

**LEMMATISATION OF DERIVATIVE NOUNS IN XITSONGA-
ENGLISH BILINGUAL DICTIONARIES**

by

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(I)

DECLARATION

“I declare that the dissertation hereby submitted to the University of Limpopo for the degree of MASTER OF ARTS IN AFRICAN LANGUAGES has not previously been submitted by me for a degree at this or any other university; that it is my work in design and in execution, and that all material contained therein has been duly acknowledged.”

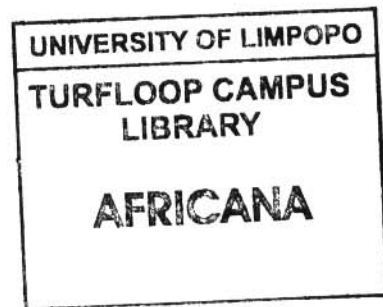
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DEDICATION

Dedicated to my father Mapipisi Jackson Chavalala.



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During the lengthy period of this study, I have had the benefit of considerable help, advice, criticism and support from friends and colleagues.

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ABSTRACT

Lemmatization of derivatives, have always given Xitsonga lexicographers a difficult task. Xitsonga lexicographers have lemmatized or treated derivatives in a haphazard and unsystematic way. This research has been undertaken to try to come with lexicographically sound suggestions on how to treat derivative nouns in Xitsonga- English Bilingual Dictionaries. It is revealed in this study that Xitsonga lexicographers do not have a principle to be followed regarding the treatment of derivative nouns. This becomes evident when some derivative nouns are lemmatized as lemmata in the dictionaries whilst others are not. The problem becomes worse when some derivative nouns are seen in the microstructures of these dictionaries. In this case, dictionary users are not able to get the required semantic information regarding derivatives because even those that are treated in the microstructures are not accessible enough to the users. Given this problem the study recommends that the information regarding the principle that is going to be followed in the treatment of derivative nouns be explained clearly in the front matter of such a dictionary so that users will know where to find derivative nouns, if the meanings of derivative nouns are nearly the same with the original form, the study recommends that lexicographers lemmatize the original forms only, and the reference skills of the target user be well- researched so as to establish which treatment procedure is best suited for these users, no meaning must be determined by word structure and therefore lexicographers need to be sensitive to language in order to know whether a word has a different meaning with the original or derived word.

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CHAPTER 1

INTRODUCTION

A dictionary is a world class book which provides information about words, their meanings, spellings, pronunciation and so forth. According to Phillips (1992: 99), a dictionary is a book that presents the words of a language in an alphabetical order with their meanings and spellings. According to the *Oxford English Dictionary*, a dictionary is:

A book dealing with the individual words of a language (or certain specified classes of them), so as to set forth their orthography, pronunciation, signification, and use, their synonyms, derivation, and history, or at least some of these facts: for convenience of reference, the words are arranged in some stated order, now, in most languages, alphabetical; and in larger dictionaries the information given is illustrated by quotations from literature; a word-book, vocabulary, or lexicon.

A dictionary is a book that contains words of a language treated in alphabetical order. Almost everyone who uses the English language will have some need to use a dictionary, and many people need to use one every day. In fact, there are so many different ways to use a dictionary, and so

many different kinds of people who need to use them, that dictionaries have evolved to fit every conceivable need. These include checking spelling, finding out the basic meaning of a word, its pronunciation, or discovering the origin of a word. People learning English as a second language have special requirements, and the *Oxford Advanced Learner's Dictionary* will explain usages that might be known to a native speaker but might cause difficulty to a foreign learner.

Amongst the words treated in a dictionary are derivative nouns usually formed from verbs in the process of nominalisation.

According to Akmajian et al derivation is the process by which affixes combine with words or stems to create new words or stems. Derivation results in the formation of new lexemes. These lexemes are formed by affixes. According to Hawkins (1986: 224), derivation is the formation of a word from a word or a root and an inflection is an inflected word, a suffix and so forth.

In Xitsonga, lexemes are also formed by suffixes and prefixes. The lexical item, **cina** (to dance) has **cinela** (to dance for) as derivative. Sometimes, derivatives have a different meaning from their original (basic) forms. This therefore means that just like their basic forms, they are used almost on a daily basis as active members of the lexicon. They are as important as any other lexical item in the language. The following are a few examples of derivative nouns (originating from the verbs in the right column) in English:

Derivative noun

acceptance

application

approval

assumption

calculation

certification

complaint

conservation

consideration

contribution

decision

deduction

delivery

designation

deterioration

determination

disclosure

discovery

disposal, disposition

distribution

education

enforcement

examination

filing

inclusion

information

investigation

movement

objection

payment

persistence

prevention

promotion

qualification

reaction

Verb form

accept

apply

approve

assume

calculate

certify

complain

conserve

consider

contribute

decide

deduct

deliver

designate (name, appoint)

deteriorate

determine

disclose

discover

dispose (sell, give away)

distribute

educate

enforce

examine

file

include

inform

investigate

move

object

pay

persist

prevent

promote

qualify

react

receipt	receive
recurrence	recur
reduction	reduce
reliance	rely
remittance	remit
residence	reside
resistance	resist
specification	specify
statement	state
submission	submit

Table 1

Just as English, Xitsonga has many derivative nouns that originates from verbs. In this case, we say that these derivatives have been nominalised.

1.2 RESEARCH PROBLEM

Xitsonga-English bilingual dictionaries include only basic words or head words as treatment units without considering derivatives as they could form important candidate lemmata in dictionaries to be compiled. This approach has not assisted dictionary users in Xitsonga to get the desired semantic information. Sometimes, these derivatives are included in another part of a dictionary article so that it becomes evident that the users, whose dictionary reference skills are not yet developed, would be unable to retrieve them. The other part(s) of a dictionary include those positioned in an article where Xitsonga dictionary users are not used to find the headwords treated. In this case, they may regard the presented derivatives as part of the microstructural entries that may appear unimportant to them. Furthermore,

presenting derivatives in the microstructure is not a user-friendly approach if the lexicographer(s) do not explain clearly such a lexicographic policy in the front matter of a dictionary. This is not the case with African language dictionaries, especially Xitsonga-English bilingual dictionaries.

The following example from Cuenod's dictionary can be used to illustrate this:

(1) **Luma** -bite (1967: 143)

The lemma **luma** in (1) above is the basic form. All its derivatives are not included in Cuenod's *Xitsonga-English Bilingual Dictionary*. In Xitsonga, there are three words derived from the verb **luma**. These are:

(2) **lumiwa** - be bitten

lumisa - cause someone to be bitten

lumetela - bite continuously

These three words are not entered in this dictionary. They play an important role in Xitsonga. The lemmatisation approach of these derivatives will create a problem to the dictionary users because they will not be able to find the meanings of these derivatives. Dictionaries are expected to be the providers of semantic information regarding lexical items in the lexicon. Why are they not treated? This will indeed create confusion to dictionary users. The words **mavabyi** and **vavabyi** are the derivatives of the basic form **vabya**, sick: These words are also not treated in the *Xitsonga - English Bilingual Dictionary* by Cuenod.

1.3 LITERATURE REVIEW

In this section, the researcher reviews the work of authors related to this study.

1.3.1 Jackson (1988)

According to Jackson, derivation indicates that the morphological process has taken place sometime in the history of a language and that headwords are also regarded as the head forms of the words from which other forms are considered to be derived. The verb **famba** (walk) is the base from which other words, especially nouns, can be derived, for example **fambile** (gone) and **mufambi** (walker) are derived. In this case, the morphological process has taken place through the addition of prefixes and suffixes to the basic verb **famba**. The addition of morphemes to a basic word makes such a word to change its meaning.

1.3.2 Svensen (1993)

Svensen (1993: 77) indicates that the inflected form may simply consist of the headword with one or more letters added. He mentions that the inflection may involve the change of one or more letters at the end of the headword. This is evident in the word **tirhile** (worked) which is derived from the lemma **tirha** (work). In the word **tirhile** the suffixal morpheme

-ile has inflected the verb **tirha** (work). Svensen (1993: 177) mentions that the inflected form is closely related to the headword. When headwords are inflected new words are formed and it is important for the dictionary compiler to see to it that these forms are presented in a lexicographically functional way in dictionaries. As we can notice from the above examples, inflectional morphemes do not change the meaning of a word but the only change is in the expression of tense, quantity, etc.

1.3.3 Mphahlele (2003)

Mphahlele (2003: 160) argues that the structural resemblance that often exists between sublexical and lexical items should not mislead the lexicographers to include sublexical items in the microstructure of lexical lemmata. He mentions that this lemmatization approach procedure is detrimental to the lemmatic status of sublexical items. This is also the case with derivatives. If the derived form of a word is included and presented with its meaning in the microstructure of the basic word, dictionary users will be unable to find the semantic information regarding that derivative.

1.3.4 Prinsloo

Prinsloo (2003) argues that since the number of derived adverbs is limited and open-ended, it is possible to lemmatize all forms separately. According to him a number of issues are at stake from a lexicographic angle. He indicates that there is a need for selection in the case of such paradigms, and that the lexicographer has to take decisions in terms of the completion of

such paradigms. He also argues that the lexicographer has to consider affixes and particles with the aim of including them in the macrostructure and that as mediator the lexicographer has to take decisions in respect of the inclusion into omission from the dictionary after he has studied the available dictionaries. For example, if a word is used only in informal context, or only by specific group of people, or if it is offensive in some way, this should be clearly indicated in the dictionary entry. As prinsloo argues, careful decisions need to be made regarding whether a word needs to be included in the dictionary or not. Much depends on the type and size of the dictionary being compiled. In the larger dictionaries, the main criterion is how widely a word occurs: the dictionary never omits a word because it regards such words as not suitable for inclusion.

1.4 AIM AND OBJECTIVES

1.4.1 AIM

The aim of this research is to analyse *Xitsonga-English Bilingual Dictionaries* in terms of the presentation of derivative nouns and to suggest user-friendly lexicographic procedures that can be followed by Xitsonga lexicographers in order to help the users of their dictionaries to find the required semantic and non-semantic information in the dictionaries intended for them.

1.4.2 OBJECTIVES

- To determine possible ways in which derivative nouns, both derived and inflected, can be better treated in Xitsonga dictionaries when users' reference skills are not yet developed.
- To make lexicographers aware that derivative nouns are as important in Xitsonga as in any other language and that possible user-oriented lexicographic principles need to be developed in order to treat these lexical items in a lexicographically sound way.
- To develop knowledge about Xitsonga derivation typology so that compilers or lexicographers could know which typology is best suited for the users and so that they could decide in an informed manner on user-friendly lexicographic policies to be followed when treating nominalised verbs.

1.5 RATIONALE

The rationale for this study is to show that derivatives are important in Xitsonga and that as such their treatment in the macrostructure of Xitsonga-English bilingual dictionaries is necessary as it will assist dictionary users to find the desired semantic information.

1.6 SIGNIFICANCE OF THE STUDY

The unsystematic presentation of derivatives in Xitsonga-English bilingual dictionaries does not assist dictionary users to retrieve the desired information. This will undoubtedly encourage lexicographers to compile user-friendly dictionaries that systematically treat derived noun. This approach will then result in good quality Xitsonga-English bilingual dictionaries that represent the lexicon of the language as it is. As a result of this endeavour, metalexigraphy will also benefit. The quality of Xitsonga-English bilingual dictionaries will be enhanced, and also be useful to scholars.

1.7 METHODOLOGY

The textual research method will be used in this study. Firstly, Xitsonga bilingual dictionaries will be used as primary texts. These dictionaries will be evaluated in terms of the presentation of derivative nouns. The researcher will also investigate whether derivatives have been presented in the macrostructure and therefore suggestions for an improvement of the original articles will be given in this study. To validate the suggestions, the available literature in the form of lexicographic texts books, journals, and theses will also be used. This therefore, means that a secondary research method will also be applied.

1.8 DELIMITATION OF THE STUDY

This research is not general but specific as it concentrates on the study of derivation in Xitsonga-English bilingual dictionaries. It has been designed in such a way that the researcher will be able to systematically reach a conclusion. It will only focus on the treatment of derivative nouns in Xitsonga-English bilingual dictionaries. This study will try to be as objective

as possible. The concepts, views and arguments presented will not be authoritarian.

1.9 DEFINITION OF CONCEPTS

1.9.1 DICTIONARY

According to Zgusta (1971: 197), a dictionary can be defined as:

A systematically arranged list of socialized linguistic forms compiled from the speech-habits of a given speech community and commented on by the author (lexicographer) in such a way that the qualified reader (dictionary user) understands the meaning.

This means that a dictionary consists of elements that are treated by means of definitions and such elements are systematically arranged in an alphabetical order. Gouws (1987:87) is of the opinion that:

Although a dictionary can and should be regarded as a source of linguistic information, it should also contain a certain amount of extralinguistic information... The way in which semantic information is presented in the dictionary is of major importance for both the lexicographer and the dictionary user.

A dictionary is a source of linguistic information. It must also contain extralinguistic information. This information will assist the dictionary users. Regarding a dictionary, Jackson (1988:157) says that a dictionary may be taken to be an alphabetical listing of words with descriptive information about them.

A dictionary can best be referred to as a reference book containing an alphabetical list of words with information about them. It is a list of words with their definitions, a list of characters with their glyphs, or a list of words with corresponding words in other languages. Many dictionaries also provide pronunciation information, word derivations, histories or etymologies, illustrations, usage guidance, and examples in sentences. Dictionaries are most commonly found in the form of a book.

The above definitions indicate that a dictionary is a book which contains words and their meanings. Let us look at the following examples of words and their meanings from Cue'nod's (1967) dictionary:

(4) ahlama - open the mouth

bazela - give a small present to a customer

chefu - poison

damurhuta - pull or draw apart

engeta - continue to do

fanisa - make alike

All the above examples are words with independent semantic information.

1.9.2 LEXICOGRAPHY

Cox (1989 : 44) defines lexicography, saying:

Lexicography is the profession of writing dictionaries.

Regarding the term lexicography, Mphahlele (2002: 27) says:

A science, activity or discipline that deals with the art of writing and editing dictionaries.

From the above definitions we can deduce that lexicography is the way in which dictionaries are compiled and edited by lexicographers with the aim of assisting dictionary users to know the meanings of words treated. It is the science or practice of compiling dictionaries, based on a study of the form, meaning, and behaviour of the words in a given language. Lexicography consists of two aspects: *Practical lexicography* deals with the art or craft of writing dictionaries, whilst *theoretical lexicography* deals with the theory of how to write good, user-oriented dictionaries.

1.9.3 DERIVATION

According to Jackson (1988: 31), derivation involves adding to an existing word either a suffix (at the end) or a prefix (at the beginning).

The definition of derivation is also expressed by Akmajian et al (1990: 481)

as “ the process by which affixes combine with words or stems to create new words or stems” (as, for example, the **-able** suffix of English which changes a verb into an adjective). This opinion is shared by Hawkins (1986: 224) when he says that “derivation is the formation of a word from a word or root, tracing or a statement of this.” When we look at these definitions, we find that they correspond. They explain derivation as the formation of new words by adding suffixes and prefixes.

The following are a few examples of derivational morphemes in English:

-ation
-al
-ize
-ic
-y
-ous, etc

Derivation in Xitsonga can be illustrated by the following examples from Mathumba et al (1974: 21):

(5) **nghala** - lion

ti + nghala = tinghala – lions

ribye- stone

ma+ribye = maribye- stones

kala- coal
ri+kala
rikala- coals

lwangu - roof
ma+lwangu
= **malwangu** - roofs

yindlu - house
ti+yindlu
= **tiyindlu** - houses

kombela – ask
kombela + ela
= **kombelela** – ask for

riwa – valley
riwa+ eni
= **riweni-** valleys

When we look at the above nouns under (5), we find derived nouns like **tinghala** (lions). The prefix **ti-** has been added to the noun **ng hala** to form **tinghala** (lions) which is a derived word. In this way new words are created through the process of derivation.

Derivational morphemes form new words from existing ones They can be added to a word or the stem of a word to create(derive) another

word. For example, the English word **create** is nominalised through the addition of the derivational morpheme **-ion** to form **creation**. As we have noticed above, derivational morphemes change the part of speech or the basic meaning of a word. For example, the suffixal morpheme **-ment** can be added to the verb **judge** to form the noun, **judgement**. or **-ness** can be added to the adjective **happy** to form the noun **happiness**. These derivational morphemes are not required by the syntactical relations outside the word. In other words, the word **unkind** combines the prefix **un-** and the word **kind** to form a single new word, but it has no particular syntactic connections outside the word. In communication we can say:

- he is unkind
- he is kind
- they are unkind
- they are kind

depending on what we mean. Derivational morphemes are sometimes unproductive. They are selective about the words with which they combine and may also have erratic effects on the meaning. This fore example, means that the suffix **-hood** occurs with only a few nouns such as **brother and neighbour** but not with many others. Derivational morphemes occur between the stem and any inflectional suffix.

1.9.4 INFLECTION

Cox (1984: 373) defines inflection as a change in the form of a word that shows its grammatical function, for example a change that makes a noun plural, etc. Inflectional morphemes do not change the basic meaning or part

of speech as derivational morphemes do. For example, **long**, **longer** and **longest** are all adjectives and they all have the meaning of degree of length.

Akmajian et al (1990: 484) define inflection as the process by which affixes combine with words or stems to indicate such grammatical categories as tense or plurality. Inflectional morphemes are productive in word formation processes. They typically combine freely with members of some large class of morphemes with predictable effects on usage meaning. This means that the plural morphemes can usually be combined with nearly any noun in the same form, and with the same effect of meaning as we have seen with the examples of **long**, **longer** and **longest** above.

The following are examples of inflectional morphemes in English:

-s	plural
-s	possessive
-ed	past tense
-ing	progressive
-er	comparative
-est	superlative

The above information deals with words which are inflected by the use of affixes. In this way, through inflection new words are formed. Akmajian et al and Cox also speak about the plurality of nouns. This can be shown by the following examples:

(6) **n'anga** – doctor
ti+ n'anga
tin'anga- doctors

byongo – brain
ma+ byongo
= **mabyongo** – brains

Poto – pot
Ma+poto
= **mapoto** – pots

The word **n'anga-** (doctor), has been inflected by the addition of the prefix **ti-** to form the plural **tina'nga** (doctors). The plurality is shown by the prefix **ti-** which changes the singular form **n'anga** to the plural form **tin'anga**.

Inflectional morphemes also occur after derivational morphemes where, for example, in the word **realizations**, the inflectional **-s** appears at the very end of the word, after the derivational morpheme **-ation**. Inflectional morphemes indicate certain grammatical functions of the words to which they are added, do not change those functions, and generally appear after derivational suffixes when the two occur together. Examples of inflectional morphemes are **-s** and **-ed** added to **help** to form the third person singular and the past tense respectively. Derivational morphemes often change the base meanings and/or parts of speech of the words to which they are added, and appear after inflectional morphemes when they appear together. Some examples are **-er** and **-able** which change the verb **fix** to the noun **fixer** and the adjective

fixable respectively.

Inflectional morphemes modify a word's tense, number, aspect, and so on for example, when the plural marker morpheme **s** changes dog to dogs.

1.9.5 AFFIX

Katamba (1993: 44) defines an affix as:

A morpheme that only occurs when attached to some other morpheme or morphemes such as a root or stem or base.

According to Hawkins (1986: 10) to affix is to add in writing. Affix is therefore a morpheme which can be added to a word. An affix can be a prefix or a suffix. This can be illustrated as follows:

(7) **golonyi** – donkey cart

ti+ golonyi

tigolonyi- donkey carts

ntsumi - angel

ti+ ntsumi

tintsumi - angels

dyondzisa – teach

dyondzisa + ana

dyondzisana – teach one another

xisibi – soap

xisibi+ nyana

xisibinyana- small soap

The word **golonyi** (donkey cart) and **xisibi** (soap) are the original words. The prefix **ti** – and the suffix **-nyana** have been added to the original words **golonyi** and **xisibi** to form **tigolonyi** - (donkey carts) and **xisibinyana** (small soap). The addition of prefixes and suffixes contribute to the change in meaning of words.

1.9.6 SUFFIX

A suffix is described by Cox (1984: 712) as a group of letters which are added to the end of a word to form a new word and its meaning.

According to Philips (1992: 369), a suffix is a group of letters that can be added to the end of a word. Katamba (1993:44) defines a suffix as an affix attached after a root (or stem or base). A suffix is added at the end of a word or to a root. In some cases these suffixes change the meaning of a word.

According to Hawkins (1986: 824) a suffix is a letter or letters added at the end of a word to form a derivative. This definition agrees with the idea that a suffix is a letter or group of letters that can be added to the end of a word. The definition of Hawkins explains a suffix as a letter which is added at the end of a word or words to form a derivative. This can be illustrated as follows:

(8) **nsimbi** – iron

ti+nsimbi

insimbi -irons

nkombe- ladle

mi+ nkombe

mikombe- ladles

kombela- ask

kombela+ela

kombelela – ask on behalf of

tirha – work

tirha+ana

tirhana – deal with

dlaya – kill

dlaya+ana

dlayana- kill each other

ambala- wear

ambala+ ela

ambala+ ela

ambalela – wear on behalf of

tumbela- hide

tumbela+ ela

tumbelela- hide for

As already mentioned, there are two types of suffixes derivational and inflectional. Derivational suffixes tend to change the meaning of a word whilst inflectional suffixes do not necessarily do so.

1.9.7 PREFIX

According to Hawkins (1986: 656), a prefix can be defined as:

A verbal element placed at the beginning
of a word to qualify the meaning.

Cox (1989: 548) defines a prefix as:

A letter or group of letters added to the
beginning of a word to make a new word.

This notion is also supported by Katamba (1993: 44) when he says that:

A prefix is an affix attached before a root
or base.

Lastly, Phillips (1992: 288) defines a prefix as follows:

A group of letters joined to the beginning
of a word to change its meaning.

These definitions explain that a prefix is a letter or letters added to the
beginning of a word, to form new words with their own meanings.

(9) **movha**-car
ti + movha
timovha – cars

tiko-country
ma+tiko
matiko-countries

mpfundla-hare
mi + mpfundla
mimfundla - hares

doroba-town
ma + doroba
madoroba - towns

rinxiyi – eyebrow
ti + nxiyi
tinxiyi - eyebrows

nomboro – number
ti + nomboro
tinomboro – numbers

In example (9) above, the prefix **ti** – has been added at the beginning of the word **movha** (car) to form **timovha** (cars). The structure of the original word **movha** (car) has therefore been changed to **timovha** (cars).

1.9.8 LEMMA

A lemma is defined by Mphahlele (2002: 23) as follows:

Any bold lexical, sublexical or multilexical unit that appears as a treatment unit in the vertical position of a dictionary.

This can be illustrated as follows:

(10) **bombela** – looks nice and pretty for a certain reason.

chayela – drive animals drawing a wagon, car, or plough.

chicha - unload.

debyisa – hang something loosely

encenyisa – imitate

fananisa – compare

golonyi – wagon

herisa – destroy

inkomu – thanks

jomboro – crowbar.

In the examples under (10), we have words like **chayela**, and **chicha**, which are on the left hand side. These words are the lemmata, while on the right hand side the translation equivalents of these lemmata are given.

1.9.9 LEMMATISATION

Lemmatisation is defined by Mphahlele (2002: 24) as:

The ordering or inclusion of sublexical, lexical and multilexical items in the macrostructure of a dictionary as treatment units or lemmata.

This definition indicates that lemmatisation is the listing of treatment units in the macrostructure of a dictionary whereby the meanings of these

treatment units are given in the microstructure. This can be illustrated as follows:

(11) **mufambi** – walker

vatirhi – workers

sweka – cook

dyondzisa – teach

mafumele – the way you govern

muaki – builder

vavumbi – creators

xirimo – ploughing season

mufi – dead person

muendzi – visitor

All the examples under (11) have been lemmatised under their headwords such as

mufambi, vatirhi, etc. On the right hand side we have the translation equivalents of the lemmatised words **mufambi**, vatirhi etc. The word **mufambi** has been derived from the original word **famba**, (walk).

1.9.10 TRANSLATION EQUIVALENT PARADIGM

The translation equivalent paradigm is defined by Mphahlele (2002 : 50) as:

A position in a translation or a bilingual dictionary where translation equivalents are found.

This can be demonstrated by the following examples from Cue'nod's (1967: 17) bilingual dictionary:

(12) **cable** – khebulo, pindza

cake – khekhe, kokisi

capacity – vundzeni, vuntato

captive – hlonga, mukhotsiwa

carefulness – vukheta, rilondzo

carry – rhwala, nekaneka

carve – kovotla, vatla

cat – ximanga, xipixi

camp – muxaxa, govelo

castrate – tsema , phawula

On the left hand side, we find words which have been lemmatised, for example **cat**. On the right hand side, we have the translation equivalence paradigm of these lemmatised words, for example (**ximanga**, xipixi. The translation equivalence paradigm is characteristics of a bilingual dictionary. English is the source language with Xitsonga as the target language, and the words in the target language form the translation equivalent paradigm.

1.9. 11 BILINGUAL DICTIONARY

A bilingual dictionary is defined by Mphahlele (2002 : 1) as:

A dictionary that supply the source language forms (lemmata) with the target language equivalents.

This can be illustrated from Cuenod (1967:133) dictionary:

(13) **kala** – scarce

kalaka – lime

kalichi – cart

kamari – room

kambela – examine

kandza – crushed mealies

kandziyisa – print

kanakana – hesitate

kanela – discuss

kaneta – deny

kanganyisa – cheat

kambisisa – check

kampa – paddock

kantini – tavern

kanya - squeeze

The examples above, taken from the Xitsonga – English Bilingual Dictionary, indicate that the source language is Xitsonga which has been provided with the target language forms. The word **kala**, the source language form has for example, been supplied with the target language form, which is scarce.

1.9.12 MACROSTRUCTURE

According to Mphahlele (2002: 29) the macrostructure can be defined as:

A list of alphabetical or non- alphabetical usually bold lemmata (treatment units) in a vertical position on the left hand side of the dictionary page.

According to this definition we find the bold lemmata on the left hand side of the dictionary page, vertically arranged. This can be seen from the following examples from Cuenod (1967: 113) bilingual dictionary:

(14) **ahlama** – open the mouth

ahlula – judgement

aka – build

ala – refuse

ambala – wear

amukela – receive

anama – wide

anarhoko - petticoat

angula – answer; butt into a conversation

All words on the left hand side fall under the macrostructure of Cuenod bilingual dictionary. The macrostructure consists of the treatment units of a dictionary.

1.9.13 MICROSTRUCTURE

According to Mphahlele (2002 : 31), the microstructure of a dictionary is formed by:

Any linguistic information that comes after the lemma in the article of a dictionary that reflects pronunciation, circumflex, labelling, definitions, usage examples, etc, about the lemma.

The above definition shows that we find the meanings of words in the microstructure. The following examples from Cuenod 's (1967 : 157) bilingual dictionary present examples of the microstructure:

(15) **nala** – enemy

namarhela – hold to

namurhuta – tear off

nandzu – debt, fault

nanga – trumpet

nantswela – lick one 's fingers

nava – spread

navela – wish

naveta – make someone envious

All the linguistic information on the right hand side that comes after the lemmata is part of the microstructure. This shows that the microstructure deals with the meanings of words which are given as translation equivalents, for example, the Xitsonga word nala which means enemy in English..

1.9.14 NOMINALISATION

Nominalisation is the linguistic process of changing a verb or a clause into a noun, because of linguistic demands. It is commonly used in academic writing to make the writing more concise and dense. Without nominalisation wording or phrasing may be long-winded and cumbersome.

The terminology defined in this section of the study is important because it will often be used in this research. It has been described here so that the reader may better understand the contents and arguments in the following chapters.

CHAPTER 2

LITERATURE REVIEW

2.1 INTRODUCTION

A literature review is given of the work of authors related to this research. The literature review below is important for the development of the argument of this study and in some cases the researcher will use references to some of this literature to support his arguments.

2.2 SHABANGU (1994)

Derivation is one way of forming new words in Xitsonga. By means of derivation nouns are formed by adding affixes. According to Shabangu (1994 : 86), the prefix indicates the class to which the noun belongs. He stresses that nouns must have prefixes, and these prefixes can also be changed to the plural form by adding the prefix of another class. Shabangu (1994 : 86) illustrates this with the following examples:

(1) **saka**-bag

ma + saka

masaka – bags

vuswa – food

ma + vuswa

mavuswa - foods

In the above examples the prefixes in the nouns are clear, as in masaka, (bags) where the prefix ma – has inflected the noun saka (bag). Let us consider the following examples:

(2) **rhuma** – send

rhuma + iwa

rhumiwa – be sent

khoma –catch

khoma + iwa

khomiwa – arrested

teka – take

teka + -ela

tekela – take for

All the examples under (2) have suffixes. This is evident when we look at the word rhuma (send). The suffix **-iwa** has been added at the end of the word to form **rhumiwa** (be sent). The same applies to the word **teka** (take)

which has been inflected by the suffix **-ela** to **tekela** (take for). Shabangu also indicates that the suffix **-ile** forms the past tense when suffixed to a verb. This can be highlighted in the word **tlhava** (stab). If this word is inflected by the suffix **-ile** the past tense **tlhavile** (stabbed) is formed. Through this formation of new words in Xitsonga the language is developed.

2.3 AKMAJIAN et al (1990)

The idea of words formation is also discussed by Akmajian et al (1990: 27). They maintain that word formation involves building up complex words from the base morphemes and affixes. They also mention that the study of how affixes combine with stems to derive new words is known as derivational morphology. On this role of word formation in language, Akmajian et al (1990: 27) observe:

There is evidence from many languages of the world that word formation follows systematic morphological principles. That is, there are rules by which complex words are built up from simpler words and morphemes and, conversely, these same rules permit complex words to be analysed into simpler ones.

This means that these are steps which must be followed in the formation of words. These steps are made possible by the use of the following affixes: prefixes, infixes and suffixes . When stems are inflected by means of

prefixes and suffixes new words are formed. The following examples indicate how prefixes inflect nouns:

(3) **homu-** cow

ti + homu

tihomu – cows

tiko – country

ma + tiko

matiko – countries

siku – date

ma + siku

masiku – dates

When we look at the first example under (3) above, we have the noun **homu** (cow), which has been inflected by the addition of the prefix **ti** – to form **tihomu** (cows). This is also evident from the example of the noun **tiko** (country) to which the prefix **ma-** has been added to form **matiko** (countries). When the above information is observed, it becomes clear that prefixes are also important in the word - formation process. There is a relationship between the original word **tiko** (country) and the derived one **matiko** (countries). The only difference is that the meaning has been

expanded in the noun **matiko** (countries), by adding the prefix **ma -**. This has been because the prefix **ma-** has been inserted. According to Akmajian et al (1990: 28), a suffix introduces another obvious change when added to a word. This is also true in Xitsonga. Note the following:

(4) **rivala-** plain

rivala + eni

rivala- openly

tafula- table

tafula+ eni

tafuleni- in the table

sava- sand

sava+ eni

saveni- in the sand

In the above examples under (4), we have **rivala**, (plain) as original word. The suffix **-eni** has been added to the end of the word **rivala** to form **rivaleni**, (openly). The **-a** in **rivala** has been replaced by **-eni**. The word **tafula** (table) has also been inflected by the a suffix **-eni** at the end to form **tafuleni**, (in the table). The suffix has been attached to the base morpheme **taful -**. This also occurs in the word **sava** (sand), when the suffix **-eni** is added to it the **-a** is replaced, forming **saveni** (in the sand). When the suffix is added at the end of the original word, the meaning changes. This type of

words should be included in the macrostructure of a dictionary, so that users may become acquainted with the newly formed words.

2. 4 BAUER (1983)

According to Bauer (1983:07), word formation makes two assumptions. The first one is that there are such things as words. The second one is that some of these words are formed through derivation. Bauer (1983:124) stresses that words can be formed by the addition of prefixes. He maintains that prefixes are stressed much more often in nouns than in verbs. Bauer (1983:125) gives the following words as examples:

(5) **charge** – the price asked for goods

dis + charge

discharge – to release

count – to find the number of (things etc.)

dis + count

discount + the amount deducted from the full price.

fix – to make or stable

in + fix

infix – to fasten or fix in

In the above examples, the prefixes have the words to which they have been added. Like in other languages, word formation by using prefixes is also evident in Xitsonga. Let us note the following:

(6) **rhumbi** – ruin

ma + rhumbi

marhumbi – ruins

nyama – meat

ti + **nyama**

tinyama – lot of meat

fole – tobacco

ma + fole

mafole - tobaccos

As can be seen from these examples, prefixes also form new words in Xitsonga. This can be illustrated by the word **rhumbi**, (ruin) to which the prefix **ma-** has been added to result in the formation of the word **marhubini**, (ruins).

Bauer (1983: 222) points out that suffixes also play a significant role in word formation (derivation). He indicates that suffixes produce nouns. He quotes the following examples in his discussion:

(7) **free** – not a slave or under the control of another

free + dom

freedom - the condition of being free

social – of society or its organization

social + list

socialist – a practice based on socialism

false – incorrect

false + hood

falsehood – an untrue thing

In the above examples, the word **free** to the suffix **-dom** has been added to form the word **freedom**. The use of such suffixes in English is quite productive in the forming of new words. Bauer argues that stress is also emphasized when the suffix is added to the original form as in the word **falsehood** where the suffix **-hood** has been added to the original word **false**. The way suffixes operate to extend the meanings of words in Xitsonga can be illustrated by the following examples:

(8) **kamara-** room

kamara+ eni

kamareni- in the room

murindzi- watchman

murindzi+ nkulu

murubdzinkulu- senior watchman

vumba- clay

vumba+ eni

vumbeni - in the clay

The significance of word formation is highlighted in the above words, where the word **kamara** (room) is inflected by the suffix **-eni** which will result in the formation of the word **kamareni** (in the room). When we look at the inflected word **kamareni**, we find that the meaning has changed from that of the original word **kamara** (room). When the suffix is added to the original word, the stress is also changed. In Xitsonga there are suffixes which indicate that a person or thing is big, as the suffix – **nkulu** which when added to the word **murindzi** (watch man) changes it to **murindzinkulu** (senior watchman). The inflected word **murindzinkulu** has the same stress as **murindzi**, although the meaning has changed. Derived words must be included in the macrostructure of the dictionary.

2.5 JACKSON (1998)

Word formation is also discussed by Jackson (1988: 10), when he says that derived lexemes can be formed from the headword by a process of lexical derivation, that is suffixation and prefixation. He gives the following examples to support the above statement:

(9) close

en + close

enclose

friend

be + friend

befriend

fuddle

be + fuddle

befuddle

All the given examples above have prefixes. The word **close** has the prefix **en-** by which a new word **enclose** is formed. To the word **friend**, the prefix **be-** has been added to form the word **befriend**. Xitsonga also has derived lexemes formed from headwords. This is evident from the following:

(10) **nseve** – arrow

mi + nseve

minseve – arrows

hotela – hotel

ti + hotela

tihotela – hotels

In example (10) above, the word **nseve** (arrow) has been inflected by the prefix **mi-** to form **minseve** (arrows). The word **minseve** means “a lot of arrows” and not only “one arrow” as the original word **nseve**. This shows that the meaning has automatically changed when the prefix has been added. Jackson (1988: 10) indicates that there are also certain lexemes formed from the headword by adding a suffix, for example:

(11) **sing**

sing + er

singer

hand

hand + ful

handful

These must be regarded as separate lexemes, since, although they are related in meaning to the headword, they usually belong to a different word - class and so are used in different ways in the structure of sentences. The word **hand** has been suffixed with **-ful** to form the word **handful**. The following examples in Xitsonga can be used as illustration:

(12) **aka** – build

aka + ela

akela – build for

faya – break

faya + ela

fayela – break for

Suffixes are one of the corner - stone in word formation. This is shown by the examples under (12). The words **aka** (build) and **faya** (break) have been inflected by the suffix **-ela** to form the words **akela** and **fayela** (break for) respectively. Headwords are regarded as the base forms of the words, from which other word forms are considered to be derived.

2.6 DE SCHRYVER AND PRINSLOO (2002)

De schryver and Prinsloo (2002: 291) maintain that lexicographers of today must acquaint themselves with the standard of present-day life when it comes to the writing of dictionaries. They indicate that all previous mistakes must be rectified so that dictionary users can get the necessary help and dictionaries can be user-friendly. Regarding derivation De schryver and Prinsloo (2002: 291) write that the lemma-sign list of a dictionary should also include derived words.subsequently be derived. This entails word formation through derivation where new words are derived by using prefixes and suffixes. The following examples illustrate this:

(13) **xivoni** – mirror

xivoni + voni

xivonivoni – looking

venga – hate

venga + iwa

vengiwa – to be hated

Derivation has taken place in the above examples, where suffixes have been added to the original words. When we look at the word **xivoni**, (mirror), we see that it has been suffixed by **-voni** to form the word **xivonivoni** (looking glass). Derivation is not affected by suffixes only but also by prefixes. Let us note the following:

(14) **rito**-word

ma + rito

marito - words

buku – book

ti + buku

tibuku - books

Among the examples under (14), there are words which have been formed by the addition of prefixes, as the word **rito** (word) which has been prefixed by **ma-** to form **marito** (words). In Xitsonga, there are certain important derived words which have not been included in the dictionary. Below follows De schryver and Prinsloo's table reflecting the typical situation of the unequal treatment of derived forms in African language dictionaries

which results from “a lemmatisation approach where lexicographers simply add the words which happen to cross the compiler’s way”:

Root	bolela	dira	hwetša	rata	reka	tseba
Derivation	(5,735)	(5,475)	(3,371)	(2,786)	(551)	(5,851)
Applicative	bolelela	direla	-	Ratela	rekela	tsebela
	(76)	(508)	(0)	(11)	(88)	(47)
Passive	bolelwa	dirwa	hwetšwa	Ratiwa(5	rekwa	tsebja
	(408)	(636)	(260)	ratwa(126)	(122)	(441)
Applicative &passive	bolelwa	direlwa	-	-	rekelwa	-
	(6)	(40)	(0)	(0)	(19)	(0)
Perfectum	boletše	dirile	hweditše	ratile	rekile	tsebile
	(767)	(910)	(671)	(151)	(90)	(234)
causative	boledisw a	DIRIŠWA	-	-	REKIŠWA	TSEBIŠWA

When we look at the above table, we see that some inflected or derived words have been omitted. This means that these words have not been included. Omitting these words makes the language concerned incomplete. The words missing in the table are very important in the lexicon of the specific language, Northern Sotho in this case. All inflected or derived words should be included in the dictionary. The omission of words in present Xitsonga dictionaries should be condemned because this lowers the standard of the existing dictionaries. This problem must be rectified by present lexicographers. De schryver and Prinsloo (2002: 291) maintain that the decision of what to include in the dictionary still has to be made by the lexicographer himself. This is true because, although lexicographers regard

themselves as mediators between these rules and dictionaries that they intend to compile, they are the final decision makers regarding what are to be included in a dictionary and what is suitable for its users. This means that given the fact that lexicographic policies are sometimes made across languages it is important that lexicographers become selective of the principles advocated by these policies as some will not be applicable to all languages and also to the skills of some of the dictionary users.

CHAPTER 3

TREATMENT OF DERIVATIVE NOUNS

3.1 INTRODUCTION

Morphemes are the minimal meaningful elements of language. There are two kinds of these: (a) the lexical morphemes (lexemes) and (b) the grammatical morphemes. The former belong to an open class and refer to the real world, always have a phonological element which never contracts, and undergo lexical derivation and inflection. The latter belong to closed classes and refer to grammatical categories; they need not contain a phonological element in the process of word formation.

The process of word formation in Xitsonga is such a complicated linguistic procedure that a specialized knowledge of linguistics is necessary. In linguistics, there is a distinction between two kinds of word-formation: derivation and compounding. Compounding is a kind of word-formation which involves combining complete word forms into a compound; **dog-catcher** is a compound, consisting of the words because **dog** and **catcher**. Derivation involves suffixes or prefixes that are not independent words; the word **independent** is derived from the word **dependent** to which the derivational prefix **in-** has been added and **dependent** itself is derived from the verb **depend** to which the derivational suffix – **ent** has been added. The distinction between inflection and word-formation is not at all clear-cut. There are many examples where linguists fail to agree whether a given rule

involves inflection or word-formation. However, the next section will clarify this distinction further.

In this study, an overview of the formation of derived nouns in Xitsonga will be presented. Given the fact that the formation of derived nouns is such a broad subject, the study will concentrate on the formation of derivative nouns with regard to verbal suffixes, that is, derived forms and the strategies of nominalization of Xitsonga verbs. Special attention will be given to how these strategies for forming nouns in Xitsonga impact on its lexicography, that is, how lexicographers treat derived nouns in Xitsonga.

The study will concentrate on the evaluation of Xitsonga - English bilingual dictionaries in terms of the presentation of derivative nouns. Derivative nouns are those nouns which have been derived from the original verbs by the addition of affixes to a stem whereby newly derived words are formed. Secondary sources will be used in this research. These include books, theses, journals etc. Everyday new words are created and these new words should be included in the macrostructure of dictionaries. This should be done for the benefit of dictionary users. Without the inclusion of derivatives in the macrostructure of Xitsonga - English bilingual dictionaries, the Xitsonga language will not be well represented lexicographically. In evaluating Xitsonga-English bilingual dictionaries, the study will make suggestions for the correction or improvement of articles that are inadequately or insufficiently treated in the dictionaries. As it is argued in this study that derivational morphemes change the meaning and or part of speech of a word in Xitsonga, the study aims to show how these linguistic processes challenge Xitsonga lexicographers with regard to lemmatization procedures during the

compilation of their dictionaries.

3.2 The formation of derivative nouns: An overview

Derivative nouns in Xitsonga are formed through the process of nominalization. In this process of nominalization, verbs are turned into nouns for semantic and syntactic purposes. This means that speakers and speech communities do not just arbitrarily decide to change verbs into nouns, but that this is a logical, systematic and necessary process in speech. The purpose of the formation of derivative nouns is, amongst others,

- to make writing more concise and dense,
- to change the meaning of a word.
- to change part of speech of a word, and
- to change both the meaning and the part of speech of a word.

3.2.1 To make writing more concise and dense.

When verbs are nominalised, sentences are shortened considerably, making them more concise and dense. Consider these examples:

- (a) To report in writing (written report)
- (b) To evaluate the text systematically (systematic text evaluation)
- (c) To evaluate the student (student evaluation)
- (d) To examine the text (text examination)
- (e) Fishing companies have been depleting the fish stocks (The depletion of fish stocks by fishing companies

The nominalizations between brackets make the above examples

more concise and dense, and shorten them considerably.

3.2.2 To change the meaning of the word

Morphological units in a language can be subdivided into free morphemes and bound morphemes. Free morphemes are independent words with independent meanings, also called root morphemes. Free morphemes usually belong to the open word classes such as nouns, adjectives and verbs. The opposite of free morphemes are bound morphemes, also called grammatical morphemes. Bound morphemes are not entire words, they modify the free morphemes and give them a more or less different meaning. Inflectional morphemes, joint morphemes and derivational morphemes are bound morphemes. The joint morphemes constitute a class of grammatical morphemes that is important for compounding in Swedish. This class is the glue between two free morphemes.

Some of the bound morphemes change the meaning of a word especially when the part of speech of the word is also changed. Bound morphemes must be attached to another morpheme, otherwise they are meaningless. For example: adding an – **s** to **cat** changes its meaning to more than one **cat**, but the **-s** alone is meaningless. Inflectional morphemes create a different form of the same word to which they are added. Derivational morphemes change the part of speech of a word they are attached to. Understanding the meaning of a morpheme is necessary for distinguishing between for example, a noun formed by adding **-tion** and a noun formed by adding **-ment**; for instance, **pronunciation** and **pronouncement** use the same root word but have different meanings.

3.2.3 To change the part of speech

Some morphemes change the part of speech of those words formed by derivation. For example, in the process of nominalization some derivational morphemes change a verb to form a noun. Morphological affixes also give a person information about the place of a word in the syntax of the sentence its part of speech. This grammatical information functions both ways; not only can a person tell from the syntax of the sentence which part of speech a word should be, but he / she can also use the grammatical aspects of a word to confirm the part of speech of a word, which the syntax of the sentence has already indicated. For instance, a person is led to expect and understand that a noun becomes the subject of a sentence, etc. This redundancy of information between the syntax and morphemes makes the sentence easier to understand and thus more efficient to process. It is also necessary to understand that the part of speech is indicated by a particular suffix, for example, that **-y** indicates an adjective and that **-ly** indicates an adverb, as in **muddy** and **muddily**. The properties of a word consist of different morphemes that determine whether the word is a noun, a verb, an adverb, etc. Derivational morphemes therefore play a very important role in changing the part of speech of a word. This is also the case in Xitsonga.

Let us consider the following example from Cuenod's (1967 :121) dictionary:

(1) **famba**-walk

In the above example, the original word is **famba** which has been

lemmatized and also given the translation equivalent **walk**. The verb **famba** has several derivatives, formed by the addition of suffixes and a combination of suffixes . Let us consider the following examples.

- (2) **mufambi** - walker
- fambile** - walked
- xifambo**-shoe
- vafambi** - walkers
- tifambela** – a walk; journey
- fambile** - walked
- vafambisi** – assistants; programmers
- fambisiwa** – cause to walk
- fambafamba** – walk aimlessly
- fambelanaka** – walk fo
- fambisa** – cause to work; help

It is evident from the above examples that derivatives are formed in different ways. In many cases, derivatives are formed from verbs with the addition of prefixes and / suffixes. In both all types of derivative formation, suffixes play a critical role. For the purpose of this study, special attention is given to the derived nouns. The relationship between the original word **famba** and its derivatives can only be seen because of the retained stem **famb-**. Looking closely at the above examples, we can see the recurrence of this stem. The fact that these is a recurrence of this stem does not necessarily mean that the meanings of the concerned derivatives are closer to each other. As already

mentioned, it will attempted in this study to ascertain whether lexicographers of Xitsonga dictionaries have treated the derived nouns satisfactorily. In Xitsonga, the word **xika** is a verb. Standing on its own, it has a specific meaning. The original word **xika** has the following derivatives:

(3) **muxiki** - the one who goes down

xikela - go down for

vaxiki - those who go down

xikisa - help one to go down

Although the original word **xika** is given in the Xitsonga - English bilingual dictionary, its derivatives are presented neither in the macrostructure nor in the microstructure of the dictionary. The noun **muxiki** is used almost everyday by Xitsonga - speaking people and therefore plays an important role in the lexicon of Xitsonga. The noun **muxiki**, is closely related to the original form **xika**, because it also deals with the action of moving or going. This research will also indicate that the development of a language rests with the speakers of that language who must always be aware of newly derived words originating in their language. This chapter will also deal with derivative nouns which do not have the same meaning as the original form and which are not included in the dictionary. It will also be indicated that such derivative nouns are very important in Xitsonga and should be included in the dictionary for the benefit of dictionary users.

With regard to word formation, Jackson (1988: 109) mentions that the headwords are those regarded as the base forms of the words, from which

other word forms are considered to be derived. In the case of noun derivatives in Xitsonga, verbs are in many cases the headwords or original words from which these noun derivatives have been formed. For example, the derivative noun **muxavi** (buyer) originates from the base form **xava** (to buy). In other words, the headword of the noun **muxavi** is **xava**. Therefore there is a close relationship between the original verb **xava** and the derived noun **muxavi**. When the meaning of the derived noun is nearly the same as the meaning of the original form, it becomes easier for a person to deduce the relationship between them. In this chapter, it will be discussed whether the treatment of such derivatives in a dictionary is necessary or not. The study will argue in favour of one option. Again, we have the derivative noun **xavana** (bribery) which has a different meaning from the original word **xava** (buy). The study will discuss whether the inclusion of this type of derivation is necessary or not, and reasons be given for the opted choice. The study will also deal with derivative nouns that are treated in the microstructure but do not have the same meaning as the original form. Cuenod's (1967) *Xitsonga - English Bilingual Dictionary* will be used in this study to ascertain whether he dealt with the issue of derivation in a proper way. This chapter will only concentrate on the treatment of derivative nouns in Xitsonga-English bilingual dictionaries. This study aims to suggest procedures that could be followed in treating derivative nouns more user-friendly in dictionaries. It is discussed in this chapter whether one lemmatization procedure for such derivatives could be relevant or whether any other lemmatization procedure followed in a consistent way could be decided upon. The study also discusses the reference skills of Xitsonga dictionary users and the importance that lexicographers make information regarding the derivative

nouns readily available to such users whose reference skills are not fully developed.

3.3 Treatment strategies regarding derivatives.

According to Akmajian et al (1990: 481), derivation is the process by which affixes combine with words or stems to create new words or stems (as, for example, the suffix -able in English changes a verb into an adjective). Jackson (1988: 31) defines it as adding to an existing word either a suffix (at the end) or a prefix (at the beginning).

The above definitions indicate that new words are formed by adding affixes to stems or words in the process of derivation. Xitsonga is one of the languages which have derivative nouns with meanings related to the original base forms. These derivatives are very important in the Xitsonga lexicon. When they are treated in the dictionary, lexicographers need to be careful not to be inconsistent in their lemmatization procedure. That is, they need to make sure that whatever policy is used in a particular dictionary such policy needs to be adhered to throughout the dictionary unless there are valid reasons determined by the users for deviating from this. This study does not dictate to lexicographers a particular lexicographic policy that needs to be followed since what is necessary for the target users of the dictionaries of one language need not be so for dictionaries intended for the same class of users in another language. It will be argued that formulating fixed rules to be followed by lexicographers of all languages would not serve both lexicographers and dictionary users. This would also pose unnecessary

demands for the different classes of users of various kinds of dictionaries. Even in the same language, there exist different classes or categories of users who can be divided by means of their knowledge and skills. Instead, the study would suggest better lemmatisation and treatment procedures regarding derived nouns in Xitsonga-English bilingual dictionaries. Keeping in mind that Xitsonga dictionary users do not have developed dictionary reference skills, the study will suggest models proper for the Xitsonga speech community. It is therefore argued in this study that what appears to be user-friendly in Xitsonga dictionaries cannot likewise be so to those dictionary users who have a developed dictionary using culture. Given the importance of these derivative words, it may happen that any speaker of the language may want to search for such a word in the dictionary in order to use it either in a decoding or an encoding manner. Furthermore, for dictionary users who are not native speakers of the language and who would want to know the meanings of these derivative words, the lemmata must also be accessible. These non-native speakers may not know that a particular word is a derivative when they see, read or hear it in a communication. A common procedure would then be that non-native speakers would search for the derived word in a dictionary in order to find the meaning. If it is lemmatized under the word from which it has been derived, it will not easily be found. Let us consider the following example from Cuenod's dictionary.

(4) **tirha** - work (1967: 189)

The verb **tirha** is not a derivative and nothing has been attached to it. It has been presented in the macrostructure of Xitsonga - English bilingual dictionaries. This will enable dictionary users to find its meaning. The

following are its derived words (treated in the microstructure) and their equivalents in English:

- (5) **mutirhi** – worker; **vatirhi** – workers; **tirhani** - work on your own

As can be seen from the above example, the two derived nouns are in their singular and plural forms. Important here is to ask where these nominalised forms should be treated in the dictionary. That is, whether both forms should be treated in the dictionary, or whether one form should be treated whilst the other form is left out of the dictionary. Their relationship plays a significant role in the above derivatives because the meanings of these derivative nouns are related to the original form as is evident from the meanings of the verb **tirha** and its derivative **mutirhi** (worker). The relationship of the meanings of this derivative noun and its original form can be shown in the following examples where the verb **tirha** and the noun **mutirhi** are used in context.

- (6) **Khanyisa wa tirha** - Khanyisa works

Khanyisa i mutirhi wa mina - Khanyisa is my worker

Looking at the first example **Khanyisa wa tirha**, we find that it tells us what Khanyisa is doing. The other example **Khanyisa i mutirhi wa mina** tells us that Khanyisa is a person who works for somebody. We find that the verb **tirha** and the derivative **mutirhi** are closely related in meaning. The meaning of the derived noun **mutirhi** is more or less the same in meaning as

the original form **tirha**, the only difference being the fact that **mutirhi** is a noun referring to a person. This type of relationship must always be indicated in dictionaries so that users can see that their meanings are closely related. It would be better if **mutirhi** is included in the dictionary, because it is regularly used in every day life. This will also help dictionary users to understand the connection between the lemmata **tirha** and **mutirhi** if they are both included in the dictionary. What has been indicated above is also evident in English where the meaning of the derivative noun (**worker**) is closely related to the original form **work**. The equivalents of the words **tirha** and **mutirhi** are explained in English monolingual dictionary. Let us consider the following examples from Hawkins (1986) dictionary:

(7) **work** - employment or occupation; what a person does to
earn a living

worker - a person who works

As indicated above, the meaning of the derived word **worker**, is closely related to the meaning of the original word **work**. These words are entered in the macrostructure of Hawkins' dictionary. The derivative noun **mutirhi** is important in Xitsonga and as a result it must be included in the macrostructure of the dictionary as Hawkins has done. The word **mutirhi** is a separate noun with its own meaning. If it is not included in the macrostructure of a Xitsonga-English bilingual dictionary, dictionary users will find it difficult to discover its meaning. It will also be difficult for dictionary users to use it because it is not included in the dictionary. The fact that its meaning is related to the word **tirha** does not mean, as we have seen, that the words can replace each other in all contexts. If the lexicographer is

not treating the word **mutirhi** in the dictionary, the users are withheld from consulting the full Xitsonga lexicon. This means that if the word **mutirhi** is not presented in either macrostructure or in the microstructure as element of a dictionary, the lexicographer is not completely presenting the Xitsonga language. Which criteria did the lexicographer use in this dictionary. It seems words were ordered with regard to their origin. If this was the criterium, then this dictionary is not presenting or treating what dictionary users will be looking for. The inclusion of derivative nouns in the macrostructure of a dictionary is very important because they form part of the lexicon, especially if they do not have the exact meaning as the original form. If the lexicographer includes derivatives which have exactly the same meaning as the original form in the macrostructure, it means that he/she will be repeating a similar meaning in the same dictionary. Such presentation will not be user-friendly, because a dictionary must serve its purpose. That is, it must be meaningful to dictionary users because presented information is useful to them. Dictionary users must not be given information which is obvious or is already known to them, otherwise the dictionary will not be serving its purpose of supplying semantic information to them. In other words, compilers or lexicographers should use the dictionary economically so that the presented information is meaningful and purposeful to the target users. Every word must not automatically be included in the dictionary. New words are being generated daily. With regard to this, Zgusta (1989: 17) writes that only dead languages can be exhaustively described in a dictionary, because no new sentences are produced in a dead language. Whenever the possibility exists of new utterances being generated, there is the likelihood that new senses and new words will also be generated. The question to be asked here is whether the word **mutirhi** should be included in

the macrostructure of a dictionary or not. It is obvious from the foregoing argument that although the derivative noun **mutirhi** originates from the verb **tirha**, it is important that it is presented either in the macrostructure as part of the macrostructural element or as sublemma in the microstructure as part of the microstructural element of the dictionary. The dictionary user expects to find such derivatives in an good dictionary because they do not have the same meaning as the original form. The dictionary user will be able to find the meaning of the derivative, for example, after he/she has heard the Xitsonga speaking people using it in their daily communication. The person who will be looking for the meaning of derivatives in a dictionary, is most often a native speaker of Xitsonga. For example, if a Zulu - speaking person hears or reads the derivative **mutirhi**, he/she will not know what it means. Even if such a person is watching television or listening to the radio, he/she may be confronted with new words unfamiliar to him, such as the derivative **mutirhi**. Derivation plays an important role even in radios. Let us say the radio announcer is reading the news over the radio and he uses the derivative **mutirhi**. This will be a new word to the non-native speaker of Xitsonga. So it will be difficult for him /her to understand the meaning of the word **mutirhi**, if he/she cannot find it in the dictionary. So it is imperative for lexicographers to include all the derivative words that do not have exactly the same meaning as the original forms in the macrostructure of dictionaries. Even newspaper readers may tend to have problems. For example, if the non-native speaker is reading a newspaper article he/she may encounter an unknown derivative word for which he/she may want to find the meaning. It is therefore better if the derivatives can be lemmatized in the macrostructure of a dictionary, where the non-native speaker can find their meaning. The words **vumba** and **xivumbiwa** are lemmatized in Cuenod's

dictionary as follows:

- (8) **vumba** - form (1967: 199)
xivumbiwa - creature (1967: 212)

Lemmatizing the verb as well as its derivative is good lexicographic practice, because the word **vumba** (form) and its derivative **xivumbiwa** (creature) do not have the same meaning. The word **vumba** must be included in the dictionary, because it forms the base of the derivative **xivumbiwa**. Given the reference skills of Xitsonga dictionary users, the treatment of the nominal form **xivumbiwa** in any other part of the dictionary than the macrostructure would make it necessary to explain such procedures well in the front matter text of the dictionary. Because of their level of dictionary consultation experience, Xitsonga dictionary users may be unable to locate the place where **xivumbiwa** is treated.

3.4 Exclusion of derivative nouns in the macrostructure

The exclusion of derivative nouns from the macrostructure of a dictionary must be justified by reasons considered appropriate by the dictionary unit or the lexicographers concerned. Although there is no rule or policy that can force them to treat all derivatives as lemmata in the dictionary, lexicographers need to be careful about what rule or policy to choose and implement throughout the dictionary. Any sound lexicographic policy adopted by the dictionary unit or dictionary compilers must be accompanied by a very logical and systematic lexicographic practice so that the whole

dictionary mirrors this adopted dictionary system.

The lexicon of a language consists of lexical, sublexical and multilexical items. All of these items convey meanings. Some may be dependant on others whilst others are not. When compiling his/her dictionary, the lexicographer must take stock of these lexical items and know which ones are relevant and appropriate in his/her dictionary and which ones are not. After this procedure, the lexicographer may start compiling his/her dictionary. There are derivative nouns which are not included in the macrostructure of Xitsonga-English bilingual dictionaries. This is a problem for dictionary users because they will not find the meaning of these words as they are not included in the dictionary. If the lexicographer does not treat the derivatives which do not have the same meaning as the original word in his /her dictionary, he/she does not fulfil the user's needs. Because these words which do not have the same meaning as the original words (verbs) are important, they need to be treated in the dictionary either as lemmata or part of the article of a lemma as sublemmata. Although lexicographers should try to save space, this does not necessarily mean that the intended target users of a dictionary should not be considered. The sole function of any dictionary, be it bilingual or monolingual, is to assist the users of the dictionary to find the desired semantic or encyclopedic information. If dictionaries should save space at the expense of the intended target users, such dictionaries would fail them. We should consider dictionaries as linguistic instruments whose success is judged in terms of the dictionary users who find satisfaction from the systematic presentation of articles. Any dictionary therefore succeeds when its intended user succeeds in retrieving the required semantic information. If not, no dictionary could claim to be successful. The process

of dictionary consultation is made easy if the information is presented in a readily available form in the articles of a dictionary. A better understanding of the presented articles in the dictionary is an indication of the possibility of a successful retrieval of semantic information on the side of the dictionary user. Given the fact that some of the derivative nouns do not have the same meaning as their original forms (verbs), it is a challenge to ensure that they are entered in the dictionary either as macrostructural elements or as microstructural elements. Let us validate this argument by giving the following example from Cuenod's dictionary:

- (9) **famba** -walk (1967: 121)
xifambo - shoe (1967: 204)

The nominalized word **xifambo** (shoe) comes from the verb **famba** (walk). The meaning of the noun **xifambo** is not the same as that of the original verb **famba**. If the lexicographer only includes the word **famba** in the macrostructure of his /her dictionary without considering its nominalised form, such an exclusion would be incompatible with the lexical status of its derivative form **xifambo** unless there are good reasons given in the front matter text to substantiate such an exclusion. The lexicographer should realize that the derivative of a word has a different meaning from its original form and this will determine his/her decision for including a lexical item in the dictionary either as macrostructural element or as microstructural element depending on the policy that is followed in the specific dictionary. The structure of a word does not influence or affect its meaning. For example, homonyms have the same structure but different meanings. In such cases, these homonyms are included in the macrostructure of a

dictionary as independent lemmata. The structure of a derivative and its original form are different from that of homonymous lexical items. Therefore lexicographers should be careful not to see the structure of a derived noun as having been influenced semantically by the words from which it is derived. Therefore, it is important for lexicographers to know whether a particular nominalized word (derivative noun in this case) has a particular meaning relationship with its original form. Unfortunately, existing dictionaries do not always help dictionary users to retrieve semantic and non-semantic information. The word **shoe** is defined in Hawkins' *Oxford Reference Dictionary* "as an outer foot covering of leather". The meaning of the noun **shoe** is not the same with the verb **walk**. The fact that the words **shoe** and **walk** are lemmatized in the macrostructure of English monolingual dictionaries, means that it is important that Xitsonga dictionaries should include their equivalents in their macrostructure. The translation equivalents of the words **xifambo** and **famba** do not have the same meaning. With regard to the above argument, the lexical items **famba** (walk) and **xifambo** (shoe) should be treated in Xitsonga dictionaries. The word **xifambo** is important in Xitsonga because people, especially non-native speakers may want to consult a dictionary to find the meaning of this word. The structure of a word may lead the lexicographer to conclude that the words have the same meanings and then include such derivatives as subordinates of the original verb. The lexicographer might also be tempted not to lemmatize the derivative noun **xifambo** on the unjustified grounds that it has the same meaning as **famba** because their structure is nearly similar. This would be poor lexicography. What must determine inclusion as a headword should be the meaning and not the assumption that a word might have the same meaning as the original verb from which it is derived. If structure influences

lemmatization, then lexicographers will also not assume that a member of a homonym pair has the same linguistic or semantic meaning as its counterpart. In the case of derivatives, the derivative nouns that have nearly the same structure as the words or verbs from which they are derived that is, the original forms, are also likely not to be lemmatized in the dictionary because of the unjustified or assumption that the structure may influence meaning. In this case, Xitsonga dictionaries satisfy the demands of the target users. The same meaning might be repeated in the dictionary as it might be impossible to deduce whether the nominalized word has the same meaning as the verb from which it is derived.

There should be a systematic and a consistent way of treating derivative nouns in the microstructure of Xitsonga-English bilingual dictionaries. These derivative nouns should be treated systematically and consistently in the macrostructure of these dictionaries. How can we say that Xitsonga dictionaries are user-friendly and hopeful whilst the lexicographic procedures the lexicographers apply are not effective? Lexicographers should be trained to recognize the importance of these derivative nouns. They should be presented in the macrostructure and not in the microstructure of the dictionaries. It is a problem when a derivative noun is presented in the microstructure because the derivative form is not subordinate to its original form. It is important for lexicographers to include these derivatives in their dictionaries, for the benefit of dictionary users. These should be presented in the macrostructure, especially when such derivatives do not have the same meanings as the original forms. This is not only the duty of lexicographers but also of dictionary users. They should cooperate in achieving the goal of presenting the derivative nouns in the macrostructure and not in the

microstructure of Xitsonga - English bilingual dictionaries.

The important question that should be asked here is whether derivative nouns should be treated in the macrostructure as lemmata, or in the microstructure either as sublemmata or as support for the headwords in the dictionary.

As already discussed above, derivative nouns are important in the lexicon or vocabulary of a language. The issue of where to lemmatize or treat them in the dictionary depends on the dictionary compilers, /lexicographers' adopted policy. The lexicographers may decide to include or treat them in the macrostructure of a dictionary like any other lemma that is considered important for inclusion or treatment in a dictionary, or they may decide to treat derivatives in the microstructure of the dictionary as sublemmata as part of the article of the headword. This means that any other treatment strategy adopted or used cannot be judged unsuitable as long as such a policy is adhered to throughout the dictionary. We cannot assume that a particular lemmatization or treatment strategy is inappropriate or user-unfriendly because the lexicographer(s) might have decided on that policy for a particular reason. This also means that what is unsuitable for one group of persons need not necessarily be unsuitable for another group. In other words, if Xitsonga lexicographers treat derivative nouns in the microstructure of Xitsonga-English bilingual dictionaries, it would be unfair for us to judge such a policy as long as it is seen or regarded as norm to be followed by these lexicographers. Also, there might be cases where some derivatives are seen as so important in the lexicon of a language that the lexicographer decides or is compelled to treat them as macrostructural

elements in the dictionary. Also, given the fact that derivatives are not similar, that is, some change their meaning after nominalization whilst others do not, the lexicographer may decide to lemmatize those that change their meaning after nominalization. Such a procedure must be seen as an endeavour to satisfy the needs of the intended dictionary users. On the other hand, other lexicographers in the same language may decide to treat all those derivatives that have a combination of suffixes at the end of a lemma in the microstructure, perhaps in an attempt to teach the system of this type of derivational morphology to users of the specific dictionary. What is important here is that the system adopted by a particular dictionary cannot be seen as unsuitable, except perhaps if a particular user group might have complained about a particular lexicographic procedure.

Many dictionaries adopt different lexicographic policies because the cultural contexts or the dictionary cultures of the users are not the same. As such, these policies cannot be seen as unsuitable or inappropriate because they intend to address the needs of different dictionary users. As long as such an adopted policy is adhered to consistently in the dictionary, such a policy cannot be criticized.

To give an example: We cannot expect African language lexicographers to emulate the compilers of dictionaries such as the *Oxford dictionaries*, *CoBuild dictionaries*, etc. If African language lexicographers are expected to follow the example of those dictionaries whose intended users have a developed dictionary culture or whose dictionary reference skills have been well developed over the years, then unnecessary and unfounded expectations are imposed on to African language lexicographers, because their intended

users are very different from those of the native speakers of English, which are more important lexicographic policies or dictionary users.

The fact is that African language lexicographers should only be encouraged to be consistent in their presentation of articles and try to put the demands of their intended target users first.

3.5 Conclusion

It is evident that lexicographers have not systematically been taking stock of the lexical items in Xitsonga. They have indeed not considered derivative words when compiling their dictionaries. This makes their dictionaries inadequate because, as we have seen, users are likely to be confused or unable to find information readily available in the dictionaries. Going through Xitsonga bilingual dictionaries, we have discovered that derivatives, especially derivative nouns are treated unsystematically in them. Lexicographers must have reasons for treating some lexical items in and excluding others from the dictionary, and this must be recorded in the front matter of the dictionary. If derivatives are not treated in the dictionary, lexicographers must have a fixed rule prescribing which derivatives should be excluded from the dictionary. In other words, lexicographers must know which words should be treated in the dictionary and which ones should not. This research has argued against the treatment of derivative nouns in the microstructure. The reason given here is that, because they convey meanings like any lexical item in the dictionary they should not be included in the microstructure. Therefore, such a treatment is not user-friendly, because most Xitsonga dictionary users are accustomed to lemmatization approach whereby lexical items are treated in the macrostructure. Such a policy may

be explained in the front matter text of a dictionary, giving information or guidance to the users that these derivatives which have previously been treated in the microstructure of the articles are in fact important treatment units in their own right. Also, it is necessary that lexicographers, with the lexicographic knowledge they have gained should teach target users about possible dictionary policies that are followed in the dictionaries. It is also the duty of the lexicographers to see that the products they produce serve their primary function.

CHAPTER 4

CONCLUSION

The aim of this study has been to evaluate Xitsonga-English bilingual dictionaries, so that they can be improved as far as the treatment of derivative nouns are concerned. The way derivative nouns are presented in the microstructure of Xitsonga - English bilingual dictionaries will cause dictionary users to be unable to find the meanings of these nouns. It has been pointed out that the lexicographers of Xitsonga-English bilingual dictionaries should be aware that Xitsonga derivative nouns have meanings that should be treated. Lexicographers must first do a thorough research regarding the skills of the intended target users of a dictionary. After this procedure, lexicographers must make sure that any principle be used in the dictionary, whether it be including all the derivatives in the macrostructure, or whether it be treating some (with meanings related to the original forms) in the microstructure, is clearly explained in the front matter of the dictionary so that users are informed of the methodology or approach followed in the dictionary. Lexicographers must ensure that such an approach is observed or followed throughout the dictionary. In chapter three, the study has dealt with the treatment of derivative nouns with meanings related to the original form. We have argued that the meanings of the derived nouns related to the original form may not be included in the macrostructure as this may cause a repetition in the dictionary. If the lexicographer presents the meaning of the original word as well as the meaning of the derived word he/she will waste much space and time. This

suggests that lexicographers must be careful not to produce big dictionaries presenting a repetition of meanings. If a derived word does not exactly have the same meaning as the original form then its meanings should be incorporated in the macrostructure of the dictionary. The study has also touched on the treatment of derivative nouns that do not have the same meaning as the original form. These derivative nouns are often not included in the macrostructure of existing Xitsonga-English bilingual dictionaries. This is a clear indication that Xitsonga-English bilingual dictionaries are not consistent in their lexicographic approach because some of the derivative nouns that do not have the same meanings as the original forms are included in the macrostructure whilst others are not. This is not a consistent and systematic approach. Although the native speakers of Xitsonga use these derivative word in their every day language, their dictionaries do not present these words with their meaning. Certain derivative nouns have been treated in the microstructure of Xitsonga - English bilingual dictionaries. This study argues against this lexicographic approach. It suggests that these derivatives should not be presented in the microstructure but in the macrostructure of the dictionary as they convey meanings like any other lexical item in the lexicon of Xitsonga. Because such words are independent, they must be given a place in the macrostructure and be presented with their rightful meanings. The research recommends that:

- If other treatment units such as derivative nouns are to be included in the microstructure of a dictionary, such a lexicographic procedure must be explained in the front matter.
- In case where the meanings of the derived nouns and the meanings of the original forms (verbs) are nearly the same, the

A.

APPENDIX

The following table is a summary of some of the derivatives in Xitsonga

Verb	Derivative	Affix
1. hlaya - read	muhlayi hlayetela hlayisa vahlayi	mu- -eta -isa Va-
2. dyondza - learn	mudyondzi- dyondzisa- mudyondzisi dyondzetela- dyondzisiwa-	mu- dyo- mu- dyo- dyo-
3. gandla- stamp	xigandlo- gandlisa mugandli gandletela	Xi- -isa mu- -etela
4. xeve- Eat sauce with ordinary mealie porridge	xixevo muxevi xevisa	xi- mu- -isa
5. hlakula - weed	nhlakulo- muhlakuri hlakulela hlakurisa	n- mu- -ela -isa

	vahlakuri	va-
6 Hleva - gossip	rihlevo hlevela muhlevi, hlevisa	ri- ela- mu and -isa -isa
7. londza- prosecute for debts	rilondzo mulondzi londzana londzetela londzisana	ri- mu- -ana -etela -ana
8. xisa- lie	muxisi vuxisi xisana xisiwa xisetela	mu vu- -ana -iwa etela
9. fihla - hide	mufihli fihliwa fihletela	mu- -iwa etela
10. tlanga- play	mutlangi vatlangi tlangisa tlangetela tlangisana tlangela	mu- va- -isa -etela -ana -ela
11 suka- depart	sukela suketela musuki	-ela -etela mu-
12 Pfuka - rise	mupfuki vapfuki pfuketela	mu- va- -etela

	pfukisa pfukana	-isa -ana
13 ambala – wear	mumbari vambari ambarisa ambalela	mu- va- -isa -ela
14. rhwala- carry	murhwari varhwari rhwariisa rhwalela rhwalaana rhwariwa	mu- va- -isa -ela -ana -iwa