife'

two-syllable:

/òstā:p.ī/ 'lower leg'

/pàlàst.ī/ 'bread'

three-syllable:

/tā:tìyā:h.ī/ 'chicken'

3.22 Postpositions

Mikasuki has a small group of nouns which occur as postpositions. Like English prepositions, they normally help to specify location in

relation to the noun with which they occur. Unlike English, however, they follow the noun forming a type of compound noun. Postpositions form a separate class of nouns because of the limitations on their occurrence; that is, (a) a postposition must always be the second noun of two nouns in a phrase, or, (b) it must be alienably possessed (see Section 3.261). The postposition follows the citation suffix of the noun with which it occurs. The postposition itself may take both the citation suffix and the topic marker.

As the second noun of a compound noun:

/ok.i.palw.i/ 'the other side of the ocean'

/ok-/ 'water'

/-i/ citation suffix

/cik.i.hayo:k.i/ 'inside the house'

/cik-/ 'house'

/-i/ citation suffix

/cik.i.yobala.ka/ 'in back of the house'

/cik-/ 'house'

/-i/ citation suffix

/-ka/ topic marker

As alienably possessed noun:

/in.yakn.i.ka/ 'the bottom'

/in-/ alienable 3rd person possessive prefix

/-i/ citation suffix

/-ka/ topic marker

/im.pakn.i.ka/ 'the top'

/im-/ alienable 3rd person possessive prefix

/-i/ citation suffix

/-ka/ topic marker

Some postpositions are clearly related etymologically to other noun roots.

/yobala-/ 'in back of'

/yob.i/ 'leg'

/yakn-/ 'bottom of'

/yakn.i/ 'the ground'

3.23 Time Nouns

The Mikasuki lexicon includes an extensive set of time indicators. Like the postpositions, these forms may take the -ka (topic marker) and may be found in compound noun formations. Unlike the postpositions, they also occur independently and with modifying suffixes. They form a semantic set. One suffix which occurs typically with time nouns is $\binom{-c:s(i)}{}$ (old) to indicate past time.

Past time:

/ò́byà̀c.ō:sī.kā/ 'yesterday'

/-o:si/ 'old'

/-ka/ topic marker

/nixak.o:si.ka/ 'last night'

/hampol.o:si.ka/ 'this morning'

Present:

/hím.nihták.i/ 'today'

/him-/ 'now'

/-i/ citation suffix

Future:

/apaks.i.ka.yi/ 'tomorrow'

/-i/ citation suffix

/-ka/ topic marker

Time nouns nominalize number verbs in compound noun formations. The number "one" occurs most frequently in these forms. Incompletive aspect (nasalization) is marked on the nominalized number on forms that refer to future time.

Future time:

/has.ɣã.yik.on/ 'next month'

/has-/ 'moon'

/ɣa-/ 'one'

/yik-/ 'this'

/-on/ oblique

Past time:

/hàs.ɣa:.ma:m.on/ 'last month'

/has-/ 'moon'

/ɣa:-/ 'one'

/ma:m/ 'that'

/-on/ oblique

/lakac.ɣa:.ma:m.on/ 'last year'

/lakac-/ 'year'

/ɣa:-/ 'one'

/ma:m/ 'that'

/-on/ oblique

/nihtak.si:tak.on/ 'four days ago'

/nihtak-/ 'day'

/si:tak-/ 'four'

/-on/ oblique

3.24 Pronouns

Mikasuki pronouns include three persons with only the first person marked obligatorily for number. Second and third persons may optionally mark number. Person pronouns are used for emphasis or to diminish ambiguity; they are not obligatory. Person is marked on the verb with person affixes (see Section 3.33). Table I shows the person pronouns of Mikasuki.

3.25 Compound Nouns

Noun compounding is the principal method of expanding the Mikasuki lexicon. Nouns may be compounded with any subclass of nouns except pronouns or with any verb. Relatively few words have been borrowed into Mikasuki from English or Spanish (the two European contact languages) and new items enter the language primarily through noun compounding.

There has been a greater degree of borrowing between Creek and Mikasuki but because the languages are so closely related, it is difficult to determine the direction of a loan. Many Mikasuki speakers consciously use Creek words while they speak Mikasuki, Creek-Mikasuki

Table II

The Person Pronouns of Mikasuki

1p.s.	a:hn-			1p.pl.	pohn-
2p.		cihn-			
3p.		yitt-	inihn-*		

* This form occurs only once in the data collected for this study in a text from a traditional speaker.

bilingualism is common, and "Indian names" are always Creek. All of these factors contribute to the complexity of Mikasuki-Creek borrowing. In spite of the borrowing of Creek words, most new forms in Mikasuki are the result of noun compounding.

When a compound noun is created, there may or may not be an /i/, the neutral vowel, separating the two nouns. There is no apparent conditioning for the occurrence of the /i/. When it does occur, it becomes an integral part of the new lexical item.

Noun-noun compounds:

/àsp.ì.hálb.ī/ 'corn flakes'

/asp-/ 'corn'

/-i/ citation suffix

/halb-/ 'skin'

/ò̀k.ì.wā:k.ī/ 'manatee'

/ok-/ 'water'

/-i/ citation suffix

/wa:k-/ 'cow'

/niɬak.ha:s.i/ 'moon'

/niɬak-/ 'night'

/ha:s-/ 'moon'

/yā:t.nàkn.ī/ 'man'

/ya:t-/ 'people'

/nakn-/ 'male'

Noun-verb compounds:

/mìk.ìl.i:c.i/ 'British person'

/mik-/ 'king'

/il.i:c-/ 'kill'

/-i/ citation suffix

/sòk.ì.hàlb.kàfáhb.ī/ 'armadillo'

/sok-/ 'pig'

/-i/ citation suffix

/halb-/ 'skin'

/kafahb-/ 'rough'

/ɣa:ɣ.lo:c.i/ 'buffalo fish'

/ɣa:ɣ-/ 'fish'

/lo:c-/ 'black'

/-i/ citation suffix

/hin.i.co:b.i/ 'highway'

/hin-/ 'road'

/-i/ citation suffix

/co:b-/ 'big'

/ī̀lb.ì̀s.bàná:.k.ā.ɣ.īk.ōn/ 'bracelets'

/ilb-/ 'hand'

/is-/ instrumental

/bana:/ 'tie'

/-k/ intransitive

/-a:ɣ/ plural

/-ik/ nominalizer

/-on/ oblique

/hoɣkof.simano:l.i/ 'persimmon'

/hoɣkof-/ 'apple'

/simano:l-/ 'wild'

/-i/ citation suffix

3.26 Noun Affixes

The Mikasuki noun root takes three types of affixes: prefixes, one infix, and suffixes. Roots must occur with at least one suffix and may carry additional affixes. Two classes of person prefixes in Mikasuki mark personal possession. A human plural affix occurs most commonly as a prefix but may occur as the one infix permitted within the noun root. There are five order classes of noun suffixes in Mikasuki.

3.261 Person Prefixes

Person prefixes are used with nouns in Mikasuki to denote possession. Two types of possession exist: inalienable and alienable.

Inalienable possession is marked by the occurrence of the patient case for the person prefix. It refers to items that one is born with (in either a biological or a cultural sense) such as body parts and certain kin relationships.

Alienable possession is marked by the occurrence of the dative case for the person prefix. It is applied to items one can acquire and lose in a lifetime, e.g., a house, a language, and certain kin relationships.

In general, all nouns are assigned to one of these two classes of possession. A few nouns may take either set with a corresponding semantic difference.

/ac.akn.i/ 'my body' (inalienable possession)

/ac-/ 1st person singular patient prefix

/-i/ citation suffix

/am.akn.i/ 'my meat' (alienable possession)

/am-/ 1st person singular dative prefix

Certain kin terms belong to both classes and take either inalienable or alienable possession. The ethnosemantic implications of the determination of the type of possession to be used with certain kin terms is an area largely unexplored by anthropologists and is appropropriate for further research. What is understood at present is described in this chapter along with questions and suggestions for further inquiry.

Mikasuki possessive prefixes always immediately precede the root of the possessed noun. Three persons are marked with number indication obligatory only in the first person. Gender is unmarked. Morphophonemic variation is complex in the possessive prefixes.

Inalienable possession

Generally, in Mikasuki a (C)VCV sequence is maintained when prefixing a root. For the inalienable prefixes this means that the CV form of the prefix metathesizes to VC before roots with an initial vowel. However, if the root has an initial /i/, the /i/ becomes vowel length on the vowel of the prefix and no metathesis occurs. Table III presents the inalienable possessive prefixes. Table IV shows three nouns inflected for inalienable possession.

Notice that in the first person plural $\binom{(}{(}$po-$\binom{)}{)}$ becomes $\binom{(}{(}$ipo-$\binom{)}{)}$ instead of $\binom{(}{(}$*op-$\binom{)}{)}$ and that the initial vowel of the root is then dropped.

Table III

Inalienable Possessive Prefixes

Singular	1	---- ca/____consonant or /i/
		---- ac elsewhere
Plural	1	---- po/___consonant or /i/
		---- ipo elsewhere
	2	---- ci/___consonant or /i/
		---- ic elsewhere
	3	---- unmarked

Table IV

Inalienably Possessed Nouns

	/no:t.i/ 'tooth'	/iy.i/ 'feet'	/akn.i/ 'body'
Sg. 1	/ca.no:t.i/	/ca.:y.i/	/ac.akn.i/
	'my tooth'	'my foot'	'my body'
Pl. 1	/po.no:t.i/	/po.:y.i/	/ipo.kni/
	'our teeth'	'our feet'	'our bodies'
Sg. 2	/ci.no:t.i/	/ci.:y.i/	/ic.akn.i/
	'your teeth'	'your feet'	'your body'
Pl. 2	/ci.no,ho,:t.i/	/ci.ho.y.i/	/ic.ak,ho,n.i/
	'your teeth'	'your feet'	'your bodies'
3	/no:t.i/	/iy.i/	/akn.i/
	'her teeth'	'their feet'	'his body'

To specify plurality for the second person, an infix $\binom{(}{)}$-ho-$\binom{)}{(}$ is inserted before the last consonant of the first syllable of the root.

Alienable possession

The set of alienable possessive prefixes is characterized by a morphophoneme of nasalization //N// (Derrick-Mescua 1980:354). It is realized as /V̰:/ before fricatives, /y/ and /w/; as /Vm/ before vowels and bilabials; and as /Vn/ elsewhere. Table V presents the alienable possessive prefixes. Table VI shows three nouns inflected for alienable possession.

In the data used for this analysis, the two sets of possessive prefixes co-occur on one noun only: /na:k.i/ 'something' or 'what'. Their co-occurrence serves as an emphatic.

/koway.i an.ca.na:k.on/ 'it is my horse'

/koway-/ 'horse'

/-i/ citation suffix

/an-/ 1st person singular alienable possession

/ca-/ 1st person singular inalienable possession

/na:k-/ 'something'

/-on/ verbalizer

/pom/po.na:k.on/ 'it is ours'

/pom-/ 1st person plural alienable

/po-/ 1st person plural inalienable

/cin.ci.na:k.on/ 'it is yours'

/cin-/ 2nd person alienable

/ci-/ 2nd person inalienable

Table V

Alienable Possessive Prefixes

		(C)$\tilde{V}$:/__fricative, y,w	(C)Vm/__vowel, bilabial	(C)Vn elsewhere
Sg. 1	aN →	ã:-	am-	an-
Pl. 1	poN →	põ:-	pom-	pon-
2	ciN →	cĩ:-	cim-	cin-
3	iN →	ĩ:-	im-	in-

Table VI

Alienably Possessed Nouns

	/fõ:s.i/ 'bird'	/i:c.i/ 'deer'	/sa:w.i/ 'raccoon'
Sg. 1	/ã:fõ:s.i/	/am.i:c.i/	/an.sa:w.i/
	'my bird'	'my deer'	'my raccoon'
Pl. 1	/põ:.fõ:s.i/	/pom.i:c.i/	/pon.sa:w.i/
	'our bird'	'our deer'	'our raccoon'
2	/cĩ:.fõ:s.i/	/cim.i:c.i/	/cin.sa:w.i/
	'your bird'	'your deer'	'your raccoon'
3	/ĩ:.fõ:s.i/	/im.i:c.i/	/in.sa:w.i/
	'her bird'	'their deer'	'his raccoon'

/in.na:k.on/ 'it is hers'

/in-/ 3rd person alienable

These forms listed above are identical to the Seminole forms described by Nathan (1977:56). It is possible that they have been borrowed from one language to the other but without further research it is impossible to determine the direction of the loan.

Kin terms, in Mikasuki, nearly always occur with a possessive prefix and take either inalienable or alienable forms. For certain terms, the form is determined by the referent or by the speaker. Although it is not possible at this time to explain the system entirely that determines the choice of possession type, the following observations can be made.

Mikasuki speakers have a matrilineal, matrilocal kinship system through which they derive membership in totemic clans. It is a classificatory system, in that certain relationships are classified together by the terminology, regardless of generation; for example, people refer to all the women in their father's clan, regardless of age, as /po:s.i/ which is glossed as grandmother. This system is, to some extent, cross-cut by the indication of inalienable or alienable possession. Everyone uses inalienable possession to refer to one's own older and younger siblings and their offspring. The terms for siblings include the offspring of one's father's brother and mother's sister. Relatives from preceding generations, regardless of the closeness of the blood relationship, are usually possessed alienably as are more distant relatives in either parent's clan. Lastly, husbands possess wives inalienably but wives posses husbands alienably. Thus, it appears

that there are two systems for classifying relationships among Mikasuki speakers with somewhat different emphases. One is a traditional matrilineal system of determining class membership in which the consideration of generation is overridden in favor of consideration of clan (all females of father's clan called /pos.i/ 'grandmother'). The other, a grammatical system, tends to classify close blood relatives of one's own generation, their descendants and one's own descendants, regardless of clan, as inalienably possessed and one's relatives of preceding generations and relatives of one's own clan and one's father's clan not closely related as alienably possessed. It is interesting to speculate that the pressure for consideration of generation over consideration of clan may be a result of English influence. These hypotheses are tentative and based on limited data gathered principally from women under the age of forty. Further investigation is clearly necessary. David West (pers comm) found a man, aged 70+, at Big Cypress Reservation who is said to have used inalienable terms to refer to nearly all of his father's relatives and alienable terms for his mother's. It is clear that the use of kin terms varies by clan membership, by reservation, and by the age and sex of the speaker. The following terms are used by a 28-year-old woman at Big Cypress Reservation (Table VII).

3.262 Human Plural Affix (no-)

Mikasuki nouns are not obligatorily marked for number; however, one affix can be used to mark human plural. It occurs as a prefix except when it marks the second person plural inalienable possession. When it occurs with the possessive prefix, it is inserted into the noun root immediately preceding the last consonant of the root. This

Table VII

Kin Possession

Inalienable	Alienable
/cā.tācāk.ī/	/ām.pós.ī/
'my brother' (ego female)	'my grandmother' (female relative)
/cā.fōnk.ī/	/ã̄:.fȭ:s.ī/
'my sister' (ego male)	'my grandfather' (male relative)
/cā.cāy.ī/	/ã̄:.wá:c.ī/
'my older sibling'	'my mother'
/āc.ā:hpíhc.ī/	/ān.tà:t.ī/
'my younger sibling'	'my father'
/āc.ō:c.ī/	/ān.tóhc.ī/
'my son'	'my uncle' (mother's clan)
/āc.ōs.tāyk.ī/	/ān.nàkn.ī/
'my daughter'	'my son'
/cā.hālk.ī/	/an.cik.i.tala:.k.i/
'my wife'	'my sister's husband' (one who lies down in the house)
	/ã̄:.χàkf.ī/ *
	'my opposite sex sibling'

*Note that this form is an exception to the generalization that generation takes precedence over clan in that this form classifies a sibling with alienable possession.

affix (-ho-) occurs in the verb person marking system (see Section 3.334) with a different distribution pattern.

With nouns, (ho-) may function as the only indicator of number or it may occur with the general plural suffix (-a:ɣ).

/ho.nakn.ot/ 'all the men'

/nakn-/ 'man'

/-ot/ nominative

/ho.tayk.a:ɣ.ot/ 'women'

/tayk-/ 'woman'

/-a:ɣ/ 'general plural'

/-ot/ nominative

With inalienably possessed nouns in second person plural, (-ho-) is an infix. It is also an infix when it indicates second person plural on the person pronoun.

/ci.no,ho,:t.i/ 'your teeth'

/ci-/ 2nd person inalienable possession

/no:t-/ 'tooth'

/-i/ citation suffix

Person pronoun:

/cih,ho,n.ot/ 'you all'

/cihn-/ 'you'

/-ot/ nominative

3.263 Noun Suffixes

Mikasuki noun morphology includes five order classes of derivational suffixes. Each class is described in this section, beginning with the class that immediately follows the noun root. Restrictions on occurrence are described for each class.

Class I Borrower

This suffix occurs on English words that are "borrowed" into Mikasuki but retain English phonology. If a word is loaned into Mikasuki with Mikasuki phonology, no borrower suffix occurs. Suffixes that follow the borrower suffix take normal Mikasuki phonology. The borrower co-occurs with all classes of noun suffixes except the derivational suffix which derives nouns from verb roots (Class IV). There are no borrowed verb roots in Mikasuki from either English or Spanish.

Nouns with borrower:

HOLLYWOOD.k.on 'Hollywood'

/-on/ oblique

NAVAJO.k.a:ɣ.ot 'Navajos'

/-a:ɣ/ general plural

/-ot/ nominative

SKIPPY.k.ha: 'Skippy!'

/-ha:/ vocative

TV.k.on 't.v.'

/-on/ oblique

Nouns without borrower:

/koloston/ 'Clewiston'

/biksa:pon/ 'Big Cypress'

/ni:pi/ 'Naples'

/ko:blin/ 'Copeland'

Class II Modifiers

Diminutive $\binom{(}{(}$-o:c$\binom{)}{)}$

This suffix marks the noun to which it refers as smaller or younger. It usually occurs with animate nouns, although not exclusively.

/i:f.o:c.i/ 'puppy'

/i:f-/ 'dog'

/-i/ citation suffix

/nakn.o:c.i/ 'boy'

/nakn-/ 'man'

/-i/ citation suffix

/cik.o:c.i/ 'little house'

/cik-/ 'house'

/-i/ citation suffix

/hom.o:c.i/ 'ground pepper'

/hom-/ 'pepper'

/-i/ citation suffix

Ager $\binom{(}{(}$-o:s$\binom{)}{)}$

This suffix has a limited range of occurrence. It appears on only one general noun root and on certain time nouns. On the general root it ages the noun, on the time nouns it marks the time under discussion as past time. It is not a productive suffix.

/nakn.o:s.ika/ 'old' (male)

/nakn-/ 'man'

/-ika/ topic marker

/obyac.o:s.ika/ 'yesterday'

/obyac-/ 'yesterday'

/-ika/ topic marker

/niɣak.o:s.ika/ 'last night'

/niɣak-/ 'night'

/-ika/ topic marker

/hampol.o:s.ik.on/ 'this morning'

/hampol-/ 'morning'

/-ik/ topic marker

/-on/ oblique

Emphatic $\binom{(}{(}$-al$\binom{)}{)}$

This suffix occurs primarily on time nouns and on particles that are syntactically nouns (see Section 3.4). However, this suffix also occurs with other nouns.

With time nouns:

/hima.yahc.ãl.on/ 'right now'

/hima-/ 'now'

/yahc-/ ?

/-on/ oblique

/hima.kosc.al.on/ 'just a little while ago'

/hima-/ 'now'

/kosc-/ ?

/-on/ oblique

With particle:

/yal.al.i/ 'right here'

/yal-/ 'this'

/-i/ citation suffix

With noun:

/oca:p.al.on/ 'right in Ochopee'

/oca:p-/ 'Ochopee'

/-on/ oblique

Class III General Plural (-a:ɣ)

Number marking is optional on Mikasuki nouns. This suffix pluralizes the noun roots to which it is suffixed. It may co-occur with the human plural affix (see Section 3:262) to convey the notion of "all of..." It is an "outer" suffix; it follows all other noun suffixes and immediately precedes the syntactic suffixes. When this suffix occurs on a verb stem, it functions as a kind of nominalizer to indicate people or things who (verb).

/tayk.a:ɣ.ot/ 'many girls'

/tayk-/ 'girl'

/-ot/ nominative

/ho.nakn.a:ɣ.ot/ 'all the men'

/ho-/ human plural

/nakn-/ 'male'

/-ot/ nominative

/i:y.a:l.ot/ 'their feet'

/i:y-/ 'feet'

/-ot/ nominative

/ya:t.a:ɣ.i/ 'foreigners'

/ya:t-/ 'people'

/-i/ citation suffix

/yawli:c.a:ɣ.on/ 'people being around here'

/yawli:c-/ 'be around' (plural stem)

/-on/ oblique

/ilb.is.bana:k.a:ɣ.i:k.on/ 'bracelets'

/ilb-/ 'hand'

/is-/ instrumental

/bana:-/ 'tie'

/-k/ intransitive

/-i:k/ nominalizer

/-on/ oblique

Class IV Nominalization $\binom{\text{-i(:)k}}{}$

Mikasuki has one suffix that nominalizes verbs. The long form of the suffix occurs when the suffix is followed by a vowel, the short form is found word finally.

/poc.k.ik/ 'something to touch'

/poc-/ 'touch'

/-k/ intransitive

/kaba:l.ik/ 'coldness'

/kaba:l-/ 'cold'

/anc.ik/ 'clothes'

/anc-/ 'wear'

/Mikiso:k.a.ɣ.ot imp.i:k.on way.l.om.in.../

'the Miccosukees sold them food...'

/mikiso:k-/ 'Miccosukee'

/-a:ɣ/ plural

/-ot/ nominative

/imp-/ 'eat'

/-on/ oblique

/way-/ 'sell'

/-l/ transitive

/-om/ auxiliary root

/-in/ different subject

Verbs are sometimes nominalized by the occurrence of the general plural suffix (see Class III).

Finally, there are roots that occur as both nouns and verbs, merely by taking the appropriate morphology.

Roots that are both nominal and verbal:

Nominal:		Verbal:	
/aha:y.i/	'teacher'	/aha:y.om/	'teaches'
/-i/	citation suffix	/-m/	auxiliary root
/way.l.i/	'seller'	/way.l.om/	'sells'
/-l/	transitive	/-om/	auxiliary root
/-i/	citation suffix		

Class V Nominal Syntactic Suffixes

The syntactic suffixes are listed and described briefly below. Chapter IV is a description of the syntactic system of Mikasuki.

Citation Suffix $\begin{pmatrix} \_ \\ -i \end{pmatrix}$

Nouns that occur in isolation or elicited nouns take this suffix.

/ni:ɬak.i/ 'night'

/tal.i/ 'rock'

/ok.i.co:b.i/ 'Lake Okeechobee'

/ok-/ 'water'

/co:b-/ 'big'

/yat.kitisc.i/ 'Indians'

/yat-/ 'people'

/kitisc-/ 'red'

The subject noun in a Mikasuki sentence ordinarily takes the nominative suffix (see below) but, when the subject is to be de-emphasized, it may take the citation suffix rather than the nominative.

/tayk.i wi:k.om/ 'the women are sitting'

/tayk-/ 'woman'

/wi:k-/ 'sit' (dual stem)

/-om/ auxiliary root

Nominative Suffix $\begin{pmatrix} \\ -ot \end{pmatrix}$

This suffix marks the subject noun phrase.

/...ah.ot haca:l.in.../ 'tree standing'

/ah-/ 'tree'

/haca:l-/ 'stand'

/-in/ different subject

/cokf.ot ca.hi:c.om/ 'a rabbit sees me'

/cokf-/ 'rabbit'

/ca-/ patient prefix

/hi:c-/ 'see'

/-om/ auxiliary root

Oblique Suffix $\begin{pmatrix} \\ -on \end{pmatrix}$

This suffix marks a noun phrase as non-subject. Subsumed under oblique are the semantic cases patient, dative, instrumental, and locative.

Patient:

/cihn.on ci.hi:c.om/ 'she saw you'

/cihn-/ 'you'

/ci-/ patient prefix

/hi:c/ 'see'

/-om/ auxiliary root

Dative:

/i:f.on nakn.on lok.s.im.i:l.om/

'he brought the dog to the man' (West 1974:5)

/i:f-/ 'dog'

/-on/ oblique

/nakn-/ 'man'

/lok-/ locative

/s-/ instrumental

/im-/ 3rd person dative

/i:l-/ 'come'

/-om/ auxiliary root

Instrumental:

/ok.on s.il.oksah.l.om/ 'she washed herself with water'

/ok-/ 'water'

/s-/ instrumental

/-il/ reflexive

/oksah-/ 'wash'

/-l/ transitive

/-om/ auxiliary root

Locative:

/in.coko:l.i:k.on o:ɣ.ik/ 'go to her house'

/in-/ 3rd person alienable possessive

/coco:l-/ 'sit'

/-i:k/ nominalizer

/o:ɣ-/ 'go'

/-ik/ same subject

Topic Marker $\begin{pmatrix} \\ -(i)k(a) \end{pmatrix}$

This suffix makes the noun on which it occurs definite. It is usually glossed as "the" or "that." It commonly occurs on time nouns. However, it is also found, in discourse, on substantive nouns. Both of the vowels of this suffix fall, in the presence of another vowel, on an adjacent morpheme within the word.

On time nouns:

/Niɣak.o:s.ik.on TV.k.on hi:c.ĩ.li/

'last night I watched T.V.'

/niɣak-/ 'night'

/-o:s/ ager

/-on/ oblique

/hi:c-/ 'see'

/-ĩ/ past II

/-li/ lst person singular agent

Other nouns:

/ho:pak.ika/ 'far away'

/ho:pak-/ 'far'

/koway.co:b.wakacb.ika/ 'jaguar'

/koway-/ 'horse'

/co:b-/ 'big'

/wakacb-/ 'spotted'

Vocative {-há} {´}

The vocative is used to call to someone loudly or to address someone directly. The only invariable marker of the vocative is high pitch / ´/ on the final full syllable of the name. Names are often abbreviated and the high pitch occurs on the last syllable. Usually, however, the vocative is formed by the addition of a syllable {-há}. On names borrowed from English the vocative suffix follows the borrower suffix.

High pitch only:

/ta:t.í/ 'father'

/ta:t-/ 'father'

/-i/ citation suffix

/i:kós/ 'aunt!'

/i:kos-/ 'aunt'

With suffix:

/*SKIPPY*.k.há/ 'Skippy!'

/-k/ borrower

/ya:t.há/ 'folks!'

/ya:t-/ 'people'

Directional (-ton)

This suffix is directional or locative in nature. It occurs on locative nouns and indicates that the verb action occurred at the location specified by the noun. It follows the syntactic suffix.

/hahc.i.apalw.on.ton hapo:y.o:.wa/

'let's look for it on the other side of the river'

/hahc-/ 'river'

/-i/ citation suffix

/apalw-/ 'side of'

/-on/ oblique

/hapo:y-/ 'look for'

/-o:/ lst person plural agent exclusive

/-wa/ inferential

/maya:m.on.ton isko:l.on acink.om.i:ka.k.in/

'we went to school in Miami'

/maya:m-/ 'Miami'

/-on/ oblique

/isko:l-/ 'school'

/-on/ oblique

/acink-/ 'go'

/-om/ auxiliary root

/-i:ka/ lst person plural agent inclusive

/-k/ remote focus

/-in/ different subject

3.264 Summary of Noun Formation

A noun in Mikasuki is composed of a minimum of one root plus one suffix. Classes of nouns include general nouns, postpositions, time nouns, person pronouns, and compound nouns.

Possession is indicated by person prefixes. Two sets of prefixes indicate either inalienable or alienable possession. Mikasuki has a three person system with number marked obligatorily only in the first person.

Human plural is marked optionally by the use of an affix that occurs either as a prefix or as an infix.

Five order classes of derivational suffixes in Mikasuki include the borrower, the modifiers, the general plural, the nominalizer, and the syntactic suffixes.

3.3 Verbs

3.30 Introduction

It is within the verb phrase that the greatest elaboration of Mikasuki grammar occurs. The verb phrase is characterized by an abundance of morphological processes. This section provides an analysis of the verb phrase, beginning with the verb root and including all the morphological processes that may modify it.

Verb roots fall into three cross-cutting classes: active and stative roots; base and suppletive roots; transitive, intransitive, and neutral roots.

Morphological processes also cross-cut formal classifications. For example, inflection for person includes prefixes, an infix, and suffixes; inflection for tense includes nasalization, infixation, pitch change, and suffixation; and the process of number derivation

incorporates full lexical suppletion, infixation, and suffixation. Because of this tendency of the morphology to cross-cut, especially within the morphological processes, it is not possible to outline a description of the Mikasuki verb in a traditional fashion--that is, from left to right (prefix-root-infix-suffix) or from the root out (root-affixes). Instead, it is useful to look at the verb phrase as if it were a "nest,"[1] with the root as the innermost part and each succeeding layer consisting of a morphological process, e.g., tense inflection. The layers are ordered in terms of their centrality to the verb root. It is a building procedure, each succeeding layer depending on the preceding one for definition. Figure 4 shows graphically the Mikasuki verb with the root as the core and the morphological processes as succeeding layers.

3.31 Verb Roots

Mikasuki verb roots are distinguishable from noun roots both by their phonological characteristics and by the morphology of their affixes. A few roots are ambiguous, being found as both nouns and verbs:

NOUN:	/a:b-i/ 'picture'	VERB:	/amb-on/ 'it resembles'
NOUN:	/am-alahk-i/ 'my relatives'	VERB:	/am-alahk-om/ 'I've got some left'

[1] I am indebted to M. J. Hardman-de-Bautista for calling my attention to this interpretation

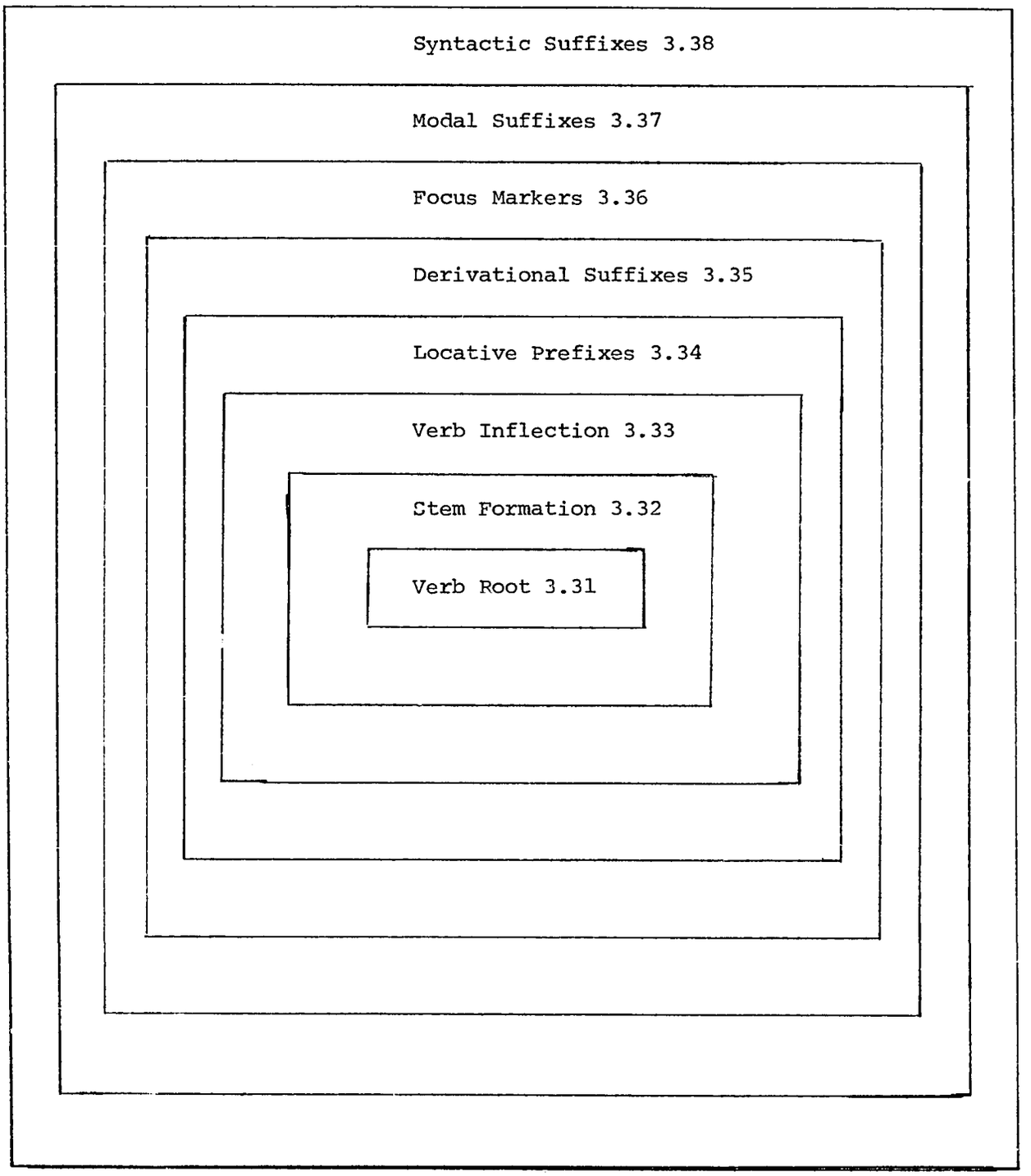


Figure 4

The Mikasuki Verb

3.311 Phonological Characteristics of Verb Roots

Verb roots are bound forms. They must be followed by a minimum of one suffix. Verb roots may be either one or two syllables in length. The final syllable of a verb root is always heavy (CV: or CVC(C)); that is, it has a coda of either vowel length or a consonant (Derrick-Mescua 1980:342). This syllable is the prominent syllable and takes contrastive pitch when the verb is inflected in certain tenses.

According to Derrick-Mescua (1980:343), the pitch of uninflected verb roots is predictable. The heavy syllable takes /mid/ pitch if it is CV; or CVL (L being a sonorant) and /high/ pitch if it is CVK (K being an obstruent). If the uninflected verb root has two syllables, the first syllable will take /low/ pitch if the syllable is short (CV or CVK) and /mid/ if the syllable is long (CVL). Adjectives, a subclass of stative verbs, take only /high/ pitch on the heavy syllable when they are uninflected. For a more detailed presentation of verb root phonology in Mikasuki, see Derrick-Mescua 1980.

3.312 Classification of Verb Roots

Mikasuki verb roots are divided into classes within three groups that cross-cut each other. The first group consists of base roots and suppletive roots (see Section 3.321). The majority of roots are base roots; that is, they are either unmarked for number or they are singular. Suppletive roots form a small class of verb roots that are inherently dual (2), multiple (3+), or plural (2+). The following examples are base roots and suppletive roots.

Base roots:

/hakl.om/ 'she, he, they hear'

/-om/ auxiliary root

/ayy.om/ 'she, he is around' (singular)

/-om/ auxiliary root

/coko:l.om/ 'she, he sits' (singular)

/-om/ auxiliary root

Suppletive roots:

/sal.k.om/ 'two lie down' (dual)

/-k/ intransitive

/-om/ auxiliary root

/mata:.k.om/ 'three or more run' (multiple)

/-k/ intransitive

/-om/ auxiliary root

The second way of grouping Mikasuki verb roots divides them into three classes: transitive, intransitive, and neutral (see Section 3.322). Transitive roots are inherently transitive; they always take an object. Intransitive roots are inherently intransitive; they never take an object. Neutral roots are neither transitive or intransitive but must be derived into transitive or intransitive to occur. Examples of transitive, intransitive, and neutral roots are

Transitive roots:

/ca.hic.om/ 'it sees me'

/ca-/ '1st person singular patient'

/-om/ 'auxiliary root'

/co:p.om.i.ka/ 'we buy it'

/-om/ 'auxiliary root'

/-i:ka/ '1st person plural agent'

Intransitive roots:

/ayy.om.li/ 'I am around'

/-om/ 'auxiliary root'

/-li/ '1st person singular agent'

/hamp.om/ 'it is bad'

/-om/ 'auxiliary root'

Neutral roots:

/tala:.l.om/ 'he laid it down'

/-l/ 'transitive'

/-om/ 'auxiliary root'

/tala:.k.om/ 'it is lying down'

/-k/ 'intransitive'

/-om/ 'auxiliary root'

The third grouping of roots divides them into active and stative (see Section 3.32). Active roots include all transitive verbs and those intransitives that refer to action. Statives refer to mental conditions and bodily states. Adjectives and numbers have predicate forms in Mikasuki and are stative verbs. The following are examples of active and stative roots:

Active roots:

/coko:l.om.li/ 'I am sitting down'

/-om/ 'auxiliary root'

/-li/ 'lst person singular agent'

/ca.ko:s.l.om.icka/ 'you are cutting me'

/ca-/ 'lst person singular patient'

/-l/ 'transitive'

/-om/ 'auxiliary root'

/-icka/ '2nd person singular agent'

/haca:l. ĩp.isk.on/ 'standing'

/ip/ 'completive'

/-ṽ/ 'progressive'

/-isk/ 'participle'

/-on/ 'oblique case'

Stative roots:

/ci.ba:n.om/ 'you want'

/ci-/ '2nd person patient'

/-om/ 'auxiliary root'

/ca.to:χo.hayh.ka.s/ 'I coughed'

/ca-/ 'lst person singular patient'

/-hayh/ 'past III'

/-k/ 'intransitive'

/-s/ 'indicative'

/po.no:c.i:p.om/ 'we're sleepy'

/po-/ 'lst person plural patient

/-i:p/ 'completive'

/-om/ 'auxiliary root'

All these groupings of verb roots overlap. A base root or a suppletive root may occur in any of the other categories: transitive, intransitive, neutral, active, or stative. However, the other groups are limited in the amount that they overlap. Active verbs include all transitive verbs and those intransitive that refer to actions. All stative verbs are intransitive. Figure 5 demonstrates the relationships among these groups.

	TRANSITIVE	INTRANSITIVE	NEUTRAL
ACTIVE	X	X	X
STATIVE	-	X	X

Figure 5

The Relationship of Verb Root Groups in Mikasuki

3.32 Verb Stem Formation

The Mikasuki verb stem consists of the root, either base or suppletive, plus any stem-forming suffix. Section 3.321 deals with the role of base and suppletive roots in number marking, Section 3.322 describes the associated stem vowels that each verb root in Mikasuki has, Section 3.323 treats the stem-forming suffixes that mark transitive and intransitive, and Section 3.324 describes the stem-forming causative suffix. Verb aspect in Mikasuki operates on the verb stem. The process of marking aspect is described in Section 3.33.

3.321 Number Marking in Verbs

Several authors have written about number in Mikasuki verbs: Boynton and Derrick (1974), West (1974b), Booker (1978) and (1980), and

Derrick-Mescua (1980). Nevertheless, because an understanding of number marking in the verb is essential to the analysis of Mikasuki verb morphology, it is described in detail in this section.

Many verb roots in Mikasuki are unmarked for number; that is, regardless of the number of the subject, object, or actions referred to by the verb, the verb root is unchanged.

/hi:c.om.li/ 'I see it' (them)
/-om/ auxiliary root
/-li/ 1st person singular agent
/hi:c.om.i:ka/ 'we see it' (them)
/-om/ auxiliary root
/-i:ka/ 1st person plural agent

There is, however, a large group of commonly occurring verbs in Mikasuki that mark number by suppletion. The suppletive form may agree in number with the agent, patient, or dative; it may refer to the number of occurrences of the verb action; or, it may have a classificatory role in relation to qualities of the referent noun. Some suppletive verbs mark three numbers: singular (1), dual (2), and multiple (3+); others mark only two: singular (1) and plural (2+). Suppletive adjectives invariably mark only two numbers.

Verbs that supplete tend to be transitive, intransitive referring to action, or positional. This pattern of number marking is in accordance with typological evidence from other North American Indian languages. According to Booker (1978:101), "If a language expresses number by full lexical suppletion, verbs of motion and position/location

will supplete before other intransitives. Transitives will not supplete unless intransitives do also."

Booker (1980:52) was the first investigator of Muskogean languages to point out that there are two distinct types of stem formation subsumed under the term "suppletion": affixation and lexical replacement. Affixation is more common than full lexical replacement in Mikasuki. A combination of affixation and lexical replacement often occurs.

Affixation

The rules that govern number marking by affixation on Mikasuki verbs are complex. If there are only two numbers (singular and plural), then rules 1 or 2 apply to the plural formation. If there are three numbers (singular, dual, and multiple), then rules 1 or 2 apply to the formation of the dual and rules 3 and 4 apply to the formation of the multiple from the dual.

1. When the root is CVC(VC)-, the dual (or plural) is CV(CV)sC-, i.e., an s infix before the last consonant of the root.

2. When the root is CV(CV)CC-, the dual (or plural) is (a) CV(CV)CC_1oC-, i.e., the infixed reduplication of the initial consonant plus o before the last consonant of the root, (b) CV(CV)ChoC-, i.e., a ho infix before the last consonant of the root. There is no apparent conditioning of the choice between C_1o and ho.

3. If there is a multiple, it is formed by suffixing -V:c to the dual stem, V being the stem vowel. (See Section 3.322 for a description of verb stem vowels.)

4. A long vowel in the singular or dual form loses its length in the multiple.

Table VIIIis a list of verbs that supplete for number by affixation, using the rules explained above. Both verbs with two and verbs with three numbers are included. The list is not exhaustive.

An adequate dictionary of Mikasuki would mark all verb roots as base or suppletive. If they are suppletive, the dictionary should indicate whether they are dual, plural, or multiple.

Three adjectives have been found that are exceptions to these rules.

1. /lo:c-/ 'black' (s.) /lo:sloc-/ 'black' (pl.)

Rules 1 and 2, which are normally mutually exclusive, were both applied to this plural formation.

2. /cikt-/ 'thick' (s.) /cikcit-/ 'thick' (pl.)
3. /tank-/ 'deserted' (s.) /tantak-/ 'deserted' (pl.)

These plurals were formed by a variation on Rule 2a. The infix consists of the root-initial consonant and its vowel rather than the root initial consonant plus o.

Lexical Replacement

The second method of number marking referred to by the term suppletion is full or partial lexical replacement. Lexical replacement is found in relatively few Mikasuki verbs. However, these are among the most commonly occurring verbs in the language. Table IX shows verbs with full lexical replacement. Table X includes the verbs with partial lexical replacement. Note that those verbs with partial replacement

Table VIII

Verbs That Supplete By Affixation

Rules	Singular	Dual/Plural	Multiple
1,3,4	CVC(VC)-	CV(CV)sC-	CV(CV)sCV:c-
fly	/yaka:l-/	/yaka:sl-/	/yakasli:c-/
drive	/sa:y-/	/sa:sy-/	/sasya:c-/
sleep	/no:c-/	/no:sc-/	/nosci:c-/
talk	/apo:n-/	/apo:sn-/	/aposni:c-/
know	/ata:χ-/	/ata:sχ-/	/atasχa:c-/
want	/ba:n-/	/ba:sn-/	/basna:c-/
good	/hi:χ-/	/hi:sχ-/	
go	/aχiy-/	/aχisy-/	/aχa:c-/
Rules			
2a,3,4	CV(CV)CC-	CV(CV)CC_1oC-	CV(CV)CC_1oCV:C-
walk	/ciya:hl-/	/ciyahco:l-/	/ciyahcoli:c-/
soft	/lokock-/	/lokoclo:k-/	
sweet	/kamosk-/	/kamosko:k-/	
long	/back-/	/bacbok-/	
red	/kitisc-/	/kitiskoc-/	
Rule			
2b	CV(CV)CC-	CV(CV)hoC-	
dark	/mocost-/	/mocoshot-/	
deep	/hayohk-/	/hayohhok-/	
short	/kickn-/	/kicikhon-/	
blue	/honotb-/	/honothob-/	
bad	/hamp-/	/hamhop-/	

Table IX

Full Replacement Verbs

	Singular	Dual/Plural	Multiple
die	/ill-/	/oks-/	
cut	/kos-/	/kalas-/	/wack-/
sit	/coko:l-/	/wi:k-/	/i:χ-/ or /wika:c-/
run	/χini:k-/	/pala:k-/	/mata:k-/
big	/co:b-/	/ho:t-/	
take pick up	/i:s-/	/aw-/	

Table X

Partial Replacement Verbs

	Singular	Dual/Plural	Multiple
come	/ont-/	/ola:w-/	/onti:c-/
arrive	/i:l-/	/itawk-/	/ila:c-/
lie	/tala:k-/	/salk-/	/salka:c-/ or /talaska:c-/
stand	/haca:l-/	/loko:k-/	/lokoka:c-/
enter	/cika:y-/	/cika:sy-/	/aci:k-/
do make	/sayk-/	/iso:k-/	/isoli:c-/
be around	/ayy-/	/yawk-/	/yawli:c-/

often follow the rules for affixation in the forms that do not take lexical replacement.

Uses of the Suppletive Verb Stem

Mikasuki verbs that supplete for number do so obligatorily. The morphological factors that require a verb to supplete vary. Most of these verbs supplete to indicate the number of the agent, patient or dative. Which person is determining the suppletive stem is discoverable in context and may be ambiguous.

/ya:t.ot no:c.om/ 'one person is sleeping'

/ya:t-/ 'person or people'

/-ot/ nominative

/-om/ auxiliary root

/ya:t.ot no:sc.om/ 'two people are sleeping'

/ya:t.ot no:sci:c.om/ 'people are sleeping'

/ili.:c.om/ 'she killed it'

/-:c/ causative

/-om/ auxiliary root

/oks.i.:c.om/ 'they killed it (them)' or 'she killed them'

A few verbs supplete according to the number of occurrences of the action of the verb. Some verbs supplete for plural verb persons and/or plural verb action. Others supplete only for verb persons or only for verb action.

Singular person, singular action:

/yatap.l.om.li/ 'I hit it once'

/-l/ transitive

/-om/ auxiliary root

/-li/ lst person singular agent

Singular person, multiple action:

/yatasp.l.om.li/ 'I beat it'

Multiple person, singular or multiple action:

/yatasp.l.om.i:ka/ 'we hit it once' or 'we beat it'

/-i:ka/ lst person plural agent

/kos.l.om/ 'cut (with a knife)'

/-l/ transitive

/-om/ auxiliary root

/kala:s.l.om/ 'cut (with a scissors)'

/wack.ik/ 'cut (hair), (chicken)'

/-ik/ same subject

Cloth-like items in Mikasuki take dual or plural stems with suppletive verbs regardless of the number of cloth-like items. Liquids take multiple or plural stems with suppletive verbs regardless of the number of liquids. All other classes of objects are treated as singular, dual/plural, or multiple/plural in accordance with the number of items involved. The following examples are of cloth-like and liquid items with suppletive verbs.

/ka:p.on aw.om/ 'she holds the jacket' (plural root)

/ka:p-/ 'jacket' (cloth-like)

/-on/ oblique case

/-om/ auxiliary root

/anc.i:ki sal.k.om/ 'the clothes lie' (dual root)

/anc-/ 'wear'

/-i:ki/ nominalizer (cloth-like)

/-k/ intransitive

/labank.on aw.om/ 'she holds the mud' (plural root)

/labank-/ 'mud'

/-on/ oblique

/-om/ auxiliary root

3.322 Stem Vowels

Some stem forming suffixes require a preceding vowel. Every Mikasuki verb root has associated with it one of two stem vowels: /a/ or /i/. These vowels are discoverable when the verb occurs with the causative suffix. They may also occur when verbs are inflected for certain tenses in traditional form (3.33). Table XI is a list of some verb roots plus their associated stem vowels.

The stem vowel does not form part of the verb stem. It is interesting to note that suppletive verbs that have full or partial lexical replacement may have different stem vowels in different numbers.

/coko:l-i-/ 'sit' (singular) /wik-a-/ 'sit' (dual)

Table XI

Verb Roots Plus Stem Vowels

/a/ Stem Roots
/takaʔk-a-/ 'work'
/hi:c-a-/ 'see'
/no:h-a-/ 'cook'
/a:b-a-/ 'resemble'
/i/ Stem Roots
/fa:y-i-/ 'hunt'
/ill-i-/ 'die'
/tabaks-i-/ 'straight'
/pafaks-i-/ 'smoke'

3.323 Transitive and Intransitive Stem Formation

As previously noted, all verb roots in Mikasuki fall into three classes: transitive, intransitive, or neutral. Transitive roots are inherently transitive, intransitive roots are inherently intransitive, and neutral roots must be derived into either transitive or intransitive in order to occur. The transitive suffix is (-l(i)) and the intransitive suffix is (-k(a)). The vowels of these two suffixes drop before a following vowel.

The transitive or intransitive suffix follows the verb root immediately and forms part of the verb stem. The following example shows how the transitive suffix becomes part of the verb stem. When the human plural affix (-ho-) occurs, it is infixed into the verb stem immediately preceding the last consonant of the stem. In this example, the (-ho-) precedes the transitive suffix, the last consonant of the stem.

/ci.yatap,ho,l.om.li/ 'I hit you all'

/ci-/ 2nd person patient

/yatap-/ 'hit'

/-ho-/ human plural

/-om/ auxiliary root

/-li/ 1st person singular agent

Table XII is a list of paired verb roots derived into transitive and intransitive stems.

There is some evidence that these suffixes serve to distinguish between active and mediopassive verb forms. Booker (1980:187) discusses

Table XII

Transitive and Intransitive Pairs

Transitive (-li)		Intransitive (-ka)	
/tala:-li-/	'lay'	/tala:-ka-/	'lie'
/kos-li-/	'cut'	/kos-ka-/	'be cut'
/wita:-li-/	'open'	/wita:-ka-/	'be open'
/yil-li-/	'burn'	/yil-ka-/	'burn'
/caw-li-/	'write'	/caw-ka-/	'written'
/baɣ-li-/	'break'	/baɣ-ka-/	'broken'

Proto-Muskogean *ka 'mediopassive' and *li 'active.' She says that modern reflexes of these forms are found in all modern Muskogean languages. Nicklas (1974:51-55) analyzes the cognate suffixes in Choctaw as 'passive' and 'active' respectively. Alabama/Koasati and Hitchiti/Mikasuki have both retained the two suffixes in unaltered form. Lupardus (1981), in her work with Alabama, suggests that /-ka/ is a 'mediopassive,' i.e., not a true passive, and /-li/ is 'active.'

This analysis is applicable to Mikasuki. Mikasuki has no true passive; however, verbs that take /-ka/ or /-li/ can participate in a kind of passive/active shift. When the /-ka/ suffix occurs, the agent noun is not specified and the patient noun takes the subject suffix. When the /-li/ suffix occurs, the agent noun may be specified and the patient noun takes the oblique suffix. In the following examples, the /-ka/ or /-li/ suffix will be underscored once and the subject/nominative suffix or the object/oblique suffix will be underscored twice.

Mediopassive:

/ilb.ot kos.k.i/ 'her hand got cut'

/ilb-/ 'hand' (patient)

/-ot/ nominative

/kos-/ 'cut'

/-i/ past II

Active:

/tayk.ot ilb.on kos.l.om/ 'the girl cut her hand'

/tayk-/ 'girl' (agent)

/-ot/ nominative

/ilb-/ 'hand' (patient)

/-on/ oblique

/kos-/ 'cut'

/-om/ auxiliary root

Mediopassive:

/ca.:y.ot am.baɣ.k.om/ 'my foot is broken'

/ca-/ 1st person singular inalienable possession

/iy-/ 'foot' (patient)

/-ot/ nominative

/am-/ 1st person singular dative

/baɣ-/ 'break'

/-om/ auxiliary root

Active:

/ca.:y.on baɣ.l.om.li/ 'I broke my foot'

/ca-/ 1st person singular inalienable possession

/iy-/ 'foot' (patient)

/-on/ oblique

/baɣ-/ 'break'

/-om/ auxiliary root

/-li/ 1st person singular agent

The preceding discussion demonstrates that the suffix $\binom{-l(i)}{}$ functions as both a transitive and an active marker and that the suffix

$\binom{-k(a)}{}$ functions as both an intransitive and a mediopassive marker. There is at least one example of $\binom{-k(a)}{}$ functioning as a mediopassive marker on a verb root that is otherwise inherently transitive, that is, that does not take a $\binom{-l(i)}{}$ suffix.

Verb inherently transitive:

/tayk.on hi:c.om.li/ 'I see the girl'

/tayk-/ 'girl' (patient)

/-on/ oblique

/hi:c-/ 'see'

/-om/ auxiliary root

/-li/ 1st person singular agent

Verb with $\binom{-k(a)}{}$:

/ca.hic.k.om/ 'I was born'

/ca-/ 1st person singular patient

/hic.k-/ 'be born'

/-om/ auxiliary root

3.324 Causative $\binom{-:c(i)}{}$

Mikasuki has a stem-forming causative suffix. This suffix requires a preceding vowel, either the stem vowel or the final vowel of the preceding suffix. Only the transitive or intransitive suffix may precede the causative suffix. The final /i/ of the causative suffix falls before a following vowel.

The causative occurs with intransitive active verbs and with stative verbs. On intransitive active verbs the causative suffix causes

the agent of the intransitive verb to become the patient of the causative verb. In the following examples the subject or nominative suffix occurs on the patient of the intransitive active verb and then on the agent of the causative verb. The causative suffix is underscored once and the nominative suffix is underscored twice.

Intransitive active:

/ca.yos.ot an.nakac.om/ 'my head hurts'

/ca-/ 1st person singular inalienable possession

/yos-/ 'head'

/an-/ 1st person singular dative

/nakac-/ 'hurt'

/-om/ auxiliary root

Causative:

/nakn.ot yos.on nokac.i.:c.om/ 'the man hurt his head'

/nakn-/ 'man'

/-on/ oblique

/-i/ Past II

When a causative suffix occurs on a stative verb, the agent of the resulting verb performs the verb action which results in the patient's acquiring the quality referred to in the stative verb root.

Stative:

/hamp.om/ 'it is bad'

Causative:

/hamp.a.:c.om/ 'she destroyed it'

Stative:

/co:b.om/ 'it's big'

Causative:

/co:b.a.:c.om/ 'she made it bigger'

When the causative suffix occurs on a suppletive multiple verb, the causative suffix follows the multiple stem. An epenthetic /i/ serves as the causative vowel. In the following examples the epenthetic /i/ is underlined.

Causative suffix on a suppletive multiple verb:

/aɣa:c.i.:c.i.li/ 'I started (something multiple)'

/aɣa:c-/ 'go' (multiple)

/-:c/ causative

/-i/ past II

/-li/ 1st person singular agent

/aposni:c.i.:c.om/ 'they gossip'

/aposni:c-/ 'talk' (multiple)

/-:c/ causative

/-om/ auxiliary root

When a Mikasuki verb root occurs with the causative suffix, the derived stem is related semantically to the original root but the meaning of the derived stem is not always predictable. The following are causative stems whose meanings are not predictable from the original root.

Original root:		Derived stem:	
/apo:n-/	'talk'	/apo:n.i.:c/	'gossip'
/hic/	'see'	/hic.a.:c-/	'take care of'
/aɣ.a.:c-/	'go'	/aɣ.a.:c.i.:c-/	'start'
	(multiple)		(multiple)

Neutral verb roots (those that must be derived into transitive or intransitive) do not usually take the causative suffix. If a neutral verb that has been derived into intransitive $\binom{-ka}{(\ )}$ does take a causative suffix, the $\binom{-ka}{(\ )}$ becomes $\binom{-li}{(\ )}$ (transitive) to allow the verb to take an object. The following examples are taken from Derrick-Mescua (1980:106).

/sawa:.k.om/ 'she's moving' (intransitive)

/sawa:.l.i.:c.om/ 'she's moving it' (causative and transitive)

3.33 Mikasuki Verb Inflection

Inflected verbs in Mikasuki must be marked for aspect (see Section 3.332), tense (see Section 3.333), and person (see Section 3.334). The analysis presented in the following pages is a result not only of the present study, but also has grown out of the work of previous investigators (Swanton 1921-22, Haas 1938-40, West 1974b, Derrick-Mescua 1980, and Booker 1980). This description is the first attempt to treat the entire verb-inflection system of Mikasuki. It is, of course, due to the work of these scholars that the present analysis is possible.

3.331 Auxiliary Verb Roots (-om[i]) and (-onk(a))

Mikasuki has two verb roots that occur both as independent verbs and also as suffixes that replace the stem vowel on inflected verbs.

1. (omm-) and (-om[i])

As an inflected verb:

/omm.i:p.ǐ.li/ 'I made' or 'I did'

/omm-/ 'make' or 'do'

/-i:p/ completive aspect

/-ǐ/ past II

/-li/ 1st person singular agent

As a suffix (-om[i]) replaces the stem vowel (Section 3.323) on inflected verbs. The use of this suffix is characteristic of the speech of young people (under age 40). Older people inflect verbs with the verb-stem vowel. The (-om[i]) suffix occurs in all tenses except the past II and future II. The following pairs of examples show traditional and contemporary forms. The stem vowel and the (-om[i]) suffix are underlined. Note that the stem vowel falls when the person inflection begins with a vowel. The /i/ of (-om[i]) occurs only to prevent an impossible consonant cluster.

Traditional:		Contemporary:	
/imp.a.li.s/	'I'm eating'	/imp.om.li.s/	'I'm eating'

/imp-/ 'eat'

/-li/ 1st person singular agent

/-s/ indicative mode

/imp.i:ka.s/ 'we're eating' /imp.om.i:ka.s/ 'we're

/-i:ka/ 1st person plural agent eating'

/imp.a.s/ 'she eats' /imp.omi.s/ 'she eats'

2. $\binom{\text{onk-}}{\text{onk-}}$ and $\binom{\text{-onk(a)}}{\text{-onk(a)}}$

As a root of an inflected verb, this morpheme means 'make noise, speak.'

/ónk.a.li/ 'I said'

/onk-/ 'speak'

/-a/ stem vowel

/-li/ 1st person singular agent

As a suffix $\binom{\text{-onk(a)}}{\text{-onk(a)}}$ it replaces either $\binom{\text{-om[i]}}{\text{-om[i]}}$ or the stem vowel. Derrick-Mescua (1980:383) argues that it is a progressive aspect marker. However, it is not a stem-forming suffix as all aspect markers are. West (1974b:3-4) calls it a secondary root and says that it indicates that the verb action occurs noisily. In free text the suffix usually occurs on "noisy" verbs such as: "call," "talk," "say." However, it is possible to elicit it occurring on verbs like "eat" or "see." In the following examples paired verbs were elicited with $\binom{\text{-onk(a)}}{\text{-onk(a)}}$ and $\binom{\text{-om[i]}}{\text{-om[i]}}$. The /a/ of $\binom{\text{-onk(a)}}{\text{-onk(a)}}$ drops before a following vowel.

With $\binom{\text{-onk(a)}}{\text{-onk(a)}}$: With $\binom{\text{-om[i]}}{\text{-om[i]}}$:

/imp.onka/ 'she's eating' /imp.om/ 'she's

/imp-/ 'eat' eating'

/hĩ:c.onka.li/ 'I'm looking now' /hĩ:c.om.li/ 'I'm looking now'

/hi:c-/ 'see'

/ṽ/ progressive aspect

/-li/ 1st person singular agent

The following are examples of $\binom{(}{(}$-onk(a)$\binom{)}{)}$ as it occurred in texts. Note that these examples involve noise.

/apo:n.onka.k.it/ 'she talked to herself'

/apo:n-/ 'talk'

/-k/ focus marker

/-it/ same subject

/haca:l.onk.in/ 'he stood' (calling me)

/haca:l-/ 'stand'

/-in/ different subject

3.332 Verb Aspect

The first component of verb inflection in Mikasuki is aspect. Any inflected verb has a prominent syllable which has significant pitch and is stressed. Aspect and tense marking operate in relation to the prominent syllable. All inflected verbs take at least one aspect. Morphologically, aspect operates in relation to the verb stem. Three of the four (or five) classes of aspect are ablaut: the neutral (significant pitch), the perfective (significant pitch), and the progressive/intensive (nasalization). The fourth aspect marker, the completive,

is a stem-forming suffix. The fifth aspect marker, an emphatic, is a stem-forming suffix.

Neutral aspect

When there is no indication of when or how the situation described by the verb came about, the verb is marked for neutral aspect. Present-tense verbs and past III and IV tense verbs may all take neutral aspect. Verbs may inflect only for neutral aspect or they may simultaneously take progressive/intensive or completive aspects.

Morphologically, a verb in neutral aspect (a) has the prominent syllable located before the verb stem boundary and (b) the prominent syllable has /mid/ pitch.

In these examples of present tense, neutral aspect verbs, the prominent syllable is underlined.

/pōck.om.li/ 'I feel it'
/pock-/ 'feel'
/-om/ auxiliary root
/-li/ 1st person singular agent

/fāc.k.om/ 'it is sharp'
/fac-/ 'sharp' (stative root)
/-k/ intransitive
/-om/ auxiliary root

/ca.:y.ot am.bāɣ.k.om/ 'my foot is broken'

/ca-/ inalienable possession 1st person singular

/:y-/ //iy-// 'foot'

/ot/ nominative

/am-/ 1st person singular dative

/baɣ-/ 'break'

/-k/ intransitive

/-om/ auxiliary root

Examples of past III, neutral aspect verbs:

/īm,h,p.a.li.s/ 'I ate' (several days ago)

/imp-/ 'eat'

/-h-/ past III

/-a/ stem vowel

/-li/ 1st person singular agent

/s/ indicative

/pafaks.ī.:,h,c.acka.s/ 'you all smoked' (several days ago)

/pafaks-/ 'smoke'

/-il/ stem vowel

/-i:c/ causative

/-h-/ past III

/-acka/ 2nd person plural agent

/-s/ indicative

/poc,hāyh,k.i:ka.s/ 'we felt it' (several days ago)

/pock-/ 'touch'

/-hayh-/ past III

/-i:ka/ 1st person plural inclusive agent

/-s/ indicative

Examples of past IV, neutral aspect verbs:

/hi:c.i.li.kta.s/ 'I looked at it a long time ago'

/hi:c-/ 'see'

/-i/ stem vowel

/-li/ 1st person singular agent

/-kta/ past IV

/-s/ indicative

/āyy.om.a:li.ta.wa/ 'someone was around a long time ago'

/ayy-/ 'be around'

/-om/ auxiliary root

/-a:li/ impersonal

/-ta/ past IV

/-wa/ inferential

Perfective aspect

When the action referred to by the verb is already finished, the verb is inflected for perfective aspect. The perfective aspect may co-occur with the completive aspect. When this aspect occurs on adjectives, it indicates the superlative.

The perfective aspect is indicated morphologically by /high/ pitch on the prominent syllable. Present tense verbs may be inflected for perfective aspect. Perfective aspect is marked redundantly for past I and II tenses and it may occur with past III and IV.

In these examples of present tense, perfective aspect verbs, the prominent syllable is underlined.

/kós.1.om.icka/ 'you just cut it'

/kos-/ 'cut'

/-l/ transitive

/-om/ auxiliary root

/-icka/ 2nd person singular agent

/bákf.om/ 'already blown up'

/bakf-/ 'swell'

/-om/ auxiliary root

/cáyh.om/ 'already grown'

/cayh-/ 'grow'

/-om/ auxiliary root

Examples of past I, perfective aspect verbs:

/hi:c.óm/ 'she has just looked at it'

/hi:c-/ 'see'

/-om/ auxiliary root

/imp.óm.i:ka/ 'we ate'

/imp-/ 'eat'

/-om/ auxiliary root

/-i:ka/ 1st person plural agent inclusive

Examples of past II, perfective aspect verbs:

/bakf.a.:c.í/ 'she is fat'

/bakf-/ 'swell'

/-a/ stem vowel

/-:c/ causative

/-í/ past II

/isk-í/ 'she drank'

/isk-/ 'drink'

/-í/ past II

Examples of past III, perfective aspect verbs:

/hi:c.ó,h,mi.li/ 'I looked at it a week ago'

/hi:c-/ 'see'

/-omi/ auxiliary root

/-h-/ past III

/-li/ 1st person singular agent

/kaba:.l.ó,h,m.icka/ 'you bit it once a week ago'

/kaba:-/ 'bite'

/-l/ transitive

/-om/ auxiliary root

/-h-/ past III

/-icka/ 2nd person singular agent

Examples of past IV, perfective aspect verbs:

/hi:c.í.kta/ 'she looked at it a long time ago'

/hi:c-/ 'see'

/-í/ past II

/-kta/ past IV

/an.kaba:l .o:t.í.kta/ 'I was cold last year'

/an-/ lst person singular dative

/kaba:l-/ 'cold'

/-o:t/ verbalizer

/-í/ past II

/-kta/ past IV

3.3323 Progressive/intensive Aspect

On active verbs (verbs of motion and positionals), this aspect indicates the progressive; on stative verbs, it marks the intensive. In a still more specialized usage, on adjectives, a subclass of stative verbs, this aspect indicates the comparative. Present tense past I and past IV verbs may take progressive aspect. This aspect may co-occur

with the completive. It must occur with either the perfective or the neutral aspect.

The morphological indication of the progressive aspect is the nasalization of the last vowel of the verb stem. It carries no pitch and cannot be the only aspect on an inflected verb.

Examples of present tense, progressive and neutral aspect verbs:

/ci.hi,hõ,:c.om.li/ "I see you all'

/ci-/ 2nd person patient

/hi:c-/ 'see'

/-ho-/ human plural affix

/-om/ auxiliary root

/-li/ 1st person singular agent

/hilãyh.k.om.li/ 'I'm crying'

/hilayh-/ 'cry'

/-k/ intransitive

/-om/ auxiliary root

/-li/ 1st person singular agent

/lok.sãyy.om/ 'one person driving'

/lok-/ locative prefix

/sayy-/ 'drive'

/-om/ auxiliary root

Examples of past I, progressive and perfective aspect verbs:

/takãλ.k.óm.li/ 'I was working'

/takaλ-/ 'work'

/-k/ intransitive

/-om/ auxiliary root

/-li/ 1st person singular agent

Examples of past IV, progressive and perfective aspect verb:

/hi,hõ,:c.î.ta.wa/ 'they saw it a long time ago'

/hi:c-/ 'see'

/-ho-/ human plural affix

/-í/ stem vowel

/-ta/ past IV

/-wa/ inferential

An interesting example of the restriction of the progressive to positional verbs (or motion verbs) is the following verb pair. The progressive aspect changes the verb form from a locative to a positional.

/coko̅:l.om.li/ 'I live there' (neutral)

/on.cokõ:l.om.li/ 'I'm sitting on it' (neutral and progressive)

/on-/ locative prefix

/coko:l-/ 'live' or 'sit'

/-om/ auxiliary root

/-li/ 1st person singular agent

A minimal pair that clearly differentiates a verb inflected for progressive and neutral aspect from a verb inflected for completive aspect is.

/hĭ:c.i.kta/ 'he saw it a long time ago' progressive, immutative aspect, past IV

/hi:c.ǐ.kta/ 'he already saw it a long time ago' perfective aspect, past IV

/hi:c-/ 'see'

/-i/ stem vowel

/-ǐ/ past II

/-kta/ past IV

When the progressive aspect marker and the intensive suffix (-os) occur together on stative verbs, they mark intensive aspect.

/ac.afac̃.k.os.om/ 'I'm very happy'

/ac-/ 1st person singular patient

/afac̃-/ 'happy'

/-k/ intransitive

/-os/ intensive

/-om/ auxiliary root

3.3324 Completive Aspect (-i:p)

When a verb action is expected to be complete, this aspect occurs. It is a stem-forming suffix. It occurs in all tenses and with all aspects.

Examples of the completive aspect in present tense:

/honlasc.ī:p.ik/ 'put some away' (present neutral)

/honlasc-/ 'put away (plural stem)

/-ik/ same subject

/aɣ̈iy.ī:p.om.li/ 'I'm leaving now' (present progressive)

/aɣiy-/ 'go'

/-om/ auxiliary root

/-li/ 1st person singular agent

/sakw.ī:p.om/ 'it's already dried up' (present perfective)

/sakw-/ 'dried up'

/-om/ auxiliary root

Example of completive aspect, past II:

/om.i:p.ī́.li/ 'I made'

/om-/ 'make'

/-ī́/ past II

/-li/ 1st person singular agent

Example of completive aspect, past III:

/hak.l.ī,h,p.ik/ 'to have heard'

/hak-/ 'hear'

/-l/ transitive

/-h-/ past III

/-ik/ same subject

Example of completive aspect, past IV:

/honc.ĩ:p.i.ta/ 'he quit' (perfective)

/honc-/ 'quit'

/-ĩ/ past II

/-ta/ past IV

/misik.a:ɣ.okl.ī:p.omi.kta/ 'they became Mexicans a long time ago' (neutral)

/misik-/ Mexican

/-a:ɣ/ plural

/-okl/ 'town'

/-omi/ auxiliary root

/-kta/ past IV

The neutral, progressive and perfective aspects play a specialized role with adjectives in the formation of the comparative and superlative. The neutral aspect indicates the positive form (big), the progressive marks the comparative (bigger) and the perfective marks the superlative (biggest). These aspects may alone indicate the comparisons or they may co-occur with a set of prefixes whose distribution is restricted to the formation of comparatives.

/cō:b.on/ 'big' (neutral)

/cō̄:b.on/ 'bigger' (progressive/intensive)

/có:b.on/ 'biggest' (perfective)

/băck.on/ 'long (neutral) /back.on/ 'long'

/băck.on/ 'longer' (progressive) /sim.băck.on/ 'longer'

/sim-/ comparative

/bâck.om/ 'longest' (perfective) /os.sim.bâck.on/ 'longest'

/os.sim-/ superlative

/căyh.on/ 'tall' (neutral)

/cāyh.on/ 'taller' (progressive)

/cáyh.om/ 'tallest' (perfective)

/hīɫ.on/ 'good' (neutral)

/hī̄ɫ.on/ 'better' (progressive)

/híɫ.om/ 'best' (perfective)

3.3325 Emphatic Aspect {-ay}

Certain positionals and verbs of motion take a suffix which appears to be aspectual. Its occurrence in these data is limited and it is difficult to determine the meaning of the suffix. When it co-occurs with the progressive aspect, the vowel of this suffix takes the nasalization {-ãy}.

/ila:c.ãy.i:ka.ti/ 'we're all coming, a group'

/ila:c-/ 'come' (multiple)

/-i:ka/ 1st person plural inclusive agent

/-ti/ emphatic

/aɣ.ãy.i.li/ 'I'm going!'

/aɣ-/ 'go'

/-i/ stem vowel

/-li/ 1st person singular agent

3.332 Verb Tense Inflection

Mikasuki grammar distinguishes three categories of time: present, future, and past. There are one present tense, two future tenses, and four past tenses. Tense is marked on all inflected verbs in Mikasuki. The pitch of the prominent syllable, the position of the prominent syllable in relation to the verb stem boundary, and the tense marking affixes constitute Mikasuki tense morphology (Derrick-Mescua 1980:380).

3.3321 Present Tense

Present time is indicated by the location of the prominent syllable before the verb stem boundary. Otherwise, present tense is unmarked. The height of the pitch of the prominent syllable is determined by the verb aspect. The following examples are present tense verbs that differ from each other as to person and aspect. The prominent syllable, which precedes the stem boundary, is underlined.

/pōck.a.li.s/ 'I feel it' (traditional form)

/pock-/ 'touch'

/mid/ neutral aspect

/-a/ stem vowel

/-li/ 1st person singular agent

/-s/ indicative mode

/hí:c.om/ 'she just saw it'

/hi:c-/ 'see'

/high/ perfective aspect

/-om/ auxiliary root

/ta.wãck.om.icka/ 'you're cutting (chicken)'

/ta-/ 'down'

/wack-/ 'cut' (multiple)

/mid/ neutral aspect

/Ṽ/ progressive aspect

/-om/ auxiliary root

/-icka/ 2nd person singular agent

/ac.a:fãc.k.os.om/ 'I'm very happy'

/ac-/ 1st person singular patient

/a:fac-/ 'happy'

/Ṽ/ intensive aspect

/mid/ neutral aspect

/-k/ intransitive

/-os/ 'very'

/-om/ auxiliary root

/cówp.om.i:ka/ 'we just bought it'

/cowp-/ 'buy'

/high/ perfective aspect

/-om/ auxiliary root

/-i:ka/ 1st person plural inclusive agent

3.3322 Future Tense

Mikasuki has two future tenses. Future I indicates near future, today or tomorrow. Future II indicates distant future, tomorrow on into more remote time. The time tomorrow when Future I becomes Future II is variable. Future time is marked morphologically by the location of the prominent syllable as the first syllable following the verb stem boundary. The prominent syllable takes /high/ pitch in the future tenses. Neutral and progressive aspects do not occur in the future tenses.

1. Future I $\binom{(-\acute{a}:(h))}{(}$

Near future is indicated by this suffix. The /h/ falls before a following consonant. In the following examples, the prominent syllable, which takes /high/ pitch, it underlined.

/ipt.á:h.om/ 'it's going to snow'

/ipt-/ 'snow'

/-om/ auxiliary root

/aɣ.á:h.om/ 'she's going to go'

/aɣ-/ 'go'

/-om/ auxiliary root

/pock.á:.li.wa/ 'I shall touch it'

/pock-/ 'touch'

/-li/ 1st person singular agent

/-wa/ inferential

When the Future I suffix (-á:(h)) immediately precedes the auxiliary root (-om[i]), the two forms normally contract into (-á:m).

/apaks.on aɣ.á:m.li/ 'I'm going to leave tomorrow'

/apaks-/ 'tomorrow'

/-on/ oblique case

/aɣ-/ 'go'

/-li/ 1st person singular agent

/no:c.á:m/ 'she will sleep'

/no:c-/ 'sleep'

/himayahcãl.on tatiyãh.on imp.á:m.acka.s/ 'you're going to eat chicken right now'

/himayahcãl-/ 'right now'

/-on/ oblique case

/tatiyãh-/ 'chicken'

/-on/ oblique

/imp-/ 'eat'

/-ackal/ 2nd person plural agent

/-s/ indicative

Some investigators (West 1974a, Booker 1980) consider (-á:(h)) to be an inceptive aspect marker rather than future tense. However, forms with this suffix meet the morphological criteria for future tense: the prominent syllable is the first full syllable after the verb stem boundary and the prominent syllable has /high/ pitch. Aspect, on the other hand, is characterized by its effect on the verb stem in Mikasuki. That this suffix does not form part of the verb stem is demonstrated by

the following example. The form in this example has the human affix $\binom{-ho-}{}$ which always immediately precedes the last consonant of the verb stem. The Future I marker $\binom{-\acute{a}:(h)}{}$ follows the last consonant of the verb stem in the following example.

/cim.a:s.a.ho.:c.á:m.li/ 'I'll help you all'

/cim-/ 2nd person dative

/a:s-/ 'help'

/-a/ stem vowel

/-ho/ human plural

/-:c/ causative

/-li/ 1st person singular agent

2. Future II $\binom{-la:ka}{}$

Distant future, tomorrow at the earliest, is indicated by this tense. The suffix follows the person inflection in all forms except the first person singular. In the first person singular, it is contracted to $\binom{-la:}{}$ and it precedes the person inflection.

Future II is also indicated by /high/ pitch on the prominent syllable which is the first syllable of the Future II morpheme.

The Future II tense cannot be formed with the $\binom{-om[i]}{}$ auxiliary root. The Future II suffix usually follows the verb stem vowel; however, the stem vowel falls in order to prevent a vowel cluster. In the following examples, the Future II tense marker is underlined once and where the verb stem occurs, it is underlined twice.

/pock.a.lá:.li.s/ 'I shall feel it'

/pock-/ 'touch'

/-li/ 1st person singular agent

/-s/ indicative mode

/pock.icka.lá:ka.s/ 'you'll feel it'

/-icka/ 2nd person singular agent

/po.to:ɣon.ka.lá:ka.s/ 'we'll cough'

/po-/ 1st person plural patient

/to:ɣon-/ 'cough'

/-ka/ intransitive

/limat.k.acka.lá:ka.s/ 'you all will swallow'

/limat-/ 'swallow'

/-k/ intransitive

/-acka/ 2nd person plural agent

3.3323 Past Tense

Mikasuki has four past tenses. The time to which the tenses refer can be specified only in relation to each other. Past I is most recent, referring usually to "a few minutes ago" but sometimes as long ago as "last week." Past II is further in the past than I. Generally it refers to "this morning," "yesterday," or "last night." Past III is further in the past than I or II. It refers to a time that is "several days ago," "last month," or even "last year." Past IV is the remote past, "a long time ago." This is normally at least several years ago.

There is an overlap in the times referred to by these tenses. It is clear, however, that they are ranked hierarchically in relation to

each other. This ranking has grammatical as well as semantic significance. (See Section 4.42.)

Most verbs in past tense have the prominent syllable as the first syllable following the stem boundary. However, past tense forms inflected for neutral aspect will have as the prominent syllable the last syllable before the stem boundary.

1. Past I

The first past tense in Mikasuki must have the prominent syllable as the first syllable after the stem boundary. The pitch of the prominent syllable is /high/. Otherwise, Past I forms are unmarked. Note that Past I forms cannot occur in neutral aspect. In the examples, the prominent syllable is underlined.

/hi:c.ónka.li/ 'I was looking at it a minute ago'

/hi:c-/ 'see'

/-ónka/ auxiliary root

/-li/ 1st person singular agent

/hi:c.óm/ 'she has just looked at it'

/hi:c-/ 'see'

/-óm/ auxiliary root

/imp.óm.i:ka/ 'we ate' (last week)

/imp-/ 'eat'

/-óm/ auxiliary root

/-i:ka/ 1st person plural inclusive agent

2. Past II

Past II is indicated by a suffix (-í) which immediately follows the verb stem. The syllable with this suffix is always the prominent syllable. When the Past II suffix precedes the 2nd person plural agent suffix (-acka), the /i/ falls and the /high/ pitch plus nasalization occurs on the /a/ of (-ácka). Past II forms cannot occur in neutral aspect. In the following examples, the prominent syllable is underlined.

/aɣ.ay.í.li/ 'I went this morning'

/aɣ-/ 'go'

/-ay/ emphatic aspect

/-í/ Past II marker

/-li/ 1st person singular agent

/imp.í/ 'she ate'

/imp-/ 'eat'

/-í/ Past II marker

/imp.ácka/ 'you all ate'

/-ácka/ 2nd person plural agent, Past II

/imp.í:cka/ 'you ate yesterday'

/-í/ Past II marker

/-icka/ 2nd person singular agent

3. Past III

This tense is indicated by an infix which immediately precedes the last consonant of the prominent syllable. The infix is realized as (-h-) except when /h/ insertion would result in an impermissible consonant cluster, in which case (-hayh-) is inserted. The first four examples

are in neutral aspect and therefore the prominent syllable is the last syllable before the stem boundary. The prominent syllable in each example is underlined.

/ī̲m,h,p̲.icka.s/ 'you ate' (about three days ago) (traditional)

/imp-/ 'eat'

/-h-/ Past III marker

/V̄/ immutative aspect marker

/-icka/ 2nd person singular agent

/-s/ indicative mode

/ī̲m,h,p̲.om.acka.s/ 'you all ate' (contemporary)

/imp-/ 'eat'

/-h-/ Past III marker

/V̄/ immutative aspect marker

/-om/ auxiliary root

/-acka/ 2nd person plural agent

/-s/ indicative mode

/p̄o̲c̲,hayh,ka.li.s/ 'I felt it' (traditional)

/pock-/ 'feel'

/-a/ stem vowel

/-hayh-/ Past III marker

/-V̄/ immutative aspect

/-li/ 1st person singular agent

/-s/ indicative mode

/poc,hāyh,k.i.ka.s/ 'we felt it' (about three days ago)

(traditional)

/pock-/ 'feel'

/V̄/ immutative aspect

/-hayh-/ Past III marker

/-i:ka/ 1st person plural inclusive agent

/-s/ indicative mode

The following three examples are in perfective aspect and the prominent syllable takes /high/ pitch. All past tense forms other than those in neutral aspect have the prominent syllable as the syllable immediately following the verb stem boundary. In these examples, the prominent syllable is underlined.

/aχ.ó,h,mi.li/ 'I went' (last year)

/aχ-/ 'go'

/-ómi/ auxiliary root

/-h-/ Past III marker

/-li/ 1st person singular agent

/hi:c-ó,h,mi/ 'she looked at it a week ago'

/hi:c-/ 'see'

/-ómi/ auxiliary root

/-h-/ Past III marker

/kabl.ó,h,mi.li/ 'I bit it many times a week ago'

/kabl-/ 'bite' (plural stem)

/-ómi/ auxiliary root

/-h-/ Past III marker

/-li/ 1st person singular agent

4. Past IV

Forms inflected with the suffix (-kta) refer to a time remote in the past. The forms are usually glossed as "a long time ago." In rapid speech the /k/ of the suffix is often lost.

There are two ways to form the Past IV. The first way adds the Past IV suffix to the verb stem, after it has been inflected for person. The Past IV suffix follows the person inflection.

/pafaksī.:ci.li.kta.s/ 'I smoked a long time ago'

/pafaksī-/ 'smoke'

/-:ci/ causative

/V/ immutative aspect

/-li/ 1st person singular agent

/-kta/ Past IV

/-s/ indicative mode

/limā:.k.icka.kta.s/ 'you swallowed a long time ago'

/limā:-/ 'swallow'

/-k/ intransitive

/-icka/ 2nd person singular agent

/-kta/ Past IV

/-s/ indicative mode

/īmp.om.i:ka.kta/ 'we ate it a long time ago'

/īmp-/ 'eat'

/-om/ auxiliary root

/-i:ka/ 1st person plural inclusive agent

/-kta/ Past IV marker

The other method of forming Past IV is to suffix the Past IV morpheme to verbs already inflected for Past II. It is not known what conditions the choice between these two forms of the Past IV.

/pock.í:.ta.s/ 'she felt it a long time ago'

/pock-/ 'feel'

/-í/ Past II marker

/-ta/ Past IV marker

/-s/ indicative mode

/hi:c.í.kta/ 'she looked at it a long time ago'

/hi:c-/ 'see'

/-í/ Past II marker

/-kta/ Past IV marker

3.333 Verb Person Inflection

Within the Mikasuki verb phrase any non-third person requires a person affix. The choice of the person affix class is determined by the root class of the verb: active or stative.

Active verbs inflect for subject with agent suffixes; patient prefixes indicate subject on stative verbs although a few stative verbs, adjectives with derived meanings, inflect for subject with dative prefixes.

To indicate object active transitive verbs take patient or dative prefixes. Some verbs take patient and some verbs take dative as object prefixes. Verbs that can take two objects have the direct object in the patient case and the indirect object in the dative case.

Of the three person affix classes, one (agent) has limited application and two (patient and dative) have relatively wide application. Agent suffixes are found only as the subject of active verbs. Patient and dative prefixes occur as the subject of stative verbs and the objects of active transitive verbs. In addition, the patient and dative prefixes are found on nouns as indicators of inalienable and alienable possession respectively (See Section 3.261).

Class 1. Agent Suffixes

The agent suffixes indicate active involvement of the subject. They occur on all transitive verbs and on those intransitives that refer to movement. Table XIIIshows the agent suffixes of Mikasuki. The first person plural inclusive includes second person and the first person plural exclusive excludes second person. Table XIV is an active verb inflected with agent suffixes.

Agent suffixes are often separated from the verb stem by more than one morpheme. These suffixes follow all tense and aspect markers except the remote past IV morphene and the remote future II morpheme. They precede the focus markers, modals, and syntactic suffixes. The following are examples of the location within the verb form of the agent suffixes.

/ĩmp.om.li/ 'I'm eating' (present tense, neutral aspect)

/imp-/ 'eat'

/-om/ auxiliary root

Table XIII

Agent Suffixes

	Singular	Plural	
1 p.	-li	-i:ka	inclusive
		-o:	exclusive
2 p.	-icka	-acka	
3 p.	ø	ø	

Table XIV

Verb Inflected With Agent Suffixes

	Singular	Plural
1p.	/ko:s.l.om.li/ 'I cut'	/ko:s.l.om.i:ka/ 'we cut' (you included)
		/ko:s.l.om.o:/ 'we cut' (you excluded)
2p.	/ko:s.l.om.icka/ 'you cut'	/ko:s.l.om.acka/ 'you all cut'
3p.	/ko:s.l.om ø/ 'cut'	/ko:s.l.om ø/ 'cut'

/aɣiy.i:p.á:m.li/ 'I'm going to go' (future I, completive aspect)

/aɣiy-/ 'go'

/-i:p/ completive

/-á:m/ future I

/pafaks.i.:c.icka.lá:ka.s/ 'you will smoke' (future II)

/pafaks-/ 'smoke'

/-i/ stem vowel

/-:c/ causative

/-lá:ka/ future II

/-s/ indicative

/imp.ícka.kta.s/ 'you ate a long time ago' (past IV, perfective aspect)

/imp-/ 'eat'

/-kta/ past IV

/-s/ indicative

/yáwk.om.i:ka.si/ 'we two were just around' (present, perfective aspect)

/yawk-/ 'be around' (dual)

/-om/ auxiliary root

/-si/ 'just'

/hi:c.õ:.ta.wa/ 'we (not you) used to look at it' (past IV, progressive aspect)

/hi:c-/ 'see'

/Ṽ/ progressive

/-ta/ past IV

/-wa/ inferential

/pock.ácka.kta.s/ 'you all felt it a long time ago' (past IV, perfective)

/pock-/ 'touch'

/-kta/ past IV

/-s/ indicative

Class 2. Patient Prefixes

Patient prefixes are found as the subject of stative verbs and the object of active transitive verbs. Some active verbs can take only one object and it must be in the patient case; some active verbs can take only one object and it must be in the dative case. If an active, transitive verb takes two objects, the direct object will be patient case and the indirect object will be dative case. Table XV shows the patient prefixes and Table XVIpresents two stative verbs inflected for subject with patient prefixes.

Active verb, one object, patient case:

/ac.a.hic.a.:c.om/ 'she's taking care of me'

/a-/ locative

/hic-/ 'see'

/-a/ stem vowel

/-:c/ causative

/-om/ auxiliary root

Table XV

Patient Prefixes

Singular 1	---- ca/____consonant or /i/
	---- ac elsewhere
Plural 1	---- po/____consonant or /i/
	---- ipo elsewhere
2	---- ci/____consonant or /i/
	---- ic elsewhere
3	---- (i)
Reciprocal*	---- ti/____consonant or /i/
	---- it elsewhere
Reflexive*	---- il

*Reflexcive and reciprocal forms occur only as objects with active verbs.

Table XVI

Verb Inflected With Patient Prefixes For Subject

	/ba:n-/ 'want'	/a:fa:c-/ 'be happy'
1 p.s.	/ca.ba:n.om/ 'I want'	/ac.a:fãc.k.os.om/ 'I'm very happy'
1 p.p.	/po.ba:n.om/ 'we want'	/ipo.:fãc.k.os.om/ 'we're very happy'
2 p.	/ci.ba:n.om/ 'you want'	/ci.:fãc.k.os.om/ 'you're very happy'
3 p.	/i.ba:n.om/ 'want(s)'	/Ø a:fãc.k.os.om/ 'are (is) very happy'

Active verb, one object, dative case:

/am.a:s.ã.:c.om/ 'she's helping me'

/a:s-/ 'help'

/-a/ stem vowel

/-:c/ causative

/-om/ auxiliary root

Active verb, two objects:

/s.am.Ø.i:l.om.icka/ 'you bring it to me'

/s-/ instrumental

/i:l-/ 'come'

/-om/ auxiliary root

/-icka/ 2nd person singular agent

Generally, when a verb inflects for subject with patient prefixes, the third person marker is null Ø. However, certain verbs require an $\binom{i-}{(i-)}$ prefix to indicate third person. It is not predictable which verbs will require this prefix.

The patient prefixes also occur as the object of active verbs. It is in this context that the reflexive and reciprocal prefixes occur.

The following examples are of patient prefixes as objects of active transitive verbs.

/ci.hi,hõ,:c.om.li/ 'I see you all'

/hic-/ 'see'

/-ho-/ human plural

/-om/ auxiliary root

/-li/ 1st person singular agent

/po.ko:s.l.om/ 'she cut us'

/ko:s-/ 'cut'

/-l/ transitive

/-om/ auxiliary root

/il.hĩ:c.om.acka/ 'you all see yourselves'

/hi:c-/ 'see'

/-om/ auxiliary root

/-acka/ 2nd person plural agent

/il.ama:s.om.li/ 'I help myself'

/ama:s-/ 'help'

/-om/ auxiliary root

/-li/ 1st person singular agent

/ti.hi:c.om/ 'they saw each other'

/hi:c-/ 'see'

/-om/ auxiliary root

A few verbs in Mikasuki can inflect for subject with either an agent suffix or a patient prefix. Nicklas noticed a similar phenomenon in Choctaw (1974:35). He postulates that the decision whether to use the agent suffix or the patient prefix as subject has to do with the voluntary or involuntary nature of the participation of the subject. This appears to be true in Mikasuki, also.

Subject-agent suffix:		Subject-patient prefix:	
/no:c.i:p.a.li/	'I'm going to sleep'	/ca.no:c.i.p.om/	'I'm sleepy'
/no:c/	'sleep'	/no:c-/	'sleep'
/-i:p/	completive aspect	/-i:p/	completive aspect
/-a/	stem vowel	/-om/	auxiliary root
/tabaks.ĩ.:c.om.li/	'I'm straightening'	/ca.tabaks.om/	'I'm sober'
/tabaks-/	'straight'	/tabaks-/	'straight'
/-i/	stem vowel	/-om/	auxiliary root
/-:c/	causative		
/-om/	auxiliary root		

Class 3. Dative Prefixes

The dative prefixes normally occur as the object prefixes of active transitive verbs. If a verb takes both patient and dative cases, the dative prefix indicates the indirect object. Dative prefixes sometimes occur as the subject affixes for certain adjectives with derived meanings. Usually adjectives, which are verbs in Mikasuki, inflect for subject with patient prefixes. The choice of dative as subject marker instead of patient appears to be based on the difference between the inherent characteristic (patient prefix) and a temporary condition (dative prefix). This phenomenon was first noted for a Muskogean language by Nicklas (1974) in his work with Choctaw. The distinction appears to be like the Spanish ser/estar difference. Examples in Mikasuki are:

Subject dative prefix:

/a:.hayy.i,h,c.in/ 'I was hot'

/hayy-/ 'hot'

/-ic/ causative

/-h-/ past III

/-in/ different subject

/in.maɣa:.l.om/ 'she's afraid'

/maɣa:-/ 'fear'

/-l/ transitive

/-om/ auxiliary root

Subject patient prefix:

/ca.hayy.i.k.in/ 'I'm getting a fever'

/hayy-/ 'hot'

/-i/ stem vowel

/-k/ remote focus

/-in/ different subject

/ca.maɣa:.l.om/ 'I fear'

/maɣa:-/ 'fear'

/-l/ transitive

/-om/ auxiliary root

Table XVII is a chart of the dative prefixes and their morphophonemic variation. Table XVIII is an adjective, a type of stative verb, inflected for subject with dative prefixes.

More commonly, the dative prefixes occur as objects on active transitive verbs. The following forms are examples of dative prefixes as objects. It is in this context that the reciprocal and reflexive forms oocur.

/an.ta.ko:s.l.om/ 'she's cutting it for me'

/ta-/ locative prefix

/ko:s-/ 'cut'

/-l/ transitive

/-om/ auxiliary root

Table XVII

Dative Prefixes

	(C)Ṽ̰:/___fricative, y, w	(C)Vm/___vowel, bilabial	(C)Vn/___elsewhere
Sg. 1	ã:-	am-	an-
Pl. 1	põ:-	pom-	pon-
2	cĩ:-	cim-	cin-
3	ĩ:-	im-	in-
Reciprocal*	tĩ:-	tim-	tin-
Reflexive*	ilĩ:-	ilim-	ilin-

*Reciprocal and reflexive forms occur only as objects on active verbs.

Table XVIII

Verb Inflected For Subject With Dative Prefixes

Sg. 1	/an.kabã:l.on/	'I'm cold'
Pl. 1	/pon.kabõ:l.on/	'we're cold'
2	/cin.kabã:l.on/	'you're cold'
3	/in.kabã:l.on/	'be cold'

/cim.a:s.a.:c.om/ 'they help you-

/a:s-/ 'help'

/-a/ stem vowel

/-:c/ causative

/-om/ auxiliary root

/im.omm.om/ 'she made it for him'

/omm-/ 'make'

/-om/ auxiliary root

/in.cob.a.:c.om/ 'she is making it bigger'

/cob-/ 'big'

/-a/ stem vowel

/-:c/ causative

/-om/ auxiliary root

/ilin.noka:c.i.:c.om.li/ 'I hurt myself'

/noka:c-/ 'hurt'

/-i/ stem vowel

/-:c/ causative

/-om/ auxiliary root

/-li/ 1st person singular agent

/tim.a:s.a.:c.ik/ 'a lot of people help each other'

/a:s-/ 'help'

/-a/ stem vowel

/-:c/ causative

/'Ok/ same subject

3.334 Non-inflectional Person Indicators

Mikasuki has two person affixes that are used optionally with inflected verbs.

1. Human Plural Infix $\binom{-ho-}{(\quad)}$

In Mikasuki verbs plurality of the second and third persons may optionally be indicated by this infix. Its occurrence marks number for the agent, patient, or dative cases.

Inflected active verbs--that is, those with agent suffixes--are ambiguous for number in the third person only. And this infix occurs only in the third person to mark plurality for an agent suffix.

Inflected verbs that have patient or dative prefixes are ambiguous for number in both the second and third persons. This infix occurs with both second and third person patient and dative prefixes to mark plurality.

If an inflected verb has both agent and patient (or dative) affixes and the human plural infix occurs, the infix refers to the patient or dative case.

When $\binom{-ho-}{(\quad)}$ occurs, it is infixed into the verb stem immediately preceding the last consonant of the verb stem (see Section 3.32).

It is interesting that in all free texts gathered for this research, $\binom{-ho-}{(\quad)}$ occurred in verb forms where explicitness about number was required by the context. It did not routinely occur when there was a plural referent. However, $\binom{-ho-}{(\quad)}$ was produced for all formally elicited verb paradigms, for the third person plural agent suffix and for the second and third person plural patient and dative prefixes.

The production of these forms was clearly a response to translation pressures from English.

Examples of $\binom{\text{-ho-}}{\text{(-ho-)}}$ are

/im,ho,p.om.ali/ 'a lot of people eat'

/imp-/ 'eat'

/-om/ auxiliary root

/-ali/ impersonal

/ci.hi,ho,:c.i.la:.li/ 'I'll see you all'

/ci-/ 2nd person patient

/hi:c-/ 'see'

/-i/ stem vowel

/-la:/ future II

/-li/ 1st person singular agent

/ci.to:ɣo,ho,ka.la:ka.s/ 'you all will cough'

/ci-/ 2nd person patient

/toɣoka-/ 'cough'

/-la:ka/ future II

/-s/ indicative

/pafaks.i,ho,:c.is/ 'they're smoking'

/pafaks-/ 'smoke'

/-i/ stem vowel

/-:c/ causative

/-is/ indicative

An interesting instance of (-ho-) in the data on which this description is based is

/ho.tap.l.om/ 'hit into pieces' /yatap.l.om/ 'hit' (once)

/-l/ transitive /-l/ transitive

/-om/ auxiliary root /-om/ auxiliary root

In the example above, the (-ho-) affix is found as a frozen prefix, it is not separable, there is no human referent, and the affix functions as a distributive. Although this function is highly unusual for Mikasuki, according to Lupardus (1981) the general modern-day function of ho in Muskogean languages is as a distributive.

2. Impersonal (-a:li)

Although the third person is unmarked in Mikasuki, there is a suffix (-a:li) which is an impersonal person, similar to the British "one" or the American "they." It occurs with verbs when the third person referred to is unknown or unspecified. It is not obligatory.

/hi:c.om.a:li/ ' lot of people are looking'

/hi:c-/ 'see'

/-om/ auxiliary root

/ã:.hak.l.om.a:li.ti/ 'somebody asked me!'

/ã:-/ lst person singular dative

/hak-/ 'ask'

/l/ transitive

/-om/ auxiliary root

/-ti/ emphatic

3.34 Locative Prefixes

Relative location is important in Mikasuki grammar. Within the verb there are four order classes of verb prefixes that describe the spatial orientation of the action of the verb relative to the speaker. These prefixes are described below in the order in which they occur, beginning with the prefixes farthest away from the verb root. Table XIX shows the order of occurrence of the prefixes.

3.34. Destination

These prefixes denote a location as either the same as that of the speaker or as different from that of the speaker. West (1974a:3). feels that these prefixes are derived verb roots from

(il-) 'arrive here' and (oɣ-) 'arrive there'

The destination prefixes occur in the position farthest away from the verb root and are mutually exclusive with each other.

1. (i:h-) or (i:l-) 'here' (by the speaker)

/i:h.ka:.aɣa:l.ik/ 'it went into the water' (and splashed me)

/ka:-/ 'into the water'

/aɣa:l-/ 'go'

/-ik/ same subject

/i:l.o:ɣ.a.wa/ 'she made round trips beginning there' (West 1974:4)

/o:ɣ-/ 'arrive'

/-a/ stem vowel

/-wa/ inferential

Table XIX

Locative Prefixes

Destination	Direction	Instrument	Person	Location	Verb Root
/i:h-/ or /i:l-/	/sap-/	/[i] s-/		/acak-/	
/oh-/ or /oɣ-/	/lok-/			/ka:-/	
				/õ:-/, /om-/ or /on-/	
				/[a] w -/	
				/ta-/	

The two forms appear to be in free variation. Further research is needed to discover whether dialect variation or other factors may determine the choice of forms.

2. (oh-) or (oɣ-) 'there' (away from speaker)

/oh.coko:l.om/ 'she arrived there and sat down'

/coko:l-/ 'sit'

/-om/ auxiliary root

/oɣ.ontic.i:p.om.i:ka/ 'then we came back'

/ontic-/ 'come' (multiple)

/-i:p/ completive

/-om/ auxiliary root

/-i:ka/ 1st person plural inclusive agent

Again, these two forms appear to be in free variation with each other.

3.342 Direction

Two directional prefixes are found in Mikasuki. These prefixes specify the location of the verb action. They occur in the position immediately following destination and they are mutually exclusive.

1. (sap-) 'away from'

/sap.aɣiy.om/ 'go away from'

/aɣiy-/ 'go'

/-om/ auxiliary root

/sap.hi:c.om/ 'look away'

/hi:c-/ 'see'

/-om/ auxiliary root

2. (lok-) 'toward'

/oh.lok.hi:c.omi.k.in/ 'look back toward'

/oh-/ 'there'

/hi:c-/ 'see'

/-omi/ auxiliary root

/-k/ remote focus

/-in/ different subject

/lok.ciyahl.om/ 'walk toward'

/ciyahl-/ 'walk'

/-om/ auxiliary root

3.343 Instrumental

Mikasuki has one instrumental prefix.

([i]s-) 'by means of,' 'with'

The instrumental prefix is always realized as /s-/ except when a word-initial consonant cluster would result. In that case it is realized as /is-/.

/s.aya:y.i.h.in/ 'show it off'

/aha:y-/ 'teach'

/-i/ stem vowel

/-h/ proximate focus

/-in/ different subject

/is.cim.i:l.om.li/ 'I bring it to you'

/cim-/ 2nd person dative

/i:l/ 'come'

/-om/ auxiliary root

/-li/ 1st person singular agent

3.344 Location

The following prefixes specify the location of the verb activity. There are five of them and they are mutually exclusive. They occur between the person prefix and the verb root.

1. (acak-) 'with'

/acak.i.l.om/ 'come with me'

/i:l-/ 'come'

/-om/ auxiliary root

/ac.acak.aɣiy.om/ 'go with me'

/ac-/ 1st person singular patient

/aɣiy-/ 'go'

/-om/ auxiliary root

2. (ka:-) 'in the water'

/ka:.yawli:c.om/ 'moving around in the water'

/yawli:c-/ 'be around' (plural)

/-om/ auxiliary root

/ih.ka:.aɣ.a:li.k/ 'it went in'

/ih-/ 'here'

/aɣ-/ 'go'

/-a:li/ impersonal

/-ik/ same subject

3. (a[w]-) 'unspecified location'

The /w/ on this suffix occurs only to prevent a vowel cluster; the suffix occurs when there is a location but it is unspecified.

/aw.i:l.om/ 'something coming closer'

/i:l-/ 'come'

/-om/ auxiliary root

/a.haca:l .isk.in/ 'standing beside it'

/haca:l-/ 'stand'

/-isk/ participle

/-in/ different subject

4. (ta-) 'down'

/ta.wa:ck.om.li/ 'I cut' (like chicken)

/wa:ck-/ 'cut' (plural)

/-om/ auxiliary root

/-li/ 1st person singular agent

/ta.coko:l.ik/ 'sit down'

/coko:l-/ 'sit'

/-ik/ same subject

5. (õ:), (om-), (on) 'on'

This prefix is realized as a nasalized long vowel before fricatives, /y/ and /w/; as a vowel plus /m/ before vowels and bilabials; and as a vowel plus /n/ elsewhere.

/õ:yawk.ik/ 'be around' (on the top)
/yawk-/ 'be around' (dual)
/-ik/ same subject
/on.coko:l.om/ 'sat on it'
/coko:l-/ 'sit'
/-om/ auxiliary root

Five prefix positions precede the verb root in Mikasuki. The maximum that have been found to co-occur on the same root is three. If three prefixes co-occur, one must be a person prefix.

Two prefixes:
/oh.lok.hi:c.omi.k.in/ 'she turned around to see'
/oh-/ 'there'
/lok-/ 'toward'
/hi:c-/ 'see'
/-omi/ auxiliary root
/-k/ remote focus
/-in/ different subject

/s.a.tokl.in/ 'two times'

/s-/ instrumental

/a-/ unspecified

/tokl-/ 'two'

/-in/ different subject

Three prefixes:

/sap.s.in.bakah.1.in/ 'she threw it away'

/sap-/ 'away'

/s-/ instrumental

/in-/ 3rd person dative

/bakah-/ 'throw'

/-1/ transitive

/-in/ different subject

Mikasuki has a type of locative cross-reference system. That is, when there is a locative noun phrase in a sentence the verb normally takes a locative prefix. This system is described in Chapter IV, Section 4.2.

3.35 Derivational Suffixes

Mikasuki has five derivational suffixes. Two of them qualify the meaning of the verb stem on which they occur. They convey a sense of intensity and occur only on stative verbs. The third derivational suffix creates a participle construction on clause level verbs (see Section 4:0). The fourth derivational suffix verbalizes nouns.

3.351 Intensifiers

1. (-os) This suffix, together with the progressive/intensive aspect marker, adds intensity to the verb meaning. Only stative verbs take this suffix.

/po.:fã:c.k.os.om/ 'we're very happy'

/po-/ 1st person plural patient

/(a)fac-/ 'happy'

/-k/ intransitive

/-om/ auxiliary root

As a prefix on adjectives this morpheme indicates the superlative.

/os.sim.bac.k.on/ 'the longest'

/sim-/ comparative

/back-/ 'long'

/-on/ oblique case ending

2. (-pick) Intensifier II

This suffix also serves as an intensifier for stative verbs.

/kaba:.li.pick.on/ 'very cold'

/kaba:-/ 'cold'

/-li/ intransitive

/-on/ oblique

/hĩɣ.pick.on/ 'pretty good'

/hiɣ-/ 'good'

/-on/ oblique

3.342 $\underset{(\text{-isk})}{(\text{-isk})}$ Participle

This suffix occurs on clause level verbs (see Section 4.0). It changes an active verb into one that is descriptive of the noun to which it refers.

/halpat.ot ka:.tala:.k.isk.it im.i:p.ĩ́/ 'the alligator lying in the water ate them'

/halpat-/ 'alligator'

/-ot/ nominative

/ka:-/ 'in the water'

/tala:.k-/ 'lie'

/-it/ same subject

/imp-/ 'eat'

/-i:p/ completive

/-ĩ́/ past II

/na:k.on caw.k.isk.ka/ 'diploma'

/na:k-/ 'something'

/caw.k-/ 'written on'

/-ka/ topic marker

3.353 $\underset{(\text{-o:tom})}{(\text{-o:tom})}$ or $\underset{(\text{-on})}{(\text{-on})}$ or $\underset{(\text{-õ:})}{(\text{-õ:})}$ or $\underset{(\text{-o})}{(\text{-o})}$ Verbalizer

There is one process of verbalization in Mikasuki. The suffix $\underset{(\text{-o:tom})}{(\text{-o:tom})}$, which is shortened variously to $\underset{(\text{-on})}{(\text{-on})}$ or $\underset{(\text{-õ:})}{(\text{-õ:})}$, follows

the noun root. With this suffix a noun becomes a verb stem and takes verbal inflection.

/tayk.o:tom.li/ 'I am a woman'

/tayk-/ 'female'

/-li/ 1st person singular agent

In the highly truncated speech that is characteristic of young people this suffix usually becomes $\binom{-on}{}$ or $\binom{-\tilde{o}:}{}$.

/χa:χ.on/ 'it's a fish'

/la:χ-/ 'fish'

/nakn.õ:/ 'it's a man'

/nakn-/ 'man'

Although both adjectives and numbers have predicate force--that is, they are verbs--they often take the $\binom{-o:tom}{}$ suffix.

/co:b.o:tom/ 'it is big'

/co:b-/ 'big'

/hĩ:χ.on/ it is good'

/hi:χ-/ 'good'

This suffix contrasts with the $\binom{-om}{}$ auxiliary root in the following examples.

/ca.wasi:l.o:tom/ 'I'm ticklish' (present neutral progressive)

/ca-/ lst person singular patient

/wasi:l-/ 'tickle'

/ca.wasi:l.om/ 'I itch' (present neutral progressive)

/ca-/ lst person singular patient

/wasi:l-/ 'tickle'

3.36 Focus

Mikasuki has two focus markers, proximate and remote. The occurrence of these suffixes on the verb relates the location of the verb action to the speaker. On the verb they follow all the inflectional suffixes and immediately precede the syntactic suffix.

3.361 Proximate Focus (-h)

This suffix occurs on a verb when the action of the verb is in the direction of the speaker.

/nakbisk.on is.i:ka.h.in yalaska:c.i:.ti/ 'we got the ribs from them, they went back'

/nakbis-/ 'rib'

/-on/ oblique

/is-/ 'get'

/-i:ka/ lst person plural agent inclusive

/-in/ different subject

/yalaska:c-/ 'go back' (plural)

/-i/ past II

/-ti/ emphatic mode

/ca.ho:cifk.i ta:mih.o:tom.h.in/ 'my name is Tamihi'

/ca-/ 1st person singular inalienable possession

/ho:cifk-/ 'name'

/-i/ citation suffix

/ta:mih-/ 'Tamihi'

/-o:tom/ verbalizer

/-in/ different subject

It is not always possible to distinguish between this suffix and the past III suffix. When a verb occurs in past III, perfective aspect, the tense marker is infixed into the syllable that immediately follows the stem boundary. If the verb is third person Ø and has the stem vowel instead of the auxiliary root $\binom{\text{-om}}{}$, the tense marker $\binom{\text{-h-}}{}$ fills the same slot as the focus marker.

/s.aha:y.i.h.in/ 'showing it off'

/s-/ instrumental

/aha:y-/ 'teach'

/-i/ stem vowel

/-in/ different subject

It is not, however, possible to collapse the two morphemes into one, because they co-occur on a single form.

/ca.hic,hayh,ka.h.in/ 'after I was born'

/ca-/ 1st person singular patient

/hic.ka-/ 'be born'

/-hayh-/ past III (long form)

/-h/ proximate focus

/-in/ different subject

Normally this suffix is followed by a syntactic suffix but it can occur word finally.[2]

/ayy.omi.si.h/ 'she was just around here'

/ayy-/ 'be around'

/-omi/ auxiliary root

/-si/ 'just'

/cowp.i.li.h/ 'I bought it'

/cowp-/ 'buy'

/-i/ stem vowel

/-li/ 1st person singular agent

3.362 Remote Focus $\underset{(\text{---})}{(\text{-k})}$

This suffix occurs on a verb when the action of the verb is away from the speaker. The suffix is followed by a syntactic suffix.

---

[2]Booker (1980:173) feels that word final /h/ in Mikasuki is a dialect variation of the word final /s/ that marks the indicative.

/...yawli:c.om.i:ka.k.in.../ 'we were around there'

/yawli:c-/ 'be around' (plural stem)

/-om/ auxiliary root

/-i:ka/ 1st person plural agent inclusive

/-in/ different subject

/ayy.om.k.it/ 'she was there'

/ayy-/ be around'

/-om/ auxiliary root

/-it/ same subject

/o.lok.hic.omi.k.in/ 'he turned around and looked'

/o-/ locative

/lok-/ locative

/hic-/ 'see'

/-omi/ auxiliary root

/-in/ different subject

Mikasuki morphology seems to have an abundance of /k/'s. The noun topic marker $\binom{-ka}{}$, the verbal remote focus marker $\binom{-k}{}$, the syntactic verbal same subject marker $\binom{-ik}{}$, the coinjoining suffixes $\binom{-kma}{}$, $\binom{-ka}{}$, and $\binom{-hkok}{}$. Although at this time it is not possible to collapse them into fewer morphemes, it is hoped that further research will shed some light on their interrelationships, if any.

3.37 Modal Suffixes

Mikasuki has at least six categories of modal suffixes: indicative, imperative, interrogative, inferential, negative, and emphatic.

3.371 Indicative

The indicative mode is marked by the suffix $\binom{-[i]s}{(\ )}$ on the main verb of the sentence or the last verb of a text. It occurs when a thought is broken or ended. The /i/ occurs to prevent an unacceptable consonant cluster.

/cokf.on hi:c.a.li.s/ 'I see a rabbit'

/cokf-/ 'rabbit'

/-on/ oblique

/hi:c-/ 'see'

/-a/ stem vowel

/-li/ 1st person singular agent

/il.kos.l.i:.li.s/ 'I just got out'

/il-/ reflexive

/kos-/ 'cut'

/-l/ transitive

/-i/ stem vowel

/-li/ 1st person singular agent

/imp.a:m.i:ka.s/ 'we're going to eat'

/imp-/ 'eat'

/-a:m/ future I

/-i:ka/ 1st person plural inclusive

3.372 Imperative

The imperative in Mikasuki is formed in one of two ways.

1. Polite Imperative

There are two steps to form the polite singular imperative: (a) $\binom{-h-}{(\ )}$ is infixed before the last single consonant of the root; if the root ends in a consonant cluster, there is no $\binom{-h-}{(\ )}$ insertion; (b) $\binom{-ih}{(\ )}$ is suffixed to the last consonant of the root. If there is vowel length in the root, it is lost.

To form the polite plural imperative: (a) the word-final /h/ of singular form is dropped; and (b) $\binom{-ti}{(\ )}$ is suffixed to the form.

Singular		Plural	
/i,h,l.ih/	'come!'		
/il-/	'come'		
/hi,h,c.ih/	'look!'	/hi,h,c.i.ti/	'look!'
/hi:c-/	'see'		
/ont.ih/	'come here!'	/ola,h,w.i.ti/	'look' (2)
/ont-/	'come'	/olaw-/	'look' (2)
		/onti,h,c.i.ti/	'look' (3+)
		/ontic-/	'look' (3+)

2. Forceful Imperative

A more forceful imperative is formed by suffixing $\binom{-iksá}{(\ )}$ to the verb root.

/iss.iksá/ 'hold it!'

/iss-/ 'hold'

/coko:l.iksá/ 'sit down!'

/coko:l-/ 'sit!' (singular)

/wik,iksá/ 'sit down!' (dual)

/wik-/ 'sit'

/i:ɣ.iksá/ 'sit down!' (multiple)

/i:ɣ-/ 'sit'

Some imperative constructions in Mikasuki are exceptions to these rules. The /k/ of (-iksá) has been lost in some and both the /k/ and /a/ have been lost in some.

No /k/		Nc /k/ or /a/	
/imp.isá/	'eat!'		
/isk.isá/	'drink' (traditional)	/isk.is/	'drink!' (contemporary)
/isk-/	'drink'	/lok.haca:l.is/	'get down!'
		/lok-/	locative
		/haca:l-/	'stand'

More research into the Mikasuki imperative needs to be done to determine whether the suffix reduction is resulting in a corresponding loss of contrast between the two imperative forms.

3.373 Interrogative

Mikasuki has at least five ways to form the interrogative. The choice among the alternative constructions depends upon the expectations of the speaker. The system, at present, is not well understood.

1. /-o/ "Yes" Expected

The use of this interrogative suffix usually indicates that the speaker expects a "yes" answer to the question.

/cin.ta:t.o/ 'is it your father?'

/cin-/ 2nd person singular alienable possession

/ta:t-/ 'father'

/cin.kaba:lo/ 'are you cold?'

/cin-/ 2nd person dative

/kaba:l-/ 'be cold'

/imp.ack.o/ 'do you want to eat?'

/imp-/ 'eat'

/-ack/ 2nd person plural agent

/nak.on ci.ba:n.o/ 'what do you want?'

/nak-/ 'what'

/-on/ oblique

/ci-/ 2nd person patient

/ba:n-/ 'want'

2. /-ko/ Neutral

It is not known what the expectations of the speaker are with this suffix.

/na:nik.on hilayh.ko/ 'why is she crying?'

/na:nik-/ 'why'

/-on/ oblique

/hilayh-/ 'cry'

3. Syllable Loss Interrogative

This interrogative is formed by dropping the second syllable of the second person agent suffixes.

/na:k.on om.om.ic/ 'what are you doing?'

/na:k-/ 'what'

/-on/ oblique

/om-/ 'make'

/-om/ auxiliary root

/-icka/ 2nd person singular agent

/ac.acak.aɣ.ac/ 'do you want to go with me?'

/ac-/ 1st person singular patient

/ack-/ locative

/aɣ-/ 'go'

/-acka/ 2nd person plural agent

4. Pitch Change

A very low pitch on the last syllable of the verb can indicate the interrogative.

/imp.òm/ 'is he eating?'

5. /-bo/ Negative Expected

The use of this suffix indicates that the speaker expects a negative answer to the question.

/ma:ti.bo/ 'isn't that right?'

/ma:ti/ 'no'

3.374 Inferential (-wa)

With this suffix the speaker indicates that she expects that what she says is so but that she does not have personal knowledge of it. The inferential commonly occurs on verbs in the past IV or remote past tense. No other modal suffix can co-occur with this one.

/yawli:c.om.a:li.ta.wa/ 'they (Indians) were around a long time ago'

/yawli:c-/ 'be around' (multiple)

/-om/ auxiliary root

/-a:li/ impersonal

/-ta/ past IV

/i.ma:m.i.ta.wa/ 'it happened long ago'

/i-/ 3rd person patient

/ma:m-/ 'happen'

/-i/ stem vowel

/-ta/ past IV

/yawli:c.i.wa/ 'they're still around'

/yawli:c-/ 'be around'

/-i/ 'stem vowel

3.375 Emphatic (-ti) or (-t̃i)

This suffix marks the emphatic mode. No other modal suffix can co-occur with it.

/na:k.a:li.ka am.ayy.tim.t̃i/ 'I've got nothing else to say'

/na:k-/ 'what'

/-a:li/ limiter

/-ka/ topic marker

/am-/ 1st person singular dative

/ayy-/ 'be around'

/-tim/ negative

/ah.ot cilaf.k.i:p.ik aɣiy.om.ti/ 'the tree is starting to fall!'

/ah-/ 'tree'

/-ot/ nominative

/cilaf-/ 'fall'

/-k/ intransitive

/-i:p/ completive

/-ik/ same subject

/aɣiy-/ 'go'

/-om/ auxiliary root

3.3376 Negation

The only invariable marker of the negative in Mikasuki is /t/. There are two negative suffixes but they both commonly undergo varying amounts of syllable collapse.

To form the negative, the speaker must start with a verb. If a noun is to be negated, it first must be verbalized. It will then take

one of the two negative suffixes: (-tayk) first person singular or (-tik) non-first person singular. However, the form will ordinarily then undergo a collapsing process. Sometimes merely the final /k/ is lost; sometimes the entire suffix except the /t/ is lost. This syllable collapse is especially characteristic of the truncated speech of young people.

Negated noun 1st person singular:

/nakn.o:tay/ 'I am not a man'

/nakn-/ 'man'

/-o:tom/ verbalizer

/-tay/ 1st person singular negative

Negated noun non-1st person singular:

/koway.o:tim/ 'it is not a horse'

/koway-/ 'horse'

/-o:tom/ verbalizer

/-tik/ negative

The process of verb negation is similar. However, the normal order of person inflection and auxiliary root is reversed. Ordinarily the person inflection follows the (-om) auxiliary root but in the negative form the person inflection precedes the auxiliary root.

Negative:

/pafaks.i:c.icka.tik.om/ 'you didn't smoke'

Affirmative:

/pafaks.i:c.om.icka/ 'you did smoke'

In addition, in the first person singular agent negative form, the agent suffix $\binom{-li}{}$ is dropped. The negative $\binom{-tayk}{}$ serves as a portmanteau for both negation and person.

Negative:

/pafaks.i:c.tayk.om/ 'I am not smoking'

/pafaks.i:c.om.li/ 'I am smoking'

These forms all undergo syllable collapse in normal speech:

/pafaks.i:c.acka.tik.om/ 'you all aren't smoking' becomes

/pafaks.i:c.acka.ti:m/

When a phrase level verb is negated, often the only sign of the negative is a /t/. (See Section 4.0 for an explanation of Mikasuki phrases.)

/cilaf.ka.t.in/ 'not fall'

/cilaf-/ 'fall'

/-ka/ intransitive

/-in/ different subject

3.38 Syntactic Suffixes

After all the processes of verb stem derivation and inflection are complete, the syntactic suffixes occur. The main verb of the sentence takes either a modal suffix or it is unmarked for syntax. The verbal syntactic suffixes serve to conjoin or subordinate the

phrase level verbs in a sentence. In Mikasuki there is no real difference between conjoining and subordination. Because chapterIV treats Mikasuki syntax, the syntactic suffixes are merely listed briefly in this section.

A typical Mikasuki sentence consists of a string of conjoined verbs ending with a main verb. All the verbs other than the main verb must take a syntactic suffix. Five of these suffixes have been found. The majority of phrase level verbs take one of the first two. (See Section 4.3 for an explanation of this system.) In the following examples, a plain arrow (↓__↑) indicates that the two verbs thus connected have the same subject and an interrupted line (↓...↑) indicates that the two verbs have different subjects.

3.381 (-in) Different Subject

The appearance of this suffix indicates that the following verb has a different subject from the verb on which the suffix occurs.

/...o.lok.hic.omi.k.in ah.i cilaf.ka.t.in/ 'he turned around
↓.....↑
/o-/ locative and saw that the
/lok-/ locative tree didn't fall'
/hi:c-/ 'see'
/-omi/ auxiliary root
/-k/ remote focus
/ah-/ 'tree'
/-i/ citation suffix
/cilaf-/ 'fall'
/-ka/ intransitive
/-t/ negative

/...ma,h,m.in hi:c.i:ka/ 'we saw it happen'

/mam-/ 'happen'

/-h-/ past III

/hi:c-/ 'see'

/-i:ka/ 1st person plural agent inclusive

3.382 (-ik) Same Subject

This suffix indicates that the verb on which it occurs has the same subject as the following verb.

/na:k.way.l.ik talw.ik hopasna:c.ik/ 'they sell, they dance, they sing...'

/na:k-/ 'something'

/way-/ 'sell'

/-l/ transitive

/talw-/ 'dance'

/hopasna:c-/ 'sing' (plural)

3.383 (-it) Same Subject

This suffix indicates that the verb on which it occurs has the same subject as the following verb with an intervening discourse segment or the same subject as the main verb of the sentence. In the following examples, the intervening discourse segment is indicated by " ".

/im.o:χ.omi.k.it " " ka:c.in/ 'arriving there " " he said'

/im-/ 3rd person dative

/oχ-/ 'arrive'

/-omi/ auxiliary root

/-k/ remote focus

/ka:c-/ 'say'

/-in/ different subject

3.384 (-kma) Disjunctive

The meaning of this suffix is very similar to the English "but." (See Section 4.4 for more information about this suffix.)

/isk.i.ta.kma honc.ip.i.ta/ 'she used to drink, but she quit'

/isk-/ 'drink'

/-i/ stem vowel

/-ta/ past IV

/honc-/ 'quit'

/-ip/ completive aspect

/-i/ stem vowel

/-ta/ past IV

3.385 (-hkok) Temporal Subordinator

(See Section 4.4.)

/i:χ.om.i:ka.khok osχa:c.omi.k.ik.../ 'while we were sitting

/i:χ-/ 'sit' (plural) there, they came'

/-i:ka/ 1st person plural agent inclusive

/osχa:c-/ 'come' (plural)

/-omi/ auxiliary root

/-k/ remote focus

/-ik/ same subject

3.386 (-ka) Conditional

(See Section 4.4.)

/hi:c.o:.ka/ 'when we see'

/hi:c-/ 'see'

/-o:/ 1st person plural exclusive agent

/an.co:p.á:m.ali.ka.wa/ 'they're going to buy it from me' (if I

/an-/ 1st person singular dative finish it)

/co:p-/ 'buy'

/-a:m/ future I

/-ali/ impersonal

/-wa/ inferential

3.387 Summary of Verb Formation

The verb phrase in Mikasuki consists of roots and morphological processes. Verb roots fall into three cross-cutting classes: active and stative; base and suppletive; and transitive, intransitive, and neutral.

Morphological processes include verb stem formation, verb inflection, locative prefixes, derivational suffixes, focus marking, modal suffixes, and syntactic suffixes.

An inflected verb in Mikasuki must be marked for tense and aspect. It is optionally marked for person; it may take one or more locative prefixes, a derivational suffix, a focus marker, a modal suffix, and a syntactic suffix.

3.4 Particles

Five particles or independent roots have been found in Mikasuki. These roots cannot be assigned to nouns or verbs, although some of them take both nominal and verbal inflection.

3.41 (ma)

It is difficult to assign a semantic content to this root. It is inflected into a verbal form, it conjoins phrase level verbs in a sentence, and it forms part of the negative "no." It may perhaps be a "pro-root," that is, a root that can substitute for any other root.

Inflected verb (active)

/ma:h.i/ 'it happened' (past II)

/ma:m.i,h,c.ik/ 'did it'

/-ic/ causative

/-h-/ past III

/-ik/ same subject

Inflected verb (stative)

/ma:m.os.om/ 'that's all!'

/-os/ intensive

/-om/ auxiliary root

Negative

/ma:ti/ 'no'

/-ti/ negative

Conjoiner

/ma:hahon/ 'then'

/mayi:k/ 'then'

/ma:hin/ 'then'

According to Lupardus, $\binom{(}{(}ma\binom{)}{)}$ is the Proto-Muskogean demonstrative "that" and it is still found in some form in all Muskogean languages.

There are two other particles that may be forms of $\binom{(}{(}ma\binom{)}{)}$ that occurred infrequently in the data. Both are used to conjoin phrases.

/man a:klik.../ 'and that's what I want'

/a:kl-/ 'want'

/-ik/ same subject

/man hick.om.h.in.../ 'and that's where she was born'

/hick-/ 'be born'

/-om/ auxiliary root

/-h/ proximate focus

/-in/ different subject

/oma ʔa:h.in oncinihl.i:c.i.li/ 'but I ran over one'

/ʔa:h-/ 'one'

/-in/ different subject

/on-/ locative

/cinihl-/ 'run over'

/-i:c/ causative

/-i/ stem vowel

/-li/ 1st person singular agent

/a:fah.i: oma im.as.tik/ 'he tried to catch it but he missed'

/a:-/ locative

/fah-/ 'catch'

/-i/ stem vowel

/im-/ 3rd person dative

/as-/ 'catch'

/-tik/ negative

3.42 (ʔok) Coordinator

This particle functions as a coordinating conjunction for Mikasuki sentences. For more information about its use, see Section 4.4.

/ah.ot haca:l.in χok has.o:t.ot asyac.a.:c.in.../ 'the tree

/ah-/ 'tree' standing and the

/-ot/ nominative clouds going by...'

/haca:l-/ 'stand'

/-in/ different subject

/has.o:t-/ 'clouds'

/asyac.a.:c-/ 'going by'

/-in/ different subject

3.43 (ya)

Another particle with wide distribution is (ya). According to Lupardus (1980), this particle functioned as a Proto-Muskogean demonstrative "this" and it is still found in the daughter languages today. In Mikasuki it is found as both a noun and a verb.

Noun

/ya:l.i/ 'here'

/ya:l.int.i/ 'this way'

/int-/ 'path'

/-i/ citation suffix

Verb

/yãy.ik/ 'here's how'

/-ik/ same subject

3.44 (χa:)

The first syllable of the word for number one (χa:m-om) functions as a particle.

Verb

/ɣã:y.ik/ 'here's how'

/-ik/ same subject

Noun (compound)

/lakac.ɣa:.ma:m.on/ 'last year'

/lakac-/ 'year'

/ma:m-/ 'do'

/-on/ oblique

3.45 Affirmatives

There are two particles that are used to indicate the affirmative in Mikasuki. To indicate agreement with a suggestion (O.K.), (ho) is used and to indicate yes in answer to a direct question, (ĩhĩ) is used.

3.5 Conclusion

The preceding chapter has provided an overview of Mikasuki morphology. Roots and morphological processes comprise the principal components of the morphology. Roots are divided into nouns and verbs with a small group of particles or independent roots.

The Mikasuki noun phrase is composed of a root from one of five subclasses of noun roots and at least one syntactic suffix. Possession on noun roots is indicated by person prefixes. Two sets of prefixes indicate either inalienable or alienable possession. Mikasuki has a three person system, with number marked obligatorily only in the first person. Human plural is marked optionally by an affix and there are five order classes of derivational suffixes in Mikasuki nouns.

The verb phrase in Mikasuki consists of roots and morphological processes, which include affixation and ablaut. The processes that a verb root may undergo depend largely on its membership in several cross-cutting groups of verb roots.

An inflected verb in Mikasuki must be marked for tense and aspect. Nonthird person verbs are inflected for person.

Location relative either to the speaker or to the action of the verb may be specified by one of a series of locative prefixes.

A verb phrase may optionally include a derivational suffix, a focus marker, a modal, and a syntactic suffix.

Finally, this chapter describes a small group of particles or independent roots that are included in Mikasuki morphology.

CHAPTER IV

SYNTAX

4.0 Introduction

This chapter provides a description of the syntactic processes of Mikasuki. The typical sentence in Mikasuki is a string of subordinated clauses with the principal clause at the end of the string. A description of the principal clause is found in Section 4.1.

Mikasuki clauses have a system of locative cross-reference in which the occurrence of a locative noun phrase (NP) corresponds to one of a set of locative prefixes on the verb of the same phrase. This system is described in Section 4.2.

Section 4.3 treats the switch reference system of Mikasuki sentences. Most sentences in Mikasuki consist of a string of clauses with the verb of each clause marked morphologically to indicate whether it has the same subject as or a different subject from the verb of the following clause.

Clause level verbs that are not marked for switch reference take one of a class of subordinating suffixes that are described in Section 4.4.

The inflection of clause level verbs and its relationship to Mikasuki syntax is examined in Section 4.5.

Section 4.6 is a text in Mikasuki that demonstrates the syntactic processes described in this chapter.

Finally, Section 4.7 reviews the analyses presented in this chapter and suggests some topics for further research.

4.1 The Principal Clause

Mikasuki is a SOV language. The subject noun phrase is distinguished by a nominative suffix $\binom{\text{-ot}}{}$ (see Section 3.263). All other NP's take an oblique suffix $\binom{\text{-on}}{}$ (see Section 3.263). Subsumed under the oblique are the semantic cases of patient, dative, instrumental, and locative. A principal clause must include a fully inflected verb and may include a subject NP and an object NP. A sentence in Mikasuki may consist of only a principal clause with no subordinate clause.

Principal clause, verb only:

/imp.ĩ.li/ 'I just ate'

/imp-/ 'eat'

/-ĩ/ past II

/-li/ 1st person singular agent

Principal clause, verb plus subject NP:

/i:f.ot hī:c.om/ 'the dog sees (it)'

/i:f-/ 'dog'

/-ot/ nominative

/hi:c-/ 'see'

/V̄/ present tense, neutral and progressive aspects

/-om/ auxiliary root

Principal clause, verb plus object NP

/okl.on aɣiy.óm/ 'she went to town'

/okl-/ 'town'

/-on/ oblique

/aɣiy-/ 'go'

/-óm/ auxiliary root, past I

Principal clause, verb plus subject NP and object NP:

/nakn.a:ɣ.ot pihɣ.on ōmm.om/ 'the men are making a boat'

/nakn-/ 'man'

/-a:ɣ/ 'general plural

/-ot/ nominative

/pihɣ-/ 'boat'

/-on/ oblique

/ōmm-/ 'do','make' present tense, neutral aspect

/-om/ auxiliary root

4.2 Locative Cross-reference

In a Mikasuki clause, when there is a locative NP, the verb in the same clause normally takes a locative prefix (see Section 3.35). This system of locative cross-reference was first described for Mikasuki by West (1974a). Only positional verbs and verbs of motion occur in this system. In the following examples the locative NP and the prefix that occurs on the verb in the same clause are underlined.

/ok.on s.il.oksāh.l.om/ 'she washes herself with water'

/ok-/ 'water'

/-on/ oblique

/s-/ instrumental

/il-/ reflexive

/oksāh-/ 'wash' present tense, neutral aspect

/-om/ auxiliary root

/χa:χ.ot ok.on ka:.yawlī:c.om/ 'the fish are in the water'

/χa:χ-/ 'fish'

/-ot/ nominative

/ok-/ 'water'

/-on/ oblique

/ka:-/ 'in the water'

/yawlī:c-/ 'be around' (plural) presnt tense, neutral aspect

/-om/ auxiliary root

/hahc.ik.on sap.ka:.cikasy.i:p.ĩ́/ 'they went into the water'

/hahc-/ 'river'

/-ik/ topic marker

/-on/ oblique

/sap-/ 'away from'

/ka:-/ 'in the water'

/cikasy-/ 'go' (plural)

/-i:p/ completive aspect

/-ĩ́/ past II

When a location is implied but not specified, the nonspecific locative prefix $\binom{a-}{\ }$ occurs on the verb.

/osta:p.apalw.on a.wolo.lí.:c.om/ 'she caught the side of her leg (on the rock).'

/osta:p-/ 'leg'

/apalw-/ 'side of'

/-on/ oblique

/a-/ nonspecific locative

/wolo-/ 'catch'

/-lí/ transitive, present tense, perfective aspect

/-:c/ causative

/-om/ auxiliary root

4.3 The Switch Reference System

The preceding sections of this chapter have been limited to a description of principal clauses or sentences with one verb only. In reality most Mikasuki sentences consist of a string of clauses with the verb in each clause marked with a suffix that indicates whether that verb has the same subject as or a different subject from the verb in the following clause. The final clause is the principal clause and the verb of that clause takes no subordinating or conjoining suffix. (There is no difference in Mikasuki between subordination and conjunction.) This type of switch reference system is not uncommon in American Indian languages. The term switch reference was coined by Jacobsen (1967) in a description of the mechanism in the Hokan-Coahuiltecan languages.

As other investigators have pointed out (Booker 1980 and Lupardus 1980), the syntax of all the Muskogean languages is characterized by a switch reference system. Clause level verbs are marked to indicate either different subject or same subject in relation to the following verb.

In the following examples, an interrupted line indicates different subject and a solid line indicates same subject.

4.31 Different Subject (-in)

To mark a clause level verb as having a different subject from the following verb the clause level verb takes the suffix -in .

/tayk.i ī:l.in hi:c.ó́m.li/ 'I saw the girl arrive'

/tayk-/ 'girl'

/-i/ citation suffix

/i:l-/ 'arrive', present tense, neutral aspect

/hi:c-/ 'see'

/-ó́m/ auxiliary root, past I, perfective aspect

/-li/ 1st person singular agent

4.32 Same Subject (-ik) ,(-it)

To mark a clause level verb as having the same subject as the following verb the clause level verb takes the suffix -ik .

/nakn.ot akl.ik lok.h̃ī:c.om/ 'the man is wondering and looking'

/nakn-/ 'man'

/-ot/ nominative

/akl-/ 'wonder', present tense, neutral aspect

/-ik/ same subject

/lok-/ 'toward'

/h̃ī:c-/ 'see', present tense, neutral and progressive aspects

/-om/ auxiliary root

Mikasuki has another syntactic suffix that indicates same subject. This suffix (-it) occurs on clause level verbs to indicate same subject as a subsequent verb but with intervening clause level verbs. Most commonly this suffix introduces direct quotations. In other words, discourse segments are embedded under the (-it) verb and the verb that follows the direct quotation has the same subject as the (-it) verb.

/...folohk.isk.it 'pom.imp.i,h,p.ik aχi:siya:.ack.o?" ink.onk.in.../

'she was there "can you come eat with us?" she said' (from Derrick-Mescua 1980)

/foloh-/ 'be there'

/-isk/ participle

/-it/ same subject (with intervening verb)

/pom-/ 1st person plural dative

/imp-/ 'eat'

/-ip/ completive

/-h-/ past III

/-ik/ same subject

/aχi:sya:-/ 'go' (plural)

/-ack/ 2nd person plural agent

/-o/ interrogative suffix

/ink-/ 'say'

/-onk/ auxiliary root

/-in/ different subject

The suffix (-it) most commonly occurs to introduce direct quotations. However, the suffix may also indicate that the verb on which it is found has the same subject as the verb of the principal clause, regardless of the intervening clause level verbs.

/ã:.χakf.ot ayy.omi.k.it Nokos.ot hocifk.o:tom.in...áyy.omi.si/

'my brother was around, Bear is his name,...he was just around'

/ã:-/ 1st person singular alienable possession

/χakf-/ 'opposite sex sibling'

/-ot/ nominative

/ayy-/ 'be around', present tense, neutral aspect

/-omi/ auxiliary root

/-k/ remote focus

/-it/ same subject (with intervening verb)

/Nokos-/ 'bear'

/-ot/ nominative

/hocifk-/ 'name'

/-o:tom/ verbalizer

/-in/ different subject

/áyy-/ 'be around', present tense, perfective aspect

/-omi/ auxiliary root

/-si/ 'just'

The occurrence of (-it) is limited in these data. It clearly marks same subject as a subsequent verb with an intervening verb. Usually it marks same subject on a verb that introduces a discourse

segment and allows the listener to disregard the quotation in relation to the switch reference system. Occasionally it marks same subject on a verb referring to the verb of the principal clause, thereby embedding the intervening clauses. More research is needed to further delineate the role of this suffix in the switch reference system.

In normal discourse the majority of verbs in subordinate clauses take either the (-ik) same subject marker or (-in) the different subject marker. The following short texts illustrate the normal operation of the switch reference system of Mikasuki. DS indicates different subject and SS same subject.

/ho.tayk.a:χ.ot oho:n.ot tinc.i:k.a:χ.in anc.i.h.in ho.nakn.ot
DS DS

foksi:k.i tinc.i:k.a:χ.in anc.ik s.o:.yawli:c.ik s.ahay.i.h.in
DS SS SS DS

hi:c.óm.li/

'all the women were wearing skirts of different styles, all the men were wearing shirts of different styles, they (the men) are on a platform showing off, I watched it'

/ho.tayk.a:χ.ot anc.i.h.in/ (different subject)
all the women wear

/oho:n.ot tinc.i:k.a:χin/ (different subject)
skirt different style

/ho.nakn.ot anc.ik/ (same subject)
all the men wear

/foksi:k.i tinc.i:k.a:ɬ.in/ (different subject)
shirt different style

/s.o.yawli:c.ik/ (same subject)
they're on a platform

/s.ahay.i.h.in/ (different subject)
show off

/hi:c.óm.li/ (principal clause)
I saw it

/an.ta:t.ot co:cah.on yokc.on bo:l.on onos.on fõs.ika.k.on

ma:m.a:li.k.in oksi:c.ik oh.s.i:l.a.h.in ã:.wa:c.on
DS SS DS

im.a:sa.:c.i.li.h.in ciɬaw.l.ik tona:b.a.:c.ik alahk.on
DS SS SS

honlasc.i:p.ik ma:m.i,h,c.ik īmp.om.i:ka.kta/
SS SS

'my father killed and brought back some garfish, turtle, bream, birds, and things like that; my mother, with me helping her, we skinned it and when we finished we put some away and then we ate some a long time ago'

/an.ta:t.ot co:cah.on yokc.on bo:l.on onos.on fõs.ika.k.on oksi:c.ik/
my father garfish turtle bream mudfish bird kill
(same subject)

/ma:m.a:li.k.in/ (different subject)
things like that

/oh.s.i:l.a.h.in/ (different subject)
bring back

/ã:.wa:c.on im.a:s.a.:c.i.li.h.in/ (different subject)
my mother I help her

/ciʔaw.l.ik/ (same subject)
skin it

/tona:b.a.:c.ik/ (same subject)
finish it

/alahk.on honlasc.i:p.ik/ (same subject)
some put away

/ma:m.i,h,c.ik/ (same subject)
do it

/imp.cm.i:ka.kta/ (principal clause)
we ate it a long time ago

In Mikasuki there is a morphosyntactic problem in the description of the noun and verb suffixes. An apparent parallel homophony exists between these suffixes. The nominative noun suffix is $\binom{-ot}{}$ and the same subject verb suffix (with an intervening clause) is $\binom{-it}{}$. The oblique noun suffix is $\binom{-on}{}$ and the different subject verb suffix is $\binom{-in}{}$. In addition these suffixes occur word finally and the word final syllable in Mikasuki is always unstressed. Like English the vowels of unstressed syllables tend to be neutralized. In normal speech it is impossible to distinguish between the verbal $\binom{-it}{}$ and the nominal $\binom{-ot}{}$ or between the verbal $\binom{-in}{}$ and the nominal $\binom{-on}{}$. Therefore the assignment of /o/ to $\binom{-ot}{}$ and $\binom{-on}{}$ and /i/ to $\binom{-it}{}$ and $\binom{-in}{}$ is somewhat arbitrary. Clearly the significant segment of the morpheme is the consonant. The morphosyntactic problem is the unlikelihood of an explanation of chance homophony for the two sets of parallel suffixes.

Kendall (1975) analyzes a similar problem in the Yuman languages, a homophony between certain nominal affixes and verbal suffixes. She postulates that the affixes are polysemous rather than homophonous.

According to Kendall the likelihood of parallel homophonous sets of affixes for nouns and verbs is small in any language. Further, it is even more unlikely to find such parallelism in an entire language family which is the case for Yuman. To resolve this descriptive and theoretical dilemma Kendall looks for a more abstract underlying semantic unit for those affixes having to do with the relationship between the speaker and the topic in the construction of a sentence.

As in the Yuman languages, it is difficult to accept that the parallel homophony of Mikasuki nominal and verbal suffixes is due to chance. In addition, these parallel sets are found throughout the Muskogean languages family. It is much more likely that the morphemes in question are polysemous. Further research may eventually allow the assignment of a more abstract semantic unit for each set of affixes than is currently possible. The role of both nominative and same subject must be included for $\binom{\text{-Vt}}{}$ and both the oblique and different subject must be included for $\binom{\text{-Vn.}}{}$

4.4 Alternative Methods of Clause Subordination

Not all clause level verbs in Mikasuki end in switch reference markers. Syntactic suffixes include a disjunctive suffix, a temporal subordinating suffix, and a conditional suffix. Verbs on which these suffixes occur are fully inflected for aspect, tense, and person.

4.41 Disjunctive $\binom{\text{-kma}}{}$

This suffix occurs word finally on clause level verbs. It is usually glossed as "but."

/ayy.omi.si.kma aχiy.óm/ 'she was just around but she left'

/ayy-/ 'be around'

/-omi/ auxiliary root

/-si/ 'just'

/-kma/ 'but'

/aχiy-/ 'go'

/-óm/ auxiliary root, past I

/lok.loko:p.is ka:c.onka.li.kma ã:.hāk.tik/ 'get down, I told him, but he didn't listen'

/lok-/ 'toward'

/loko:p-/ 'get down'

/-is/ imperative

/ka:c-/ 'say'

/-onka/ auxiliary root

/-li/ 1st person singular agent

/-kma/ 'but'

/ã:-/ '1st person singular dative

/hāk-/ 'hear', present tense, neutral aspect

/-tik/ negative

This suffix occurred once without a following verb in these data. Preceded by a ( ) -ho ( ) suffix, it implied a contradiction of the verb meaning.

/aχi:siy.ay.í:ka.ho.kma/ 'we were supposed to go but we didn't'

/aχi:siy-/ 'go' (plural)

/-ay/ intensive aspect

/-ĩ́:ka/ 1st person plural inclusive agent, past II

/-ho/

/-kma/ 'but'

4.42 Temporal Subordinator (-hkok)

This suffix occurs word finally on clause level verbs. It indicates that the action of the verb on which it is found occurred simultaneously with the action of the following verb. It is glossed into English as "while" or "as."

/is.yawlĩ:c.om.i:ka.hkok Lokihpi in.ta:t.ot ã:.honk.onk.isk.in.../

'as we were doing that, Lokihpi's father was calling me...'

/is-/ instrumental

/yawlĩ:c-/ 'be around'

/-om/ auxiliary root

/i:ka/ 1st person plural agent inclusive

/-hkok/ 'as'

/lokihpi/ name

/in-/ 3rd person alienable possession

/ta:t-/ 'father'

/-ot/ nominative

/ã:-/ 1st person singular dative

/honk-/ 'call'

/-onk/ auxiliary root

/-isk/ participle

/-in/ different subject

/caw.l.ĩ:p.i:ka.hkok lok.is.foloh.k.onk.in.../ 'as we write, he's over there, saying that'

/caw-/ 'write'

/-l/ transitive

/-ĩ:p/ completive, progressive

/-i:ka/ 1st person plural inclusive agent

/-hkok/ 'while'

/lok-/ 'toward'

/is-/ instrumental

/foloh-/ 'say'

/-k/ intransitive

/-onk/ auxiliary root

/-in/ different subject

4.43 Conditional (-ka)

This suffix occurs word finally on clause level verbs. It indicates the conditional. Its similarity to the nominal topic marker (-ika) is suspicious (see Section 3.263). It is hoped that the collection of more data will allow the collapse of these two morphemes into one.

/...im.ayawk.ĩp.tik.ka oh.ka:.ɣayɣo:h.a.:c.k.in.../ 'if he's not lazy he should go spearfish'

/im-/ 3rd person dative

/ayawk-/ 'be lazy'

/-ip/ completive

/-tik/ negative

/-ka/ 'if'

/oh-/ 'there'

/ka:-/ 'in the water'

/ɣayɣo:h-/ 'spearfish'

/-a/ stem vowel

/-:c/ causative

/-k/ remote focus

/-in/ different subject

4.5 The Inflection of Clause Level Verbs

4.51 Person Inflection in Switch Reference

All clause level verbs in Mikasuki are inflected for tense and aspect. Verbs with the disjunctive suffix, the conditional, and the temporal subordinating suffix are invariably inflected for person. However, verbs that take the switch reference markers are normally uninflected for person. Rather, person is inferred from context. Because the switch reference markers refer to subsequent verbs always, there may be several successive verbs uninflected for person, indicating same subject but not who or what the subject is. Finally, the principal verb occurs and is inflected for person.

/...oh.ka:.ɣayɣo:h.a.:c.k.in mahiɣass.ik īmp.o.wa/

'he goes spearfishing, (we) fix it, we eat it'

/oh.ka:.ɣayɣo:h.a.:c.k.in/ (different subject)
goes spearfishing

/mahiɣass.ik/ (same subject)
fix it

/īmp.o.wa/ (principal clause)
we eat it

Another example has four verbs marked for switch reference and unmarked for person followed by the principal verb which is fully inflected.

/...ka,h,:c.i.h.in is.χay.k.in s.i:s.ik ho.tayk.o:c.a:χ.on
la,ho,p.ik s.aχisiy.ĩ:ka/
'I told him to spearfish, we pick up and take all the girls, we went.'

/ka,h,:c.i.h.in/ (different subject)
(I) told (him)
/is.χay.k.in/ (different subject)
(he) spearfish
/s.i:s.ik (same subject)
(we) pick up
/ho.tayk.o:c.a:χ.on la,ho,p.ik/ (same subject)
all the girls (we) take
/s.aχisiy.ĩ:ka/ (principal clause)
'we went'

Switch reference verbs are inflected for person when the sentence would otherwise be highly ambiguous. In the following example the person inflection is underlined.

/...ã:.hon.onk.isk.in hapo:y.om.li.k.in haca:l.a.h.onk.in oχ.om.li.k.in.../
'he was calling me, I looked for him where he was standing, I went there'

/ã:.hon.onk.isk.in/ (different subject)

calling me

/hapo:y.om.li.k.in/ (different subject)

I looked

/haca:l.a.h.onk.in/ (different subject)

(he) stood

/oɣ.om.li.k.in/ (different subject)

I went there

4.52 Tense Inflection in Clause Level Verbs

Tense and aspect are marked on all clause level verbs. Choice of a particular tense may depend on the grammatical relationships of the verbs in the sentence rather than the details of the action referred to by the verb. For example, an event that occurred in the remote past would normally take the past IV tense (see Section 3.33). However, to indicate that the event in question occurred after an event previously described in the sentence with a past IV verb, the speaker will use the past III tense. In the following example each succeeding verb is inflected in a subsequent tense to reflect the order of events as they actually occurred.

/...oca:p.on ca.hic.k.omi.kta.wa/ (past IV)

in Ochopee I was born a long time ago

/ca.hic,hayh,ka.h.in/ (past III)

'I was born'

/HOLLYWOOD.k.on osɣa:c.ĩ:ka.h.in/ (past II)

to Hollywood we moved

/mon/ (conjoining particle)

and

/ayy.ik/ (same subject)

be around

/ca.hamōh.omi.ta.wa/ (past IV)

'I grew up'

'I was born in Ochopee, after I was born we moved to Hollywood, and I grew up around there'

The verbs in the example above all refer to events that occurred about the same time, some 25 years ago. However, the events occurred in a sequence that is indicated by the tenses of each succeeding verb. First, the speaker was born (past IV), then after she was born (past III), the family moved (past III) to Hollywood. The occurrence of the particle mon (and) interrupts the sequence so the final verb (grow up) is back in the remote past (IV).

The details of this tense hierarchy system have not been worked out. Most anecdotes are told in the present, which is semantically the most nearly neutral tense. Aspect is neutral or perfective. The verb of the principal clause is inflected for the tense that indicates when the event described actually occurred.

/ni:ɣak.o:s.ik.on TV.k.on hic.ī:p.ik/ (present)

last night T.V. seeing

/i:χ.ā,h,c.ay.i:k.in/ (past III

we were sitting there

/po.hamp.ī:p.in/ (present)

it broke

/mā:h.a.h.in/ (present)

it happened

/wata:l.i:k.on omm.i:p.ī́.li/ (past II)

necklace I was making

'last night we were sitting there watching T.V. and it broke and I started making a necklace'

In the example above, all the verbs are in present tense except two. One is in past III to establish that it (we were sitting there) happened before the verb in past II (I was making a necklace). In other words the ordering of the tenses of the verbs in the sentence allows the listener to infer that the speaker was already sitting there when she started to make the necklace. All other verbs in the sentence are present tense and the time frame to which they refer must be discovered from the context of the sentence.

More research is needed to determine whether this type of ranking of tenses is used for verbs inflected for the future tenses.

4.6 Text

The following text is a story told by a twenty-eight-year-old woman. She thought that it was originally a folk tale from elsewhere but it reminded her of a Mikasuki folk tale. The text, broken down into morpheme segments, and a literal interlinear translation are presented first; a free translation follows.

/Sok.i.hatk.i ah.on tapa:k.ik haca:l.ip.isk.in koway.co:b.wakacb.ot
opossum tree push standing horse big spotted

im.o:χ.omi.k.it "cihn.ot is.ca.nonχ.i.:c.icka sak.ayy.o:tom.ic?"
she got there "you you trick me are you the one?"

ka.:c.in "ma:ti ahn.o:.tik.i ya:l.on ah.on tapa:k.ik
she said "no it wasn't I here tree push

haca:l.i.li.s.ti" ka.:c.isk.it χok.hima onka.k.it "ya ah.i
I stood here" he said and then he said "this tree

haca:l.i.k.in na:k.on in.toko.li.:c.o:.k.in hiχ.o.w.akl.i:k.o:tom
stand there what brace it would be good

ma:.tik.kayi i.pon.cilaf.k.ik tokl.i.ka.:,h,c.on ipo.:ksi:c.a:m.ti
if not fall on us the two of us it's going to kill us

tapa:k.ik haca:l.ick.in intoko.li.:c.i.k.in hapo:y.a:m.li"
push stand brace I'll look for "

ka.:,h,c.ik aχiy.omi.ta.wa ma:h.i.h.in koway.co:b.wakacb.ika
he said he left then horse big spotted

ahon tapak.a.:c.ay.ik i.wan.i:p.ik apo:n.onka.k.it "himay.ay.ika
tree push she got tired she talked "right now

ca.:l.ip.a:m.is ah.ot cilaf.k.i:p.ik aχiy.om.ti" ink.ik
I'm going to die tree fall begin" she said

is.haca:l.i.:c.ay.ik hoho.ik patk.o:s.ik lini:.k.ik
stand there she let go fast run

hapak.a.:,h,c.ik o.lok.hi:c.omi.k.in ah.i cilaf.ka.t.in
she went far she turned around to look tree didn't fall

hi:c.omi.ta.wa. Ah.ot haca:l.in χok has.o:t.ot asyac.a.:c.in
she saw tree stand then clouds going by

hi:c.onka	cilaf.k.ik	aχiy.isk.om.i,h,c.om	omm.i.ti	i.ma:m.i.ta.wa
look like	fall	going to	do	it happened

Omm.i.ti	sok.i.hatk.i	s.in.nonχ.i.:c.om.in	onka.hon.ti	χok
So	opossum	tricked her	once	then

himay.a.:c.omi.ta.wa.
he did it again.

One day the jaguar came upon the possum by a tree. He was pushing against the tree with his hands. The jaguar said to him, "you are the one who tricked me." "No, it wasn't me because I was here all the time pushing this tree and then he said, "if we don't brace it the tree is going to fall and kill us both, so you stay here and push while I go look for a pole." The possum left the jaguar pushing against the tree. The jaguar waited and waited but the possum never came back so the jaguar got tired and said "Now, I'm going to die because this tree is falling down." The jaguar gave up and let go of the tree. She ran away quickly and she looked back but the tree didn't fall. It was only a cloud going by up above that made the tree look like it was falling. It was the possum that tricked her before and he tricked her again.

4.7 Conclusion

This chapter has provided an introduction to Mikasuki syntax. The organization of a Mikasuki sentence is a string of subordinated or conjoined clauses with the principal clause at the end of the string. Word order is SOV.

Mikasuki clauses have a system of locative cross-reference in which the occurrence of a locative NP corresponds to one of a set of locative prefixes that occurs on the verb.

A typical Mikasuki sentence consists of a string of subordinated clauses each marked morphologically to indicate the same subject as or a different subject from the following verb. In addition, it is possible to indicate the same subject as a succeeding verb with intervening clause level verbs. This type of clause subordination is known as switch reference.

A morphosyntactic problem in the analysis of Mikasuki is the apparent homophony of the nominal and same subject suffixes and of the oblique and different subject suffixes. It seems likely that these suffixes are polysemous rather than homophonous.

Other ways to subordinate clauses besides the switch reference system include a disjunctive, a conditional, and a temporal subordinating suffix.

The inflection of clause level verbs is of interest. The principal verb and the verbs that take the disjunctive, conditional, and temporal subordinating suffixes are always inflected for person. Verbs with the switch reference markers are normally uninflected for person and person is inferred from context.

All verbs, both subordinate and principal, are inflected for aspect and tense. Usually, the clause level verb is inflected for present tense, which is semantically the most nearly neutral. The verb of the principal clause is inflected for the tense that reflects the time when the speech event described by the sentence actually occurred. However, the tenses of clause level verbs may form a hierarchy that indicates the order in which the events described in the sentence occurred.

Areas that have been suggested for further research include further definition of the role of the (-it) (same subject with intervening clause) in the switch reference system, the semantic relationship between the nominal and same subject suffixes and between the oblique and different subject suffixes; the similarity between the nominal topic marker (-ika) and the conditional (-ka) ; and the hierarchical ranking by tense of the clause level verbs.

INDEX OF GRAMMATICAL MORPHEMES

/-tik/	negative	148-50
/-ton/	directional	60
/-wa/	inferential	147
/ya/	particle	158

BIBLIOGRAPHY

Booker, Karen. 1977a. Some common elements of Muskogean verb morphology. Kansas Working Papers in Linguistics 2:95-133.

1977b. Proto-Muskogean *ho and some implications for the reconstruction of certain pronominals. In Proceedings of the 1976 Mid-America Linguistics Conference, ed. Robert L. Brown, Jr., pp. 35-44. Minneapolis: Depts. of English and Linguistics, University of Minnesota.

1978. On the origin of number marking in Muskogean. Kansas Working Papers in Linguistics 3:100-12.

1980. Comparative Muskogean: Aspects of Proto-Muskogean Verb Morphology. Ph.D. dissertation. Lawrence: University of Kansas.

Boynton, S. and Mary T. Derrick. 1974. Number in Mikasuki. Paper presented at the meetings of the American Anthropological Association, Mexico City.

Crawford, James M. 1975. Southeastern Indian languages. In Studies in Southeastern Indian Languages, ed. James M. Crawford, pp. 1-120. Athens: University of Georgia Press.

Derrick-Mescua, Mary T. 1980. A Phonology and Morphology of Mikasuki. Ph.D. dissertation. Gainesville, University of Florida.

Fairbanks, Charles H. 1957. Ethnohistorical report of the Florida Indians. MS. Tallahassee.

1973. The Florida Seminole People. Phoenix: Indian Tribal Series.

1978. The ethno-archeology of the Florida Seminole. In Tacachale: Essays on the Indians of Florida and Southeast Georgia during the Historic Period, ed. Jerald T. Milanich and Samuel Proctor. Gainesville, University Presses of Florida.

Garbarino, Merwyn S. 1972. Big Cypress, A Changing Seminole Community. Case Studies in Cultural Anthropology. New York: Holt, Rinehart and Winston.

Haas, Mary R. 1938-40. Brief Hitchiti vocabulary and grammatical notes. National Anthropological Archives MS. Washington, D.C.: Smithsonian Institution.

1940 Ablaut and its function in Muskogee. Language 14:61-65.

1941a. The classification of the Muskogean languages. In Language, Culture and Personality, ed. by Leslie Spier, A. Irving Hallowell and Stanley Newman, 41-56. Menasha: Sapir Memorial Publishing Fund.

1941b. Noun incorporation in the Muskogean languages. Language 17:311-15.

1945. Dialects of the Muskogee language. International Journal of American Linguistics 11:69-74.

1946. A Proto-Muskogean paradigm. Language 22:326-32.

1947. The development of Proto-Muskogean *k^w. International Journal of American Linguistics 14:244-46.

1950. On the historical development of certain long vowels in Creek. International Journal of American Linguistics 16:122-25.

1951. Interlingual word taboos. American Anthropologist 53: 338-44.

1969. The Prehistory of Language. Janua Linguarum, series minor, 57. The Hague: Mouton.

1972. Number suppletion in Creek verbs. Paper read at the annual meeting of the American Anthropological Association, Toronto.

1977. Tonal accent in Creek. In Studies in Stress and Accent, ed. Larry M. Hyman. Southern California Occasional Papers in Linguistics 4:195-207.

Hardman, M. J. and Shoko Saito Hamano. 1981. Language Structure Discovery Methods: A Field Manual. MS.

Hockett, Charles F. 1958. A Course in Modern Linguistics. New York: Macmillan.

Jacobsen, Jr., William H. Switch-Reference in Hokan-Coahuiltecan. In Studies in Southwestern Ethnolinguistics, ed. Dell H. Hymes and William E. Bittle. The Hague: Mouton.

Kendall, Martha B. 1975. The /-k/, /-m/ problem in Yavapai syntax. International Journal of American Linguistics 41:1-10.

Lupardus, Karen J. 1980. Muskogean T's, K's, and N's. Paper presented at the annual meeting of the American Anthropological Association, Washington, D.C.

1981. Passives in Alabama. Paper presented at the annual meeting of the American Anthropological Association, Los Angeles.

Mahon, John K. 1967. History of the Second Seminole War. Gainesville: University of Florida Press.

Nathan, Michele. 1977. Grammatical Description of the Florida Seminole Dialect of Creek. Ph.D. dissertation. New Orleans: Tulane University.

Nicklas, T. Dale. 1971. Choctaw Morphology. Idabel and Durant, Oklahoma: Choctaw Bilingual Education Program and Southeastern State College.

1974. The Elements of Choctaw. Ph.D. dissertation. Ann Arbor: University of Michigan.

1975. Choctaw morphophonemics. In Studies in Southeastern Indian Languages, ed. James M. Crawford, pp. 237-49. Athens: University of Georgia Press.

Nida, Eugene A. 1946. Morphology: The Descriptive Analysis of Words. Ann Arbor: University of Michigan Press.

Oswalt, Robert L. 1976. Switch reference in Maiduan: an areal and typological contribution. International Journal of American Linguistics 42:297-305.

Sturtevant, William C. 1951. The phonemes of Mikasuki Seminole. MS.

1954. The medicine bundles and busks of the Florida Seminole. The Florida Anthropologist 7:31-70.

1956. H. R. Pratt's report on the Seminole in 1879, presented and annotated by W. C. Sturtevant. The Florida Anthropologist 9:1-24.

1962. Spanish-Indian relations in southeastern North America. Ethnohistory 9:41-94.

1971. Creek into Seminole. In North American Indians in Historical Perspective, ed. by Eleanor B. Leacock and N. O. Lurie, 92-128. New York: Random House.

Swanton, John R. 1921-22. A sketch of the Hitchiti language. National Anthropological Archives MS. 4148. Washington, D.C.: Smithsonian Institution.

West, John David. 1962. The phonology of Mikasuki. In Studies in Linguistics 16(3-4):77-91.

1974a. Mikasuki verb prefixes. Work Papers, Summer Institute of Linguistics, North Dakota Session 18:67-75.

1974b. Number in the Mikasuki verb stem. Work Papers, Summer Institute of Linguistics, North Dakota Session 18:133-38.

1975. Mikasuki verb suffixes. MS.

BIOGRAPHICAL SKETCH

Sylvia S. Boynton was born in Minnesota in 1948. She moved to Naples, Florida, in 1958 where she completed her secondary education. Several Seminole Indians attended Naples High School with her and this period marked the beginning of her interest in Seminole language and culture. In 1965 she moved to Northfield, Minnesota, to attend Carleton College. In 1968 she transferred to the University of Minnesota where she earned a B.A. in Spanish in 1969. After spending nearly two years in Colombia, S. A., she moved to Gainesville, Florida, in 1971 to begin work on an M.A. in anthropological linguistics and Latin American Studies. In 1974 she received the M.A. and since that time has been working on a Ph.D. in anthropology. While working on the dissertation she served as director of bilingual education at the Ahfachkee School on the Big Cypress Seminole Reservation and as adjunct professor of anthropology at Florida International University.

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

M.J. Hardman-de-Bautista, Chair
Professor of Anthropology

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

Jerald T. Milanich
Associate Professor of Anthropology

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

John K. Mahon
Professor of History

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

Samuel Proctor
Professor of History

I certify that I have read this study and that in my opinion it conforms to acceptable standards of scholarly presentation and is fully adequate, in scope and quality, as a dissertation for the degree of Doctor of Philosophy.

Alice Faber
Assistant Professor of Classics

This dissertation was submitted to the Graduate Faculty of the Department of Anthropology in the College of Liberal Arts and Sciences and to the Graduate Council, an was accepted as partial fulfillment of the requirements for the degree of Doctor of Philosophy.

August 1982

Dean for Graduate Studies and Research