Binyam Sisay Mendisu \& Janne Bondi Johannessen (eds.)

## Multilingual Ethiopia: Linguistic Challenges and Capacity Building Efforts

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# MULTILINGUALISM AND LINGUISTIC CAPACITY BUILDING 

BINYAM SISAY MENDISU \& JANNE BONDI JOHANNESSEN

## [1] MULTilinguAL ETHIOPIA

Ethiopia is the second most populous country in Africa, with close to 90 million inhabitants - who speak approximately 90 different languages. Consequently, linguistic diversity is found not only at national and regional levels, but also in local administrative units, rural and urban speech communities, schools, institutions, and even in individual households. Any effort to establish a sustainable and holistic development in such a multilingual nation requires proper recognition and management of its socio-cultural diversity, in which language plays a key role, since it often serves as the principal indicator for the ethnic identity of individuals. As Abbink (2014) notes, however, it is not always feasible to establish an unambiguous match between linguistic and ethnic identities in multilingual contexts.

It was only in 1991 that Ethiopia adopted an ethnic federal political system, within which its current nine regional states were mainly organised along lines of ethno-linguistic identities ${ }^{1}$. Moreover, the 1994 constitution gives equal rights to all Ethiopian languages and encourages their development. Since then, Amharic - the former official language of Ethiopia - now only functions as the working language of the federal government, whereas regional governments are allowed to select their own working language for local administration. Thus, the government of Ethiopia actively promotes multilingualism and multiculturalism, the implementation of which has now been in place for the last two decades.

According to some estimates, Ethiopian Sign Language is used by nearly two million people. Most of the spoken Ethiopian languages belong to two major phyla: Afro-Asiatic and Nilo-Saharan. Among the seventeen Nilo-Saharan languages spoken in Ethiopia, Berta $\left(205,732^{2}\right)$, Gumuz $(179,348)$, Nuer $(151,195)$,

[^0]Me'en $(145,259)$ and Anuak $(88,037)$ have the largest speaker communities. Despite this, the great majority of Ethiopian languages belong to the Afro-Asiatic phylum. Three of the phylum's six language families are represented in Ethiopia, namely Semitic, Cushitic and Omotic - the last one is spoken exclusively in Ethiopia (Azeb 2013) ${ }^{3}$. According to the national census conducted in 2007, Af-ro-Asiatic languages with more than one million native speakers in Ethiopia are: Afan Oromo ( 25 mio), Somali ( $4,6 \mathrm{mio}$ ), Sidaamu Afoo ${ }^{4}$ ( 3 mio ), Afar ( 1,3 mio) and Hadiyyisa ( $1,3 \mathrm{mio}$ ) from the Cushitic family; Wolaytta ( $1,5 \mathrm{mio}$ ) and Gamo ( $1,1 \mathrm{mio}$ ) from the Omotic family; and Amharic ( 21,6 mio), Tigrinya ( 4,3 mio) and the so-called Gurage varieties ( $1,6 \mathrm{mio}$ ) from the Ethio-Semitic family.

Beside the vibrant Ethiopian languages with millions of native and second language speakers, there are also languages that are on the verge of extinction or are already lost for good. The Ethio-Semitic Gafat is one of the languages that has disappeared with few traces. Other languages, like Ongota and Murle, are highly endangered. One language, the Ethio-Semitic Gə`əz, for which a rich written tradition has existed since ancient times, lost its native speaker community hundreds of years ago, but has been retained for liturgical purposes in the Ethiopian Orthodox Church until today. The Ethiopian Sign Language, on the other hand, which has been used for many years in specialised schools to teach deaf students, is only recently receiving more attention.

Over the last two decades, nearly half of the Ethiopian languages have been converted into written languages. In particular, the 1990s have witnessed the design and development of orthographies for a number of languages that were exclusively used for oral communication. Many of them were immediately introduced into the school system as a school subject and/or language of instruction in primary schools, cf. Moges (2010). Those languages that had been transcribed into written form before the 1990s, like Amharic or Tigrinya, are using the Ethiopic script, whereas many of the languages that were written after the 1990s opted for the Latin script ${ }^{5}$, including major languages like Afan Oromo, Sidaamu Afoo, Afar and Wolaytta, cf. Meyer (2008).

Currently, nearly 40 Ethiopian languages are used in schools for mother tongue education in different ways and at different levels. The new language

[^1]policy also encourages the use of local languages in the mass media and administration. Yet the implementation of this policy requires a lot of both financial and professional capacities. Most importantly, the languages themselves must be developed to serve in new formal functions. They have to extend their terminology to express new concepts; grammars and supplementary materials for their use in education must be prepared. Furthermore, qualified personnel are needed to expand our knowledge of these languages, to assist in languagerelated challenges, and provide direction and leadership for various institutional initiatives. In short, the use of about 40 languages in different formal settings in Ethiopia today calls for constant efforts of capacity building at all levels and by all stakeholders, including universities.

## [2] CAPACITY BUILDING EFFORTS

Against the backdrop of such a huge demand to build the capacity of languages and institutions, Addis Ababa University, Hawassa University, University of Oslo and the Norwegian University of Science and Technology initiated the international project Linguistic capacity building: tools for the inclusive development of Ethiopia, which is financed by the Norwegian Agency for Development Cooperation (NORAD) under its NORHED program from 2014-2018. The main aim of the project is to increase the knowledge and capacity at Ethiopian universities to develop resources for disadvantaged spoken and signed languages, so that children and adult speakers of these languages will be able to use them in education and other democratic arenas. For this purpose, the project is involved in various activities, including linguistic research, preparation of short-term training for local language specialists, development of graduate programs in linguistics and communication, PhD training, corpus preparation for several languages and establishing networks between stakeholders.

Within the inclusive scope of the project are diverse languages with different levels of development, for which the project's activities are tailored accordingly. The first group of languages comprises Amharic, Afan Oromo, Tigrinya and Somali. These are languages which have established themselves well in education, media and administration. Accordingly, the intervention of the project mainly focuses on corpus development and adaptation to technology. In the second group, languages like Sidaamu Afoo, Wolaytta, Hadiyyisa and Gamo are included, i.e. fairly well developed languages that are also employed in education, media and administration. Nonetheless, there is a need to strengthen these efforts by conducting research and providing expert opinion on issues of standardisation and preparation of supplementary school materials, such as dictionaries and grammar books. Thirdly, the project focuses on languages for
which local authorities have initiated the development of orthographies and efforts are underway to use them in mother tongue education. In this group, Aari, Hamar and Gurage varieties are considered. The project assists the development of these languages by providing basic linguistic descriptions, which are crucial for designing orthographies and school materials. Moreover, it supports the development of supplementary school materials to be used in early grades and by conducting short-term trainings at local level.

Furthermore, the project gives special attention to the development of Ethiopian Sign Language, which caters for the needs of close to two million deaf or hard of hearing Ethiopians. The project works on the grammatical description of the language, trains experts, launches a graduate program and creates awareness.

## [3] THIS VOLUME

As part of its effort to develop the linguistic knowledge of the Ethiopian languages and deal with practical linguistic challenges, the project organised a research workshop in Rondane, Norway, 1-4 September 2015, at which original research was presented. This volume presents articles written by project participants on various aspects of the languages spoken in Ethiopia. The languages primarily covered in this volume are Amharic, Sidaamu Afoo, Hadiyyisa, Gamo, Inor, Hamar and Sezo. The topics of the contributions range from the description of specific grammatical aspects of a language to socio-political discourse; and from psycholinguistics to the issues of mother tongue education. The papers included in this volume can be generally categorised into the following major themes.

First, there are five contributions that deal with different grammatical aspects of languages. Three of these are specifically concerned with the phonology of individual languages. Baye Yimam investigates the phonological features peculiar to the Amharic variety in South Wello. He concludes that this variety does indeed constitute a distinct Amharic dialect and should be recognised as such. Tsehay Abza looks at the phonology of Inor, a peripheral Western Gurage language, with the intention of determining the phonemic status of consonants and vowels, which was a subject of contention in earlier studies. She grants phonemic status to labialised and palatalised consonants, and to the high central vowel. Shifting our attention from segmental to supra-segmental features, Girma Mengistu Desta examines in detail the tonology of Sezo. He finds that Sezo has two tonemes, i.e. high and low, and provides an in-depth description of the crucial role that tone plays in the lexicon of the language. The other two contributions deal with grammatical aspects of Hamar, a lesser-known South

Omotic language. Binyam Sisay Mendisu describes the main aspects of negation in Hamar with some notes on linguistic typology. The paper focuses on standard negation and negative interrogatives, and addresses the effects of polarity on person agreement, as well as the marking of tense, aspect and mood. The negation of non-verbal, existential and imperative clauses is also briefly discussed. Moges Yigezu describes morphophonological aspects of Hamar. He identifies three commonly occurring morphophonological processes, namely the spreading of nasality, the spreading of place of articulation and the spreading of manner of articulation.

The second group of papers focuses on orthography and script. Ronny Meyer provides a historical and social account of the Ethiopic script by dealing with the origin, linguistic modification and socio-cultural implications of the script. Feda Negesse and Derib Ado reports on a psycholinguistic experiment concerning the visual recognition of graphic variants of the Ethiopic script as currently used in Amharic. The study notes that frequency of use is directly connected to the visual recognition of letters. The third contribution by Shimelis Mazengia addresses practical challenges of the Hadiyyisa orthography. The study reveals that students have difficulties in distinguishing phonological quantity and vowel length. The study also touches upon some of the problems students face when transferring their knowledge of Hadiyyisa orthography into learning English. At the end, the paper provides suggestions for revision, based on the principles of economy and regularity.

The third major theme which emerges from the studies collected in this volume is the issue of words and names. Lutz Edzard sheds light on the complexity of lexicographic comparison in Semitic languages, by exploring the important role that the lexicon plays in genetic classification in the context of South Arabian and Ethio-Semitic languages. He stresses that serious engagement on the applicability of lexicostatistics for genetic classification is needed. Zelealem Leyew closely investigates personal names in Hadiyya. He describes the various social, economic and political connotations of indigenous names in the Hadiyya culture, examines the linguistic features of Hadiyya names, and gives insights into the recent trend of shifting to Amharic and Biblical names.

The issue of standardisation and identity is the fourth thematic topic in this volume. Almaz Wasse Gelagay examines the standardisation of Gamo and its challenges. She finds that the standard form currently employed is based on a single dialect of Gamo known as Dače and recommends a 'dialect democracy approach' to establish a neutral standard variety. Hirut Woldemariam investigates the challenges of language planning in a context where identity is closely tied to dialectal varieties, by taking Gamo as a case in point. She recommends
that identity planning should go hand in hand with language planning in such settings. Kjell Magne Yri explores the challenges that are faced by Sidaamu Afoo in coining specialised grammar terminology. He presents his views regarding linguistic terms which are currently in use and their negative effects for learners. He suggests using locally relevant and everyday words in terminology development.

Issues of social and political discourse are the focus of the last two papers in this volume. Nigussie Meshesha Mitike and Kjell Magne Yri provide a detailed account of three Sidaama folk media in the light of discourse analysis and speech act theory. They give a linguistic and contextual analysis of selected songs and lullabies and illustrate how the community traditionally expresses its social and political grievances via those media. Finally, Fekede Menuta and Ruth Vatvedt Fjeld examine cursing expressions in Gurage and Norwegian culture. They describe the role of cursing in each of the two cultures and conclude with a comparative note. Unlike in the Nordic culture, cursing is a highly gendered practice in Gurage, which also has a regulatory function in society.

## [4] THE REVIEW PROCESS

In order to achieve the highest possible quality for the papers in this volume we have had two reviewers for each paper. No matter how good a scientific paper is to start with, it can always be improved. This is why reviewing is such an important part of the publishing process. With the help of thorough, serious reviewers the authors get the chance to see that some points are unclear to others, that certain arguments could be better focused, that background information might be added for the readers to improve understanding of the paper, and perhaps most importantly, that earlier work on the subject should not be missed out in the relevant sections.

The reviewers for this volume are experts from universities and academic institutions across the world, from Australia, Ethiopia, Finland, France, Germany, Great Britain, Kenya, Israel, Italy, Japan, Norway, Netherlands, Sweden and the USA. They have been very thorough and constructive, and a few even agreed to review more than one paper. We are very grateful for their work, and honour them by mentioning their names here. (Some reviewers wanted to stay anonymous, which we of course respect.) Their names are given in alphabetical order:

Anbessa Teferra (Tel Aviv University), Andreas Wetter (HumboldtUniversität zu Berlin), Anne Golden (University of Oslo), Avihai Shivtiel (em., University of Leeds), Azeb Amha (African Studies Centre, Leiden University), Baye Yimam (Addis Ababa University), Daniel Harbour (Queen Mary University
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# PHONOLOGICAL FEATURES OF THE 

 AMHARIC VARIETY OF SOUTH WəLLOBAYE YIMAM

## ABSTRACT

This paper examines the phonological features that characterize the Amharic variety spoken in South Wallo, an area which has been influenced by the diffusion of linguistic and cultural features arising from longstanding contact situations between Semitic and non-Semitic linguistic groups. Data from eight districts of the zone have shown that the South Wallo variety has 26 consonant and seven vowel phonemes. The consonants are four fewer than that reported of the standard variety. The co-occurrence restrictions of the consonants and the syllable structures are the same as those of the standard variety. However, the phonological rules that operate at morpheme internal, morpheme and word boundary levels are different in the degree of complexity and directionality. These include intervocalic lenition of velar stops, word-final weakening of alveo-palatals, coalescence of lowering diphthongs, centering, lowering and fronting of vowels, metathesis of coronals and anteriors, and lexeme specific alternations of homorganic consonants. The description of the facts provides more substantive arguments in favor of the long-held claim that Wallo constitutes a distinct dialect area.

## [1] INTRODUCTION

Amharic is the working language of the Federal Democratic Republic of Ethiopia. It is the most widely spoken Semitic language serving as a national lingua franca. It is a medium of instruction in elementary schools in the Amhara Regional State and in major urban areas in other states. It is a field of study in colleges and universities. It has a relatively rich literature that dates back to the turn of the $20^{\text {th }}$ century, and a history of writing that goes back to the $14^{\text {th }}$ century, (Appleyard 2003: 233). There are books on its grammar, lexicon, and creative writings of all genres.

One aspect of the language that has not been given enough attention is the degree of variations it shows across regions and social groups (Amsalu and Habtemariam 1973:114). The few attempts that have been made indicate the following as possible areas of dialect variations (Amsalu and Habtemariam

1973; Hailu et al. 1976):
Wallo
Gondər
Goj̃jam
Mənz (Shewa)
Addis Ababa.
The identification of these areas is based on lexical and phonological features of data from semi-urban areas in Wəllo, Goyjam, and Mənz.

This situation calls for a more comprehensive and in-depth study than could be undertaken here. Therefore, the present paper focuses only on Wallo, and specifically South Wallo (SW), which has witnessed processes of ethnic and religious interactions over an extended period of time (Hussein 2001). Among the interacting groups are Amhara, Oromo and Argobba Christians and/or Muslims whose contacts have had an effect on the formal and functional aspects of the language used in the area. The present study is, thus, an attempt towards describing the phonological features that characterize the area.

To this effect, the paper is organized into five sections, the first of which is a brief introduction. The second section gives a brief overview of previous studies on variations as a point of departure. Sections three and four address the phonemic inventory and the various phonological processes attested in the present corpus, and finally, section five provides a short summary.

## [2] PREVIOUS STUDIES

Dialect studies are a recent phenomenon in Ethiopian linguistics (Amsalu and Habtemariam 1973). Their history goes back to the late 1960s and mid 70s, when work started as part of a descriptive survey project on language use and language teaching in Eastern Africa. Four teams set out to do the survey in the four Amharic speaking provinces of Bəgemidir (now Gondər), Gojjam, Wəllo, and Mənz of Shewa. Subsequently other surveys were undertaken on the major languages of the Cushitic, Omotic, Semitic and Nilotic stalks, the results of which were published in Bender et al. (1976).

Following these studies, certain Oromo and Amharic speaking regions were recognized as dialect areas (Hailu, Getachew and Cowley 1976; Gragg 1976; Kebede 2009). Among them was Wollo, which Amsalu and Habtemariam (1973) had already identified as a possible dialect continuum with Mənz of Shewa. The claim was later supported with studies by Getahun (1983), Gebre (1999) and Zelealem (2007). Getahun (1983) is an essay on the same Wallo area with data from the locality of Ambassal, some 60 km north of Dase, the capital of the pre-
sent South Wallo Zone. The data in Amsalu and Habtemariam (1973) was from Haik', a small town 30 km north of Dase, and from nearby villages such as Sulula.

The focus of these studies was on some general phonological and morpholexical features of Amharic for which the Addis Ababa variety, which was considered a de facto standard variety (SV) due to its connection with the power elites and the bureaucracy, was taken as a measure against which variations were described and judged (Amsalu and Habtemariam 1973).

The phonological descriptions showed that there were two types of alveodental stops: one consisting of $/ \mathrm{d} /$ and $/ \mathrm{t} /$, and the other comprising the alveopalatal counterparts $\left[d^{y}\right]$ and $\left[\mathrm{t}^{y}\right]$. Whether the latter two consonants were phonemic entities or allophonic variants of the former two is not clear from the descriptions.

The same descriptions also showed that there was a palatalization process which reduced the alveo-dental stops $/ \mathrm{d} /$ and $/ \mathrm{t} /$ to [ $\check{c}]$ and $[\check{j}]$ in the context of a following high front vowel. However, such processes are not unique to the Wallo variety as they are also attested in other dialects such as Mənz (Hailu and Fisseha 1973), in North Shewa, and in South Gondər, as reported in Gebre (1999). The feature may cover a chain of areas from South Gondar to North Shewa, with South Wallo (SW) falling in between. What seems unique to SW is the further weakening of these same alveo-palatals, /č/ and / $\check{j} /$, to $[y]$, as will be shown in section four.

The survey by Amsalu and Habtemariam (1973) also showed that the variety of Wallo is characterized by a large number of Arabic and Oromo loan words, resulting from longstanding secular and religious contacts between and among speakers of these languages or dialects. It is reported that the present day South Wallo has become one of the major centers of Islamic teaching, for which a variety of Arabic has been in use along with Amharic (Hussein 2001; Rukia 2013). Such contacts between Christian and Muslim Amharas have been so close that the two languages have influenced each other, with the Amharic lexicon becoming Arabicized, and the Arabic one getting Amharicized. ${ }^{1}$ The Arabicized Amharic lexicon has now led to the emergence of a special sub-variety dubbed Muslim Amharic (Pankhurst 1994; Rukia 2013:128).

The contact between Amharic and Oromo is as old as the $17^{\text {th }}$ century, which was marked by the Oromo expansion to the north following the Jihadist conquest of the country by Ahmad bin Ibrahim al Gazi (1506-1543). There has been
[1] Examples of Amharicized Arabic words include indiris for Idris; ay̌əb for Sujib / 乌ay̌aSib; ǰuma/Jimmət for ǰuma§a; səyid for Said, gyism for ǰism 'body', adduñña for addunya <al-dunya 'livelihood, world', šeralla for sharia Allah, merebba for merhaba 'may it be so' etc.
a diffusion of Oromo morpho-lexical features into Amharic, and a large number of lexical items defused from Amharic into the variety of Oromo used by the expansionists. This is in addition to features that are claimed to have come into Amharic from a Cushitic substratum, more particularly from the Agaw languages of central and northern Ethiopia (Leslau 1945, 1964; Appleyard 1977). From this, one may conjecture that Amharic is a sandwich language of an Agaw base and an Oromo topping, decorated with a thin layer of Arabic lexicon. This is evident from its basic lexicon which is reported to be $25 \%$ non-Semitic, and its head-final syntax which is fully Cushitic, (Appleyard 1977; Bender 1983). As stated in Amsalu and Habtemariam (1973), the lexical influence of Oromo and Arabic has been more noticeable in the Wallo area than in other parts of the Amharic speaking regions of the country.

## [3] THE PRESENT STUDY

As stated above, the data for the previous studies was gathered from urban and semi-urban areas in South Wallo, specifically in Dase, Haik' and in adjacent districts such as Ambassal, all within a radius of 60 km . In contrast, the data for the present study comes from a broader area, that includes eight of the 20 districts of the South Wallo Zone. ${ }^{2}$ These districts have been selected since they show a great deal of religious and ethnic interactions.

The data was gathered through elicitation of lexical items of cultural and natural objects, and audio - video recordings of oral narratives, such as reminiscences ${ }^{3}$ of elders and youngsters of both sexes, stories, and two Aǰami texts by two Sheikies from Dase. The present corpus may, thus, provide a broader spectrum of facts for a more comprehensive description, which may, in the end, support or militate against the claim that Wallo in general constitutes a dialect area. For this, the study takes the phonetic and phonological properties of consonants and vowels attested in the present corpus as its major concern.

The approach adopted for the description is synchronic, and eclectic in the sense that both stracturalist and generative concepts and descriptive tools are used. The phoneme is recognized as a distinctive unit of sound and/or as a bundle of distinctive features, depending on the nature of the facts that need explaining.
[2] These are Wərrə Babo, Wərə Ilu, K'alu, Ləgə Hida, Borəna, Tənta, Ambassəl, and Təhulədəre.
[3] Four elderly male, five young male and five female native speakers, with ages ranging from 18 to 81, have been consulted.

## [4] Phonology

In this section, the consonant and vowel sounds attested in the present corpus are described. To this end, the inventory of the consonant and vowel phonemes of the standard variety (SV) of the language will be used as a contrastive background, but not as a derivative basis for the variations shown in the SW variety shows.

## [4.1] Consonants

From the elicited data and recorded narratives, the following consonant phones have been identified.

| Bilabial | Labio- <br> dental | Alveo- <br> dental | Alveopalatal | Velar | Glottal |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathrm{bb}^{\text {y }}$ |  | $\mathrm{d} \mathrm{d}^{\text {y }}$ | j | $\mathrm{g} \mathrm{g}^{\text {y }} \mathrm{g}^{\mathrm{w}}$ |  |
| (p) |  | $t^{\text {y }}$ | č | $\mathrm{k} \mathrm{k}^{\mathrm{y}} \mathrm{k}^{\mathrm{w}}$ | $?$ |
| (p') |  | $t^{\prime} t^{\prime \prime}$ | č' | $k^{\prime} \mathrm{k}^{\text {y }} \mathrm{k}^{\prime \mathrm{w}}$ |  |
| $\beta$ | $\mathrm{ff}^{\mathrm{f}}$ | z z ${ }^{\text {y }}$ | žš | $\mathrm{yx} \times$ | $h h^{\text {w }}$ |
| m | m | $\mathrm{s} \mathrm{s}^{\mathrm{y}}$ ( $\mathrm{s}^{\prime}$ ) | ñ | $y$ |  |
| w |  | $\mathrm{nrr} \mathrm{r}^{\mathrm{y}} \mathrm{l}^{\mathrm{y}}$ | y |  |  |

TABLE 1: Consonant phones of the South Wallo Variety (SWV).
Out of these 49 consonant phones, those in brackets, (p), (p') and (s'), are found in loan words of English, Greek and Gi'iz. They are thus marginal as their distribution is restricted to just a few such words. The native plosives, liquids, and coronal fricatives have alveo-palatal and round counterparts, attested in the following examples from SW :

| (1) $\left[b^{\text {y }}\right.$ esa] | razor | [bag] | sheep |
| :---: | :---: | :---: | :---: |
| [fyera] | flu | [fər] | fallow |
| [dyegg] | fine | [d"ur] | bush |
| [ $t^{\text {y }}$ eza] | dew | [t'ərr] | January |
| [ $\mathrm{t}^{\mathrm{y}} \mathrm{e}$ ] | where | [tzw] | stop |
| [ $\mathrm{k}^{\text {y }}$ es] | priest | [k'ass] | slow! |
| [ $\mathrm{k}^{\mathrm{y}}$ is] | pocket | [kas] | compensate |
| [ $\mathrm{g}^{\text {y }}$ ism] | body | [gər] | humble |
| [1'emat] | basket | [lam] | fertile |
| [ $r^{y} \mathrm{e}$ Pwu] | trickery | [raß] | hunger |
| [ $\mathrm{s}^{\text {s }}$ isay] | wealth | [sir] | root |
| [z'ema] | melody | [zər] | seed |

The initial consonants in each of the words in the left column are followed by the front vowel [e] or [i] which seems to trigger the palatalization of the consonants. In the corresponding words in the right column, which are from the same variety, the same consonants do not undergo palatalization because they are not followed by the front vowels. This suggests that the palatalized initial consonants in the words of the left column are allophonic variants of their plain counterparts in the words of the right column.

However, there are examples which also suggest that the palatalized consonants could be phonemic entities rather than allophonic variants. Evidence for this possibility comes from the data below, where the palatalized consonants appear preceding the low mid front vowel [æ], a segment which has not been attested in the standard variety (SV), and in the reports of previous studies. sWv:
(2) [dy $\left.{ }^{y} æ f a\right]$ problem [dy $\left.\neq s\right]$ shade
[adyær] night long [dyæñña] judge
[add ${ }^{y} æ m$ ] Adam [dy $\left.\neq r\right]$ side
[id $\left.{ }^{y} æ\right]$ debt [ady $\left.\neq\right]$ and so
[malady $\mathfrak{x}$ ] morning [arady $\mathfrak{y}$ ] urbane
[gady distance [by ${ }^{y}$ essa] city center
The palatalized consonants are found in syllabic onset positions, which may imply that such positions may be specified for segments which have the features [ + HIGH, - BACK], in the sense of Chomsky and Hale (1968), and in subsequent literatures. However, there is evidence to the contrary which will be provided in section four.

The labial fricative [ $\beta$ ], the labio-dental $[\mathrm{m}]$ and the velar nasal $[\eta]$ are allo-
phonic variants of $/ \mathrm{b} /$, and $/ \mathrm{n} /$, respectively. This is consistent with the pattern in the standard variety (SV), as the following examples in phonetic transcription demonstrate.

| (3) | /leba/ | $[$ leßa $]$ | thief | /kənfər/ | [kəmfər] lip |
| :--- | :--- | :--- | :--- | :--- | :--- |
| /angət/ | [angət $]$ | neck | /anfət'/ | [amfət'] | colored |

The velar fricatives $[\mathrm{x}],\left[\mathrm{x}^{\prime}\right]$ and $[\mathrm{y}]$ in table 1 were not reported in previous studies, but have been attested in the present corpus as being allophonic variants of the corresponding stops $/ \mathrm{k} /, / \mathrm{k}$ / and $/ \mathrm{g} /$, respectively. They occur in post-vocalic position, as in the following examples from the SW variety.
(4) /hagər/ [hayər] country /gəragər/ [gərayər] unsus-

/alləh/ [alləx] | you |
| :--- |
| have | /sərak'i/ [sərax'i] thief

In the same way, the glottal stop [?] occurs as a free variant of the ejective stop $/ \mathrm{k}^{\prime} /$ found in post-vocalic positions as in the following examples:

|  | SWV | SV |  |
| :---: | :---: | :---: | :---: |
| / bək'əddəm/ | [bə2əddəm] | [bək'əddəm] | just a while back |
| / mək’ənnət/ | [mə2ənnət] | [mək’ənnət] | girdle |
| /t'əbbik'/ | [t’əbbì] | [t'əbbik'] | wait for |

It also appears that in the SWV, [ž] is a free variant of /y̌/ in nearly all forms, except in [aǰja ] 'oats', [ijjjag] 'very' and [ $\mathrm{ij} j \mathrm{j}]$ 'hand', where only the affricate is possible. Similarly, the palatal affricate [č] freely alternates with the fricative [š] in initial and medial positions in the noun [šaggər], ~ [čaggər] 'problem', and in the corresponding verbs [təčəggərə] ~ [təšəggərə] 'vexed' and [aččənnəfə] ~ [aššənnəfə] 'won'. In the standard variety, it is only the affricate which is more frequent. ${ }^{4}$
Out of the 49 consonants in Table 1, only 26 of them have phonemic status; the rest are allophonic variants occurring in free or complementary distributions. The phonemes of the SW variety are, thus, the following:

[^2]| Bilabial | Labiodental | Alveo- <br> dental | Alveopalatal | Velar | Glottal |
| :---: | :---: | :---: | :---: | :---: | :---: |
| b |  | d | j | g |  |
| (p) | f | t | č | k |  |
| (p') |  | $\mathrm{t}^{\prime}$ | č' | k' |  |
| m |  | $s\left(s^{\prime}\right) \mathrm{z}$ | š (ž) |  | h |
| w |  | n r 1 | ñ |  |  |
|  |  |  | y |  |  |

TABLE 2: Phonemes of the SW variety.

These phonemes correspond to 26 of the 31 phonemes of the standard variety, in which, the labio-velars $/ \mathrm{g}^{\mathrm{w}} /, \mathrm{k}^{\mathrm{w}} /, \mathrm{k}^{\boldsymbol{\mathrm { w }}} /$ are treated as phonemes. In the present corpus, these have been identified as variants of the plain counterparts, occurring in the context of a following back vowel, as in words like [ $\mathrm{g}^{\mathrm{w} u m}$ ] 'mist', [ $\mathrm{k}^{\mathrm{w} u l] ~ ' e y e ~ l i n e ', ~[~} \mathrm{t}^{\text {'w }} \mathrm{om}$ ] 'fasting' and [k'wlf] 'key', as has also been argued in Taddese (1972) for the SV.

The 26 phonemes of the SW variety can occur in all positions in a word, and that all, but /h/occur geminate in non-initial positions. The feature is both grammatical and lexical, as the opposition in the following examples shows:
(6) /səbr-/ break /gənna/ Christmas
/səbbər-/ broke /gəna/ not yet

From the facts observed thus far, one would conclude that the assumed SW variety has 26 consonant phonemes. The glottal stop and the labio-velars are allophonic variants. [y]] and [ž] are free variants in almost all cases, and that [č] and [̌̌] alternate in only two nouns and in their corresponding verbs.

## [4.2] Vowels

The vowel sounds that have been attested in the present corpus are the following:

| $\dot{i}$ | $\dot{\mathrm{i}}$ | u |
| :---: | :---: | :---: |
| e | $\boldsymbol{\partial}$ | o |
| $æ$ | a | - |

table 3: Vowels of the SW Variety.

These vowels are found in examples like the following, all from the SW variety.

| (7) | $\left[\mathrm{t}^{\mathrm{y}} \mathrm{is}\right]$ | smoke | $[$ izzih $]$ | here | $\left[\mathrm{m}^{\mathrm{w}} u \mathrm{k}^{\prime}\right]$ | warm |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| $\left[\mathrm{s}^{\mathrm{y}} \mathrm{et}\right]$ | woman | $[$ borr $]$ | gate | $\left[\mathrm{m}^{\mathrm{w} o t}\right]$ | death |  |
| $\left[\mathrm{d}^{\mathrm{y}} æ r\right]$ | side | $[$ bal $]$ | husband | $\left[\mathrm{t}^{\text {w }} \mathrm{om}\right]$ | fasting |  |

Table 3 above shows that there is an asymmetry in the inventory, since there are only two back vowels, $[\mathrm{u}]$ and [ o , corresponding to the three front vowels, [i], [e] and [æ]. This may cast some doubt on the status of [æ]; it could be an allophonic variant of the low central vowel [a], occurring immediately after palatalized alveo-dental consonants such as [ $\left.\mathrm{d}^{\mathrm{y}}\right]$ and $\left[\mathrm{t}^{\mathrm{y}}\right]$, as in the examples in the first column in (7). If this assumption is correct, then the phonemic representation of forms such as [ $d^{y} æ r$ ] in (7) would have to be / $d^{y}$ ar/. But this claim faces a problem because it implies that consonants like [ $d^{y}$ ] are phonemes. The fact that such consonants occur in the environment of a following front vowel /i/ or /e/ makes them phonologically conditioned variants of the plain counterparts. Secondly, there are no minimal or analogous pairs where, for example, $\left[d^{y}\right]$ and $[d],\left[t^{y}\right]$ and $[t]$, etc. show contrast in meaning.

An alternative argument would be one that treats the vowel [æ] in forms like [ $d^{y} æ r$ ] as a result of coalescence of /i/ and /a/. In that case, the phonemic representation of forms like [dyær] would be /diar/ in the SW variety. Support for this line of argument comes from the SV where sequences of /i/ and /a/ are possible in phonemic representations of forms like the following.
(8) /k'aria/ green pepper /zabia/ handle
/t'abia/ station /kaffia/ drizzle

It is possible that in the SW variety, in such forms as /diar/ 'side', the high front vowel /i/ causes the consonant preceding it to get palatalized and then it (/i/) coalesces with /a/. Thus, the phonemic representation of forms such as/k'aria/ surface as [k'ary] 'green pepper' or [t'a $\left.\Omega^{y} æ\right]$ 'station' after coalescence in the SW variety. In the SV, instead of coalescence, /i/ gets weakened to [y] such that forms like /t'abia/ surface as [t'aß ${ }^{\mathrm{y}} \mathrm{a}$ ] at the phonetic level. It seems that the two varieties apply different rules - coalescence or weakening on their respective phonemic representations. ${ }^{5}$

All other vowels of the SW variety are short and simple. The lax vowels /a/
[5] A reviewer commented that each variety should be treated on its own, with which I fully agree. The phonemic inventory and the co-occurrence restrictions of the phonemes and the syllable structures of each variety are the same. The difference is in the type of phonological processes that take place at the various levels in each variety, or in the directionality of the processes.
and /a/ occur in all positions, except that / $\partial /$ is restricted to a non-final position. Consider the following:
(9) /ibd/ mad /arag/ interjection of surprise /abbat/ father /bird/ cold /k’ərrə/ failed to come /asa/ fish

The tense vowels /i/ /e/ /o/ and /u/ have not been attested in word initial positions in the present corpus, which is consistent with what is reported of them in the standard variety (Baye 2000).

From the facts observed thus far and the arguments forwarded, it is possible to keep the claim that the SW variety has seven short vowels, and 26 consonant phonemes. In the following, the phonological processes that operate on structures of syllables, morphemes and lexemes will be described.

## [4.3] Phonological Processes

This sub-section describes the phonological processes that take place within morphemes, across morpheme and word boundaries. For this, it is necessary to start with the syllable structure of the SW variety. It has the pattern: (C) V (C) (C), where geminates count as two consonants, taking onset and coda positions, as in /dab.boh/ 'your bread' and in /wərk'/ 'gold', which has a branching coda. Clusters of no more than two consonants are allowed in non-initial position. In this regard, the SW variety behaves like the SV, their differences being in the type, manner and directionality of the phonological rules which are described next.

## Morpheme internal assimilation

In the SW variety, the voiced alveo-dental stop / $\mathrm{d} /$ changes to the continuant [ r ] in the context of a following continuant such as $/ \mathrm{m} /$ or $/ \mathrm{l} /$, as in the following examples:

|  | SWV | SV |  |
| :---: | :---: | :---: | :---: |
| / irme/ | [ $\mathrm{irm}^{\text {y }}$ e $]^{6}$ | [irme] | age |
| /wadla/ | [warla] | [wadla] | place name |
| /k'admo/ | [ $\mathrm{k}^{\prime} \mathrm{rrm}^{\mathrm{w}}$ o] | [ ${ }^{\prime}{ }^{\prime} \mathrm{dm}^{\mathrm{w}}$ o] | before |
| /gudba/ | [ $\mathrm{g}^{\mathrm{w}} \mathrm{ur} \beta \mathrm{a}$ ] | [ $\mathrm{g}^{\mathrm{w}} \mathrm{ud} \beta \mathrm{a}$ ] | ditch |

The same consonant / $\mathrm{d} /$ optionally turns into its voiceless counterpart [ t ] in

[^3]final position in the word for 'yes' in the SW variety. The form occurs as [awad] or [awat] ${ }^{7}$ both based on the cognate [awə] used in the standard variety with an optional /n/, as in [awən]. There are, thus, three variants: [awəd] ~ [awət] used in the SW variety, and [awən] used in the SV for the same concept of affirmation.

The bilabial nasal $/ \mathrm{m} /$ changes to the alveolar counterpart [ n ] in the bound imperative stem [-nt'a] 'come' in the SW variety. The root of this stem is $/ \mathrm{m}-\mathrm{t}$ '? / 'come' in the SV. The initial consonant [m] is attested in the form of the perfective stem /mət't'a/ 'came' in the same variety. In the SW variety, however, $/ \mathrm{m} /$ assimilates to the coronal obstruent [ $\mathrm{t}^{\prime}$ ] in place, and appears as [ n$]$. Hence, the bound imperative form is [-nt'a] 'bring' from which the SW variety derives the causative [ant'a] lit. 'cause to come' (= bring), the optative, [yi-nt'a] 'let him come', and the permissive/consultative [li-nt'a] 'may I come?' all showing [n], whereas in the SV these forms occur with a $/ \mathrm{m} /$.

As stated in the introduction, anterior and coronal consonants undergo morpheme internal palatalization in the environment of a following front vow$\mathrm{el} / \mathrm{i} /$ or /e/. Examples of forms in which the rule applies include the following:

|  | SWV |  |  | SV |
| :---: | :---: | :---: | :---: | :---: |
| /dese/ | [ $\mathrm{d}^{\mathrm{y}} \mathrm{es}^{\mathrm{y}} \mathrm{e}$ ] | name of a town | /dase/ | [dəse] |
| /sera/ | [s ${ }^{\text {y }}$ era] | conspiracy | /sera/ | [sera] |
| /lemat/ | [ ${ }^{\text {y }}$ emat] | basket | /lemat/ | [lemat] |
| /meda/ | [ $\mathrm{m}^{\mathrm{y}}$ eda] | field | /meda/ | [meda] |
| /keša/ | [ $\mathrm{k}^{\mathrm{y}}$ eša] | sack | /keša/ | [keša] |
| /t'is/ | [ $\mathrm{t}^{\text {y }}$ is] | smoke | /t'is/ | [č'is] |
| /t'eza/ | [ $\mathrm{t}^{\text {y }} \mathrm{eza}$ ] | dew | /t'eza/ | [t'eza] |

The plain consonants / $m, d, s, l, n, t^{\prime}, k /$ change to $\left[m^{y,} d^{y}, s^{y}, l^{y}, n^{y}, t^{y}, k^{y}\right]$ in the SW variety only, where the [ +HIGH ] feature is more noticeable (Baye 2000). Note that the form [dyese] has different phonemic representations: /dese / in SWV, and /dase/ in the SV. This means that the difference between the two varieties could be representational in the sense that they show different phonemic vowels /e/ or / / / in the first syllable of the same noun.

In the SW variety, regressive assimilation in devoicing is attested in the forms [dəftər] 'exercise book' and [dəftəra] 'cleric'. In the standard variety, these forms have the phonemic representations, /dəbtər/ and /dəbtəra/, respectively, and phonetic realizations, [də $\beta$ tər] and [dəßtəra]. The bilabial stop

[^4]$/ \mathrm{b}$ / undergoes lenition and surfaces as [ $\beta$ ] in the context of a preceding vowel. In the SW variety, however, a process of devoicing of [ $\beta$ ] to [ f$]$ is triggered by the [-VOICE] feature of $/ \mathrm{t} /$ following it ( $[\beta]$ ). The difference between the two varieties is that only lenition takes place in the SV, whereas both lenition and devoicing take place in the SW variety, which makes the variety complex ${ }^{8}$.

## Metathesis

A few cases of morpheme internal metathesis have been observed in both nominal and verbal forms in the SW variety. The following have been selected on the assumption that they may be unique to the variety.

| [gaddy ${ }^{y}$ efa] <br> [mag" ${ }^{\text {os }}$ ] <br> [səmmət'ə] <br> [balak'] <br> [mikk wut] <br> [mort'ə $\Omega^{y}$ a] <br> [irfft] |
| :---: |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |
|  |  |

SWV
supported
charisma
he sank
a flexible twig
fattened sheep or goat
axe
recess
shirt

| $\begin{align*} & \text { SV }  \tag{12}\\ & \text { [daggəfə] } \end{align*}$ |
| :---: |
| [ $\mathrm{m}^{\text {wogrs] }}$ |
| [sat't'ama] |
| [ləßək'] |
| [ ${ }^{\text {w ukkit] }}$ |
| [mət'raß ${ }^{\text {y }}$ a] |
| [irft] |
| [ [ijozt't'abbaß |

In the SW variety, word - initial and medial consonants, and word - medial and final consonants, switch positions as in: [gəddy ef ] and [daggəfə] 'supported', and [səmmət'ə] and [sət't’əmə] 'sank', respectively. In these forms, the medial consonant is a geminate, whereas the initial and the final ones are simple. When the geminate shifts to the initial position, it becomes simple (degeminates), and when the simple ones shift to the medial positions, they become geminate. In other words, the rule requires that a metathesized segment matches its feature with the specific feature [+ gemination] or [- gemination] of the position it shifts to.

In the forms /balak'/ 'flexible stick', the first and the second consonants, and in /mat'rəbiya/ 'axe' the second and the third consonants, swap position. Both forms are nouns and behave differently from the verbal ones in which

[^5]gemination plays a grammatical role. In addition, in those forms in the second column in (12) above, the first vowel swaps position with the second in the first two, and the second vowel and the continuant consonant immediately following it also exchange positions. It appears that in almost all cases, the SW variety seems to favor central vowels in initial syllables, and an obstruent before a non-obstruent, a coronal before an anterior in stems. The pattern of preference is shown in (13) below, which shows the list of the metathesized segments in the words shown in (12) above.
(13) SWV SV
$-m-t^{\prime}-\quad-t^{\prime}-m-$
$-r-t^{\prime}-\quad-t^{\prime}-r-$
-b-l- -l-b-
$-t^{\prime}-j-\quad-j-t^{\prime}-$
-d -g - -g -d -

## Morpheme boundary assimilation

In morpheme boundary domains, only alveolar consonants undergo what may be called proper palatalization, where a consonant assimilates to the place and/or manner feature of a triggering vowel. This is illustrated by examples from the SV variety

| (14) | /hid-i/ | [hǐyi] |
| :--- | :--- | :--- |
| /bərt-i/ | [bərči] | go |
| cheer up |  |  |
| /k'iməs-i/ | [k'iməš(i)] | taste |
| /sit'-i/ | [sič'i] | give |
| /gìz-i/ | [giži] | buy |
| /gidəl-i/ | [gidəəy] | kill |
| /zifən-i/ | [zifəñn] | sing |
| /filət'-i/ | [filləč'] | split |

These are second person feminine imperative forms. The feminine morpheme is /-i/ and it triggers the palatalization, or weakening, of the stem-final alveo-dental consonants. The rule applies to all the coronal obstruents in the language in general, and is considered an areal feature (Ferguson 1976). What is peculiar to the variety of SW is that the rule extends to /č/ and / $\check{j} /$, which get weakened to [y] in word final position, as mentioned earlier. Observe the following examples:
(15)

| SWV | SV |  |
| :--- | :--- | :--- |
| $[$ liy $]$ | $[1$ lǐ̌ $]$ | child |
| $[$ məy $]$ | $[$ məč $]$ | when |
| $[$ dəy $]$ | $[$ dəy̌j] $]$ | outdoor |

One would expect the central vowels $/ \mathrm{i} /$ and $/ \partial /$ in the phonetic forms of the SW variety to undergo fronting, as they are followed by the palatal glide [y], which has the feature [+HIGH]. The forms should have been *[liy], *[mey] and *[dey]. One possible reason for this could be that the fronting rule applies to verbs and their derivatives, whereas the triggering segment is a phoneme and not a positional variant, which is what [y] is in (15). It is a weakened variant of a palatal affricate $/ \check{c} /$ or $/ \breve{g} /$. Support for this comes from the examples in (16) below.

|  | SWV | SV |  |  |  |
| :--- | :--- | :--- | :--- | :--- | :--- |
| a. | /həyd-/ | [hed-] | /həyd- / | [hed-] | go |
| b. | /həyd-all-əč / | [hed-all-əy] | /həyd-all- <br> ač/ | [hed-all-əč] | she has <br> gone |

In (a), the central vowel / $\partial$ / is realized as [e] because of the glide $/ \mathrm{y} /$, which is subsequently deleted. In (b), /č/ is realized as [y] in [hed-all-әy] 'she has gone' but the vowel / $\partial /$ preceding $[y]$ has not undergone fronting.

In the context of negation, the liquid /l/ of the negative marker /al-/, assimilates in manner to the second person marker / -t / in negative imperative stems like the following:

```
/al-t-gərf-m/ > [attigərfim] don't whip
    /al-t-səbr-m/ > [attisəbrim] don't break
    /al-t-balam/ > [attibəlam] don't eat
```

This rule of homorganic assimilation in manner only applies to the SW variety. In the standard variety, /l/ deletes, and /al-t-gərf-m/ surfaces as [atgərfim] 'don't whip'. The choice is between deletion and assimilation of $/ 1 /$, and the SW variety opts for the latter.

## Vowel harmonies

There are morpheme and word boundary processes of vowel harmony attested in the present corpus. These are described in the following sub-sections.
(i) Centering

A stem internal high front vowel may turn into high central, in the context of a preceding central vowel across a boundary. The following are illustrative examples:

|  | SWV | SV |  |
| :---: | :---: | :---: | :---: |
| a. /2-zzih ${ }^{\text {/ }}$ this | [?ìzzih] | [ 2 i -zzih] | here |
| b. /tolo/ | [ $\mathrm{t}^{\mathrm{w}}$ olə] | [ $\mathrm{t}^{\mathrm{w}} \mathrm{ol}^{\mathrm{w}} \mathrm{o}$ ] | quickly |

In 18 (a), the epenthetic vowel [i] is inserted to break up the initial cluster of /2-zz-/, which is not permissible. The stem internal high front vowel /i/ in [?izzih] 'here' changes to high central [i], in harmony with the epenthetic high central vowel of the prepositional enclitic [?i-]. In (b), the final mid back vowel /o/ of the second syllable of /tolo/ 'quickly' changes to mid central [ə] in the second syllable in /tolə /, in disharmony with the mid back vowel /o/ of the first syllable. This is attested in data from Borəna and Tənta. In data from other areas such as Lasta, in North Wallo, the process changes the vowel of the initial syllable in disharmony with the vowel of the second syllable. This means that the form /tolo/ 'quickly' surfaces as [tal ${ }^{\mathrm{w}} \mathrm{o}$ ] in this area.

In the language in general, perfective verb stems show the mid central vowel /a/ immediately after the initial and immediately before the final root consonant as in, for example, /səbbar-/ 'broke'. This is found in regular tri-literal verbs. In irregular verbs such as [hed-] 'went', which is derived from the phonemic representation /həyd-/, the glide triggers fronting of the vowel / $\partial /$ to [e] and then deletes, resulting in the stem [hed-], to which the third person suffix vowel [- $\quad$ ] is attached. In the SW variety, the glide triggers the medial consonant / $\mathrm{d} /$ to become palatalized to [ $\mathrm{d}^{\mathrm{y}}$ ], and then it (the glide) deletes. This results in the stem /hədy-/, to which the same third person morpheme vowel /$\partial /$ is attached. Then the palatalized [ $d^{y}$ ] causes the suffix vowel /- ə/ to become fronted to [e]. This process results in the form [hədy-e] 'he went'. The difference between the two varieties is in the direction in which the rule operates. In the standard variety, fronting applies to the vowel preceding the glide, whereas in the SW variety, raising applies to the consonant / $\mathrm{d} /$ following it (the glide). In both cases, the glide deletes leaving its mark on the preceding or following segment. The cyclic application of the palatalization of /d/ to [ $d^{y}$ ], and the fronting of the suffix vowel /-ə/ to [e], makes the process more complex in the SW variety.
[9] This is a reduced form of /2i-z-yih/ lit. 'from of this...' where /y/ assimilates to the preceding [z], a historical process also attested in other deictics.

A similar process is observed in the following imperative/imperfective forms of the two varieties derived from the respective stems.
(19) Perfective Imperative/Imperfective

|  | SWV | SV |  |
| :--- | :--- | :--- | :--- |
| /həssəb/ | [issəb] | [assib] | think |
| /həggəz/ | [iggəz] | [aggiz] | help'/ 'assist |
| /həggəd/ | [iggəd] | [aggid] | stop from movement |

The perfective stems begin with the laryngeal, $/ \mathrm{h} /{ }^{10}$ in both varieties. In the imperative/imperative stem of the SW variety, /h/ deletes simply from the initial position and the epenthetic vowel [i] is inserted. In the SV, it deletes after the mid central vowel / $\partial /$ immediately following it has changed to low central [a], hence the contrast between [issab] ~ [assib] 'think', for example. In the SV, the forms appear as [assib], [aggid] and [aggiz] with the epenthetic vowel [i] inserted in the penult position of the root, which results in the form [assib] ${ }^{11}$.

## (ii) Rounding

There is a general rule that reduces a syllabic / $u$ / to a non-syllabic [w], and a syllabic /i/ to a non-syllabic [y]. An instance of the former process is attested in the copula /nə-u/ 'it is', where the morpheme vowel/-u/ is weakened to the non-syllabic glide [w], leading to the form [nəw] 'it is'. Contrary to this, there is a rule that turns the palatal glide /y/ to the labio-velar glide [w], in the context of a high back morphemic vowel /-u/. Compare the following examples:

[^6](20)

SWV
/t'əhay-u/ [t'əhawu] 'sun-DEF'
/səmay-u/ [səmawu] 'sky-DEF
/lay-u/ [lawu] 'upper-DEF'

SV
[s'əhayu] ${ }^{12}$ the sun
[səmayu] the sky'
the upper

As can be observed, the backing/rounding rule applies in the SW variety, the difference between the two varieties is one of applying or not applying the rule.
(iii) Lowering and rounding

The high back vowel / $\mathrm{u} /$ turns into a mid back [o] in the context of a following mid back suffix vowel /-o/. Consider the following examples derived from the corresponding stems:

|  | SWV | SV |  |
| :--- | :--- | :--- | :--- |
| $/$ mut $/$ | $\left[\mathrm{m}^{\mathrm{w}} \mathrm{ut}^{\mathrm{w}}-\mathrm{o}\right]$ | $\left[\mathrm{m}^{\mathrm{w}} \mathrm{ot}^{\mathrm{w}}-\mathrm{o}\right]$ | he, having died |
| /dul/ | $\left[\mathrm{d}^{\left.\mathrm{w} u \mathrm{l}^{\mathrm{w}}-\mathrm{o}\right]}\right.$ | $\left[\mathrm{d}^{\mathrm{w}} \mathrm{ol}^{\mathrm{w}}-\mathrm{o}\right]$ | he, having entered something |
| /hun/ | $\left[\mathrm{h}^{\mathrm{w}} \mathrm{un}^{\mathrm{w}}-\mathrm{o}\right]$ | $\left[\mathrm{h}^{\mathrm{w}} \mathrm{on}^{\mathrm{w}}-\mathrm{o}\right]$ | he, having become |

## Word boundary assimilation

In the preceding sub-sections, morpheme boundary phonological processes have been examined. In this sub-section, harmonic processes that take place across word boundaries will be examined.

## (i) Centering

In the SW variety, the high back vowel /u/ in the second syllable of the adjective / t '-ru/ 'fine' turns into the mid central [ $\mathrm{\partial}$ ] in harmony with the mid central $/ \partial /$ of the noun /wərk'/ 'gold', and subsequently the epenthetic rule applies to the position following the initial consonant in/ t'-ru/ 'fine'. Compare the following forms:

|  | SWV | SV |  |
| :--- | :--- | :--- | :--- |
| $[$ t'-ru wərk'/ | ['tirə wərk'] | $\left[t^{\prime}\right.$ ir ${ }^{\text {w }} \mathbf{u}$ wərk'] |  | fine gold

In the SV , only the rounding rule applies to $/ \mathrm{r} /$ which surfaces as $\left[\mathrm{r}^{\mathrm{w}}\right]$.

[^7]
## (ii) Fronting

In the following locative interrogative structure, the second syllable of the locative preposition /wadə/ 'to' truncates, and the remaining part /wə-/ restructures itself with the interrogative pronoun /yət/ 'where'. This leads to an indivisible unit, to which a number of rules apply. Observe the following:

## (23)

/wada yət nə-u /
to where be-it
to where is it that
First, the syllable /-də/ of the preposition /wadə / is truncated and the remaining part, that is /wə-/, is restructured with the locative pronoun /yət/ across word boundary, resulting in the form [wəyat/ 'where'. Then, the final consonant / t / of this new form, /wəyət/, assimilates totally to the initial nasal /n/ of the copular predicate /nə-u/ 'it is', again across the boundary. This leads to the surface form /wəyənnə-u/ 'where is it? Then a fronting rule applies to the second /a/ which turns into [i] because of the glide /y/ preceding it. Finally, a weakening rule reduces $/-\mathrm{u}$ / in /nə-u/ to [w], resulting in an indivisible phonetic form [wəyinnəw] 'where is it?

This is in the SW variety. In the SV, the glide /y/ of the pronoun /yat/ 'where' deletes, after it has triggered the mid central vowel/a/ following it to change to mid front, [e ]. Then, the rhyme, /-et/, of the syllable, [yet] 'where' is restructured with the preposition /wadə/ 'to', resulting in the form /wadə-et/ 'where'. The central vowel / $\partial /$ of /wadə/ 'to' is deleted because of the high front tense vowel /e/ of the rhyme /-et/ following it. This results in the form /wadet/. Then /t/ of this form assimilates to the nasal /n/ of the predicate, /nə-u/ 'it is'. This yields the surface form, [wodennəw] 'where is it'. The difference between the two varieties is in the degree of truncation. In the SW variety, an entire syllable is truncated, whereas in the SV, only the onset glide /y/ of /yot / 'where' is deleted. In both varieties, restructuring is followed by assimilations leading to the forms [wəyinnəw] in the SW variety, and [wədennəw] in the SV, both meaning 'where to'?
(iii) Deletion and rounding

There are deletion rules applying to the final consonant of the interrogative pronoun /mon/ 'what', followed by rules of vocalic harmony and disharmony operating on the vowel of the remaining part of the same pronoun, which is much the same as what happens to the pronoun /yot/ 'where' considered above.

|  | /min hun -o/ | [m"uhw ${ }^{\text {w }}{ }^{\text {w }}$ o] | [ $\mathrm{minh} \mathrm{h}^{\mathrm{w}} \mathrm{on}^{\mathrm{w}} \mathrm{o}$ ] |
| :---: | :---: | :---: | :---: |
|  | what became-3MSG <br> what became of him? |  |  |
| b. | $/$ min hon $-\mathrm{k} /$ what became-2MSG what became of you? | [ $\mathrm{m}^{\text {w }}$ uhə yk ] | [minhwa ${ }^{\text {¢ }}$ k] |

In the interrogative phrase in 24 (a), the final segment $/ \mathrm{n} /$ of the pronoun $/ \mathrm{min} /$ 'what' deletes in the context of a following inchoative predicate, and the high central vowel /i/preceding the deleted nasal of the same pronoun turns into a high back, in harmony with the high back vowel / $u$ / of the first syllable of the inchoative predicate /hun-o/ 'having become'. In 24 (b), the same deletion rule applies to the final nasal of the interrogative pronoun /min/ 'what'; the high central vowel, /i/preceding it turns into high back [u], again in harmony with the mid back vowel/o/ of the inchoative predicate. Then, the mid back vowel /o/ of the inchoative predicate turns into the mid central vowel $/ \partial /$, in disharmony with the high back vowel [ $u$ ] of the interrogative pronoun.

Following the deletion of $/ \mathrm{n} / \mathrm{of} / \mathrm{min} /$, one harmonic, and one disharmonic rule applies in cycles. The disharmonic rule operates on the output of the deletion rule which elides the final nasal of the pronoun, and on the forms that result from the restructuring of the remaining pronoun with the inchoative predicate.
[5] SUMMARY
The objective of this study was to undertake a further description of the variety of Amharic spoken in South Wollo. In previous literature (Amsalu and Habtemariam 1973) it was claimed that Amharic had shown variations across the provinces of Gondər, GojJjam, Wallo and Shewa. This was based on an assumption that the Amharic used in the capital city, Addis Ababa, was de fact standard as it was the language of power, propagated by the media as an expression of formal communication in institutions such as schools, courts, churches, etc. The few attempts made to describe the variations, showed that the Wallo variety had lexical and phonological peculiarities such as palatalized alveo-dentals like [ $d^{y}, t^{y}, t^{\text {y }}$ etc], a tendency for central vowels instead of front vowels and weakening of alveo-palatals. It was also reported that the variety was characterized by a large number of Arabic and Oromo words caused by longstanding socio-cultural contact that led to lexical diffusion.

The studies were based on data from three urban and semi-urban sites: Haik', Sulula and Ambassal. The present attempt, in contrast, is based on rec-
orded corpus from eight of the 20 districts of the present South Wallo Zone. The focus of the description is on the phonetic segments and the phonological process attested in the corpus.

From the recorded corpus of narratives, 49 consonants have been identified, of which 26 consonants and seven vowels have been recognized as phonemes, making a total of 33 against the 37 recognized for the standard variety. The difference is in the labio-velars $/ \mathrm{k}^{\mathrm{w}}, \mathrm{g}^{\mathrm{w}}, \mathrm{k}^{\prime \mathrm{w}}$, and $\mathrm{h}^{\mathrm{w}} /$ which are missing in the Wallo variety as phonemes, but occur as results of a phonological process of rounding (labialization). It has also been attested in the present corpus that the velar stops have spirantized counterparts, occurring in intervocalic positions. Furthermore, the phonetic inventory of vowels includes a low front vowel [æ] which is considered a result of coalescence of /i/ and /a/. In the standard variety, /i/ is weakened to [y], instead of coalescing with /a/. Thus, /zabia/ surfaces as [zaß'a] and not as [zaßæ], 'handle'.

The seven vowels and the 26 consonant phonemes fall into structures of syllables with a non- branching optional onset, and a branching optional coda of two segments on which the phonological rules operate. Such rules include primary palatalization of anterior and coronal obstruents, weakening of alveopalatal affricates, and spirantization of velars stops; sporadic (lexeme-specific) alternations between the simple alveo-dental stops $/ \mathrm{t} / \mathrm{and} / \mathrm{d} /$ and the sonorants $/ \mathrm{n} /$ and $/ \mathrm{r} /$; morpheme boundary assimilations, and word boundary truncation of parts of a syllable, followed by restructuring of the remaining part with the rest of a constituent. The study has also shown variations in the directionality, and cyclicity of rules of vocalic harmony attested in the SW variety.

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## CONSONANTS AND VOWELS IN THE

WESTERN GURAGE VARIETY INOR: COMPLEX CONNECTIONS BETWEEN PHONEMES, ALLOPHONES, AND FREE ALTERNATIONS

TSEHAY ABZA

## ABSTRACT

This paper is concerned with the phonemic status of consonants and vowels of Inor, a Peripheral Western Gurage language in the southern part of Ethiopia. Determining the status of Inor consonants and vowels is a task well worth doing, as scholars disagree on their categorization. Qualitative research methodology is used in the study. The linguistic data have been collected using key informants and they have been analyzed thematically. The findings show that labialized and palatalized consonants have a phonemic status, even if the predictability of their occurrence cause them to be grouped in addition under the phonetic inventory of the language. It is also determined that, in addition to being the allophone of $b$, there are some indicators showing that a fricative bilabial $\beta$ is phonemic, though this needs further investigation. Moreover, the high central vowel $i$ has double status, being both phonemic and epenthetic.

## [1] INTRODUCTION

Inor is spoken in the Gurage Zone of the Southern Nations, Nationalities and People Regional State. It is one of the South Ethiosemitic languages grouped under Peripheral Western Gurage along with Ener, Endegagn and Gyeto (Hetzron 1977:17). The total population speaking the language is 167,745 (CSA 2008:75).

This study aims to provide a description of the phonemic status of Inor consonants and vowels. In Inor, diachronic sound changes and specific synchronic developments have resulted in a complex situation, in which a phoneme can have a variety of allophones, some of which may also function as phonemes on their own. This has caused some disagreement in the literature on this. For instance, Berhanu and Hetzron (2000:13) did not treat labialized and palatalized consonants as separate phonemes, since they are often triggered by nonsegmental grammatical morphemes. Prunet and Petros (1996) also argued that
all of these secondarily articulated consonants are derived in Western Gurage. Similarly, the labialized consonants $/ \mathrm{p}^{\mathrm{w}}, \mathrm{x}^{\mathrm{w}}, \mathrm{h}^{\mathrm{w}} /$ are lacking in Wendimu (2011:11), but not other labialized consonants. Moreover, Berhanu and Hetzron (2000:13) consider the high central vowel $i$ to be epenthetic, although its occurrence is predictable in rare cases. Rose (1997:7) also confirms that $i$ is epenthetic in all Gurage languages. Berhanu and Hetzron (2000:13) describe a low front vowel /æ/ for Inor, which is an unusual vowel in the Ethiosemitic languages. Wendimu (2011:16) and Rose (1997:7) refer to this vowel as $/ \varepsilon /$.

This paper argues that all labialized and palatalized consonants are not only triggered by morphophonemic processes, but also have phonemic status in Inor. This paper also ensures a double status of the high central vowel i.

The data for this paper have been gathered in spring 2015 from two male native speakers of Inor, Tigistu Muraga ( 35 years old) and Nasir Awol ( 30 years old), who live near Gunchire.

The paper is divided into different sections. The second section elaborates on various views on the identification of phonemes. The third and fourth sections deal with the consonant and vowel phonemes in Inor, respectively. The fifth section focuses on the identification of consonants and vowels of Inor using phoneme/allophone approach to identify sounds that do not change, vis-àvis sounds that adjust their form due to phonotactic reasons, or differ from speaker to speaker. The final section concludes the paper.

## [2] IDENTIFICATION OF PHONEMES

Phonemes are the abstract underlying units of a language (Davenport and Hannahs 2005:116). Katamba (1996:22) defines them as "the functionally significant segments of a language". Regarding the means of identifying phonemes, Davenport and Hannahs (2005:115) state that the phoneme/allophone approach, in which a group of sounds are represented abstractly by a particular phoneme depending on where they occur in a word, distinguishes between the surface sounds of a language and the underlying system. According to them, this enables us to distinguish systematically between underlying representations and sounds actually occurring in a language and to establish the relatively small inventory of underlying phonemes of a language by relating them to the greater number of sounds that speakers of that language actually produce.

Katamba (1989:22) identifies four basic procedures which are used to identify the phonemes of a language: the minimal pair test, contrasts in analogous environments, suspicious pairs, and recapitulation. He states that the minimal pair test is a key principle of phonemic analysis. Davenport and Hannahs (2005:117) also maintain that phonemes are most often established by finding a
contrast between the speech sounds which can be most easily seen in minimal pairs.

However, this method may sometimes lead to the wrong conclusion, as segmental phonemes might also be defined through a bundle of non-segmental features. Therefore, the phonemic analysis in this paper is based on the minimal pair test and the phoneme/allophone approach.

## [3] consonant phonemes

Contrary to Berhanu and Hetzron (2000:13) and Wendimu (2011:11), who assume eighteen and thirty-five consonant phonemes, respectively, for Inor, I identify thirty-nine consonant phonemes including palatalized and labialized consonants, since their occurrence is unpredictable, and it is possible to offer minimal and near minimal pairs for them (see List 3, List 6, List 7 and List 9 in the Appendix).

|  | Labial | Alveolar | Alveopalatal | Palatal | Velar | Glottal |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Plosive/ Affricate | $\begin{array}{cc} b & p \\ b^{w} & p^{w} \end{array}$ | $\begin{array}{ll} \mathrm{t} & \mathrm{~d} \\ \mathrm{t}^{\prime} \end{array}$ | tf ds ty | $\begin{array}{ll} \text { c } & 1 \\ & \\ \text { c } \end{array}$ | $\begin{array}{lcc} \mathrm{k} \underset{\mathrm{k}^{\mathrm{w}}}{\mathrm{~g}} \underset{\mathrm{~g}}{\mathrm{~g}^{\mathrm{w}}} \\ \mathrm{k}^{\prime \prime} \end{array}$ | $\begin{gathered} ? \\ 2^{\mathrm{w}} \end{gathered}$ |
| Fricative | f (ß) | s z | $\int 3$ | ç | $\begin{gathered} \mathrm{x} \\ \mathrm{x}^{\mathrm{w}} \end{gathered}$ |  |
| Nasal | $\begin{gathered} \mathrm{m} \\ \mathrm{~m}^{\mathrm{w}} \end{gathered}$ | n |  | n |  |  |
| Liquid <br> Glide | w | $\mathrm{r} \quad(1)^{2}$ |  | j |  |  |

table 1: Phonemic consonant inventory.

Gemination is a rare feature in Inor. It does not exist word-initially, as the language tends to avoid word-initial consonant clusters (see List 2 in the Appendix).

The consonant phonemes in Table 1 are identified by the minimal pairs shown in List 3, List 4, List 5, List 6, List 7, List 8, List 9 and List 10 in the Appendix. All consonants occur word-medially, while $p, p^{\mathrm{w}}, r, n$ do not appear word-initially (see the distribution of consonants in List 1 in the Appendix). The lateral $l$ and

[^8]the approximant $w$ never occur word-finally. Bahru (1981 E.C.:9) is of the opinion that $l$ is lacking word-initially. However, in my data, it is found in several words word-initially, as in [ləmtfa] 'twin', [luga] 'yoghurt', [lu:x] 'soul'. Minimal pairs containing the lateral $l$ could not be found. According to Hetzron (1977:37), $\beta$ is phonemic, which is also confirmed by my data, as its occurrence is unpredictable, i.e. both $b$ and $\beta$ are found intervocalically and following consonants:
(1) a. [tazrabat'ə] 'be curious'
b. [t'əbat'ə] 'hold'
c. [nəkəßə] 'find'
d. [əßəsər] 'for the meat'
e. [butbutfa] 'puppy'
f. [atßak’ərə] 'succeed'

The plosive b is realized as [b] in the word-initial position or in the onset of a syllable immediately preceded by another consonant, as in (1e), but as [ $\beta$ ] when preceded by prefixes, as in (1d). Sometimes, however, $b$ and $ß$ may occur in the same phonetic environment, as in (1b) vs. (1c), which justifies the view that $\beta$ is also a phoneme by its own. However, no convincing minimal pair was found for b and $\beta$.

The minimal pair method has its own methodological problem, i.e. it is used to establish contrasts between segmental phonemes, which in turn are defined through a bundle of non-segmental features. Thus, this method may lead to the wrong conclusion, because diachronic sound changes and language-specific synchronic developments may result in a complex situation, in which a phoneme can occur in a variety of allophones, which may also function as phonemes on their own (see [5]). For instance, in the minimal pair [zəpara] 'reply' vs. [зəใərə] 'split', $p$ and 2 are contrasting with each another. In the closely related Gurage language Ezha, however, the cognate words are [zəbbərə] 'reply' vs. [zətt'ərə] 'split', in which the contrasting segments are $b$ and $t$ ' rather than $p$ and 1. It therefore seems that Ezha [弓əbbərə] changed into Inor [zəpərə] due to degeminating and devoicing, whereas $t t^{\prime}$ was degeminated and then debuccalized into [?], i.e. it is an allophone of the phoneme $t^{\prime}$ in Inor. Accordingly, if we only consider the contrast between a glottal stop and another consonant, its alternation with an ejective in another form of the same word is missed.

## [4] VOWEL PHONEMES

Inor has seven single vowel phonemes, their doubled counterparts, and two diphthongs. According to Berhanu and Hetzron (2000:13), the phonemic system
of Inor contains the low front vowel $\propto$ which alternates with $a j$. For Wendimu (2011:16), this vowel is $\varepsilon$ which is very rare and alternates with ej. His only example for $\varepsilon$ is [aßcnərə] 'yawn'. My informants, however, pronounce this word [aßajnərə], while Hetzron (1970:568) gives it as [aßœnərə] with the long open vowel $\propto$ for underlying aaj. Thus, the same word is pronounced in three different ways in Inor, probably due to speaker idiosyncrasies. In fact, the vowel $\varepsilon$ seems to be an optional variant of the sequence central low vowel $a$, followed by the glide $j$, which fuses to the front vowel $\varepsilon$.

|  | Front | Central | Back |
| :--- | :---: | :---: | :---: |
| High | $\mathrm{i} / \mathrm{i}:$ | $\dot{\mathrm{j}}$ i: | $\mathrm{u} / \mathrm{u}:$ |
| Mid | $\mathrm{e} / \mathrm{e}:$ | $\mathrm{\partial} / \mathrm{a}:$ | $\mathrm{o} / \mathrm{o}:$ |
| Low |  | a/a: |  |

TABLE 2: Phonemic vowel inventory.

A word in Inor can begin in any vowel (except diphthongs) and end in any vowel except the long vowels $o$ : and $u$ :. In contrast, Wendimu (2011:16) states that a word can end in any vowel except long vowels. However, I recorded a number of words ending in long vowels, as in [wa:] 'this' and [xa:] 'that'. In addition, long vowels occur at the end of some biliteral verbs and 2/3PF pronouns, as in [ty'ija:] 'stink', [fata:] 'untie', [axa:] 'you (PF)', [xina:] 'they (F)'. In my opinion, the vowel length in the pronouns probably developed as a compensation for ${ }^{*} m$, which diachronically disappeared. Hetzron (1970:561-2) discusses different origins of the double vowels of Inor, and states that these vowels tend to behave in the same manner whatever their origin. According to him, one of these origins is the loss of the feminine plural, which he traced from -əma through -əßa to -aa by comparing Inor forms with the parallel forms in Ezha and Gyeto. As for diphthongs, no word is recorded containing them word-initially and -medially (see List 11 in the Appendix). The vowel phonemes shown in Table 2 are identified through minimal and near minimal pairs (see List 12, List 13 and List 14 in the Appendix).

Regarding the phonemic status of the high central vowel $\boldsymbol{i}$, my data confirms Wendimu's (2011:16) finding that the vowel $\dot{i}$ is often used as an epenthetic vowel, but it is not as rare as stated by Berhanu and Hetzron (2000:13). In my data, too, the vowel $\dot{i}$ occurs in a number of words in which it cannot be predicted (see List 11 in the Appendix). It is also used as epenthetic vowel to separate clusters of two distinct consonants word-initially and -finally if the second member is a sonorant, or in a cluster of three consonants except in words such as [bəßan2jəme] 'in everywhere', [wəjßßad] 'knife (made of wood)', [arßใat]
'four' and most of the Inor verbal nouns. The epenthetic vowel $i$ may also occur as $i$ or $u$ depending on the environment. For instance, in [ $g^{w i r}$ ] 'lump (clay)', $i$ may be uttered $u$ because $g^{w}$ has the allophone $g u$ (see also [5.6]).

Vocalic length is phonemic in Inor. It is formed by morphophonemic processes, i.e. assimilation of two short vowels. Vowel length also occurs lexically. This contrast is shown in the minimal pairs in List 13 and List 14 in the Appendix.
[5] Phonemes based on the phoneme/allophone approach
[5.1] Alternation between $n, n, r, l$
According to Hetzron (1977:40-41), most Gunnän-Gurage varieties are characterized by the alternation between the sonorants $n \sim r \sim l$. The alternation between $r \sim n$ mainly occurs in verb inflection, in which the perfective base contains the nasal $n$ but the imperfective/jussive bases, the trill $r$ (cf. Meyer and Fekede 2015:531). In Inor, $n$ also alternates with $r, l$ or $j$, but also remains $n$ as such. The alternation between the nasal $n$ in the perfective base, and $r$ or $j$ in the imperfective and jussive bases of the same verb, is shown in (2).
(2) Perfective 2sm Jussive 2sm Jussive

| a. [xənใa] | [xirใa] | [xijใəwa] | 'prevent' |
| :--- | :--- | :--- | :--- |
| b. [bənใa] | [bir?a] | [bijใəwa] | 'eat' |

The roots of the verbs in (2) are related to the Semitic roots $\sqrt{ } \mathrm{k}-1-\sum$ 'prevent' (a), and $\sqrt{ } \mathrm{b}-\mathrm{l}-\Upsilon$ 'eat' (b) - whose second root consonant $l$ diachronically changed in Inor, namely to the nasal $n$ in the perfective, but to $r$ elsewhere, which, in turn further changed to $j$ with 2 SF subjects. In Inor, the alternation between $n$ and $r$ can also be observed in nouns, in which initial $n$ becomes $\tilde{r}$ if a prefix is attached, such as the genitive marker $\partial$ - in (3):
(3) a. [ni:sa] 'corpse' vs. [ãr̃i: $\left.{ }^{n} s a\right]^{3}$ 'of a corpse'
b. [najə] 'porcupine' vs. [ə̃г̃̃ãjã] 'of a porcupine'

There are also instances of $n$ in Inor verbs, in which it does not alternate with $r$ or $j$ :
(4) 3 sm Perfective 3 sm Imperfective 3 sm Jussive
[3] The mutated $n$ causes the spread of nasalization on the vowels in a base or stem - unless it is blocked by consonants other than $\}$ or j . When the nasalization chain stops on a blocker consonant, an intrusive nasal occurs (cf. Hetzron 1977:44; see also Bovin 1996:22).
a. [menRa]
[jĩmว̃̃n2a]
[ãmãn2a] 'fill up'
b. [fəndə]
[jifənd]
[əfind] 'cut into half'

In some cognates, Inor singleton $n$ corresponds to geminated $r r(5 a-c)$ or $l l(5 d-$ f) in related Ethiosemitic languages. According to Chamora (1996:60), geminated $l l$ and $r r$ regularly degeminate in Inor, and then get nasalized, as shown in (5):
(5) Root Inor Amharic
a. Vb-r-r [bənərə] [bərrərə] 'fly'
b. Vm-r-r [mənərə] [mərrərə] 'be bitter'
c. Vt-r-f [tənəfə] [tərrəfə] 'be left over'
d. $\sqrt{b-l-1}$ [ban?a] [balla] 'eat'
e. Vm-l-§ [men?a] [molla] 'be full'
f. Vs'-l-? [t'əna:] [t'əlla] 'hate'

Beside the alternation of $n$ in the perfective with $r$ in the imperfective/jussive, as in (2), Inor also has a few tri- and quadrilateral verbs, in which $r$, or its nasalized variant $\tilde{r}$, in the perfective/imperfective alternates with $n$ in the jussive, in which it assimilates in place of articulation to the immediately following consonant, as in (6b):
(6) 3sm Perfective 3sm Perfective 3sm Jussive

b. [sirəpətə] [jisrəpt] [əsəmbit] 'sojourn'

In some Inor verbs, geminated palatal nasal $\mu \Omega$ in the perfective alternates with singleton $j$ in the imperfective/jussive. The glide $j$, furthermore, assimilates with an immediately preceding vowel a into $e$ (cf. the imperfective base of all verbs in (7)), or is realized as vowel $i$ word-finally if preceded by a consonant, as in the jussive base in (7c-e) (see also [5.5]):
(7) 3sm Perfective 3sm Imperfective 3sm Jussive

b. [fəュлə] $/ \mathrm{j}$-fəj/ $\rightarrow$ [jife] $\quad * / ə-\mathrm{fəj} / \rightarrow$ [əfre] 'fear'
c. [k'wənnə] $/ \mathrm{j}-\mathrm{k}^{\prime} \mathrm{w}^{\prime} \partial \mathrm{j} / \rightarrow\left[\mathrm{jik} \mathrm{k}^{\prime} \mathrm{w} \mathrm{e}\right] \quad * / \partial-\mathrm{k}^{\prime} \mathrm{w}_{\mathrm{j}} / \rightarrow\left[\partial \mathrm{k}^{\prime} \mathrm{w}_{\mathrm{i}}\right]$ 'roast'
d. [af $\left.{ }^{\mathrm{w}} \partial л \wedge ə\right] \quad / j-\mathrm{a}: \mathrm{f}^{\mathrm{w}} \partial \mathrm{j} / \rightarrow\left[\mathrm{ja:} \mathrm{f}^{\mathrm{w}} \mathrm{e}\right] \quad * / \partial-\mathrm{af} \mathrm{f}_{\mathrm{j}} / \rightarrow$ [a:f $\left.\mathrm{f}_{\mathrm{i}}\right] \quad$ 'take a rest'
e. [təллə $] \quad / \mathrm{j}$-təj/ $\rightarrow$ [jite] $\quad * / \partial-\mathrm{tj} / \rightarrow$ [əti] 'swear'

In the nominals derived from the verbs in (7d-e), i.e. [fwəjad] 'rest (N)', and [təjə] 'oath', $j$ also substitutes the geminated palatal nasal $\eta \mu$. From a diachronic
point of view, the geminated palatal seems to occur in roots in which an original root-final glide $j$ was lost, but still left a trace in the palatalization (and gemination) of the preceding nasal $n$ into $n n$. The assumed singleton nasal $n$, in turn, results from a diachronic sound change $* l>n$, which can be deduced from the verb [ k 'wənnə] 'roast' in (7c), which has the cognate verb [k'olla] in Amharic.

In addition to the common alternation $л \wedge \sim j$ in (7), the glide $j$ in the jussive base of the verbs in (7a-b) further mutates to the trill $r$ for reasons that are not clear. This mutation is also found with plural subjects in the imperfective/jussive bases in two verbs, as shown in (8):
(8) 3 pm Perfective 3 pm Imperfective 3 pm Jussive
a. [fwənnomw [jifwəroa] [əfwrəwwa] 'fear'
b. [afwənnom] [ja:fwəroa] [a:fwroa] 'take rest'

Furthermore, a few verbs with geminated $n n$ as second root consonant in the perfective degeminate it to $n$ in the imperfective and jussive:
(9) 3SM Perfective 3SM Imperfective 3SM Jussive

| a. [c'ennə] | [jic'en] | [əc'eд] | 'be fat' |
| :---: | :---: | :---: | :---: |
| b. [mªnnə] | [jıîãan] ${ }^{4}$ | [ว̃พิ̃ã] | 'feel bad' |
| c. [Rennə] | [jizin] | [วใən] | 'beget' |

Diachronically, an original ${ }^{*} l$ can also appear as $r$ in Inor: ${ }^{5}$
(10) Inor Amharic Gə`əz
a. [məsərə] [məssələ] [məsələ] 'resemble'
b. [waRarə] [walə] [wəโələ] 'spend the day'
c. [barə] [alə] [bihlə] 'say'

Moreover, the word-final $r$ in a number of Inor nouns is related to $l$ in cognates from other Ethiosemitic languages:
(11)

Inor Amharic
a. [gamera] [gimal] 'camel'
b. [kaser] [kasal] 'charcoal'
c. [ิำ̃arr] [k'imal] 'lice (also 'donkey' for Inor)'
d. [kəใar] [k'it’al] 'leaf

[^9]To summarize, the sonorants ${ }^{*} l,{ }^{*} n$, and ${ }^{*} r$ are central elements in a network of interrelated diachronic sound changes yielding a complex allophonic distribution of sonorants in current Inor. Accordingly, the realization of the phoneme $/ n /$ includes the allophones $[r, \tilde{r}, j, n$, while /n/ has the allophones $[j, n, r]$. Moreover, these allophones also function as phonemes in Inor, since they contrast with each other in minimal pairs:
(12) a. [mena] 'work' [mira] 'kind'
b. [ma:n] 'who' [ma:r] 'forgive (sm)!'
c. [anə] 'bump' [anə] 'there is'
d. [wija] 'honey' [wirə] 'truth'
e. [ija] 'I' [ina] 'we'

## [5.2] Alternation between ejectives and the glottal stop

In Gunnän Gurage, the glottal stop $?$ can be a continuation of the original *? and ${ }^{*} \Upsilon$, but more frequently functions as an allophone of the postvocalic ejectives $t^{\prime}$, $f^{\prime}, k^{\prime}$, or $k^{\prime w}$ as a result of a debuccalization process (cf. Berhanu and Hetzron 2000:11). Inor belongs to the group of Gurage languages that have retained an original glottal stop, which is shown in (13), in which the Inor data are contrasted with cognates from Gə`əz. This comparison shows that the intervocalic glottal stop in Inor represents the original consonant, and is thus a phoneme, because its occurrence is not predictable synchronically in these words: (13) Inor Gə`əz
a. [saRarə] [səRələ] 'ask'
b. [salam̃ə] [səใəmə] 'kiss'
c. [waRarə] [wəโələ] 'spend the day'
d. [saใar] [sa2ir] 'grass'

In most Gunnän Gurage languages, an original intervocalic glottal stop is lost, which often results in the merger of two mid-central vowels into a low-central vowel, thus *əใə>*əə>a, as shown in (14a) vis-à-vis the Gə`əz data in (13a):
(14) Inor Ezha/Chaha
a. [təsa1arə] [təsarə-m] 'ask'
b. [sarə] [sarə-m] 'be happy'

The loss of the original glottal stop in Ezha and Chaha causes a number of homonyms; e.g. (14a) and (14b), whereas its preservation in Inor prevents this development.

Moreover, an allophonic glottal stop resulting from the debuccalization of
an original ejective is found with great frequency in Inor，in which it even oc－ curs word－initially，e．g．（15a，d），whereas Gunnän Gurage languages like Chaha or Ezha still tend to retain the original ejective：${ }^{6}$
（15）Inor Ezha Chaha
a．［？ətərə］［k＇ətt＇ərə－m］［k＇ət＇ərə－m］＇kill＇
b．［弓əใərə］［弓ətt＇ərə－m］［弓ət’ərə－m］＇split＇
c．［fe？ 2 ］［fatft＇$\partial-\mathrm{m}]$［fətfo－m］＇grind＇
d．［？iraใərə］［k＇irakk＇ərə－m］［k＇irak＇ərə－m］＇mix＇
The allophonic glottal stop also occurs in Inor nouns，as shown in（16），in which the Inor data are contrasted with cognates from Ezha and Chaha：
（16）Inor Ezha Chaha
a．［ $\left.\mathrm{qx}^{\mathrm{m}} \mathrm{f} \frac{\mathrm{f}}{\mathrm{r}}\right]$［t＇ifir］［t＇ifir］＇fingernail＇
b．［ziPa］［zət＇ə］［3ət＇ə］＇nine＇
c．［kəใər］［k＇it＇ər］［k＇it＇ər］＇leaf＇

e．［fəəəə？［fijək＇］［fek＇］＇goat＇
The item（16c）originally contains two different ejectives，i．e．word－initial $k^{\prime}$ and word－medial $t^{\prime}$ ，as shown in the Ezha and Chaha cognates．While the word－ medial ejective $t^{\prime}$ is regularly debuccalized to $?$ in Inor，word－initial $k$ lost its ejective feature resulting in $k$ ．The conditions for the two de－ejectivization strategies are still unclear．It also remains unclear which original ejective is debuccalized to $?$ in Inor，since ejectives also frequently occur in Inor：
Inor Ezha Chaha
a．［nək’əsə］［nəcc’əsə－m］［nək’əsə－m］＇limp＇
b．［mət＇ərə］［mətt＇ərə－m］［mət＇ərə－m］＇be clear＇
c．［k’ənəmə］［k’ənnəmə－m］［k’ənəmə－m］＇insult＇
d．［t＇ək＇ək＇ə］［t＇əkk＇ək＇ə－m］［t＇ək＇ək＇ə－m］＇be about to die＇
Moreover，there are two additional instances of a glottal stop in Inor，which cannot be traced to an original glottal stop or pharyngeal fricative，or to an ejective．In a few words，the glottal stop occurs as the second element in a con－ sonant cluster，which starts with a sonorant，i．e．$\beta 2, m 1, n 2, r 1, l\}, w ?, j$ 2．In（18）， for instance，the sequences $n 1, m ?, l ?, j 1$ seem to be a reflex of the original gemi－ nated $n n, m m, l l, j j$ ，respectively，when the Inor data are compared with their
［6］The verb－final suffix－m in the Ezha and Chaha data in（14）is an obligatory marker of affirmative per－ fective verbs in main clauses．For further details，cf．Rose（2007：413）．

Ezha cognates, whereas Chaha does not compensate for the loss of gemination:
Inor Ezha Chaha
a. [bənRa] [bənna-m] [bəna-m] 'eat'
b. [sənRa] [sənna-m] [səna-m] 'arrive'
c. [səmRa] [səmma-m] [səma-m] 'hear'
d. [el2a] [ella-m] [ela-m] 'intend, desire'
e. [xujia] [xujja] [xuja] 'twenty'

However, if the glottal stop in the Inor sonorant clusters did indeed originate from the loss of gemination, it should be lacking in those word forms in which the corresponding original sonorant is singleton. This is obviously not the case, as shown in (2) above, where the sonorant-glottal stop clusters also occur in the non-geminating bases of the imperfective and jussive. Furthermore, the Ezha cognates for the Inor data in (19a-c) have no geminated sonorant:
(19) Inor Ezha
a. [ar $\beta$ Rat] [ar $\beta$ ətt] 'four'
b. [am2ist] [amist] 'five'
c. [sa $\beta$ Rat] [sə $\beta$ att] 'seven'
d. [so?ost] [sost] 'three'

The Inor data in (19) also exclude the assumption that the glottal stop in the sonorant clusters stems from a diachronically lost word-final glottal stop or pharyngeal fricative, as these consonants do not occur in cognates for the items in (19) or (18e). Finally, the glottal stop in (19d) is intrusive, since it splits an original vocalic element represented by the vowel o in Ezha.

## [5.3] Lenition

Word-initially, the labial plosives, the labial glide, and the nasals are spirantized in Inor if preceded by a prefix ending in a vowel, as shown in (20): ${ }^{7}$
a. $/ \mathrm{b} / \rightarrow[\beta]: \quad[$ bəsər $]$
'meat'
b. $/ \mathrm{b}^{\mathrm{w}} / \rightarrow[\mathrm{w}]:$ [bwirxima]
'stork'
c. $/ \mathrm{m} / \rightarrow[\tilde{\mathrm{m}}]: \quad$ [mira]
'kind'
d. $/ \mathrm{m}^{\mathrm{w}} / \rightarrow[\tilde{\mathrm{w}}]:$ [mina]
vs. [əßวsər]
'of the meat'
vs. [əwirxima]
'of the stork'
vs. [ãற̃ற̃ĩ $\mathfrak{1}$ ã
'of the kind'
vs. [ãw̃ĩna]
[7] Recall that the plosive / $\mathrm{p}, \mathrm{p}^{\mathrm{w}} /$ and the nasal $/ \mathrm{n} /$ do not occur word-initially.

'uncle (mother's side)' 'of the uncle'<br>e. $/ w / \rightarrow[\tilde{w}]: \quad[w ə d ə j a]$<br>vs. [ãw̃ãdəja]<br>'adult (male)'<br>'of the adult (male)'<br>f. $/ n / \rightarrow[\tilde{r}]: \quad[n i: s a]$<br><br>'corpse’<br>'of the corpse'

These consonants are also spirantized on verbs if preceded by subject prefixes or the relative-clause verb marker $\quad$-:

| 3 sm | 3 sm | 3 sm Relative |
| :--- | :--- | :--- |
| Perfective | Imperfective | perfective verb |

a. $/ \mathrm{b} / \rightarrow[ß]:$ [bata:] [jißəda] [əßəta] 'take'


In a number of words, however, $w$ does not spirantize, but remains unchanged, as, e.g. in [wətəใə] 'he fell' vs. [jiwədi?] 'he falls'.

In addition, the velar stop $k$ is spirantized to [x] intervocalically in verb conjugation, as in [bakərə] 'he lost' vs. [jißəxir] 'he loses'. On the other hand, the fricative $x$ in Inor also results from the diachronic sound change $* k \rightarrow x$; as seen, for instance, when comparing Gə`əz śok 'thorn' with Inor sox 'thorn' (cf. Leslau 1991: xxvi).

Although $x$ and $w$ are the postvocalic weakened allophones of $k$ and $b^{w}$ respectively, they are also phonemes, which occur word-initially like the corresponding plosives, as in [bwirxima] 'stork' vs. [wirə] 'truth', or [kətəfə] 'chop up' vs. [xətərə] 'thatch a roof'. ${ }^{8}$

## [5.4] Free consonant alternations

In a number of Inor words, certain consonants are interchangeably used without affecting the actual meaning of the words. The free alternations $p \sim f$ (or $p \sim b), p^{\prime} \sim b$ and $s^{\prime} \sim t^{\prime}\left(\right.$ or $\left.s^{\prime} \sim t\right)$ are peculiar to loanwords in Inor, as in (22), in which they have acquired a social meaning:
(22) Educated speaker
a. [polis]
b. [s'om]
c. [itjop'ja]
(<Amharic)
(<Aharic<Gə「əz)
(<Aharic<Gəəəz) [itobija]
non-educated speaker
[folis bolis] 'police'
[t'om~tom] 'fasting'
[itobija] 'Ethiopia'
[8] See also [3] for a similar ambiguous relationship between $b$ and $\beta$.

The original pronunciation of $p, p^{\prime}, s^{\prime}$ in loanwords - usually taken from Amharic as the immediate source language - is characteristic of educated Inor speakers who have a good command of Amharic. The alternating pronunciation of $p$, $p^{\prime}, s^{\prime}$, in contrast, dominates among illiterate or non-educated Inor speakers, as well as children. Children, moreover, tend to substitute word-initial alveopalatal consonants for their non-palatal alveolar counterparts:
(23) Adult's speech Children's speech

| a. [təəkərə] | [təkərə] | 'cook' |
| :--- | :--- | :--- |
| b. [dzəpərə] | [dəpərə] | 'finish' |
| c. [Jətərə] | [sətərə] | 'wither' |

## [5.5] Assimilation of glides and adjacent vowels

The glides $/ \mathrm{j}, \mathrm{w} /$ tend to assimilate with the immediately adjacent central vowels /i, $\partial, \mathrm{a} /$ into the front vowels [i, e, $\varepsilon$ ], or the back vowels $[\mathrm{u}, \mathrm{o}$ ], respectively, as, e.g. in $/ \mathrm{s} ß \mathrm{ij} />[\mathrm{si} ß \mathrm{i}]$ 'break ( sf )!' or $/ \mathrm{t}$ 'iw/>[t'u] 'breast' word finally, or in /jiłin/>[i2in] 'he begets' or /wifəntfa/>[ũ ${ }^{m} \mathrm{f}^{w} \partial \mathrm{ff}$ ] 'door, entrance' word initially. Consequently, $[i, e, \varepsilon]$ and $[u, o]$ are phonologically conditioned vowels in the environment of $j$ and $w$, respectively. However, there are words in which the glides do not assimilate with adjacent vowels, as in [waraj] 'rumor', [a:j] 'where', or [wisa] 'kind of bread made from ensete pith'.

## [5.6] Effects of labial and palatal coarticulation

The labialization of non-coronals and the palatalization of velars is a peculiar feature of most Gunnän Gurage languages, including Inor (cf. Hetzron 1977:45). According to Podolsky (1991:13), labialized consonants developed from plain labial and velar consonants, due to the adjacent back vowels /o, $u$ /, thus ${ }^{*} \mathrm{Cu}>\mathrm{C}^{\mathrm{w}}(\mathrm{i})$ or ${ }^{*} \mathrm{Co}>\mathrm{C}^{\mathrm{w}}$ 。. However, there are words in Inor for which such an origin of labial coarticulation is impossible, as in [mwecə] 'bury', or [gwar] 'part of farm yard (very near to the home)'. In addition, labialized consonants also contrast with their plain counterparts in minimal pairs, including [mwar] 'share' vs. [ma:r] 'forgive (sm)!'

Regardless of the origins of both labialization and palatalization, synchronically they represent productive morphophonological processes triggered by the non-segmental features ${ }^{w}$ or ${ }^{j}$ as separate morphemes, or as part of segmental morphemes (cf. Hetzron 1971:194). Labialization and palatalization triggered by a suffix affect the rightmost labializable or palatalizable consonant anywhere within the base (cf. Rose 1994:113). If there is no labializable or palatalizable consonant in a root, the non-segmental features cannot be realized.

The non-segmental feature ${ }^{w}$ labializes plain labials, velars, and glottal consonants as follows: $p \rightarrow p^{w}, b \rightarrow b^{w}, \beta \rightarrow w, f \rightarrow f^{w}, m \rightarrow m^{w}, k \rightarrow k^{w}, k^{\prime} \rightarrow k^{\prime w}, g \rightarrow g^{w}$, $x \rightarrow \chi^{w}, ? \rightarrow ?^{w}$.

Labialization is triggered by different morphophonemic processes, such as the formation of the verbal noun from the jussive template, the formation of the impersonal, and the formation of the third person plural with perfective and imperfective verbs:
$\left.\begin{array}{llllll} & \text { 2sm Jus- } & \text { Verbal } & \text { Impersonal } & \text { Impersonal } & \text { 3pm Perfec- }\end{array}\right]$

In (24a-c), the base-final consonant is labialized. Because base-final $r$ in (24d-f) cannot be labialized, the non-segmental feature ${ }^{w}$ docks onto the next available labializable consonant, which is the penultimate $k$ in (24d), but the base-initial $b$ or $x$ in (24e-f). If no labializable consonant is available in a root, the labial feature remains covert, as in ( $24 \mathrm{~g}-\mathrm{h}$ ).
All coronal and velar consonants can be palatalized in Inor, i.e. $t \rightarrow t, d \rightarrow d_{5}$, $t^{\prime} \rightarrow f^{\prime}$, etc., and $k \rightarrow c, g \rightarrow f, k^{\prime} \rightarrow c^{\prime}, x \rightarrow c ̧$. Palatalization, for instance, marks the female gender with the 2 SF subject affix in the jussive conjugation:
(25) 2sm Jussive 2sf Jussive
a. [dirg] [diry(ua)] 'hit!'
b. [səsix] [səsiç(ua)] 'husk by pounding!'
c. [əkik] [əacic(ua)] 'itch (sf)!'

The non-segmental features also affect the pronunciation of adjacent central vowels. Accordingly, the feature ${ }^{w}$ optionally changes the central vowels $\dot{i}$ and $a$ into the back vowels $u$ and o (cf. Hetzron 1970:567), as in [ $g^{w i r} \sim g u r$ ] 'lump (clay)', [ $x^{w} ə$ ใə xo? xo ] 'spill'. Among the long vowels, only $\partial$ : can be labialized into o:, as in [ə:?ir] 'let him fence (it) (SM)' vs. [o:? ${ }^{w i r t}$ ] 'to fence' (see Hetzron 1970: 567 for further detail). Similarly, the palatal feature of a consonant affects the following central vowels so that $i$ and $\partial$ are pronounced $i$ and $e$, respectively, as in /çida/> [xida] 'she', /taçərə/> [taxerə] 'be known'. Thus, [u, o] and [i, e] are
conditioned allophones of $/ \mathrm{i} /$ and $/ 2 /$ in the vicinity of the labial and palatal features, respectively (see also [5.5]). On the other hand, these front and back vowels are also phonemes (cf. List 11, List 12, List 13 and List 14 in the Appendix).

## [5.7] Diphthongs

In addition to the rising diphthong -Vj , Inor possesses two falling diphthongs, oa and -ua, which are derived from the original masculine plural suffixes *-əmu and ${ }^{*}$-imu, respectively (cf. Hetzron 1970:563, 1971:568; Berhanu and Hetzron 2000:15), and exclusively occur word-finally. They are not found word-initially, but when followed by other suffixes, they are pronounced as -oo and -u, respectively, as in [xunoa] 'they (m)' vs. [xunoom] 'and they (m)', or [axua] 'you (pm)' vs. [axum] 'and you (pm)'. This process indicates that the falling diphthongs are combinations of two vowels, and, therefore, not phonemic according to Berhanu and Hetzron (2000:15). Wendimu (2011:19), however, considers them to be phonemes because, unlike other vowels, the falling diphthongs cannot be nasalized, and may even trigger palatalization. My data confirm Wendimu's (2011:19) assumption.

## [6] CONCLUSION

This paper has exemplified the difficulties of establishing the phonemic status of Inor consonants and vowels by means of the classical minimal pairs method alone, since phonetics and morphology are tightly interrelated with each other. A phoneme can occur with a variety of allophones, which may also function as phonemes on their own. Despite the fact that labial and palatal coarticulated consonants often result from morphophonological processes triggered by the non-segmental features ${ }^{w}$ and ${ }^{j}$, they are considered phonemes because their occurrence in many lexical items is not predictable on phonological or morphological grounds. Similarly, the high central vowel $i$, which functions as an epenthetic vowel to resolve impermissible consonant clusters, is also a phoneme in Inor, since in many words its existence cannot be predicted. Thus, it is concluded that it has a double status as phonemic and epenthetic vowel. In a number of words, $ß$ and $b$ occur in identical environments. Consequently, both of them must be phonemic, although $\beta$ also functions as a postvocalic allophone of $b$.

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APPENDIX: DISTRIBUTION AND MINIMAL PAIRS OF CONSONANT AND VOWEL PHONEMES

List 1: Distribution of consonants word-initially, -medially and -finally

| /p/ | Initially | Medially | Finally |
| :---: | :---: | :---: | :---: |
|  |  | [t'ipawa] | [tat'ep] |
|  |  | 'narrow' | 'abstain (sm)!' |
| $/ \mathrm{p}^{\mathrm{w}} /$ |  | [kapwat] |  |
|  |  | 'mattress' |  |
| /b/ | [bəใər] | [t'əbat'ə] | [gab barə] |
|  | 'hundred' | 'hold' | 'become cool, be calm' |
| /bw/ | [ ${ }^{\text {wirxima }}$ ] | [at'abwot ${ }^{\text {' }}$ ] |  |
|  | 'stork' | 'beam' |  |
| $/ \beta /$ |  | [nəkəßə] | [ $\mathrm{t}^{\prime} \mathrm{i}$ ] |
|  |  | 'find' | 'tribe' |
| /f/ | [fenəgə] | [gəfərə] | [sif] |
|  | 'carry on head' | 'make free' | 'sew (sf)!' |
| /fw/ | [fwəfə] | [afwənnə] | [ã: ${ }^{\text {mfw }}$ ] |
|  | 'fart' | 'take rest' | 'bird' |
| /m/ | [məmər] | [amərə] | [əsəm] |
|  | 'neck' | 'believe' | 'brother' |
| $/ \mathrm{m}^{\mathrm{w}}$ / | [ $\mathrm{m}^{\mathrm{w}} \mathrm{a}$ 2ə] | [arəm ${ }^{\text {w }}$ ¢ ${ }^{\text {w }}$ ad] | [molom ${ }^{\text {w }}$ ] |
|  | 'be hot' | 'bruise' | 'they (m) came' |
| /w/ | [wira] | [wirawir] |  |
|  | 'truth' | 'goiter' |  |
| /t/ | [tikə] | [วtam] | [k'ətfa:t] |
|  | 'child' | 'sister' | 'basket' |
| /d/ | [dayga] | [nəmədə] | [banad] |
|  | 'cheek' | 'love (V)' | 'bald' |
| /t'/ | [t'əßa] | [at'e] | [mit' ${ }^{\text {tr }}$ '] |
|  | 'mud' | 'finger' | 'sorrow' |
| /s/ | [siyz:] | [asiyo:] | [gus] |
|  | 'buy' | 'sell' | 'old' |
| /z/ | [zan?a] | [ziza] | [bəzaz] |
|  | 'sow' | 'cold' | 'dream' |
| /n/ | [nəkəßə] | [anəßวd] | [tən] |
|  | 'find' | 'tongue' | 'smoke (N)' |
| /r/ |  | [cifarənə] | [bəsər] |
|  |  | 'messenger' | 'meat' |


| /l/ | [luga] | [t'aßak'wila] |  |
| :---: | :---: | :---: | :---: |
|  | 'yoghurt' | 'pumpkin' |  |
| /S/ | [ 5 ika] | [afa] | [ja:rə]] |
|  | 'trap' | 'you (sf)' | 'he builds' |
| /3/ | [3əpərə] | [təzəpərə] | [ə3] |
|  | 'reply' | 'return' | 'see (sm)!' |
| /t/ | [tyakərə] | [kitfa] | [ət] |
|  | 'cook' | 'worry' | 'boy' |
| /d3/ | [dzagar] | [wərədza] | [tgawads] |
|  | 'garden yard' | 'compound' | 'farmer' |
| $/ 5^{\prime} /$ | [t'awada] | [aţofəd] | [tazrabat'] |
|  | 'chat' | 'something' | 'curious' |
| /c/ | [cifarənə] | [micara] | [2cic] |
|  | 'messenger' | 'fever' | 'itch (sf)!' |
| /1/ | [ృecada] | [təjaใarə] | [dirf] |
|  | 'accompany' | 'depend on' | 'hit (sf)!' |
| /c'/ | [c'ifafə] | [jic'en] | [tic'ec'] |
|  | 'ankle' | 'be fat' | 'she lies' |
| /ç/ | [faraç] | [wəçə] | [siç̧] |
|  | 'patient' | 'udder' | 'flee (sm)!' |
| /n/ |  | [bənə] | [jazwən] |
|  |  | 'thigh, month' | 'be pretty' |
| /j/ | [jisatf] | [ 4 ij2] | [waraj] |
|  | 'he drinks' | 'hump (cow)' | 'rumor' |
| /k/ | [kəsər] | [zəkədə] | [dək] |
|  | 'charcoal' | 'remember' | 'calf' |
| /kw/ | [ $\mathrm{k}^{\text {inntifif] }}$ | [səkw ${ }^{\text {w }}{ }^{\text {w }}$ 2] | [hirakw] |
|  | 'beard' | 'squirrel' | 'call (sm) him!' |
| /g/ | [gaz] | [dzagar] | [adzig] |
|  | 'war' | 'garden yard' | 'loan, debit' |
| $/ \mathrm{g}^{\mathrm{w}}$ / | [ $\mathrm{gw}_{\text {ir }}$ ] | [dzigwarə] |  |
|  | 'lump (clay)' | 'problem' |  |
| /k'/ | [k'ar] | [fuk'ənə] | [barik'] |
|  | 'voice’ | 'whistle' | 'old person' |
| /k'w/ | [ $\mathrm{k}^{\prime}$ wak'wəsə] | [2k'wirt ${ }^{\text {che }}$ ] |  |
|  | 'wink' | 'to despise' |  |
| /x/ | [xəta] | [axə] | [lu:x] |
|  | 'deny' | 'you (sm)' | 'soul' |
| /xw/ | [ $\mathrm{x}^{\mathrm{w}}$ 2? ${ }^{\text {a }}$ | [tgxwora] | [ $\mathrm{nn}^{\text {ax }}{ }^{\text {w }}$ ] |


| /7/ | 'spill' | 'stump' | 'I'm present' |
| :---: | :---: | :---: | :---: |
|  | [(2)akadə] ${ }^{\text {a }}$ | [məใatad] | [fənə2] |
|  | 'tie' | 'sickle' | 'goat' |
| /2w/ | [ ${ }^{\text {w }}$ 2n?omw] | [01wəra] |  |
|  | 'they went up' | 'squeeze' |  |

List 2: Distribution of geminated consonants word-medially and -finally

## Medially

Finally
/ff/ [effa] 'cover' [eff] 'cover (sm)!'
$/ \mathrm{mm} /$ [emmə] 'defeat' [emm] 'defeat (sm)!'
/nn/ [inni] 'all'
/nn/ [?ennə] 'beget'
List 3: Minimal pairs for labials: /p, pp, b, m, mw, w/
/p,pp/ [epə] 'a type of clothe'
[eppə] 'refuse'
$/ \mathrm{b}, \mathrm{m}^{\mathrm{w}} /$ [beca] 'cry'
[ $\mathrm{m}^{\mathrm{w}} \mathrm{ec}$ ]] 'bury'
/m, w/ [mija] 'side (of body)'
[wija] 'honey'
/mw, w/ [mwa?a] 'be hot'
[wa?ว] 'swallow'
List 4: Minimal pairs for alveolars: / t, d, s, z, n /
/t, d/ [taja] 'oath'
[dija] 'rain, outside of home'
/d, z/ [dərma] 'young mule’
[zərma] 'adults (male)'
/s,z/ [səkərə] 'be drunk'
[zzkərə] 'jump'
/z, n/ [zakədə] 'remember'
[nəkədə] 'touch'
[9] Word-initial $?$ is said to be unpronounced, but it occurs if preceded by a prefix (Prunet 1996:178, 191; Berhanu and Hetzron 2000:13). According to Leslau (1951:214), any original initial laryngeal is zero in Inor. In intervocalic position, however, original ${ }^{*}$ ? and ${ }^{*}$ are preserved as $?$.

List 5: Minimal pairs for palatals: $/ \int, 3, t \int, t \int, d_{3}, c ̧, ~ c, ~ c^{\prime}, \jmath^{\prime} /$

| /t5, ti/ | [ 4 ija] | 'hump (of cow)' |
| :---: | :---: | :---: |
|  | [t¢ ${ }^{\text {ija }}$ ] | 'stink' |
| /ts, d3/ | [วt] | 'boy' |
|  | [ad3] | 'hand' |
| /S,ç/ | [çin] | 'heart' |
|  | [ [in] | 'tooth' |
| /ç, 〕/ | [çin] | 'heart' |
|  | [jin] | 'part of head around nape of the neck' |
| /3, d3/ | [зәрərə] | 'reply' |
|  | [dзəpərə] | 'finish' |
| /c, c'/ | [ecərə] | 'plane wood' |
|  | [ec'ərə] | 'chew' |

List 6: Minimal pairs for velars: / $\mathrm{k}, \mathrm{k}^{\prime}, \mathrm{g}, \mathrm{k}^{\mathrm{w}}, \mathrm{k}^{\prime} \mathrm{w}, \mathrm{g}^{\mathrm{w}} /$
/k, g/ [kəkir] 'embrace (sm)!'
[gəkir] 'make straight (sm)!'
/k, k'/ [nəkəsə] 'bite'
[nək’əsə] 'limp'
$/ k^{\mathrm{w}}, \mathrm{k}^{\prime \mathrm{w}} / \quad\left[\mathrm{k}^{\mathrm{w}} \mathrm{a}: \mathrm{ji}\right] \quad$ 'let it be paid'
[ $k$ 'wafi] 'let it be thrown away'
/g, gw/ [Jagərə] 'exchange'
[Jəgwərə] 'wizard'

/p, t/ [gəpa] 'enter'
$/ b^{w}, g^{w} /\left[b^{w i r}\right] \quad$ 'main'
[ $\mathrm{g}^{\mathrm{w}} \mathrm{ir}$ ] 'lump (clay)'
/b,g/ [bata:] 'take'
[gəta:] 'pour'
/t, k/ [nətədə] 'it was burned'
[nəkadə] 'touch'
$/ \mathrm{t}, \mathrm{k}$ '/ [tən] 'smoke (N)'
[k'ən] 'horn'
$/ \mathrm{t}^{\prime}, \mathrm{k}$ '/ [t’əna:] 'hate'
[k'əna:] 'be succeed'
$/ \mathrm{R}, \mathrm{T}^{\mathrm{w}} /$ [ne?ə] 'sleep, spend the night'
[no? ${ }^{w}$ 2] 'bark'

List 8: Minimal pairs for fricatives: /f, $\mathrm{s}, \mathrm{z}, \mathrm{S}, \mathrm{x} /$
/f, s/ [nəfa] 'blow'
[nesa] 'lift'
/f, x/ [fəta:] 'untie'
[xata] 'deny'
/z, $\mathrm{f} / \mathrm{[zin}$ ] 'nape of neck'
[ in ] 'tooth'
/S, x/ [axə] 'you (sm)'
[afə] 'see'
List 9: Minimal pairs for nasals: /m, mw, $n, \mathrm{n} /$
$/ \mathrm{m}^{\mathrm{w}}, \mathrm{n} /$ [m²asa] 'calf'
[nəsa] 'lift'
/m, n/ [səmRa] 'hear'
[sən2a] 'arrive'
/n, n/ [anə] 'there is'
[anə] 'bump'
List 10: Minimal pairs for glides: /w, j /
> /w, j/ [waใar] 'herd, spend the day (sm)!' [ja:r] 'he goes'

List 11: Distribution of vowels word-initially, -medially and -finally

|  | Initially | Medially | Finally |
| :--- | :--- | :--- | :--- |
| /i/ | $[\mathrm{ift}]$ | $\left[\mathrm{m}^{\mathrm{w} i n a}\right]$ | $[$ hari $]$ |

/e/ [emmə] [mena] [woxe]
'defeat' 'work' 'good'

'egg' 'why' 'she came'
/ə/ [aḑ] [kəs] [tawjə]
'hand' 'abdomen' 'orphan'
/a/ [at'e] [k'ar] [gorfa]
'finger' 'voice’ 'malaria'
$/ \mathrm{u} /$ [ũ ${ }^{\text {mf }}$ ²d] [busəd] [maRaxu]
'cover (N)' 'anus' 'I came'
/o/ [o?ot] [t'əp²ə] [boto]
'to go out' 'suck' 'lake'
/oa/ [xunoa]
/ua/

| /i:/ | [i:na] |
| :--- | :--- |
|  | 'our' |
| /e:/ | [e:? ] |
|  | 'of wood' |
| /i:/ | [i:xa] <br> 'of water |
| /a:/ | [oiz] |

/a:/ [ə:3]
'let him see'

'of door'
/o:/ [o:ft]
'to see' 'he is died'
'they (pm)'
[axua]
'you (pm)'
[gəradi:]
'the girl and'
[we:]
'or'
[waratfi:]
'she went and'
[epə:]
'do'

List 12: Contrast of comparable vowel phonemes
/i, a/ [xari] 'wise' [xarə] 'know'
/i, a/ [git] 'middle, half'
[gat] 'pain'
/a,o/ [k'ar] 'voice' [k'or] 'navel'
/e, ә/ [ใерлә] 'beget'
[әллә] '(be) lost'
/e, u/ [ne?] 'sleep (sm)!'
[nu2] 'big, elder'
List 13: Minimal pairs showing phonemic status of long vowels

| /i, i:/ | [ija] | 'I' |
| :---: | :---: | :---: |
|  | [i:ja] | 'mine' |
| /e, e:/ | [e?a] | 'wood' |
|  | [e:?ə] | 'of wood' |
| /a, ə:/ | [ə3] | 'see (sm)!' |
|  | [อ:3] | 'let him see' |
| /0,00/ | [o?ot] | 'to go out' |
|  | [o:?ot] | 'to feel pain' |

List 14: Minimal pairs showing lexical occurrence of long vowels

| /a, a:/ | [epə] | 'a type of clothe' |
| :---: | :---: | :---: |
|  | [epa:] | 'do' |
| /a, a:/ | [JJta] | 'knife' |
|  | [Jota:] | 'stink' |
| /u, u:/ | [mud] | 'die (sm)!' |
|  | [mu:d] | 'death' |

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# TONE IN SEZO 

Girma Mengistu Desta

## ABSTRACT

Sezo has two levels of tone - high and low. The two tones occur on monomoraic and bimoraic syllables (i.e. on short and long vowels). Rising (LH) and falling (HL) contour tones have been recorded occurring only on bimoraic syllables. They are analyzed as composites of the high and low tones squeezed together on one bimoraic syllable as a result of diachronic and synchronic processes. Tone plays a very significant role in the lexicon of the language. It distinguishes lexical items. It also derives nominal stems from verbal roots. Unlike its importance in the lexicon, tone has a limited role in the grammar of the language. The only grammatical function of tone is to make a distinction between declarative and interrogative sentences. The key tonal processes in the language are downdrift, downstep, contour formation and total spreading of a high tone. Contour tones are formed through the partial spreading of a high tone over a low tone bearing unit and the re-linking of a floating high tone to an adjacent low tone bearing unit.

## [1] INTRODUCTION

Sezo is an endangered Omotic language classified as a member of the NonGonga group of Mao languages (Fleming 1984: 35). It is spoken in the western borderland of Ethiopia in the Begi and Guddattu Qondala districts of the West Wellegga administrative Zone within Oromia Regional State. The speakers of Sezo are estimated as numbering between 7,000 and 10,000 (Girma 2015: 2).

Sezo is a tone language. It is not a pitch-accent language because the location of a high pitch in a given word class is not predictable. According to Fox (2000: 179), a pitch-accent language 'involves the use of pitch in an accentual function, i.e. to give prominence to one particular element [...]'. Pitch-accent is assigned to either a prominent or a stressed syllable (Yip 2002:276). In Sezo, however, lexical items of comparable syllable structure can be divided into different groups only by their pitch variation. A word may not involve a high pitch at all.

This paper ${ }^{1}$ intends to give a brief but comprehensive description of the tone system of Sezo. The discussion is presented in six sections, the first one being an introductory section. Section 2 describes the methods of collecting and presenting data. Section 3 deals with the inventory of tones. Section 4 provides acoustic evidence for the contrastive tones. This is followed by Sections 5 and 6 which respectively deal with the description of the lexical and grammatical functions of tone and various tonal processes. Section 7 concludes the paper.

## [2] METHODOLOGIC AL CONSIDERATIONS

The data used in this study were collected between 2011 and 2014 in different villages of the Begi and Guddattu Qondala districts of the West Wellegga Zone and in Asosa, the capital of the Benishangul Gumuz Regional State. In order to identify the contrastive tonal melodies on lexical morphemes and to establish the number of level and contour tones, lexical items were gathered from native speakers of the language through series of group sessions. During the group sessions, specific semantic domains of words were used to build up the vocabulary. Each word was transcribed on a separate slip of paper. The transcribed words were then subdivided into different subgroups on the basis of their similarity in morphological form and syllable structure. Words in each subdivision were repeatedly pronounced and whistled by native speakers so that the surface tonal melodies in each word class could be identified. Finally, the underlying tones of the language have been established on the basis of the identified surface tonal melodies.

In order to discover how the different tones behave following or preceding other tones in particular syntactic constructions, frames, carefully constructed phrases and natural texts were used. In this study, the pitch tracks and acoustic measurements of contrastive tones and various tonal processes are demonstrated by a software program known as 'Speech Analyzer', retrieved from http://www.sil.org/computing/sa/index.htm. All the acoustic measurements have been carried out by the author.

## [3] THE INVENTORY OF TONES

Sezo is a two-tone language. The two tones-high (H) and low (L), are able to occur on both monomoraic and bimoraic syllables. The inventory of the tones is based on contrastive pitches attested on disyllabic nouns, adjectives and

[^10]verbs. Disyllabic words were chosen for the inventory of tones, because they constitute more than $90 \%$ of the Sezo lexicon. In order to make the inventory of nominal and adjectival tonal melodies, the citation form of nouns and adjectives have been used. In the citation form, nouns and adjectives consist of lexical roots and terminal vowels (hereafter "TV"). The function of the TV of a noun or an adjective cited in isolation is to host the root-final floating tone that belongs to the lexical root. The TV is underlyingly toneless (Girma 2015: 102). The inventory of verbal tonal melodies is based on the second person singular imperative form of a verb, because it is the simplest of all inflected verb forms. The following examples illustrate tonal contrast on nouns (1), adjectives (2) and verbs (3). Note that all the contrasting words have the same syllable structure:
(1) Nouns:

| a. | CVCV | H.H bólí | 'pumpkin' |
| :---: | :---: | :---: | :---: |
|  |  | H.L pát'ì | 'thigh' |
|  |  | L.H pàlí | 'girl' |
|  |  | L.L tàmì | 'fire' |
| b. | CVC $\mathrm{C}_{1} \mathrm{~V}$ | H.H kízzí | 'mind' |
|  |  | H.L t'úbbì | 'calf of leg' |
|  |  | L.H gìzzí | 'money' |
|  |  | L.L ?às's'ì | 'tooth' |
| c. | $\mathrm{CVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ | H.H Rémsí | 'moon' |
|  |  | H.L húldì | 'donkey' |
|  |  | L.H Tànsí | 'gold' |
|  |  | L.L gùmbì | 'tree sp.' |
| d. | CVVCV | H.H Sí:ní | 'heart' |
|  |  | H.L $\int$ ú: $\mathfrak{i}$ | 'snake' |
|  |  | L.H lù zí | 'rope' |
|  |  | L.L mì:nì | 'buffalo' |
| e. | $\mathrm{CVVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ | H.H bó:nzí | 'leg' |
|  |  | H.L Jí:nt'ì | 'nose' |
|  |  | L.H mè:ns'í | 'glass ring' |
|  |  | L.L gò:yk'ì | 'skin' |
| f. | $\mathrm{CCVVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ | H.H t'wé:nt'í | 'worm' |
|  |  | H.L sjá:ns'ì | 'bed' |
|  |  | L.H tjà:ndí | 'heel' |
|  |  | L.L sjà:nsì | 'fire place' |

(2) Adjectivs:
a.
CVCV
H.H Jíl
'close, near'
H.L kálì 'warm'
L.H Tàzí 'slim'
L.L gìmì 'dirty'
b.
$\mathrm{CVC}_{1} \mathrm{C}_{1} \mathrm{~V}$
H.H Jáppí
'bitter'
H.L kámmè 'straight, excellent'
L.H gàttí 'big, great'
L.L pàzzì 'sharp (of tip)'
c.
$\mathrm{CVC}_{1} \mathrm{C}_{2} \mathrm{~V}$
H.H húlt'í 'rotten'
H.L k'ántì 'jealous'
d. $\quad \mathrm{CVVC}_{1} \mathrm{C}_{2} \mathrm{~V}$
H.H já:nt'í 'soft'
H.L Rá:mp'ì 'fool'
L.H tà:ntí 'red, chocolate'
e. CCVVCV H.L kjá:mì 'dry'
f. $\quad \operatorname{CCVC}_{1} \mathrm{C}_{1} \mathrm{~V}$ H.L k'wéffi 'happy'
g. $\quad \mathrm{CCVVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ L.H kwèmbí 'old'
(3) Verbs:
a. CVCV H.H Sómé 'Disappear!'
L.H k'às'é 'Do!'
b. $\quad \mathrm{CVC}_{1} \mathrm{C}_{1} \mathrm{~V}$ H.H húzzé 'Farm!'
H.L hèzzé 'Hit!'
c. $\mathrm{CVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ H.H Rúns'é 'Stand!'
L.H k'ònt'é 'Chew!'
d. CVVCV H.H kó:lé 'Throw!'
L.H dò:k'é 'Stand!'
d. $\quad \mathrm{CVVC}_{1} \mathrm{C}_{2} \mathrm{~V}$ H.H hú:mp'é 'Steal!'
L.H pà:nsé 'Jump!'
e. CCVCV H.H tjámé 'Count'
L.H k'jànsé 'Pass by, Step over!'

As can be observed, all of the possible combinations of the two tones, i.e. H.H, H.L, L.H and L.L melodies, have been attested on disyllabic nouns and adjectives. Disyllabic verbs show only H.H and L.H melodies. This is because the tone associated with the final syllable of the verbs underlyingly belongs to the second person imperative mood marker -é. On the basis of the facts, the surface tonal melody of disyllabic major word classes of Sezo can be summarized as follows:

|  | Major word classes |  |  |
| :---: | :---: | :---: | :---: |
| Tone melodies | Nouns | Adjectives | Verbs |
| H.H | + | + | + |
| H.L | + | + | - |
| L.H | + | + | + |
| L.L | + | + | - |

TABLE 1: Melody inventory of disyllabic major word classes.

In addition to the level tones, Sezo shows rising LH and falling HL contour tones on some nouns, adjectives and verbs. But these are attested only on bimoraic syllables-syllables consisting of long vowels. On some bimoraic syllables, the LH contour tone contrasts with the two level tones. The following are examples of words that show the rising LH contour tone:
(4) Nouns:

> LH.L fǐ:mì 'scorpion'
> १र̌:ऽi 'name
(5) Adjectives:

> LH.L Jã:mì 'tall, long'
> pǐ:wì 'bad'
(6) Verbs:

LH.H wě:nk'é 'Open!' pǎ:yé 'Swim!'

The falling HL contour tone has not been attested on isolated disyllabic and trisyllabic words. In citation form, only monosyllabic V-final nouns show the HL contour tone. Examples are given below:
(7) HL Jî: 'excrement'
dî: 'father'
mî: 'grain'
In this study, contour tones are analyzed as fusions of the two level tones for various reasons. The first reason is related to their distribution. As mentioned earlier, contour tones are always realized on bimoraic syllables. Monomoraic syllables do not bear contour tones. Moreover, they are mostly found on V-final roots which are assumed to have lost their root consonants historically. For instance, the following V-final noun roots, which bear an LH contour tone on
their root-internal long vowels, have C-final cognates in closely related languages such as Northern (Bambasi-Diddessa) Mao and Ganza. ${ }^{2}$
(8) Sezo Bambasi-Diddessa Mao Ganza Gloss

| wǎ:-ì [wǎ:jì] | walä | wájà 'ear' |
| :--- | :--- | :--- |
| wě:-1 [wě:jì | wakä | wàyà 'chicken' |

This suggests that the L and the H tones, which synchronically form the LH contour tone on wě:- 'ear' and wǎ:- 'chicken', were historically distributed over two different syllables. They are squeezed together on one bimoraic syllable as a result of historical loss of consonant such as $/ l /, / k /, / \mathrm{j} /$ and $/ \mathrm{y} /$. The same assumption also works for roots consisting of HL tone bearing syllables. The treatment of such contour tones as sequences of level tones is the usual analytical step (Yip 202:27).

The second evidence for the treatment of contour tones as composites of the two level tones comes from synchronic tonal processes that form the HL contour tone on bimoraic syllables. Synchronically, a HL contour tone can be formed by tonal processes, such as partial high-spreading and re-linking of a floating high tone to an adjacent non-floating low tone bearing bimoraic syllable (see § 6.3).

## [4] ACOUSTIC EVIDENCE FOR THE CONTRASTIVE TONES

The following figures demonstrate the pitch tracks of contrastive tones attested on disyllabic nouns (Figures 1-5), adjectives (Figures 6-10) and verbs (Figures 11-13). All the words in the examples are as pronounced by the same male informant of about 27 years. According to the measurement, while the high tone produced by the informant is $\approx 52$ semitones, the low tone is $\approx 48$ semitones on average. But it should be noted that the pitches of the two tones may ascend above or descend below the average semitones based on the vocal range used by the informant at different recording times.

[^11]
figure 1: Rémsí (H.H) 'moon'


Figure 2: Tànsí (L.H) 'gold'

figure 3: Ráms'ì (H.L) 'tears'


FIGURE 4: Ràs's'ì (L.L) 'tooth'


FIGURE 5: Tǐ: il (LH.L) 'name'

figure 6: Jáppí (H.H) 'sour'


FIGURE 8: k'ákì (H.L) 'cold'


FIGURE 9: gàttí (L.H) 'big'


FIGURE 10: pàzzì (L.L) 'sharp (of tip)'


FIGURE 11: Jã:mì (LH.L) 'tall, long'


FIGURE 12: sísé (H.H) 'Shave! (2SG) '


FIGURE 13: kàs'é (L.H) 'Work, do! (2SG) '


FIGURE 14: wě:yk'é (LH.H 'Open ! (2SG)'
The pitch tracks in the above figures substantiate the different tonal melodies attested on disyllabic nouns, adjectives and verbs. While the tonal melodies attested on disyllabic nouns and adjectives are H.H, H.L, L.H, L.L and LH.L, those found on verbs of the same syllable structure are H.H, L.H and LH.H.
[5] THE FUNCTIONS OF TONE
[5.1] Lexical function
Changing lexical meaning
In Sezo, tone distinguishes the meaning of words. Tonal minimal pairs and triplets are very frequent in the language. The following tonal minimal pairs and triplets have been identified from a stock about 700 words:
(12)

Tonal minimal pairs
a. H.L Rí: 1 'honey'
LH.L Tǐ: $\int 1$
'name'
b. H.L kjá:jì
'egg'
L.L kjà:jì
'house'
c. HL jî: 'excrement'

L $\quad \mathrm{j}$ :
'forest'
d. H.L má:jì
'food'
LH.L mǎ:jì
'person'
e. H.L ?ú:jì
'millstone'
LH.L Rǔ:jì
'hole in the ground'
f. H.L fá:yì
'outside, light (n)'
LH.L Jǎ:yì
'fly (n)'

| g. | H.L | wíns'ì | 'tree sp.' |
| :---: | :---: | :---: | :---: |
|  | L.L | wìns'ì | 'paternal aunt' |
| h. | H.L | mánì | 'right (n) |
|  | L.L | mànì | 'outside, a field in front of a house |
| i. | H.H | túgí | 'leg, foot' |
|  | H.L | túgì | 'pillar' |
| j. | H.H | 2ú:zí | 'hill' |
|  | L.H | ใù:zí | 'rope used to climb a tree' |
| k. | L.H | tùlí | 'pushing' |
|  | H.L | túlì | 'returning' |
| 1. | H.L | Sáwì | 'stone' |
|  | H.H | Sáwí | 'sharp (of edge), young, hero' |
| m. | H.H | ká:ndí | 'warthog' |
|  | L.H | kà:ndí | 'groaning' |
| n. | L.H | kè:sí | 'grain sp. (Eragrostis Abyissinica)' |
|  | H.L | ké:sì | 'finding' |
| 0. | H.L | kwé:jì | 'cooking' |
|  | L.L | kwè:jì | 'road, path' |
| p. | H.L | 7í:nsì | 'tree' |
|  | L.H | רì:nsı́ | 'be afraid of' |
| q | H.L | wé:jì | 'shepherd, to look after animals' |
|  | LH.L | wě:jì | 'ear' |
| r. | H.L | Pénì | 'tolerant' |
|  | L.H | Tèní | 'hunting' |
| S. | H.L | ?úlì | 'mounting, climbing' |
|  | L.H | ?ùlí | 'garbage' |
| t. | L.H | pè:k'í | 'heavy' |
|  | L.L | pè:k'ì | 'toad' |
| u. | H.L | pát'ì | 'thigh' |
|  | L.H | pàt'í | 'antelope' |
| V. | H.H | tá:yí | 'grain sp.' |
|  | LH.L | tǎ:\ì | 'hit repeatedly' |
| w. | L.L | wè:yk'ì | 'cardamom' |
|  | LH.L | wě:yk'ì | 'opening' |
| X. | H.H | Cámí | 'breast' |
|  | H.L | Rámì | 'gleaning' |
| y. | H.H | Ré:wí | 'thing' |
|  | H.L | Té:wì | 'ripen' |


#### Abstract

z. H.L sá:sì 'in old times' L.H sà:sí 'biting' (13)

Tonal minimal triplets a. H.L dú:lì L.H dù:lí

LH.L dǔ:lì b. H.L Já:mì L.L Jà:mì

LH.L Jã:mì c. H.L páfí H.L pà̀i L.H pà̀í 'era' 'hyena' 'family, relative, clan' 'blind' 'cabbage' 'tall' 'moral' 'porcupine's thorny hair' 'planting'

\section*{Noun derivation}

In Sezo, verbal nouns and result nominals are derived from verbs by insertion of polar (opposite) tones in the root-final position of the verb roots. ${ }^{3}$ If the base verb carries an H tone on its root-internal first mora (counting from right to left), an $L$ tone is inserted in the root-final position of the verb root to derive the nominal counterpart of the verb. If the base verb carries an $L$ tone on its root-internal first mora (counting from right to left), an H tone is inserted in the root-final position of the verb root for the same purpose. At the surface level, the derivational polar tone is realized on the TV of the derived noun when the noun is cited in isolation. In Sezo, the function of a TV is to support the root-final floating tones of isolated nominals, that is to say, nouns and adjectives. The following tables illustrate the derivation of verbal nouns and result nominals.


[^12]| Verb root | Gloss | RIT | TDM | VN (UF) | VN (CF) | Gloss |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| sís- | 'shave' | H | L | /sís '-/ | [sísì] | 'shaving' |
| k'íw- | 'listen' | H | L | /kíw --/ | [k'íwì] | 'listening' |
| tjámm- | 'count' | H | L | /tjámm `-/ | [tjámmì] | 'counting' |
| t'á:y- | 'kick' | H | L | / t'á:y - | [t'á:yì] | 'kicking' |
| Sí:S- | 'urinate' | H | L | /Sí: $\int^{\prime}$-/ | [ 1 í:1] | 'passing urine' |
| wě:yk'- | 'open' | LH | L | /wě:yk' '-/ | [wě:yk'ì] | 'opening' |
| kǒ:- | 'sit' | LH | L | / kǒ: '-/ | [kǒ:jì] | 'sitting' |
| Sǒ:- | 'walk | LH | L | / Sǒ: '-/ | [ ${ }_{\text {cǒ:jì] }}$ | 'walking' |
| k'às'- | 'work' | L | H | /k'às' '-/ | [k'às'í] | 'working' |
| k'ìm- | 'talk' | L | H | / k'ìm ${ }^{\prime}$-/ | [k'ìmí] | 'talking' |
| hèzz- | 'hit' | L | H | /hèzz '-/ | [hèzzí] | 'hitting' |
| dò:k'- | 'stand' | L | H | /dò:k' ${ }^{\prime}$-/ | [dò:k'í] | 'standing' |
| pà:ns- | 'jump | L | H | /pà:ns '-/ | [pà:nsí] | 'jumping' |

TABLE 2: Derivation of verbal nouns.

| Verb root | Gloss | RIT | TDM | RN (UF) | RN (CF) | Gloss |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Sí: - | 'urinate' | H | L | /Sí: ${ }^{\prime}$-/ | [ ${ }^{1} 1: 1 \mathrm{l}$ ] | 'urine' |
| hámbíl- | 'bleed' | H | L | /hámbíl --/ | [hámbílì] | 'blood' |
| k'éss- | 'perspire' | H | L | /k'éss '-/ | [k'éssì] | 'sweat' |
| s'úl- | 'spit' | H | L | /s'úl --/ | [s'úlì] | 'sputum' |
| mál- | 'give birth' | H | L | /mál --/ | [málì] | 'child' |
| hù:ns'- | 'laugh' | L | H | /hù:ns'-/ | [hù:ns'í] | 'laughter' |
| hùzz- | 'farm (v)' | L | H | /hùzz-/ | [hùzzí] | 'farm (n)' |
| k'ìm- | 'talk' | L | H | /k'ìm-/ | [k'ìmí] | 'speech' |

TABLE 3: Derivation of result nominal.

The following three pairs of graphs substantiate the claim that polar tones are derivational morphemes. They demonstrate the pitch tracks of verbs: sís-é 'Shave(2SG)', k'às'-é ‘Work, do (2SG)' and dò̀k'-é 'Stand (2SG)', which respectively show $\mathrm{H}, \mathrm{L}$ and L tones on their root-internal moras and that of the nominal counterparts of the verbs-[sísì] 'shaving', [kàsí] 'working' and [dò:k'í] 'standing', which respectively display the polar derivational tones L, H and H on their TV. While the H tone associated with the second person singular imperative -é underlyingly belongs to the suffix, the polar derivational tones associated with TVs belong to the lexical roots. The TV is only a phonetic material inserted to host the root-final floating tones of isolated nominals.


FIGURE 16.1: sísé (H.H) 'Shave ! (2SG)'


FIGURE 16.2: sísì (H.L) 'shaving'


FIGURE 17.1: k'às'é (H.L) 'Work, do! (2SG)'


FIGURE 17.2: k'às'í (L.H) 'working, doing'


FIGURE 18.1: dò:k'é (L.H) 'Stand (up)! (2SG)'


FIGURE 18.2: dò:k'í (L.H) 'standing (up)'
As can be observed from the pairs of figures, when the verb carries an H tone on its root-internal TBU, its nominal counterpart bears an $L$ tone on its TV. When the verb carries an L tone on its root-internal TBU, its nominal counterpart bears an H tone on its TV. As mentioned earlier, the tones borne by the TV
are the polar derivational tones.

## [5.2] Grammatical function

In Sezo the role of tone in the grammar is very limited. It distinguishes only between declarative and interrogative sentences. Whereas the declarative is marked by a high tone associated with the suffix -á:, its interrogative counterpart is indicated by a low tone associated with the same suffix. Consider the bold printed suffixes in the following examples.
(24) wànágì- mà:máné kàrmá: bà:báb-té pì-n $\varnothing=k w-a ́:$

Wanagi-Nom Yesterday Karma Babane-DAT/LOC rise-CVB1 3SG.AGRS=come-DCL 'Yesterday Wanagi came from Karma Babane.'
(25) wànágì-S hín-té pì-n kw-à:

Wanagi-NOM where-DAT/LOC rise-CVB1 come-DCL
'Where did Wanagi come from?'
[6] TONAL PROCESSES
In Sezo, a tone borne by one lexical or morphological element may affect a tone that belongs to a neighboring lexical or morphological element. It may trigger tonal processes such as downstep, downdrift, high-spreading, re-linking of a high tone, and delinking of a low tone. In the language, tonal processes may take place across morphemes and word boundaries. The following subsections describe tonal processes attested in the language.

## [6.1] Downstep

Downstep is lowering of a high tone. It is triggered by a preceding floating or unassociated low tone (Yip 2002:148). In Sezo, a low tone that triggers a downstepping of an $H$ tone may be stranded from its TBU in two ways - by deletion of a nominal TV or by total spreading of a high tone from the left.

In citation form, every nominal (noun and adjective) in Sezo consists of a root and a TV. As repeatedly mentioned, the function of a TV in Sezo is to host the root-final floating tone of isolated nominals. But when such nominals are followed by morphological or syntactic constituents, their TV gets deleted, leaving the tone it bears floating. In Sezo, a L tone delinked from its host TV triggers a following H tone to be downstepped. For instance, when an H.L tone bearing adjective like ká:wì 'black' is used to pre-modify an H.H tone bearing noun like bólí 'pumpkin', the adjective deletes its TV and occurs as ká:wø-- 'black' to form a single utterance group together with the noun it modifies. Conse-
quently, the L tone delinked from the deleted TV of the adjective remains behind by floating and triggers downstepping of the H tone hosted by the adjacent syllable of the modified noun. The process can be illustrated by the following autosegmental notations introduced by Goldsmith (1976). In autosegmental representation, elements in the tonal and segmental layers are linked to each other with 'association lines'. The disconnection of elements in the two layers is indicated by an equal sign (=) cutting across an association line. An encircled tone represents a floating tone.
(16) The adjectives and the nouns in citation form
a. ká:wì

b. bólí
| |
H L
'pumpkin'
(17)

The adjectives and the nouns in modifier-modified relation

| ká:w - | ‘bólí |
| :---: | :---: |
| \| $=$ |  |
| H L | ${ }^{\text {}} \mathrm{H}$ |

'white pumpkin'
The following figures depict the acoustic representation of the isolated nominals in (16) and the downstepping process demonstrated in (17).


FIGURE 19: ká:wì (H.L) 'white'


FIGURE 20: bólí (H.H) 'pumpkin'


FIGURE 21: ká:w bólí (H.H) 'white pumpkin'
As can be observed, in citation form, the noun bólí 'pumpkin' bears a high tone ( $\approx 52$ semitones) on both its first and last syllables (cf. Figure 20). But this high tone is lowered to $\approx 49$ semitones when the noun is pre-modified by the adjective ká:wì 'black' (cf. Figure 21). What triggers the downstepping is the adjectival root-final floating tone that is delinked from its deleted host: viz. TV [i]. The lowering of the H tone borne by the ultimate syllable of the pre-modified noun bólí 'pumpkin' is a result of a pause feature (cf. Figure 21).

A floating L tone that triggers an H tone to be downstepped may also be stranded from its TBU as a result of H spreading from the left. Spreading is the association of the tone of one TBU to an adjacent TBU by feature discharging (Yip 2002). When an H tone associated with a TBU of a separate morpheme spreads to the right over a monomoraic $L$ tone bearing syllable of an adjacent morpheme (constituent), it delinks the L tone (since there is no enough space to accommodate the two tones) and associates itself with the TBU of the stranded L tone. As a result, the delinked L tone stays behind by floating and triggers the downstepping of an adjacent H tone. Compare the pitch tracks of the H tone associated with the ultimate syllables of the noun fikkí 'knife' in the following graphs:

figure 22: Jikkí 'knife' (H.H)


Figure 23: jé-fík kí (H.H. ${ }^{\text {He }}$ ) 'the knife'

In citation form, the noun fikkí 'knife' bears a L ( $\approx 49$ semitones) and a high ( $\approx 53$ semitones) tone respectively on its penultimate and ultimate syllables, as in Figure 22. But when it occurs with the definite marker jé-, the L tone associated with the first syllable of the noun is changed to an H tone ( $\approx 51$ semitones), as displayed in Figure 23. On the contrary, the H tone associated with the ultimate syllable of the definite noun is realized at a very low pitch ( $\approx 46$ semitones). The two changes are the results of different tonal processes. First, the $H$ tone associated with the definite article jé- ( $\approx 51$ semitone) spreads over the first syllable of the noun Jikkí 'knife' delinks the L tone from its TBU and associates itself to the L tone bearing unit. The delinked tone remains by floating and then lowers the pitch of the $H$ tone borne by the ultimate syllable of the definite noun. The processes can be illustrated as follows. A dotted association line indicates spreading of the tone feature.

a. jé- $\int \mathrm{í}^{\mathrm{k}}{ }^{`}{ }^{\downarrow} \mathrm{kí}$


H L H 'The knife'

This above autosegmental representation shows the H spreading to the right, the delinking of the L tone and the downstepping of the H tone of the ultimate syllable of the noun.

## [6.2] Downdrift

Downdrift is a tonal process whereby a H tone after an overt L tone is realized at a lower height of pitch, compared to a preceding $H$ tone (Yip 2002:148). It is a gradual downward inclination of pitch from the beginning of utterance to the end (Fox 2000:189). In Sezo, it is a common tonal process observed in longer utterances such as phrases and sentences. Let us look at the high tone borne by the ultimate syllable of fikkí 'knife' in isolation and in a phrase. In this study, both downstep and downdrift are represented by a down arrow ( ${ }^{( }$) superscribed on the onset of a syllable.
a. $\left.\right|_{\mathrm{H}} ^{\text {má:nzì }}$
'small'
b. Jikkí

L H
'knife'
c. má:nzø̀ $f$ ik ${ }^{\text {² }}$ kí
'small knife'
Note that the lowering of the pitch of the high tone on the final syllable of Jikkí 'knife' in (19-a) is not a downstep because it is not triggered by a floating low tone. It is found after an overt low tone associated with the TBU of the first syllable of the noun. The following Figures respectively demonstrate the pitch tracks of the un-lowered (19-b) and the lowered (19-c) high tone of the noun Jikkí 'knife' as pronounced by the native speaker mentioned earlier.

figure 24: $\mathfrak{\text { jikkí (L.H) 'knife' }}$


Figure 25: má:nz- Øikkí

As can be observed, when the noun Jikkí 'knife' is cited in isolation, the pitch of the high tone associated with the final syllable of the noun is $\approx 53$ semitones (cf. Figure 24 ). But when the noun is pre-modified by adjective má:nzì 'small' it drops down to $\approx 48$ semitones (cf. Figure 25). It is lower than the pitch of the preceding L tone.

## [6.3] Formation of a falling contour

A falling HL contour tone can be formed through two synchronic tonal processes. These are partial high-spreading and re-association of a floating H tone to a L tone bearing unit. In Sezo, an HL contour tone is formed only on bimoraic syllables, viz. syllables consisting of long vowels. The two processes are separately described below.

## Partial spreading of a high tone

In Sezo, if an H tone belonging to one morpheme spreads rightwards over a bimoraic L tone bearing adjacent syllable, it always forms a HL contour because there is enough space to accommodate the two tones (because there are two morae/moras). This process is referred to as partial high-spreading, because it does not delink the L tone from its TBU. The HL contour tone borne by the penultimate syllable of the following definite noun (20-b) is formed by a feature discharged from the H tone associated with the definite prefix. That the HL contour tone is a result of partial high-spreading is clear from the indefinite counterpart of the noun which displays a basic L.H tonal melody (20-a).
(20)
a. tà:lí
L H 'chief'

The following figures demonstrate the pitch tracks of the above indefinite and definite nouns:

figure 26: tà:lí 'chief' (L.H)


Figure 27: jé-tâ: Mí (H.HL. ${ }^{\text {He }}$ ) 'the chief'

As can be observed from Figure 26, while the tone borne by the first syllable of the indefinite noun tà:lí 'chief' is an L tone ( $\approx 48$ semitones), the tone hosted by the final syllable of the same noun is $\mathrm{H}(\approx 50$ semitones). But when the noun occurs with the definite marker jé-, the tone borne by the first syllable of the noun is changed to HL (the pitch starts at $\approx 51$ semitones and declines down to $\approx 48$ semitones (cf. Figure 27). The HL contour is a result of partial highspreading. Note that the lowering of the H tone associated with the final syllable of the definite noun is a result of downdrift as well as a pause feature.

## De-linking and re-linking of a high tone

The other tonal process whereby a falling contour is formed, is the reassociation of a stranded H tone to an L tone bearing bimoraic syllable. This process usually takes place across word boundaries when a nominal category deletes its H tone bearing TV to form a single phonological unit with an adjacent syntactic or morphological element. For instance, when an L.H tone bearing disyllabic adjective like gàttí 'big' pre-modifies an L.H tone bearing disyllabic noun like twàzzí 'hoe', the TV of the adjective gets deleted, leaving the root-final H tone behind. Following the deletion of the TV, the stranded H tone moves rightwards and re-associates itself with the first syllable of the modified noun. Eventually it forms a falling ( HL ) contour, together with the L tone originally borne by the first syllable of the noun. On bimoraic syllables, $H$ tones do
not displace $L$ tones, because there is enough space to accommodate the two tones. In terms of autosegmental representation, the process can be illustrated as follows. Note that the down arrow in example (21-c) represents a downdrift and a pause feature.
(21)
a. gàttí

L H
'big'
b. twà:zí

L H
'hoe'
c. gàttø-twâ:‘zzí

L H L ${ }^{\text {t }}$
'big hoe'
The following Figures display the actual acoustic representation of 21-a, 21-b and 21-c.


FIGURE 28: gàttí (L.H) 'big'


FIGURE 29: twà:zí (L.H) 'hoe'


FIGURE 30: gàtt-twâ: zí (L.HL. ${ }^{\text {He }}$ ) 'big hoe'
As can be observed, in citation form, the noun twà:zí 'hoe' shows a low tone ( $\approx 48$ semitones) on its first syllable (cf. Figure 29). But when the noun is premodified by the adjective gàttí 'big', the tone on the same syllable starts at $\approx 51$ semitones and glides downwards to $\approx 48$ semitones (Figure 30 ). This is clearly a HL contour tone formed by the merger of an unassociated high tone from the left and an associated L tone borne by the first syllable of the modified noun. Note that the pitch of the high tone on the final syllable of the noun is very low, i.e. $\approx 46$ semitones (Figure 30). This is a result of the downdrift and pause feature.

## [6.4] Total spreading of high tone

In Sezo, a high tone of a separate morpheme may spread over a neighboring low tone bearing monomoraic syllable across the morpheme boundary. When a high tone spreads over a monomoraic syllable, it does not form a HL contour, because the syllable does not have enough space to accommodate the two tones. It delinks the low tone from its TBU and totally replaces it. The following is a typical example of a total spreading of high tone. Note that the indefinite noun gìzzí 'money' has a low tone on its first syllable when it is cited in isolation.
(22) a. gìzzí

L H
'money'
b.

[^13]The following are respectively graphic representations of examples (22a) and (22b):

figure 31: gìzzí (L.H) 'money'

figure 32: jé-gíz zí (H.H. 'H) 'the money'

As can be observed, the tone associated with the first syllable of the indefinite noun gìzzí 'money' is $\approx 48$ semitones (Graph 31 ). But this is changed to $\approx 52$ semitones when the noun occurs with the definite marker (Graph 32). This suggests the displacement of the low tone from its original TBU by a total spreading of a high tone from the left, i.e. from the definite article. The displacement of the low tone is clear from the downstepping phenomenon observed on the final syllable of the noun.

## [7] CONCLUSION

This paper has shown that Sezo has two levels of tone - high and low. It has demonstrated that the two tones occur on monomoraic and bimoraic syllables (i.e. on short and long vowels). Rising (LH) and falling (HL) contour tones have been recorded occurring only on bimoraic syllables. These are analyzed as composites of the high and low tones squeezed together on one bimoraic syllable as a result of diachronic and synchronic processes. The study has shown that tone has a very significant role in the lexicon of the language. It is used to distinguish lexical items and derive nominal stems from verbal roots. The only function of tone in the grammar of the language is to make distinction between declarative and interrogative sentences. The basic tonal processes attested in the language are downdrift, downstep, contour formation through partial spreading of a high tone over a low tone bearing unit, contour formation through re-linking of a floating high tone to an adjacent low tone bearing unit and total spreading of a high tone.

ABBREVIATIONS AND SYMBOLS

| ACC | accusative | RN | result nominal |
| :--- | :--- | :--- | :--- |
| AGRS | subject agreement | TDM | tonal derivational morpheme |
| C | consonant | UF | underlying form |
| CF | citation form | V | vowel |
| CVB | converb | VN | verbal noun |
| DAT/LOC | dative/locative | VR | verb root |
| DCL | declarative | 1 | first person |
| H | high | 2 | second person |
| L | low | nominative | , |
| NOM | imperative | $\checkmark$ | third person |
| IMP | interrogative | $\checkmark$ | low tone |
| INTER | root-internal tone | $\wedge$ | rising (LH) contour tone |
| RIT | singular | $\downarrow$ | falling (HL) contour tone |
| SG | terminal vowel | $\neq$ | downstep, downdrift |
| TV |  |  |  |

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# NEGATION IN HAMAR 

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## ABSTRACT

This study deals with the negation of declarative and interrogative main clauses, imperatives, and non-verbal and existential sentences in Hamar, an Aroid language of the Omotic language family. It describes the ways in which negation is expressed in the language, and positions the discussion in light of cross-linguistic observations made by Dahl (1979, 2010), Payne (1985), Miestamo (2005, 2007), Eriksen (2011) and others. The morpheme -tis used in Hamar to mark negation in both verbal and non-verbal clauses. This means that Hamar has a morphological or affixal negation (Dahl 2010). The language uses two different sets of subject agreement affixes for the affirmative and negative counterparts. While affirmative sentences employ a shortened pronoun, a set of agreement suffixes is used in the negative. In this study, it is suggested that the negative verbs may have preserved older subject agreement morphemes which are now lost in the affirmative, as negatives are less affected by innovation, cf. Zargulla in Azeb 2009 and Canadian French in Poplack 2001. Moreover, close interaction is reported between negation and TAM (Tense, Aspect and Mood) categories. For example, some of the aspect/tense categories that occur in the affirmative are neutralised in the negative. Negative constructions in Hamar are not only different from their affirmative counterparts due to the presence of the negation morpheme -t-, but also in terms of subject agreement marking and tense/aspect categories. As a result, it is argued that Hamar has an asymmetric negation system, cf. Miestamo 2005.

## [1] INTRODUCTION

This paper examines negation in Hamar, which is one of the linguistically lessinvestigated languages in Ethiopia. The Hamar language, which belongs to the Aroid group of the Omotic language family ${ }^{1}$, has about 46,000 native speakers (CSA 2008). The people mainly live as semi-pastoralists keeping cattle near the Omo valley in the South Omo Zone of the Southern Nations, Nationalities and Peoples Regional State (SNNPR) of Ethiopia. The Hamar language has two dialects, namely Benna and Beshada, and it is closely related to languages like Ka-
[1] The genetic classification of Aroid languages within and outside Omotic is controversial, and readers are recommended to look at the recent works of Moges (2007 and 2015a) and Theil (2012) for further information.
ra, Aari and Dime (Moges 2015b).
Although numerous anthropological studies are available on Hamar, linguistic investigations are limited in number and sketchy in depth. The main linguistic studies on the language include Lydall (1976, 1986, 2000), Mary (1987), Getahun (1991), Cupi et al (2013), Binyam and Moges (2014) and Moges and Binyam (2015). Some of the studies listed above deal with the verbal system of the language. For example, Lydall (1976) briefly describes the verb system of Hamar as part of her sketch grammar, while Binyam and Moges (2014) deal with copula constructions. More importantly, a preliminary account of the verb in Hamar is provided by Cupi et al (2013). The authors, admit, however, that their study is incomplete and no account is given of negative constructions. The focus of the present study is therefore the negation of main clauses in Hamar, which has not been thoroughly investigated in any of the earlier works.

The data for the present paper is elicited from native speakers of the language over consecutive field studies in the area where the language is spoken in 2014 and 2015. In addition to that, the analysis has been checked against and complemented by naturally occurring texts of various genre collected from the speakers of the language. The paper is organised as follows. The brief introduction about the language and earlier studies given in the current section will be followed by the presentation of major verbal predicate types in Section 2. Section 3 summarises major typological issues related to negation marking. Then, Section 4 deals with negation marking in verbal main clauses of both declarative and interrogative sentences. A brief account of negation in nonverbal, existential and imperative clauses is provided in Section 5. Finally, Section 6 summarises the main findings of the study.

## [2] MAJOR TYPES OF VERBAL PREDICATES

Hamar is an SOV language. Although the language has some portmanteau morphemes, it is mainly an agglutinating language. As is the case in most Omotic languages, the verb root in Hamar does not occur as a word on its own, cf. Koorete (Binyam 2010), Maale (Azeb 2001), Zayse (Hayward 1990) among others. The most frequent verb root in the language is a closed syllable with a single peak, i.e. CVC (e.g. 7is-' 'eat', wod- 'sleep’, Rim- 'give' etc.) (cf. Cupi et al 2013:184).

Cupi et al (2013:185) identify two verbal forms in Hamar, i.e. simple and compound. According to them, simple forms are made up of a lexical verb, while compound ones include a lexical verb plus an auxiliary and/or a copula. In this study a four-way categorisation of the verbal predicates is proposed. The present study diverges from the Cupi et al (2013) analysis in two ways: first, various realisations of the main verb have been found and second, there is a
difference between the status of the auxiliary and the copula elements. To this end, four structurally different types of verbal predicates are identified and presented. The structural categorisation of the predicate verb types is crucial for providing a systematic description of the negative and affirmative verbs. First, there are nonverbal sentences of copula constructions which are without a verb, as in example (1):
(1) Pinta fora-ne

I Fora-DECL
'I am Fora.'
Second, there are verbal predicates which include simply a main verb, as in example (2). Here the main verb occurs alone with various inflectional suffixes:
(2) fora dur6o ?is-idi-ne

Fora porridge eat-PST-DECL
'Fora ate porridge.'
The third category consists of verbal predicate types that exhibit the double occurrence of the main verb, as in example (3):
(3) kodi rat-a rat-a

She sleep-PRES sleep-PRES
'She sleeps.'
And finally, a predicate verb type has been identified, which is comprised of a main verb and an existential auxiliary. An example is presented in (4):
(4) kidi is-ete ki-daa
he eat-PROG 3MS-AUX
'Is/was he eating?'
As can be observed from the examples above, Hamar verbs carry different types of inflectional markers. Verbs in the language are inflected for tense, aspect and person. In addition, verbs carry sentence type and negation suffixes. Hamar has two sets of tense and aspect categories in the affirmative and negative. With regard to tense and aspect marking, it has been determined that the tense/aspect categories of simple past, remote past, present, present perfect and progressive occur in the affirmative ${ }^{2}$. All these tense/aspect categories are

[^14]merged into three main aspects in the negative: namely perfective, imperfective and progressive. A detailed discussion of the negative constructions in relation to their affirmative counterparts will be given in section 4.

## [3] TYPOLOGICAL NOTES ON NEGATION

All known languages that have been investigated until now express negation, which suggests that negation is a universal feature of language (Dahl 1979, Miestamo 2005, Bond 2007). Underscoring the universality of negation and its total absence in animal communication systems, Horn (2010:1) further claims that 'negation is what makes us human, imbuing us with capacity to deny, to contradict, to misrepresent, to lie, and to convey irony'. Although the universality of negation is fascinating in its own right, a closer look both at individual languages and cross-linguistically reveals that negation is a highly complex phenomenon which interacts closely with many grammatical categories (Miestamo 2007). With regard to the marking of negation, Dryer (2013) states that all languages use some kind of negative marking morpheme and no language has been found in which it is expressed through intonation or word order.

Standard negation is the main focus of this study, but non-standard negation constructions such as imperative, nonverbal and existential sentences will also be briefly discussed. The idea of standard negation was first proposed by Payne (1985) and followed by many other typologists. Miestamo (2007:553) defines standard negation, in simple terms, as 'the basic means that languages have for negating declarative verbal main clauses'. In most languages, the specific strategy and markers used to mark standard and nonstandard negation constructions is different (Miestamo 2007). Negation closely interacts with Tense-Aspect-Mood (hereafter "TAM") and agreement categories in many languages (Miestamo 2005), and the course of influence can be in both directions.

The focus of much of the typological literature on negation has been on standard negation, with little attention provided to non-standard negation from cross-linguistic perspectives (Eriksen 2011). In recent years, this seems to have changed slightly with significant contributions from Eriksen (2011) and Veselinova (2013) on the expression of nonverbal and existential sentences respectively. Eriksen (2011) proposes that even if nonverbal sentences often use non-standard means for expressing negation, they can still be analysed as an indirect way of expressing the same negation phenomenon in a language. In his own words, Eriksen (2011:304) writes that 'non-standard negation of nonverbal predicates may be analysed as various means to negate such predicates indirectly'. To account for this, he proposes a typological universal rule he re-
fers to as 'Direct Negation Avoidance (DNA)'. Regarding the negation of existential clauses, Vaselinova (2013:107) underscores that 'the use of special strategy to negate existential sentences is cross-linguistically extremely common'. She also identifies four different types of languages in connection with the strategy they use and the strategy's comparison to standard negation.

The typology literature on negation proposes slightly differing approaches to negation marking, cf. Dahl (1979), Payne (1985), Dryer (2013) etc. However, for this study, Dahl's (2010:12) suggestion to classify them into three main types has been adopted. These are: morphological or affixal negation, negative particles and negative verbs. Of the three, Dryer's (2013) study of 1157 languages reveals that the use of negative particles is the most common strategy among the languages of the world. On the other hand, a second proposal to categorise negation into 'symmetric' and 'asymmetric' is made by Miestamo (2005), based on existing structural correspondences between affirmative and negative sentences. Miestamo (2007:556) explains that the 'distinction pays attention to whether or not negatives differ structurally from affirmatives, in addition to the presence of negative markers'. Languages in which the distinction between affirmative and negative constructions is limited to the addition of the negative morpheme, are said to have symmetric negation. Those languages, on the other hand, that exhibit more structural differences than just the addition of the negation morpheme are said to have an asymmetric negation system.

## [4] NEGATION IN VERBAL MAIN CLAUSES

The negation of verbal main clauses in Hamar is expressed morphologically. In verbal main clauses, negation is marked by suffixing $-t$ - on verbs. The morpheme $-t$ - is used to mark negation in Hamar verbs in all of the three verbal paradigms that are attested in the negative constructions, namely perfective, imperfective and progressive paradigms. In addition to the negation suffix $-t$-, all the negative paradigms in Hamar exhibit a separate set of subject agreement markers which is not attested in the affirmative (see section 4.3 for a detailed discussion). Subsequent sections of this article will examine negation marking in Hamar in declarative and interrogative sentences.

## [4.1] Negative, Declarative

In this section, the expression of negation in declarative sentences will be discussed. Declarative sentences in Hamar are mainly expressed by adding the morpheme -ne onto verbs. The negative suffix -t- is suffixed to the verb preceding the agreement and declarative markers. Negation in each of the three
verbal paradigms: namely negative perfective, negative imperfective and negative progressive, will be examined.

## Negative Perfective

In Hamar, verbs in both the simple past and remote past are negated with the same negative construction. The two-way tense distinction in the affirmative is neutralised into a single aspect category of perfective in the negative construction. Such a type of merger is known as neutralisation in typology and it has been attested cross-linguistically in some other languages (Payne 1985). Prior to discussing the negative perfective verbal forms, however, the two affirmative constructions of simple and remote past are presented for the purpose of comparison. Both affirmative categories make use of simple verbs and the tense markers are directly added to the verb.
(5) Simple past:
kidi noq'o wut'-idi-ne
he water drink-PST-DECL 'He drank water.'
(6) Remote past:

| a. | Pinta noq'o | ?i-wut $'$-ade |
| :--- | :--- | :--- | :--- |
| I | water | 1SG-drink-REM |

b. kidi noq'o ki-wut'-ade
he water 3Ms-drink-REM
'He drank water (remote time).'
The negative counterpart of the affirmative example in (5) and (6a\&b) is one and the same. The full paradigm of the negative counterpart of (5) and (6) is provided in (7) and the verb carries a perfective aspect marker.

In the negative perfective paradigm, the negative morpheme $-t$ - is added to the verb. The negative suffix is added inbetween the aspectual marker and subject agreement morpheme. The negative, declarative paradigm of the verb wut'- 'drink' in the perfective aspect is given in (7) below:
(7) Declarative, Negative Paradigm (Perfective)

I did not drink. (etc.)
a. 1SG wut'-aa-t-i-ne
drink-PFV-NEG-1SG-DECL
b. 2SG wut'-aa-t-a-ne
drink-PFV-NEG-2SG-DECL
c. 3MS wut'-aa-je
drink-PFV-DECL.3.NEG
d. 3FS wut'-aa-je
drink-PFV-DECL.3.NEG
e. 1PL wut'-oo-t-o-ne
drink-PFV-NEG-1PL-DECL
f. 2PL wut'-ee-t-e-ne
drink-PFV-NEG-2PL-DECL
g. 3PL wut ${ }^{\prime}$ 'aa-je
drink-PFV-DECL.3.NEG
The position of the different morphemes in the verb can be schematically represented as:

VERB-PFV-NEG-AGRE-DECL
(8) Tinta wut

I drink-PFV-NEG-1SG-DECL
'I did not drink.'
Although what is provided above can be considered as a general schematic representation of the negative verb in the perfective, not all of the verb forms in the verbal paradigm neatly fit the template. For example, the negative morpheme - $t$ - is absent from all the third person verb forms (i.e. 3MS, 3FS and 3PL). The absence of the negative morpheme from the third person verb forms (most probably through its deletion) triggers morphophonemic changes in the sentence type marker (i.e. its change from -ne to -je). The third person verb form behaves differently from other verb forms and it is considered here as a marked form ${ }^{3}$, as is the case in closely related Aroid languages, cf. Aari (Hayward 1990) and Dime (Fleming 1990). Notice that the sentence type morpheme je synchronically appears in all third person verb forms. Thus, in this study, -je is considered as a portmanteau morpheme marking both sentence type, third

[^15]person and negation. An example is given below:
(9) kidi/kodi/kidi wut'-aa-je
he/she/they drink-PFV-DECL.3.NEG
'He/She/They didn't drink.'
A morphophonemic process worth mentioning in connection with the perfective verb paradigm is the change in vowel quality that occurs inbetween the subject agreement suffix and the perfective aspect marker in the 1PL and 2PL. The subject agreement morphemes -0 (1PL) and -e (2PL) trigger a regressive vowel assimilation of the perfect morpheme -aa- to -oo- and -ee- respectively. Illustrative examples are given in (10a\&b).
a. wosi wut'-oo-t-o-ne
we drink-PFV-NEG-1PL-DECL
'We didn’t drink.'
b. kidi wut'-ee-t-e-ne
you drink-PFV-NEG-2PL-DECL
'You (PL) didn't drink.'
More examples of the declarative, negative verb form in the perfective are provided below:
a. Pinta dur6o Ris-aa-t-i-ne

I porridge eat-PFV-NEG-1SG-DECL
'I did not eat porridge.'
b. ja dur6o Ris-aa-t-a-ne
you porridge eat-PFV-NEG-2SG-DECL
'You did not eat porridge.'
c. kidi dur6o Ris-aa-je
he porridge eat-PFV-DECL.3.NEG
'He did not eat porridge.'
d. kodi dur6o 2is-aa-je
she porridge eat-PFV-DECL.3.NEG
'She did not eat porridge.'
e. wosi dur6o Ris-oo-t-o-ne
we porridge eat-PFV-NEG-1PL-DECL
'We did not eat porridge.'
f. jesi dur6o ?is-ee-t-e-ne
you porridge eat-PFV-NEG-2PL-DECL
'You did not eat porridge.'

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g. kidi dur6o Ris-aa-je
they porridge eat-PFV-DECL.3.NEG
'They did not eat porridge.'
```


## Negative Imperfective

Once again, the suffix - $t$ - is used to express negation in verbal main clauses in the imperfective verb paradigms. Before we look at the negative construction, let us once again consider the affirmative counterparts, i.e. the present perfect and present:
(12) Present perfect

| kidi | noq'o | ki-daa | wut'-e |
| :--- | :--- | :--- | :--- |
| he | water | 3MS-exist | drink-PRES |

'He has drunk water.'
(13) Present
kidi noq'o wut'-a wut' -a
he water drink-PRES drink-PRES
'He drinks water.'
The two affirmative tense categories have one negative counterpart. This is once again an instance of neutralisation in the negative (Payne 1985). The full paradigm of the negative imperfective of the verb wut'- 'drink' is provided below in (14):
(14) Declarative, Negative Paradigm (Imperfective)

I do not drink. (etc.)
a. 1SG wut'-a-t-i-ne
drink-IPFV-NEG-1SG-DECL
b. 2SG wut'-a-t-a-ne
drink-IPFV-NEG-2SG-DECL
c. 3MS wut'-e-je
drink-IPFV-DECL.3.NEG
d. 3FS wut'-e-je
drink-IPFV-DECL.3.NEG
e. 1PL wut' ${ }^{\prime}$-a-t-o-ne
drink-IPFV-NEG-1PL-DECL
f. 2PL wut'-a-t-e-ne
drink-IPFV-NEG-2PL-DECL
g. 3PL wut'-e-je
drink-IPFV-DECL.3.NEG

In the imperfective paradigm as well, the negative suffix $-t$ - is added to the main verb following the imperfective aspect marker $-a$-. It is then followed by the subject agreement suffix and the sentence type marker -ne. The order of the morphemes can be summarised as:

VERB-IPFV-NEG-AGRE-DECL
(15) Tinta wut'-a-t-i-ne

I drink-IPFV-NEG-1SG-DECL
'I do not drink.'
An interesting morphophonemic process is once again observed in the third person verb form. Akin to the perfective paradigm, the third person verb forms behave differently from the others. First, the negative morpheme -t- is not overtly shown, rather it is expressed in a portmanteau morpheme. Second, there is morphophonemic change of the sentence type morpheme and regressive vowel assimilation.

In the third person, the verb formally remains the same for the singular and plural, the imperfective morpheme $-a$ - is realised as $-e$ - assimilating regressively with the vowel in the sentence type marker $-j e$. Here there are no separate morphemes which overtly mark negation and subject agreement. Instead, the sentence type marker -ne is realised as -je only in third person verb forms. Historical changes aside, it is more plausible to treat -je as a portmanteau morpheme, marking sentence types, person agreement and negation synchronically. Consider the following example:

$$
\begin{array}{ll}
\text { (16) } & \begin{array}{l}
\text { kidi/kodi/kidi } \\
\text { he/she/they }
\end{array} \quad \text { drink-jPFFV-DECL.3.NEG } \\
\text { 'He/She/They do not drink.' }
\end{array}
$$

Notice that the vowel assimilation, which has been observed in the 1PL and 2PL verb forms of the perfect paradigm explained in example ( $10 a \& b$ ) above, does not occur in the imperfective paradigm. Instead, similar regressive vowel assimilation is noted in the third person verb form, as illustrated in example (16).

More examples of the negative imperfective paradigm are provided below for the verb rar- 'sleep':
(17) a. Pinta rat-a-t-i-ne

I sleep-IPFV-NEG-1SG-DECL
'I do not sleep.'
b. ja rat-a-t-a-ne
you sleep-IPFV-NEG-2SG-DECL
'You do not sleep.'
c. kidi rat-e-je
he sleep-IPFV-DECL.3.NEG
'He does not sleep.'
d. kodi rat-e-je
she sleep-IPFV-DECL.3.NEG
'She does not sleep.'
e. wosi rat-a-t-o-ne
we sleep-IPFV-NEG-1PL-DECL
'We do not sleep.'
f. jesi rat-a-t-e-ne
you sleep-IPFV-NEG-2PL-DECL
'You do not sleep.'
g. kidi rat-e-je
they sleep-IPFV-DECL.3.NEG
'They do not sleep.'

## Negative Progressive

In the progressive aspect, akin to perfective and imperfective paradigms, the suffix -t-marks negation. The progressive aspect in Hamar uses a verbal construction made up of a main verb and an existential auxiliary daa- 'exist'. While the progressive aspect morpheme -ete is directly added to the main verb, the negative suffix -t- is instead suffixed to the existential auxiliary daa- 'exist'. In addition to the negation suffix, the existential auxiliary carries the subject agreement and sentence type morphemes. The use of similar complex verbal constructions, consisting of a main verb and an auxiliary in the progressive aspect, is common in many Omotic languages (cf. Koorete in Binyam 2010 etc.). The declarative, affirmative and negative paradigm in the progressive aspect for the verb wut'- 'drink' are given below in (18) and (19) respectively:
(18) Declarative, affirmative (Progressive)

I am (was) drinking. (etc.)
a. 1SG wut'-ete ?i-daa-de
drink-PROG 1SG-exist-DECL
b. 2SG wut'-ete xi-daa-de
drink-PROG 2SG-exist-DECL
c. 3MS wut'-ete ki-daa-de
drink-PROG 3MS-exist-DECL
d. 3FS
wut'-ete ko-daa-de
drink-PROG 3FS-exist-DECL
e. 1PL
wut'-ete wo-doo-de
drink-PROG 1PL-exist-DECL
f. 2PL
wut '-ete je-dee-de
drink-PROG 2PL-exist-DECL
g. 3PL wut'-ete ki-daa-de
drink-PROG 3PL-exist-DECL
The affirmative progressive verb form presented in (18) above illustrates that the progressive aspect suffix is suffixed to the main verb and the existential auxiliary carries the shortened pronouns which indicate the person and sentence type markers. The negative counterpart is provided below:
(19) Declarative, negative (Progressive)

I am (was) not drinking. (etc.)
a. 1SG wutf'-ete daa-t-i-ne
drink-PROG exist-NEG-1SG-DECL
b. 2SG
wut'-ete daa-t-a-ne
drink-PROG exist-NEG-2SG-DECL
c. 3MS wut'-ete daa-je
drink-PROG exist-DECL.3.NEG
d. 3FS
wut'-ete daa-je
drink-PROG exist-DECL.3.NEG
e. 1PL
wut '-ete doo-t-o-ne $^{\text {det }}$
drink-PROG exist-NEG-1PL-DECL
f. $2 P L$
wut ${ }^{\prime}$ 'ete dee-t-e-ne
drink-PROG exist-NEG-2PL-DECL
g. 3PL
wut''-ete daa-je
drink-PROG exist-DECL.3.NEG
The overall schematic representation of the negative progressive paradigm in

Hamar can be presented as:
VERB-PROG AUX-NEG-AGRE-DECL

| Tinta | wut $f$ '-ete | daa-t-i-ne |
| :--- | :---: | :--- |
| I | drink-PROG | exist-NEG-1SG-DECL |
| 'I $\mathrm{am} /$ was not drinking.' |  |  |

Equally, in the progressive verbal paradigm, the negation suffix and the subject agreement marker are elided from the auxiliary in the third person verb forms. Similar to the two negative verbal paradigms we have discussed earlier, the declarative/third person/negation marker -je is directly suffixed to the auxiliary daa- 'exist'. Consider the example below:
$\begin{array}{lll}\begin{array}{l}\text { kidi/kodi/kidi } \\ \text { he/she/they }\end{array} \quad \text { wut'-ete } & \text { daa-je } \\ \text { 'He/She/They is/was/are/were not drinking.' }\end{array}$
Similarly to the perfective paradigm illustrated in example (10a \& b) and unlike the imperfective paradigm discussed in example (16), regressive vowel assimilation is observed between the subject agreement morpheme and the long vowel in the auxiliary in the 1PL and 2PL verb forms. Note that the long vowel aa in the existential auxiliary daa- changes to 00 in the 1PL and to $e e$ in the 2 PL , assimilating with the subject agreement suffixes -0 and $-e$ respectively. Here are examples:
a. wosi wutf'-ete doo-t-o-ne
we drink-PROG exist-NEG-1PL-DECL
'We are/were not drinking.'
b. jesi wut''-ete dee-t-e-ne
you drink-PROG exist-NEG-2PL-DECL
'You are/were not drinking.'

More examples of the declarative, negative verb forms in the progressive aspect are provided below:
(23)
a. Rinta dur6o Ris-ete daa-t-i-ne I porridge eat-PROG exist-NEG-1SG-DECL 'I am/was not eating porridge.'
b. ja durbo ?is-ete daa-t-a-ne you porridge eat-PROG exist-NEG-2SG-DECL 'You are/were not eating porridge.'
c. kidi dur6o ?is-ete daa-je
he porridge eat-PROG exist-DECL.3.NEG
'He is/was not eating porridge.'
d. kodi dur6o ?is-ete daa-je
she porridge eat-PROG exist-DECL.3.NEG
'She is/was not eating porridge.'
e. wosi dur6o ?is-ete doo-t-o-ne
we porridge eat-PROG exist-NEG-1PL-DECL
'We are/were not eating porridge.'
f. jesi dur6o ?is-ete dee-t-e-ne
you porridge eat-PROG exist-NEG-2PL-DECL
'You are/were not eat porridge.'
g. kidi dur6o ?is-ete daa-je
they porridge eat-PROG exist-DECL.3.NEG
'They are/were not eating porridge.'

## [4.2] Negative, Interrogatives

Interrogative counterparts of the negative, declarative verb forms described in section 4.1 for the most part remain the same, with the exception of changes in the sentence type marking. In one of the paradigms, the declarative suffix -ne is replaced by the overt interrogative sentence type marker -nu. In other cases, the absence of the overt marking of the declarative suffix expresses interrogation. The negative interrogative counterparts of the three negative verbal paradigms described above are listed below. First let us look at the declarative and interrogative counterparts of the perfective paradigm:
(24) Declarative, Negative (Perfective) Interrogative, Negative (Perfective)

I did not drink. (etc.)
$\begin{array}{ll}\text { a. 1SG } & \begin{array}{l}\text { wut' } ' \text {-aa-t-i-ne } \\ \text { drink-PFV-NEG-1SG-DECL }\end{array} \\ \text { b. 2SG } & \begin{array}{l}\text { wut } \mathrm{S}^{\prime} \text {-aa-t-a-ne } \\ \text { drink-PFV-NEG-2SG-DECL }\end{array}\end{array}$

Did I not drink? (etc.)
wut'-aa-t-i
drink-PFV-NEG-1SG
wut' $'$-aa-t-a
drink-PFV-NEG-2SG

| c. 3 MS |  | wut'-aa-je | wut'-aa-da |
| :---: | :---: | :---: | :---: |
|  |  | drink-PFV-DECL.3.NEG | drink-PFV-NEG. 3 |
| d. 3FS |  | wut'-aa-je | wut ${ }^{\prime}$-aa-da |
|  |  | drink-PFV-DECL.3.NEG | drink-PFV-NEG. 3 |
| e. 1PL |  | wut'-oo-t-o-ne | wut'-oo-t-o |
|  |  | drink-PFV-NEG-1PL-DECL | drink-PFV-NEG-1P |
| f. | 2PL | wut'-ee-t-e-ne | wut'-ee-t-e |
|  |  | drink-PFV-NEG-2PL-DECL | drink-PFV-NEG-2PL |
| g. 3PL |  | wut'-aa-je | wut'-aa-da |
|  |  | drink-PFV-DECL.3.NEG | drink-PFV-NEG. 3 |

In the negative perfective verbal paradigm, it is the absence of the declarative marker -ne which expresses interrogation. Following the verb root, aspect, negation and agreement morphemes are added in that order.

As a marked verb form, the third person verb once again behaves differently from the others. Here, following the aspect marker suffix, the morpheme $-d a$ is added. The element - $d a$ which is phonologically close to the negation marker -tis analysed as a portmanteau morpheme, both expressing negation and acting as a third person agreement marker. The analysis of $-d a$ as a negation/third person marker is strengthened by the fact that the sentence type marker is absent in the verb paradigm ${ }^{4}$. A detailed discussion of the interaction between agreement marking and negation is given in section 4.3. Consider the example below:

kidi/kodi/kidi | wutg'-aa-da |
| :--- |
| he/she/they |
| 'Did he/she/they not drink-PFV-NEG. 3 |

More examples of the negative perfective in the interrogative are given below:
a. Rinta dur6o Ris-aa-t-i

I porridge eat-PFV-NEG-1SG
'Did I not eat porridge?'
b. ja dur6o ?is-aa-t-a
you porridge eat-PFV-NEG-2SG
'Did you not eat porridge? '
[4] More data is still needed to determine exactly the semantics, form and use of the element -da which is synchronically analysed in this study as a negation and third person morpheme. There is a good chance that the function of -da could be explained more by diachronic evidence of morphophonemic change, which could be the result of the deletion of some of the morphemes, such as the agreement and sentence type markers that are observed in the non-third person verb forms.
c. kidi dur6o Ris-aa-da
he porridge eat-PFV-NEG. 3
'Did he not eat porridge?'
d. kodi dur6o ?is-aa-da
she porridge eat-PFV-NEG. 3
'Did she not eat porridge?'
e. wosi dur6o ?is-oo-t-o
we porridge eat-PFV-NEG-1PL
'Did we not eat porridge?'
f. jesi dur6o ?is-ee-t-e
you porridge eat-PFV-NEG-2PL
'Did you not eat porridge?'
g. kidi dur6o 2is-aa-da
they porridge eat-PFV-NEG. 3
'Did they not eat porridge?'
Now let us look at the negative, interrogative imperfective paradigm. In this case, the interrogative sentence type marker -nu is suffixed to the verb at the end. For the purpose of comparison, the negative interrogative imperfective paradigm is provided below, parallel to its declarative counterpart:
(27) Declarative, Negative (Imperf.) Interrogative, Negative (Imperf.)

I do not drink. (etc.)
a. 1SG
wut'-a-t-i-ne
drink-IPFV-NEG-1SG-DECL
b. 2SG
wut' a a-t-a-ne
drink-IPFV-NEG-2SG-DECL
c. 3 MS wut' $\mathrm{e}-\mathrm{je}$
drink-IPFV-DECL.3.NEG
d. 3FS
wut' 'e-je
drink-IPFV-DECL.3.NEG
e. $1 P L$
wut' $'$ a-t-o-ne
drink-IPFV-NEG-1PL-DECL
f. 2PL wut'-a-t-e-ne
drink-IPFV-NEG-2PL-DECL
g. 3PL
wut' $-\mathrm{e}-\mathrm{je}$
drink-IPFV-DECL.3.NEG
Do I not drink? (etc.)
wut' ${ }^{\prime}-\mathrm{a}-\mathrm{t}-\mathrm{i}-\mathrm{nu}$
drink-IPFV-NEG-1SG-INT
wut' $'$ a-t-a-nu
drink-IPFV-NEG-2SG-INT
wut' $'$-a-ju
drink-IPFV-INT.3.NEG
wut' $-\mathrm{a}-\mathrm{ju}$
drink-IPFV-INT.3.NEG
wut' $'$-a-t-o-nu
drink-IPFV-NEG-1PL-INT
wut' $'$-a-t-e-nu
drink-IPFV-NEG-2PL-INT
wut' $-\mathrm{a}-\mathrm{ju}$
drink-IPFV-INT.3.NEG
As can be noted above, the negative, interrogative imperfective paradigm is
distinct from the declarative one, due to the suffixation of the interrogative marker -nu. In line with their markedness behavior, the third person verb form behaves differently. The negation and the subject agreement suffixes do not occur overtly and the interrogative suffix is realised as $-j u$. The suffix $-j u$ is analysed as a portmanteau morpheme, expressing interrogation, third person agreement and negation.

More examples of the interrogative, negative imperfective are provided below, using the verb rar- 'sleep'.
(28) a. Tinta rat-a-t-i-nu

I sleep-IPFV-NEG-1SG-INT
'Do I not sleep?'
b. ja rat-a-t-a-nu
you sleep-IPFV-NEG-2SG-INT
'Do you not sleep?'
c. kidi rat-a-ju
he sleep-IPFV-INT.3.NEG
'Does he not sleep?'
d. kodi rat-a-ju
she sleep-IPFV-INT.3.NEG
'Does she not sleep?'
e. wosi rat-a-t-o-nu
we sleep-IPFV-NEG-1PL-INT
'Do we not sleep?'
f. jesi rat-a-t-e-nu
you sleep-IPFV-NEG-2PL-INT
'Do you not sleep?'
g. kidi rat-a-ju
they sleep-IPFV-INT.3.NEG
'Do they not sleep?'
In the progressive paradigm, the absence of the declarative sentence type marker shows interrogation. Note that a similar strategy is employed for the negative interrogative perfective paradigm discussed above. The negative interrogative paradigm of the progressive aspect with its declarative counterpart is provided below for the verb wut'- 'drink'.
(29) Declarative, negative (Progressive) Interrogative, negative (Progressive)

| I am (was) drinking. (etc.) |  |  | Am (was) I drinking? (etc.) |  |
| :---: | :---: | :---: | :---: | :---: |
| a. | 1SG | wut'-ete daa-t-i-ne | wuty'-ete | daa-t-i |
|  |  | drink-PROGexist-NEG-1SG-DECL | drink-PROG | exist-NEG-1SG |
| b. | 2SG | wutf'-ete daa-t-a-ne | wutf'-ete | daa-t- |
|  |  | drink-PROGexist-NEG-2SG-DECL | drink-PROG | exist-NEG-2SG |
| c. | 3MS | wuf ${ }^{\text {'-ete }}$ daa-je | wut'-ete | daa-da/daa-ju |
|  |  | drink-PROG exist-DECL.3.NEG | drink-PROG | exist-NEG.3/INT.3.NEG |
| d. | 3FS | wut'rete daa-je | wut'-ete | daa-da/daa-ju |
|  |  | drink-PROG exist-DECL.3.NEG | drink-PROG | exist-NEG.3/INT.3.NEG |
| e. | 1PL | wut'trete doo-t-o-ne | wut'-ete | doo-t-o |
|  |  | drink-PROG exist-NEG-1PL-DECL | drink-PROG | exist-NEG-1PL |
| f. | 2 PL | wut'-ete dee-t-e-ne | wut'-ete | dee-t |
|  |  | drink-PROG exist-NEG-2PL-DECL | drink-PROG | exist-NEG-2PL |
| g. | 3PL | wut'trete daa-je | wut | a-da /daa-ju |
|  |  | drink-PROG exist-DECL.3.NEG | drink-PROG | exist-NEG.3/INT.3.NEG |

In the negative interrogative paradigm of the progressive aspect above, one can see that in general the absence of the declarative suffix expresses interrogation. Similar to the perfect paradigms exemplified in (26) above, the third person verb form takes the suffix -da, which is a portmanteau morpheme for third person subject agreement and negation. Interestingly, the third person verb form also has a free alternant, in which the interrogative/agreement suffix/negation -ju is directly added to the auxiliary.

More examples of the interrogative, negative verb forms in the progressive aspect are provided below:
a. Pinta dur6o ?is -ete daa-t-i I porridge eat-PROG exist-NEG-1SG 'Am/was I not eating porridge?'
b. ja dur6o ?is-ete daa-t-a you porridge eat-PROG exist-NEG-2SG 'Are/were you not eating porridge?'
c. kidi dur6o ?is-ete daa-da/-ju he porridge eat-PROG exist-NEG.3/INT.3.NEG 'Is/was he not eating porridge?'
d. kodi dur6o ?is-ete daa-da/-ju she porridge eat-PROG exist-NEG.3/INT.3.NEG 'Is/was she not eating porridge?'
e. wosi durbo ?is-ete doo-t-o we porridge eat-PROG exist-NEG-1PL 'Are/were we not eating porridge?'
f. jesi dur6o ?is-ete dee-t-e you porridge eat-PROG exist-NEG-2PL 'Are/Were you not eat porridge?'
g. kidi dur6o ?is-ete daa-da/-ju
they porridge eat-PROG exist-NEG.3/INT.3.NEG
'Are/were they not eating porridge?'
[4.3] Interaction between negation and subject agreement marking/TAM
There is a close interaction between negation and subject agreement marking in Hamar. The language has a set of subject agreement suffixes that occur only in negative verbs. Note that subject agreement in affirmative sentences is indicated by means of cliticised pronouns. The agreement suffixes generally occur immediately following the negative suffix $-t$-. The subject agreement morphemes for first and second person are listed below:

| Negative |  | Affirmative |
| :--- | :--- | ---: |
| 1SG | -i | ?i- |
| 2SG | -a | xi- |
| 3MS | - | ki- |
| 3FS | - | ko- |
| 1PL | -o | wo- |
| 2PL | -e | je- |
| 3PL | - | ki- |

The situation with the third person agreement marker is a little complicated. In Hamar, the third person verb form remains the same for 3MS, 3FS and 3PL. Due to what seems to be a historical process of the deletion of some of the morphemes, the third person verb form appears different. On this basis, this study proposes a portmanteau morpheme analysis for the sentence type and negation morphemes which occur in the third person verb form. Accordingly, a portmanteau analysis is suggested for the following morphemes:

```
-je DECL.3.NEG
-ju INT.3.NEG
-da NEG. }
```

In short, the close interaction between negation and subject agreement mark-
ing in Hamar is shown on two levels. On the one hand, there is a separate set of agreement marking morphemes used in the negative for first and second persons. On the other hand, in the interrogative paradigm of the perfective and progressive aspects, the portmanteau morpheme -da expresses both negation and third person simultaneously. Similarly, the morphemes -je and -ju signify sentence type, negation and person marking simultaneously. Although further investigation is needed on the diachronic aspects of the subject agreement markers, a comment is warranted on their historical development and status. Most importantly, it is worth mentioning that the set of agreement morphemes seem to be archaic morphemes which are kept in negative constructions, since negative verbs are less affected by innovation than affirmative ones. Similar findings have been reported for the closely related Omotic language Zargulla by Azeb (2009) and in Canadian French by Poplack (2001).

Close interaction between TAM (Tense, Aspect, Mood) and negation is also observed in Hamar. The number of tense/aspect categories in the affirmative is reduced to three in the negative. These are the perfective, which is marked by $a a-$, the imperfective, which is marked by $-a$ - and the progressive, which is marked by -ete. Thus, some of the tense/aspect categories in the affirmative are neutralised in the negative. According to Payne (1985), the reduction of an inflectional category in the negative is cross-linguistically attested in the Uralic language Livonian, which is described as neutralisation.

Most importantly, when one compares affirmative and negative constructions in Hamar, a greater difference is to be found between the two than a simple suffixation of the negative morpheme -t-. Accordingly, Hamar has an asymmetric negation system, in line with the typological classification provided by Miestamo (2005). Interestingly enough, Hamar exhibits two sets of subject agreement markers and tense/aspect categories for affirmative and negative sentences.
[5] NEGATION IN NON-VERBAL, EXISTENTIAL AND IMPERATIVE CLAUSES

Hamar uses the same negative morpheme -t- to mark negation in all non-verbal sentences (Binyam and Moges 2014). In other words, the language uses the same strategy for standard negation and non-verbal sentences. This is reported to be less common typologically. Therefore, the direct similarity in the use of negation strategy across languages like Hamar clearly supports Eriksen's (2011) claim that the two sentence types should be analysed as subtypes of the same phenomenon. Examples are provided below:
(31) a. Rinta hamar-ne

I Hamar-DECL
'I am Hamar.'
b. Rinta hamar-te

I Hamar-NEG
'I am not Hamar.'
a. Pinta hamar-u

I Hamar-INT
'Am I Hamar?'
b. Pinta hamar-ta-ju

I Hamar-NEG-INT
'Am I not Hamar?
The morpheme -te in (31b) and -ta in (32b) are added to the nominal predicate to mark negation.

Existential clauses use suppletive verbs in the affirmative and negative. The existential verb daa- 'exist' and q'ool- 'not_exist' are employed. Unlike nonverbal clauses, the negation of existential predicates is different from standard negation in Hamar, which is the most common approach cross-linguistically (Vaselinova 2013). The strategy used in Hamar falls into the type which Vaselinova (2013:112) described as a 'prototypical difference', in the sense that it 'involves a complete formal and constructional difference between the expressions used'. Consider the following examples:
a. Pinta q'uli daa-ne
I goat exist-DECL
'I have a goat.'
b. ?inta q'uli q'ool-e

I goat not_exist-DECL
'I do not have a goat.'
In the imperative mood, the verb gar- 'leave/avoid' is used together with the main verb to show negation:
a. wut'-aa 'drink!'
drink-IMP.2SG
b. wut'-an ${ }^{5}$ gar-aa 'do not drink!'
drink-? avoid-IMP
[5] The exact role of the element -an needs further investigation in the future.

| a. | wutf'-ee | 'drink!' |
| :--- | :--- | :--- |
|  | drink-IMP.2PL |  |
| b. wutf'-an gar-ee | 'do not drink!' |  |
|  | drink-? avoid-IMP.2PL |  |

[6] SUMMARY
According to Payne's (1985) typological classification, Hamar has morphological negation. Negation in verbal and non-verbal main clauses in Hamar is expressed by the morpheme $-t-$. The use of the same negation marker in verbal and non-verbal main clauses is less common cross-linguistically (Miestamo 2005).

Hamar has a separate set of subject agreement markers which occur only in the negative constructions. Their affirmative counterpart uses shortened/cliticised pronouns to mark subject agreement. It is probable that the affirmative verb forms have lost the agreement suffixes which have been preserved by the negative constructions, cf. Zargulla in Azeb (2009). Poplack (2001) in her study of Canadian French, for example, argues that affirmatives are more affected by innovation than negatives. In other words, older inflectional forms are retained more in negative constructions.

Close interaction between negation and tense/aspect marking has been observed in Hamar. For five tense/aspect categories in the affirmative, only three aspectual paradigms have been found in the negative. These are the perfective, imperfective and progressive paradigms. This is a clear example of the neutralisation of tense/aspect categories in the negative, which is also reported crosslinguistically, cf. Payne (1985).

In all three of the negative verb paradigms, the third person verb forms were found to behave differently from the other verb forms. In this study, they are considered as marked and the negative suffix $-t$ - does not generally occur in the third person verb form. This is in line with the case in many Omotic languages, cf. Aari, Hayward (1990), Koorete, Binyam (2010), Dime, Fleming (1990), in which the third person verb forms behave differently from the others, and this may have something to do with their frequency of use and functional markedness. Negative existential sentences use suppletive verbs in Hamar. Finally, negation in imperative clauses is shown by means of a phrasal construction using the verb gar- 'avoid/leave'.

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## SYMBOLS AND ABBREVIATIONS

| 1 | first person |
| :--- | :--- |
| 2 | second person |
| 3 | third person |
| AUX | auxiliary |
| DECL | declarative |
| F | feminine |
| IMP | imperative |
| INT | interrogative |
| IPFV | imperfect |
| M | masculine |
| NEG | negation, negative |
| PFV | perfective |
| PL | plural |
| PRES | present |
| PROG | progressive |
| PST | past |
| REM | remote past |
| SG | singular |

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# ASPECTS OF THE MORPHOPHONOLOGY OF 

HAMAR

MOGES YIGEZU

## ABSTRACT

Hamar is a member of the Aroid group of languages spoken by around 46,000 individuals (CSA 2008). The Hamar live in the plain lands of the semi-desert region of the rift valley in the south western corner of Ethiopia, in the South Omo Zone of the Southern Nations, Nationalities and Peoples Region (SNNPR). Their subsistence can be characterized as a mixture of pastoralism and shifting agriculture. The earliest attempts at describing the language were made available through the publications of Conti Rossini (1927) and Da Trento (1941), who provided a few comparative lists of words and grammatical sketches. Over the last few decades, however, some progress has been made in describing aspects of the structure of the language, and these include: Lydall (1976, 1988, 2000), Mary (1987), Getahun (1991), Cupi et al (2013), Binyam \& Moges (2014), and Moges \& Binyam (2015). Only Lydall (1976), Mary (1987) and Moges \& Binyam (2015) briefly described the phonology, the latter with the aim of designing an orthography for the envisaged mother tongue education in the Hamar language. This contribution is a follow up to these previous efforts and it tries to describe aspects of the morphophonology of Hamar. In doing so, the paper gives a concise summary of the sound pattern of the language, focusing on the syllable structure, phonotactic constraints and word structure conditions that regulate the morphophonemic alternations. Three processes are found to be widespread in the morphophonology of the language: the spreading of nasality, the spreading of place of articulation and the spreading of manner of articulation. While nasality spreads from right to left, the spreading of place and manner features takes place from left to right.

## [1] INTRODUCTION

This paper describes the morphophonology of Hamar language. The term morphophonology is used here to refer to the description and analysis of morphophonemic alternations (Trask 1996:229) prevalent in the Hamar language. It also gives a concise description of the sound pattern of Hamar, as a background to the discussion on the morphophonemic alternations exhibited in Hamar word formation processes.

The Hamar live in the rift valley region of south western Ethiopia and their
territory stretches from the lower Omo valley in the west across the rift valley of Chew Bahir in the east. To the south their border coincides with the Dassanach and the Kenyan border and to the north they are bordered by their closest kins - the Benna and the Aari.

The language is called Hamar Apo by its speakers, which means "mouth of the Hamar". The Hamar use different names to refer to their neighbours. Murso for the Surmic Mursi, Bume for the Nilotic Nyangatom, Muguji for the Surmic Koegu, Galab for the Cushitic Dassanach, Marale or Ulde for the Cushitic Arbore. The population of Hamar, according to the 2008 national census, is estimated to be 46,000 individuals. Their subsistence can be described as a mixture of pastoralism (keeping cattle, goats and sheep near the Omo valley) and shifting agriculture, i.e. planting sorghum, maize and beans. Although the Hamar appear to lead an ageless, unchanging way of life and established religions such as Islam and Christianity are noticeable only by their absence (Lydall, 1980:147), recently this trend has been changing and, according to our informants, around 100 youths have been converted to Christianity over the past decade.

## [2] PREVIOUS STUDIES ON HAMAR

Some earlier studies and sketches have been mentioned above. These include: Conti Rossini (1927) who published a few grammatical data and a word list; Da Trento (1941) recorded a comparative list of sixty words in Hamar and other neighbouring languages; and Cerulli (1942) who commented on Da Trento and Conti Rossini's contributions.

Over the past few decades some progress has been made in describing aspects of the grammar of the language. Lydall's (1976) article entitled "Hamar" was a grammatical sketch that describes the phonology, morphology and syntax of Hamar in brief. The article, which is quite informative, has for a long time been the only source on Hamar grammar. Later, Lydall published two more studies on Hamar entitled "Gender, Number, and Size in Hamar" (1986) and "Having fun with idiophones: A sociolinguistic look at idiophones in Hamar, Southern Ethiopia" (2000). In the former, Lydall describes how Hamar nouns express gender, number and size with respect to the gender orientation of the society and in the latter she discusses the idiophones of Hamar from a sociolinguistic perspective. The contributions of Lydall were followed by Mary (1987), a senior essay entitled "Hamar Phonology". This paper was partly a duplication of Lydall's paper and provides little linguistic information. Another descriptive study was Getahun (1991), "The Structure of Noun Phrase in Hamar", in which the author described the noun phrase structure of the lan-
guage within the generative framework. Moges (1999) is unpublished baseline research that describes the basic elements of the language. Cupi et al (2013) entitled "Preliminary notes on the Hamar verb" presents a partial and preliminary description of some verbal forms of Hamar. Recently, two more papers have been published: Binyam \& Moges (2014), the description of copula constructions in Hamar, followed by Moges \& Binyam (2015), "The orthography of Hamar" with an update on the phonology. There are also some historicalcomparative studies made on the Aroid group of languages which includes Hamar ${ }^{1}$. This paper's contribution on the morphophonology of Hamar is part of a larger research undertaking on the grammar of Hamar, under the NORHED Project "Linguistics Capacity Building - Tools for the inclusive development of Ethiopia".

## [3] THE PHONOLOGICAL STRUCTURE OF HAMAR

In this section, the consonant and vowel phonemes, the word structure, the syllable structure and the phonotactic constraints will be discussed in brief.

## [3.1] Consonants and vowels

Hamar has 30 consonant phonemes that include voiceless stops /p, t, k, $\mathbf{~ /}$, voiced stops $/ \mathrm{b}, \mathrm{d}, \mathrm{g} /$ ejectives $/ \mathbf{s}^{\prime} \sim \mathbf{t}^{\prime}, \mathbf{t f}^{\boldsymbol{f}}, \mathrm{q}^{\prime} /$ and implosives $/ 6, \mathfrak{d}, \boldsymbol{g} /$. In the stop series, Hamar has a four-way contrast between voiceless stops, voiced stops, ejectives and implosives. Fricatives $/ \Phi, \mathbf{s}, \mathbf{z}, \int, \chi, h /$, affricates $/ \mathbf{t s}, \mathbf{t} \int, \mathrm{d}_{\mathbf{3}} /$, nasals $/ \mathbf{m}, \mathbf{n}, \mathrm{y}$ and $\mathrm{n} /$, liquids $/ \mathbf{r}$ and $\mathrm{l} /$ and approximants $/ \mathbf{w}$ and $\mathrm{j} /$ are also part of the phonemic inventory of the language. The alveolar ejective $/ \mathrm{t}^{\prime} /$ and the alveolar ejective fricative $/ \mathrm{s}^{\prime} /$ are used interchangeably. It seems that the two consonants are in the process of merging into one in Hamar. In most cases, the fricative ejective occurs. The distribution of these sounds looks partly dialectal, in the sense that in the Hamar dialect where / $\mathbf{t}$ '/ is used in some words, the corresponding consonant in the Benna dialect is the alveolar fricative ejective /s'/. For example, in kut'o 'vulture' in Hamar is pronounced as kus'o in Benna, but this issue is beyond the scope of the present study ${ }^{2}$.

[^16]
table 1: Consonant Phonemes of Hamar.

Of the 30 singleton consonants identified as phonemes of Hamar, seven consonants $/ \mathbf{s}^{\prime} \sim \mathbf{t}^{\prime}, \mathbf{g}, \mathbf{h}, \mathbf{t s}, \mathbf{t} \mathbf{f}, \mathbf{d} \mathbf{3}, \mathbf{n} /$, shown in parenthesis in Table 1 above, are marginal consonants found in a handful of vocabularies. The frequency count made on 2143 tokens, based on 350 basic vocabularies and a six-minute story recorded by native speakers, have shown that these consonants are marginal and found in less than a dozen tokens from the total number of tokens (Moges and Binyam 2015:6-7).

Gemination of consonants is phonemic but not all consonants can be geminated. As shown in the consonant chart in Table 1 above, seventeen consonant phonemes can be geminated, while the remaining thirteen consonants are not geminated. Particularly the implosives, the ejectives, except / $\mathbf{q}^{\prime} /$, and the glottal consonants $/ \mathbf{T} /$ and $/ \mathrm{h} /$ are among those that are not geminated.

In terms of the distribution of the consonant phonemes, there are fewer restrictions. All voiceless stops, voiced stops, implosives and ejectives are found in all positions within a root or a word. The glottal stop occurs only in word

[^17]initial and medial positions; it is absent from the final position of a word. The sonorants (nasals, trills, liquids and glides) are also found in all positions within a word. An exception is the velar nasal /y/ which cannot appear word initially. Among the nasal consonants, the bilabial and alveolar nasals have a wide range of preconsonantal occurrences, as shown below under phonotactics (Section 3.5).

Hamar also has a fairly complex vowel system, with two sets of vowels that can be distinguished by [ATR] feature. Lydall (1976) recorded a ten-vowel system for Hamar; and Moges (2007:249) reconstructed a ten-vowel system for Proto-Aroid and states that "Proto-South-Omotic or Proto-Aroid must have had a ten-vowel system, which may be distinguished by the feature [ATR]". Vowel length is also phonemic but only the [+ATR] vowels can be lengthened:

figure 1: The Vowel Phonemes of Hamar.
The consonant and vowel phonemes discussed above are largely in agreement with an earlier study, namely "The orthography of Hamar" by Moges \& Binyam (2015). The only difference in terms of type and number of phonemes is the status of the labio-velar /f/ which was recorded as a phoneme in the earlier study, whereas in this study a closer look has shown that it is a voiceless bilabial fricative $/ \phi /$.

## [3.2] Pitch

A cursory analysis of pitch in Hamar shows that Hamar is indeed a register tone language with two tone levels, high and low. In our data, high tone is marked with an acute accent ['] and low tone with a grave accent [']. Unidentified tone is unmarked. The following minimal and near minimal pairs may illustrate the contrast between the two tone levels:

| (1) dáá | 'pot/jar' | Zùlò | 'back' |
| :---: | :---: | :---: | :---: |
| dàà | 'to live' | Zùló | 'level ground' |
| t'áá/s'áá | 'to vomit' | bùlàà | 'open! 2sg. Imp' |
| t'àà/s'àà | 'to milk' | bùláá | 'prostitute' |
| ss 1 | 'fine dust' | dèzesá | 'grind! 2sg. Imp.' |
| ss 1 | 'nine' | dèz̀sà | 'kill! 2sg. Imp' |
| ع́Énà | 'men' | àyq'ásí | 'bee' |
| éná | 'in the past' | àyq'àsì | 'child of a goat' |

A detailed and comprehensive analysis of the tone pattern in Hamar, however, awaits further investigation.

## [3.3] Word structure

Hamar word structure can be characterized as having monosyllabic verbal roots and dominantly disyllabic non verbal roots. In what follows, we shall first consider a brief description of the prosody of words in different grammatical categories such as nouns, verbs, adjectives, adverbs, pronouns, Wh-words, post positions, numerals and demonstratives, and then look at the general pattern. The data base used for this analysis contains 1000 lexical items for all word classes.

## Nouns

With regard to the canonical form of simple nouns there are two main types of nouns, namely those ending in a vowel and those ending in a consonant. Those ending in a vowel, when elicited in isolation, carry a terminal vowel (TV). Most nouns which carry these terminal vowels in their citation form drop the vowels when an inflectional or derivational suffix is added to the root form. Examine the following data in (2) that show simple nouns with terminal vowels against the corresponding plural forms to which an inflectional morpheme (the plural marker -na or -no) is added:

| (2) | Simple nouns | Gloss | Plural forms |
| :--- | :--- | :--- | :--- |
| q'àm-í | 'ear' | q'àmmá < q'am-na | 'ears' |
|  | $d_{\Lambda}$ b-ín | 'animal' | d^ 'mmá < d $\Lambda$ b-na | 'animals'

In Hamar the general pattern for number marking in nouns is expressed by attaching the suffix -na for countable nouns and -no for uncountable nouns, as in /?àn/ 'arm/hand', /Ràn-ná/ 'arms/hands'; /isin/ 'sorghum', /isin-o/ 'a stock of sorghum'. In the process of marking the plural forms of nouns, different phonological processes involve creating a phonologically acceptable word that confirms to the phonotactics of the language. See section 4 below for the discussion on morphophonemic processes.

In a few cases, the terminal vowels are not deleted even when an inflectional or derivational affix is attached to the root form. Examine the data in (3) below. In these examples, the terminal vowels remain when a suffix is added to the root noun, perhaps due to phonotactic reasons. For instance, in àp-i-ná without the TV, the final output would result in impermissible sequences of consonants, i.e., an obstruent followed by a sonorant. Hence, the form *apna is not an acceptable word in the language:

| (3) | Singular | Gloss | Plural | Gloss |
| :---: | :---: | :---: | :---: | :---: |
|  | àp-í | 'eye' | àpí-nà | 'eyes' |
|  | nùq'-ó | 'water' | nùq'ó-nò | 'some water' |
|  | pèt $\mathrm{S}^{\prime}$-é | 'bean' | pèt ${ }^{\text {cé-nò }}$ | 'some beans' |
|  | ànz-á | 'girl' | ànzá-ná | 'girls' |
|  | mesk-i | 'brain' | meski-na | 'brains' |
|  | haaq-a | 'tree' | haaq'a-na | 'trees' |

Examine also the following simple roots ending in a consonant in example (4) below. The consonant ending nouns consist solely of the root form.
(4) ?àn 'hand/arm' ws jlı im 'heart'
$\int_{\Lambda}$ in 'urine' àb 'other'
pànáq' 'frog' a tá6 'tongue'
dàlq 'news' mò 'chin'
It appears that many of the consonant ending nouns do not have more than
two syllables and this fact has also been observed in Aari (Hayward 1990), a language closely related to Hamar. By and large, the simple nouns extending to three syllables are those in which the third syllable is the terminal vowel. This fact would lead us to conclude that simple nominal roots rarely exceed two syllables in length, and this in turn reduces the canonical form of Hamar simple nouns to the disyllabic type. Although most nouns in Hamar are disyllabic in nature, there are a few nouns extending to three syllables: dìbìnì 'ashes'; bòq'òló 'corn' (Amharic borrowing); sìlàlè 'dust'; kùtòbo' 'fly'; q'ùjùm6a' 'horn'; દ̀z̀zìnì 'star'.

The feature of dropping a terminal vowel when a suffix is added to the root noun is a widespread phenomenon in Omotic languages (cf. Hayward 1990 on Aari, Fleming 1990 on Dime). North Omotic languages (and dialects) such as Gamo, Gofa and Dawro are also reported to have the feature of terminal vowels (Hirut 2004). At this stage the issue is far from clear. One possible analysis is to consider the terminal vowels as part of the lexical property of the root, since the quality of the final vowel is unpredictable and there is no discernible pattern in the data at hand. Hayward (1990) and (2001) presents an extensive discussion on terminal vowels in Omotic languages and argues that they do not belong to the root nouns. Rather they seem to be separate and independent of the root noun. Hayward (2001) also classifies the terminal vowels into "stable" and "unstable" terminal vowels, based on the data from languages of the Ometo cluster.

The grammatical function of the terminal vowel is far from clear. At least in Hamar, the terminal vowels cannot be considered as gender markers, for instance, since they are found on both semantically masculine and feminine nouns. They cannot be considered singulative markers either in the sense the term is usually understood, i.e. they do not mark or indicate one item from the group. They also do not seem to mark definiteness, since definiteness is consistently marked by -t- and -to- for masculine and feminine nouns respectively, as in gòygòl-á 'canoe', gòygòl-t-á 'the canoe' (masc. definite), gòygòl-tó-nó 'the canoe' (fem. definite) (See Moges 1999). Following Hayward (1990), we assume for the time being that the final vowels are to a certain extent independent of the root noun and we may consider vowel ending nouns as bipartite in structure. The nature and function of the terminal vowels in Hamar and in the wider Omotic family calls, however, for an in depth analysis of the issue on its own.

Hamar simple nouns, therefore, display the following syllable types:

## (5) Syllable type Example Gloss

V à.pí 'eye'
VV èغ̀.zì.nı̀ 'star'
VC àn.zá 'girl'
CV q'à.mí 'ear'
CVV pee 'country'
CVC 3àn 'hand/arm'
CVCC dàlq' 'news'

Comparison of the structure of simple nouns with pronouns and numerals shows a slightly different pattern. Pronouns and numerals display only two of the syllable types observed in simple nouns, namely, the CV and CVC types. All pronouns and numerals begin with a consonant and both mono and disyllabic forms are identified in our data. Adjectives also behave like pronouns and numerals in the sense that they begin with a consonant. They also display mono and disyllabic forms but the semantics of the adjectives include the copula and simple adjectives are read as "it is ...". For example, the word for 'red' dè̀r is read as 'it is red'. Some examples are given below under (6) and (7) for pronouns and numerals as well as for adjectives respectively:
(6) Pronouns
Syllable types Example Gloss
CVC.CV
CV

| CV.CV | kìdì | 'he' | CVC.CVC | màkkàn | 'three' |
| :--- | :--- | :--- | :--- | :--- | :--- |
| CV.CV | kòdì | 'she' | CVC.CV | 1òjdì | 'four' |
| CV.CV | wòdì | 'we' | CVC | dò̀ | 'five' |
| CV.CV | j^ dì | 'you | CVC | làx | 'six' |
| CV.CV | kìì̀ | (pl.)' | 'they' | CV.CV | tòbà |
| 'seven' |  |  |  |  |  |

## (7) Adjectives

Syllable type Example Gloss

| CV | mo.ra | 'blue' |
| :--- | :--- | :--- |
| CVC | dìt' | 'full' |
| CVCC | bàr | 'young' |
| CVVC | dèz̀r | 'red' |
| CVV | t'z̀z̀.rì | 'deep' |

## Verbs

The simplest form of the verb in Hamar is the second person imperative form in which the vowel -a is suffixed to the root verb. In simple verb forms, as in imperative forms, the syllable types V, VV, VC, CV, CVV, CVC and CVVC occur. Some examples are the following:
(8) Syllable type

## Example Gloss

VC.V àf-à 'hide! (2sg. Imp.)'
VV.CV èz.là 'call! (2sg. Imp.)'
VC.CV à.k-á 'make/do! (2sg. Imp.)'
CVV tfá-á 'clap! (2sg. Imp.)'
CV.CV jí.2-á 'go! (2sg. Imp.)'

CVC.CV kùm.m-á 'drink (for blood)! (2sg. Imp.)'
CVV.CV màà.t-á 'return! (2sg. Imp.)'
CVVC.CV dòòr.q'-à 'sit down! (2sg.Imp.)'
By contrast, the vast majority of verb roots in Hamar are monosyllabic in their structure having the canonical structure of (C) V (V) (C1) (C2) - as shown in example (9) below:


Demonstratives and adverbs
Demonstratives show both open and closed syllable types and the syllable types
are V, CV, CVV and CVC. Adverbs comprise both open and closed syllables; although many of the forms are monosyllabic they also display disyllabic and multisyllabic words. The syllable types attested in adverbs are CV, CVC and CVV:
(10) Demonstratives

Syllable Example Gloss type CV kà 'this'
V.CV àgà 'that'
CV.CV kìrà 'these'
V.CV.CV ìgìrà 'those'

CVV sàà 'there'
CVC ks $\int$ 'this, here
(M)'

Adverbs
Syllable Example Gloss type
CV
CVC
CVV

Wh-words and post positions
Wh-words have both mono and disyllabic forms and the syllable types displayed in the forms include V, CVV, CVCC, CV and CVC. Both open and closed syllables occur within a word. Post positions display a few syllable types of both open and closed. They are also mono and disyllabic forms:
(11) Wh-words

| Syllable <br> types | Examples | Gloss | Syllable <br> types | Examples | Gloss |
| :--- | :--- | :--- | :--- | :--- | :--- |
| V.CVV | ajii | 'who?' | VV | ì̀ | 'in' |
| CVV | haa | 'when?' | VVC.CV | iinte | 'inside/in' |
| CVCC | harr | 'what?' | CV | tfó | 'under' |
| CVC.CV | hatte | 'how?' | CVV | baa | 'on/high |
|  |  |  |  |  | up' $^{\text {Cò }}$ |
|  | hàrnà | 'why?' | CVC | dar | 'on' |

As a rule, the canonical word structure in Hamar is (C) V (V) (C) (C). Accordingly, the prosodic structure of Hamar words display the following syllable types: V, VV, VVC, VC, CV, CVV, CVC, CVVC and CVCC.

The most common syllable types are the CV and CVC, which are found in all word categories. Pronouns and numerals display only these common syllable types. All word categories demonstrated both open and closed syllables. The most complex syllable type, with an onset and a complex coda, is found in nouns, adjectives and Wh-words whereas a syllable type with a branching nucleus is displayed in verbs, adjectives and Wh-words.

Generally, unlike the case in many Omotic languages, words can end in a vowel or in a consonant. Words can begin either in a vowel or a consonant. All consonants, except for the velar nasal $/ \mathbf{y} /$, can appear at the beginning of a word. All vowels both short and long can appear word initially, medially and finally.

## [3.4] The syllable structure

The syllable template of Hamar consists of an optional non-branching onset, followed by a branching nucleus and an optional but branching coda: (C) V (V) (C) (C). According to this template, the only obligatory element is the nucleus, while the onset and the coda are optional.

figure 2: The Syllable template of Hamar.
The nucleus which contains a long vowel or a diphthong will be analysed as containing a peak ( P ) and an adjoining satellite ( Sa ). The Sa is optional so that a short vowel is simply a nucleus consisting of a bare peak. The coda can also branch having a maximum of two consonants. There are no restrictions on the type of consonants that occur in coda position; all consonants may assume the coda position when coda is non-branching. As for the onset only single consonants may appear in that position and syllables may begin either in a vowel or in a consonant.

Hamar word structure displays the following syllable types:

| (12) | Syllable Type | Example | Gloss |
| :--- | :--- | :--- | :--- |
| V | a.po | 'mouth' |  |
| VV | ì̀ | 'body' |  |
| VC | ar̀.pì | 'moon' |  |
| VVC | iin.te | 'inside/in' |  |
| CV | kà | 'this' |  |
| CVV | dáá | 'pot' |  |
| CVC | Sìn | 'urine' |  |
| CVVC | d 'èr | 'red' |  |
| CVCC | dàlq' | 'news' |  |

A branching coda is also part of the complex rhyme in order to subsume clusters of non-identical consonants as well as geminated consonants occurring at medial and final positions within a word. This implies that Hamar allows su-per-heavy syllables, both word medially and word finally. Hamar is a language that permits a sequence of vowel length and a geminate consonant which means that there are more than three segmental positions within the rhyme of the syllable. Hence, Hamar syllables contain maximally three segments in the rhyme word-internally as shown in (13) below:

| (a) | CVV.CV | poo.li | 'tortoise' |
| :--- | :--- | :--- | :--- |
|  | CVVC.CV | pool.la | 'tortoises' |
| (b) | CVV.CV | zaa.ni | 'rope' |
|  | CVVC.CV | zaan.na | 'ropes' |
| (c) | CVV.CV | baa. $\int a$ | 'chicken' |
|  | CVVC.CV | baaf.fa | 'the chicken' |
| (d) | CVVCCV | dòòr.q'á | 'sit down' |
|  | CVVCCV | tiin.ta | 'take' |

## [3.5] Phonotactics

The phonology of Hamar imposes a number of restrictions on the cooccurrence of consonant phonemes. As a rule, clusters can occur word medially as well as word finally, and no word begins with a cluster of consonants. The word medial consonant clusters occur across syllables.

The permissible combinations of consonant clusters at word medial positions can be divided into four types:
(i) Type I: Sibilant +C , where sibilants $/ \mathrm{s} /$ and $/ \mathrm{S} /$ are followed by a consonant
(ii) Type II: Nasal Clusters ( NC ): a nasal consonant followed by homorganeous obstruent
(iii) Type III: Liquid Clusters (LC): a liquid followed by other sonorants
(iv) Type IV: N or L followed by a geminate obstruent

The description of each type of clustering is given as follows.

## Type I Clusters: Sibilant followed by an obstruent

Type I clusters mainly contain a sibilant as the first member of the cluster and an obstruent as a second member. Some examples:
(14) Clusters Example Gloss
sk bı ská 'carry! (2sg. Imp.)'
sk q'àskì 'dog'
sp Wòspà 'crooked'
$\int k \quad$ gè k ká 'against, it is'
fp gòfpáh 'make beautiful'
Type II Clusters: NC Clusters, a nasal consonant followed by a homorganeous obstruent
Type II clusters consist of a nasal consonant as a first member of the cluster, in which case a nasal consonant is followed by a homogeneous obstruent. Some examples are as follows:
(15) Clusters Example Gloss
mp tàmpò 'tobacco'
mb kòmbá 'stick, cane'
m6 q'ùfùm6á 'horn'
$m \phi \quad$ gumфá 'hat'
nt Tìntá 'I'
nd ?ìndó 'my mother'
nt' g^nt'alá 'chisel'
nd $\quad \int_{\Lambda}$ ndá 'urinate! (2sg. Imp.)'
ns gànsà 'smell'
nz ànzá 'girl'
$n s ' \quad$ q'ùns'á 'break! (2sg. Imp.)'

| yk | bànkír | 'arrow' |
| :--- | :--- | :--- |
| $\mathrm{yq}^{\prime}$ | s'ì̀q'ré | 'charcoal' |
| ntf' | gàntf'á | 'slim/thin' |
| nf | hànfá | 'descend! (2sg. Imp.)' |

In Type II there is a further restriction on the choice of the second consonant in the cluster. That is, the second member of the cluster has to be homogeneous to the preceding nasal consonant.

As shown in Section 2.1 above, Hamar has four nasal consonants and they are all phonemic. Single nasals and homorganic nasal clusters contrast as in: q'àmí 'ear', q'àm6i 'dependant orphan'; q'àná 'beat! (2sg. Imp.)', q'àntà 'sorghum store'; lòòya 'shield', pèyká 'time', q'aná 'Maz³ name for vagina', q'àndzì 'cool'.

## Type III Clusters: LC Clusters

In Type III the sequence consists of a liquid as the first member of the cluster, followed by any consonant as a second member of the cluster. The LC clusters appear to be the most frequent type in the language. Apparently, the preferred consonants in C 1 positions seem to be the liquids. This is not surprising given the fact that as compared to the set of consonants filling the C 1 position, the liquids rank the highest in the sonority scale: ${ }^{4}$

| Clusters | Example | Gloss |
| :--- | :--- | :--- |
| Lp | hàlpá | 'knife' |
| lb | q'albi | 'leaf' |
| Lm | mùlmùlì | 'thigh (the inside part)' |
| Ls | bùls | 'gift for bride groom' |
| $\mathrm{l} \int$ | g^ lfá | 'make someone suffer' |
| rp | àrpí | 'moon' |
| rb | kirba | 'dance! (2sg. Mas. Imp)' |
| rt | kùrtìm6à | 'fear (n.)' |
| rd | àrdá | 'enter! (2sg. Imp.)' |
| rg | gùrgùr | 'crocodile' |
| rk | wàrkát | 'left' |
| rq' | dòòrq'á | 'sit down! (2sg. Imp.)' |
| r | durфi | 'fat (for person)' |

[^18]| rs | фàrsì | 'local beer' |
| :--- | :--- | :--- |
| rf | nàr | 'illness' |
| rm | عrmet | 'tear (n.)' |
| rn | hàrnà | 'why?' |
| rd3 | bárd3ó | 'God' |
| rt $f^{\prime}$ | q'òrtf'ì | 'throat' |

Conversely, when the first member of the cluster happens to be a glide, then the C2 position is always filled in by a liquid. Again this is in confirmation to the sonority hierarchy that the glides are more sonorous than the liquids. No cluster is found in which both members are liquids:

| Clusters | Example | Gloss |
| :---: | :---: | :---: |
| wl | tf'swli | 'white' |
| Jl | ws jlı ¢m | 'heart' |
| Js | q'àjsá | 'lose (sth.)' |
| Jm | kòjmó | 'money' |
| jd | pàjdá | 'count! (2sg |

Type IV Clusters: $N / L+$ Geminate Obstruent
In Type IV a sonorant (more specifically a nasal or a liquid) is followed by a geminated obstruent, creating in effect a sequence of three consonants. This is the result of the morphophonemic alternations taking place at a morpheme boundary:

| (18) | Clusters | Example | Gloss |
| :--- | :--- | :--- | :--- |
|  | rtt | màrttidi | 'I make $(\mathrm{sb})$ sell' |
|  | nss | q'anssídi | 'I make $(\mathrm{sb})$ hit' |
|  | rdd | àrddìdì | 'I make $(\mathrm{sb})$ enter' |
|  | rqq' | dòòrqq'ìdì | 'I make $(\mathrm{sb})$ sit down' |

The sequence of three consonants has been created as a result of the morphophonemic alternations that occurred in the process of causativization. The geminated consonant is the result of the assimilation processes that took place at a morpheme boundary in deriving the causative form of the verb. See section 3 below for the details of the morphophonemic alternations.

## Word final Clusters

Word final clusters are strictly sequences of a sonorant and an obstruent, i.e. C1 positions are filled in by sonorants and C2 positions are consistently occupied
by obstruents:

| (19) | Word final Clusters | Example | Gloss |
| :--- | :--- | :--- | :--- |
| Mp | womp | 'womb' |  |
| rf | nàr | 'illness' |  |
| Ls | bùls | 'gift to the bridegroom' |  |
| Lp | ùlp ùlp | 'to pass through holes' |  |
| Lt | gìdigàlté | 'mid night' |  |
| Lk | delk | 'a problem' |  |

Geminated consonants (C1C1), or sequences of identical consonants, display a parallel structure in their occurrence to that of sequences of non-identical consonants (C1C2). Most geminates occur word medially. Geminates can also occur word finally for a few consonants (mostly sonorants [ $\mathbf{m}, \mathbf{l}, \mathbf{r}$ ] and the alveolar fricative [s]). Word final geminates are more readily noticeable in idiophones. No word begins with a geminated consonant and not all consonants can be geminated in Hamar, as shown above under 3.1. Most of the geminate consonants occur in morphologically complex forms, and are obviously the result of consonant assimilation across morpheme boundaries. The consideration of morpheme internal contrasts suggests that underlying gemination is far less common. The following geminate examples are all morpheme internal:
(20) Example Gloss
tullo 'warm'
pıjja 'well'
makka n 'three'
puddo 'cotton'
konno 'granary'
matti 'barely'
badzd3e 'ritual'

## [4] MORPHOPHONEMIC PROCESSES

The most productive morphophonemic processes prevalent in the morphology of Hamar include nasalization, assimilation of place and manner of articulations, metathesis and sibilant harmony. Some of these processes are motivated or triggered by either the syllable structure conditions or the word structure well-formedness conditions.

## [4.1] Nasalization

The process of nasalization, i.e. the process of changing a non-nasal (in this
case an obstruent) into a nasal consonant, is a widespread phenomenon. The spreading of nasality, however, does not affect sonorant consonants; it only affects obstruents.

In number marking of nouns, the most productive number marker -na is suffixed to the root noun as in २àn 'hand/arm'; جàn-ná 'hands/arms'. The suffix initial consonant, which is a nasal, turns a non-nasal consonant, i.e. an obstruent, into a nasal consonant, as a result of the spreading of nasality that goes from right-to-left:

| bit-a | 'chief' | bin-na | 'chiefs' |
| :--- | :--- | :--- | :--- |
| jaat-i | 'sheep' | jeen-na | 'sheep (pl.)' |
| nuk-i | 'nose' | nuy-ya | 'noses' |
| méék-1́ | 'buffalo' | mééy-yá | 'buffalos' |
| wààk-íl | 'cow' | wàày-yá | 'cattle' |
| lees-i | 'corpse' | leen-na | 'corpses' |

In the first two examples given in (21) above, when the plural suffix is attached to the root form, the nasality feature spreads from the suffix initial consonant to the root-final obstruent, in effect altering the root final consonant to agree in nasality to the following consonant as in $\mathrm{tn}>\mathrm{nn}$. This process is triggered by the phonotactic constraint that the sequence -tn- is an impermissible cluster in the phonology. In the following examples, the -kn- sequence, which is created at a morpheme boundary by the word formation process of affixation, is changed to $\mathfrak{y y}$ sequence due to the spreading of nasality from right to left. This process is followed by a spreading of place of articulation from left-toright resulting in a complete progressive assimilation. Interestingly, while nasality spreads from right to left regressively, place of articulation spreads from left to right progressively.

Examine the data in (22) below, where nasality does not affect sonorant consonants but the spreading of manner of articulation alters the suffix initial consonant:

| Singular | Plural | Gloss |
| :--- | :--- | :--- |
| apal-a | apal-la < apal-na | 'cloth' |
| gùrgùr | gurgur-ra < gurgur-na | 'crocodile' |
| bòq'òl-ó | boq'ol-la < boq'ol-na | 'corn' |
| agil-i | agil-la < agil-na | 'baby' |
| pool-i | pool-la < pool-na | 'tortoise' |
| gigir-i | gigir-ra < girgir-na | 'jaw' |

Hence, when the verb root ends with a sonorant, the suffix initial consonant
agrees with the root final consonant in manner of articulation, as in rn > rr. This is a spreading of manner of articulation from left to right, progressively resulting in a geminate consonant.

On the other hand, when the root final sonorant is a nasal consonant (which has the same manner of articulation with the suffix initial consonant), the spreading of feature becomes that of place of articulation, as shown in (23) below:

```
(23) Singular Plural Gloss
am-i am-ma < am-na 'breast'
am-o am-mo<am-no 'field'
q'àm-ì q'am-ma<q'am-na 'ear'
```

In the above examples in (23), the spreading of place of articulation takes place from left to right, in which case the suffix initial consonant must agree in place of articulation with the preceding root final consonant as in $\mathrm{mn}>\mathrm{mm}$, again creating a geminated consonant.

The spreading of the feature nasality to a non-nasal consonant across a morpheme boundary can be schematically represented as follows:


FIGURE 3: Spreading of nasality.
The feature [+nasal] spreads from the suffix-initial nasal consonant to the next segment to its left, i.e. to the root final non-nasal consonant. As a result the association line linking the [-nasal] feature is de-linked.

## [4.2] The spreading of Place of Articulation

When the plural marker -na attaches to the root noun that ends in an implosive consonant, a sequence of 6 n or d n is created, an obstruent followed by a nasal. The spreading of place of articulation takes place from left to right, changing the sequence 6 n to 6 m . Nevertheless, the sequence of obstruentsonorant is a violation of the phonotactic structure. In order to conform to the phonotactic structure of the language the process of metathesis applies, chang-
ing the obstruent-sonorant sequence $6 m$ into a sonorant-obstruent sequence as in mb . The spreading of place of articulation from left to right is followed by the process of metathesis as in $6 n>6 m>m 6$. Examine the following data in (24):
(24) Singular Plural 'gloss'
kv`to 6-o' ko to 'm6a' 'fly'
tìra 6 -́ tìra m6a' 'liver'
tє sìb- $\quad$ t $\varepsilon$ sìm6a' 'axe'
6ıd-a bındo 'food'
tud-i tunda 'buttock'
ata6 atam6a 'tongue'
The representation of place assimilation rule in which the nasal agrees in terms of place of articulation with the preceding stop by sharing the place node, can be schematically shown as in figure 4 below:


Figure 4: Place assimilation.
The schematic figure in (4) captures the idea that the segment undergoing assimilation comes to share its PLACE node (PL) with the preceding sound. In other words, a cluster 6 m arises by assimilation from 6 n, so that the $/ \mathrm{m} /$ is identical to the /6/ in all its supra-laryngeal (S-L) features except manner. The nasal loses its PLACE and takes the PLACE node of the preceding stop.

In a nutshell, as shown in the preceding discussions, nasality spreads from right to left altering the root final consonant, so that an obstruent that immediately precedes a nasal consonant at a morpheme boundary must be replaced by the corresponding nasal. Often the spreading of nasality is followed by the spreading of place of articulation which spreads from left to right, i.e. in the opposite direction. In other words, while nasality is regressive, the spreading of place is progressive and this direction of change is consistent and it is the general pattern. With the sonorant ending roots, however, the process of nasaliza-
tion does not apply; rather it is the spreading of place and manner features that take place from left to right.

In the formation of homorganic nasals the spreading of place of articulation applies to ensure that an obstruent that immediately precedes the nasal consonant must agree in place of articulation. This is followed by the process of metathesis which is triggered by a phonotactic constraint.

## [4.3] The spreading of Manner of Articulation

## i) Causative verb

In the derivation of verbs, the causative form is derived from the verb root by attaching the suffix -t or -s to the root form of the verb. The two forms (allomorphs) seem to be conditioned phonologically, but there are also exceptions. The -s form attaches to the verb roots that end in sonorant consonants, while the $-\mathbf{t}$ form attaches to verb roots that end with vowels and obstruent consonants. Although the phonetic motivation for the distribution of the allomorphs is not clear, for the time being we consider the -t suffix as the underlying form of the causative morpheme, since it has a wider distribution.

Compare the following derivations in (25) below for the verbs wadim'work', ?al- 'ward off', and kumm- 'drink (for blood)', where the causative form $-s$ is attached to the verb root followed by a tense marker:
(25) Tìntá wadima 'I work'
?ìntá wadim-idi 'I worked'
?ìntá wadim-s-idi 'I make (sb) work'
Tala 'ward off'
Tal-s-idi 'cause to ward off'
Tìntá kùmmá 'I drink' (for blood)'
?ìntá kùmm-ídì 'I drank'
?ìntá kùmmí-s-ìdì 'I make (sb) drink'
Examine the following data in (26) below where verb roots that end in vowels attach the causative form -t followed by tense marker:
(26) Tinta tii-idi 'I took'
?inta tii-t-idi 'I make (sb) take'
2inta gi-idi 'I told'
?inta gi-t-idi 'I make (sb) tell'
?inta kurt-idi 'I feared'
?inta kurt-t-idi 'I make (sb) fear'

On the other hand, when the verb root ends in alveolar consonants such as [s] and [d], the root final consonant assimilates to the suffix initial consonant in manner of articulation resulting in a regressive total assimilation process. Examine the data in (27) below:

| Root verb | Gloss | Causative verb | Gloss |
| :--- | :--- | :--- | :--- |
| Ris- | eat | 2ittidi < Cis-t-idi | 'cause (sb.) to eat' |
| q'ad- | wear | q'attidi < q'ad-t-idi | 'cause (sb.) to wear' |
| s'ás- | vomit | s'áttídi < s'as-t-idi | 'cause (sb.) to vomit' |
| mars- | sell | marttidi < mars-t-idi | 'cause (sb.) to sell' |

As can be observed from the data in (27) above, the causative marker -t is suffixed to the root verb followed by the past tense marker -idi. In the process of affixation, the root final consonant assimilates to the suffix initial consonant, as in the following derivations: ?is-t-idi > Rittidi. The particular process involved in this derivation is assimilation of manner of articulation, in which the alveolar fricative [ $\mathbf{s}$ ] has been changed into an alveolar stop [ $\mathbf{t}$ ]. In other words, this is the spreading of manner of articulation from right to left regressively.

Interestingly, when the root verb ends in clusters of consonants involving the liquid as in mars- 'sell' and kurt- 'fear', the assimilation process results in a sequence of three consonants -rtt- word internally, in which case the first member of the cluster is a liquid followed by a geminated stop.

## ii) Definiteness

Definiteness is marked by suffixing -t-, -to and -na to masculine, feminine and plural nouns respectively. Examine the following examples:

| Masculine | Indefinite <br> agil-a | Definite <br> agil-t-a |
| :--- | :--- | :--- |
| 'a child(mas)' | 'the child (mas)' |  |
| Feminine | agil-no <br> 'a child (fem)' | agil-to-no |
| 'the child (fem)' |  |  |
| Plural | agil-la < agil-na 'children' |  |
|  |  | agil-la-na <br> 'the children' |

In agil-a the masculine marker is attached to the root form and in agil-no the feminine marker is attached to the nominal root. But in agilla (< agil-na the plural form), there is an assimilation of manner of articulation of the root final consonant to the following suffix when a plural suffix attached. In (29) below, the spreading of manner of articulation occurs at a morpheme boundary dur-
ing the word formation process:

| (29) | Root noun | Masculine definite | Feminine definite | gloss |
| :--- | :--- | :--- | :--- | :--- |
| baaf-a | baaf-fa | baaffa-to-no | 'chicken' |  |
| ànq'ás-ì | ànq'ás-sà | anq'ass-i-to-no | 'bee' |  |
|  | kojis-i | kojit-ta | kojit-to-no | 'calabash' |

In the first example of the masculine definite form, baaf-ta becomes baaf-fa and the sequence of $\int \mathbf{t}$ changes into $\iint$. In the second example, anq'as-ta becomes anq'as-sa, again st > ss. In the third case, the same change has occurred, i.e. $\boldsymbol{s t} \boldsymbol{>} \mathbf{s s}$. All the changes are cases of the spreading of manner of articulation from left to right progressively.


Figure 5: Manner assimilation.
The schematic representation in figure 5 shows that the segment undergoing assimilation shares its MANNER node with the following sound. In other words, a sequence $\boldsymbol{t t}$ arises by total assimilation from st, so that the segments become identical in all their supra-laryngeal features.

## [4.4] Sibilant harmony

Sibilant harmony is a well-formedness condition in nouns and verbs, which is also observed in many Omotic languages such as Aari, Basketo, Bench, Dime, Dizi, Mocha and Zayse (Hayward 1988, Azeb 2012). In Hamar when two or more sibilant consonants occur in a word, they must agree in terms in palatalization, either [+palatal] or [-palatal]:

```
(30) \intofi 'guest'
s'^ns'i 'to forge'
s'ásá 'vomit! (2sg. Imp)
s'os'i 'many'
\int^nfa 'sell! (2sg. Imp)
tf'atf'e 'roots'
```

The same process has also been observed in the derivation of the causative verb where the causative marker -t changes into $-\int$ following a root final palatal consonant as shown in (31) below:
(31) hànf-ídì 'I descended'
hànfí-f-ídì 'I make (sb) descend'
pof-idi 'I tore'
pofi- $\int$-idi 'I make (sb) tear'
mıtf-idi 'I finished'
$m \Delta t \int i-t \int-i d i \quad$ 'I make ( sb ) finish'
Once again this is the spreading of manner of articulation from left to right, progressively altering the suffix initial stop and changing it to a palatal consonant, so that it agrees with the palatal consonant within the root in terms of manner of articulation.
[5] SUMMARY
This study tries to describe the widespread morphophonemic alternations in Hamar morphology. A brief account of the phonological structure of the language focusing on syllable structure, phonotactic constraints and word structure conditions that regulate the morphophonemic alternations has also been given. The paper also describes the most common morphophonemic processes, such as nasalization, assimilation of place and manner of articulations, metathesis and sibilant harmony in the light of syllable based constraints and morpheme structure conditions. Three productive processes occurring at morpheme boundaries are the spreading of nasality from right to left, and the spreading of place and manner features from left to right.

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# THE ETHIOPIC SCRIPT: <br> LINGUISTIC FEATURES AND SOCIO-CULTURAL CONNOTATIONS 

RONNY MEYER

## ABSTRACT

During the last two millennia, a large corpus of texts were produced in the Ethiopic script. This ancient African writing system is peculiar to the Ethio-Eritrean region at the Horn of Africa, particularly to the Ethiosemitic language Ga`əz. The present paper is concerned with the origin, linguistic modification and spread of the Ethiopic script, as well as its sociocultural connotation vis-à-vis other scripts in the region. For this purpose, previous studies related to these topics have been assessed and summarised in a comprehensive description.

## [1] INTRODUCTION

From 1991 onwards, a substantial number of Ethiopian and Eritrean languages have been reduced to writing in either a Roman-based orthography, or in the Ethiopic script, which was first used to write the Ethiosemitic language Gə $\partial z$. The Ethiopic script originates from the South Arabian abjad (or consonant script; cf. [3.1]). Probably inspired by Indic scripts, it was modified to an alphasyllabary (i.e. a script whose graphemes represent CV sequences or plain consonants; cf. [3.1] for details), while additional syllabographs, and graphemes for numerals were created as a result of the Greek influence. In subsequent modifications, particularly when the Ethiosemitic language Amharic was written in this script, diacritics for labialised, palatalised, and spirantised consonants were invented. When the Ethiopic script was adapted for writing languages other than Gə`əz and Amharic in the $19^{\text {th }}$ and $20^{\text {th }}$ centuries, new syllabographs were created by modifying existing graphemes, and various conventions were developed to indicate vowel length and gemination.

Although Gə`əz ceased to be spoken as a native language after the \(8^{\text {th }}\) century AD, it was retained in the Ethiopian Orthodox Church as the language of liturgy. Moreover, a diglossic situation prevailed at the Christian Ethiopian royal court for several centuries in which Gə`zz functioned as the sole literary language, but with Amharic as the spoken lingua franca. Because of major politi-
cal, socio-cultural, and economic changes in the second half of the $19^{\text {th }}$ century, Amharic became the dominant Ethiopian language in print media, resulting in the use of Gə`əz being confined to the religious domain. Amharic, by contrast, was promoted as the official national language in Ethiopia to the disadvantage of all other Ethiopian languages. This situation only changed in 1991 when the current government granted all ethnolinguistic groups the constitutional right to use their native languages in official domains within their respective administrative units.

Due to its socio-historical evolution, the Ethiopic script is often associated with Ethiopian Orthodox Christianity and the ruling Amhara elite. Therefore, its use was not only disfavoured by Muslim Ethiopians, but also by formerly disadvantaged ethnolinguistic groups, who currently prefer to write their native languages in a Roman script to signal their linguistic and socio-cultural autonomy.

Beside comparative works, like Jensen (1925), Daniels (1997), Salomon (2000), Coulmas (2003), Comrie (2005), Rogers (2005), various detailed studies are concerned with the linguistic features of the Ethiopic script, in particular Ullendorff (1951a), Hammerschmidt (1994), Getatchew (1996), Ayele (1997), Hornus (2006), Meheretu (2006), Treis (2008), Azeb (2010) and Frantsouzoff (2010). Some of these studies also mention socio-cultural aspects associated with the script, like Azeb (2010), but most information on this topic is scattered in non-linguistic publications. The main conclusions drawn from the review of these studies will be presented as follows: following an outline of the origin of the Ethiopic script in [2], its basic linguistic features are presented in [3]. Major script modifications preceding the $19^{\text {th }}$ century are described in [4], while [5] is concerned with more recent modifications, due to the adaption of the Ethiopic script for writing Ethiopian languages other than Gə`əz and Amharic. Selective historical aspects regarding the spread of the Ethiopic script are discussed in [6], followed by an overview of other local scripts and comments on their sociocultural connotations in [7]. Finally, [8] summarises the main phases in the development and spread of the Ethiopic script.

## [2] ORIGIN OF THE ETHIOPIC SCRIPT

The emergence of the Ethio-Eritrean cultural region is often seen as being related to Aksum - the capital of a powerful Christian kingdom on the Horn of Africa between the $1^{\text {st }}$ and $8^{\text {th }}$ centuries AD. Aksum was an important regional centre that was also part of an extensive international trade network between the Mediterranean area, Southern Arabia, and the Indian west coast (cf. Sernicola \& Phillipson 2011:190-192; Phillips 2014).

The earliest written attestations in the Ethio-Eritrean region are Sabaic inscriptions from the $7^{\text {th }}$ or $8^{\text {th }}$ centuries BC in the South Arabian consonant script (cf. Avanzini 2007a:152; Müller 2007:156; Mcdonald 2010). ${ }^{1}$ As most of them contain linguistic features not found in Arabian Sabaic, it is assumed that the Ethio-Eritrean inscriptions represent a form of Pseudo-Sabaic that was composed by speakers of early Ethiosemitic (or a predecessor of Gə`əz) for whom Sabaic was a learnt - not a native - language (e.g. Drewes 1958:115; Müller 2007:156; Weninger 2011a:1115). ${ }^{2}$ Weninger (2011a:1115), thus concludes that Ethiosemitic was already being spoken when South Arabian migrants arrived in the Ethio-Eritrean region, i.e. their language, Sabaic, is not the immediate predecessor of Ethiosemitic as purported by received opinion (cf., e.g. Hetzron 1972:122-125; Marrassini 2011).

The Ethiopic script, whose earliest remnants in Gə`əz date back to a period between the \(1^{\text {st }}\) and \(3^{\text {rd }}\) centuries AD (Avanzini 2007a:153; 2007b:160), is clearly related to the South Arabian script (cf., e.g. Unseth 2008:358-359). \({ }^{3}\) Ullendorff (1951a:207; 1951b) considers monumental inscriptions from the \(3^{\text {rd }}\) and \(4^{\text {th }}\) centuries AD to be the earliest attestations of Ga`əz and consequently of the Ethiopic script, while Drewes \& Schneider (1976) propose an earlier date based on Proto-Gə`əz graffiti. Be that as it may, the Ethiopic script was substantially modified from an abjad to an alphasyllabary (for the terms, cf. Daniels 1997:1617; Salomon 2000:88) during the reign of King 'Ezana (AD 330-365/70). In AD 340, 'Ezana converted to Christianity, which subsequently became the state religion in the Aksumite kingdom (Hahn 2005:479). The newly established Ethiopian Orthodox Church started to teach reading and writing in Gə`əz (Haile 1976:339343); religious texts were translated from Greek into Gə`əz (cf. Weninger 2011b:1124). As Greek had been a lingua franca along the Red Sea coast for several centuries, it was also known in the Ethio-Eritrean region (cf. Voigt 2012:28-29). This is evidenced by several Greek inscriptions dating from 300 BC to AC 600 (Fiaccadori 2007:158; Avanzini 2007a:152-153), and Aksumite coins from the $4^{\text {th }}$ century AD, which were minted in Greek (Phillipson 2004:81). Intense language contact with Greek yielded the incorporation of Greek letters as

[^19]numeral graphemes into the Ethiopic script (cf. [3.2]), and probably triggered the change in the direction of writing and the invention of additional syllabographs (cf. [3.1]). ${ }^{4}$

In the typology of writing systems, the modified Ethiopic script and Indic scripts of the Brāhmī type belong to the same group, i.e. they are alphasyllabic (Daniels 1997:24; Salomon 2000:93-94; Coulmas 2003:152-155; Comrie 2005:1192; Rogers 2005:208; Avanzini 2007b:160; Frantsouzoff 2010:580-583; Voigt 2012:30). Although the similarity between the Ethiopic and Indic scripts has already been observed in the $19^{\text {th }}$ century, direct Indic influence appeared unlikely. Consequently, it was assumed that the vowel diacritics in the Ethiopic alphasyllabary are an indigenous Ethio-Eritrean innovation (cf. especially Salomon 2000:94; but also Dillmann 1857:19, 20 fn. 1; Jensen 1925:140; Hammerschmidt 1994:317; Ullendorff 1951a:81-82). Other possible influence, such as e.g. Christian missionaries (from the Middle East) (Littmann 1953:352) or India (Daniels 1997:24), did not gain much acceptance. ${ }^{5}$

Historical and archaeological research shows that India and the EthioEritrean region exchanged goods and had several cultural contacts during the times of the Aksumite kingdom and before it (Pankhurst 2007:142-143; but also Phillips 1997:448-451; 2014:254-255, 261). Nevertheless, Salomon (2000:93-94) argues that Indic alphasyllabaries differ to a certain extent from the two alphasyllabaries in Northeast Africa, being Ethiopic and the Meroitic (cf. Voogt 2010 for its features), such that these scripts should be considered independent parallel innovations - as long no proof is found of direct Indic influence on writing. However, inscriptions in an early Brāhmī script were found together with graffiti in the Ethiopic abjad in a cave at Soqotra dating back to a period between the $1^{\text {st }}$ and $3^{\text {rd }}$ centuries AD (Frantsouzoff 2010:583). Consequently, Frantsouzoff (2010:583) assumes that Indic scripts, particularly the Kharoṣthī script, influenced the Ethiopic alphasyllabary. ${ }^{6}$

[^20][3] BASIC FEATURES OF THE ETHIOPIC SCRIPT

## [3.1] From abjad to alphasyllabary

The Ethiopic script is closely related to the South Arabian script, which was in use from the early $1^{\text {st }}$ millennium BC until the $6^{\text {th }}$ century AD (Stein 2011:1042; Müller 1994). The South Arabian script is an abjad consisting of 29 consonant graphemes (Stein 2011:1047-1049) which were written from right to left or in boustrophedon (i.e. with alternating directions for each line) - the latter dominating in early Sabaic (Nebes 2007:153). The graphemes $\langle\mathrm{w}\rangle,\langle\mathrm{j}\rangle$, and rarely $\langle\mathrm{h}\rangle$ also function as matres lectionis marking word-final long vowels (Stein 2011:1049). Words are separated by a vertical bar (|).
table 1 shows the graphemes of the Ethiopic abjad with their South Arabian equivalents (cf. Daniels 1997:34; Naveh 2005:49-50; Stein 2011:1045; Weninger 2011b:1126). Most Ethiopic graphemes are transliterated into IPA symbols (cf. Weninger 2010 for the reconstruction of their phonemic value), except śand $d$ which probably represent IPA $\notin$ or ${ }^{\prime}$ ', respectively.

The twenty-four graphemes in the Ethiopic abjad are adapted from the South Arabian script (cf. Ullendorff 1951a:208 for details). In the Ethiopic script,〈w $\rangle$ and $\langle\mathrm{j}\rangle$ only rarely function as matres lectionis (Frantsouzoff 2010:583; Hammerschmidt 1994:317; Ullendorff 1951a:209). Except for a few early PseudoSabaic inscriptions (Frantsouzoff 2010:582), the writing direction in Gə`əz is consistently left-to-right (cf. Avanzini 2007b:160; Weninger 2011b:1125), probably due to Greek influence (Voigt 2012:33; Hammerschmidt 1994:317; Littmann 1953:352).

The subscript numbers attached to E (for Ethiopic) and SA (for South Arabian) in table 1 indicate the order of the graphemes in the respective scripts. Although the South Arabian sequence was known in the Ethio-Eritrean region, the Ethiopic graphemes occur in a different order, even if consonant sequences in shorter clusters (e.g. the initial four graphemes $h-l-\hbar-m$ in table 1 ) are identical to the South Arabian script (Frantsouzoff 2010:582). ${ }^{7}$ Ullendorff (1951a:210-211) discusses various reasons for this variation, but concludes that the order of graphemes in the Ethiopic script is "predominantly accidental" (cf. also Getatchew 1996:570). ${ }^{8}$

[^21]| Ethiopic Graphemes |  | South Arabian Equivalents |  |
| :---: | :---: | :---: | :---: |
| $\mathrm{E}_{1}$ | $\boldsymbol{v}\langle\mathrm{h}\rangle$ | Y $\langle$ h | $\mathrm{SA}_{1}$ |
| $\mathrm{E}_{2}$ | $\boldsymbol{n}$ (1) | T <l ${ }^{\text {¢ }}$ | $\mathrm{SA}_{2}$ |
| $\mathrm{E}_{3}$ | $\boldsymbol{d}\langle\hbar\rangle$ | $\Psi\langle$ ¢ $\rangle$ | $\mathrm{SA}_{3}$ |
| $\mathrm{E}_{4}$ | $\boldsymbol{\sigma 0}\langle\mathrm{m}\rangle$ | リ $\langle\mathrm{m}\rangle$ | $\mathrm{SA}_{4}$ |
| $\mathrm{E}_{5}$ | $\boldsymbol{\omega}\left\langle\left\langle{ }_{\text {st }}\right\rangle\right.$ | $3\langle 5\rangle$ | $\mathrm{SA}_{7}$ |
| $\mathrm{E}_{6}$ | $\langle\langle\mathrm{r}\rangle$ | כ $\langle\mathrm{r}\rangle$ | $\mathrm{SA}_{8}$ |
| $\mathrm{E}_{7}$ | ( $\langle\mathrm{s}\rangle$ | ${ }^{\text {n }}\langle\mathbf{s}\rangle$ | $\mathrm{SA}_{11}$ |
| $\mathrm{E}_{8}$ | $\boldsymbol{\phi}\left\langle\mathrm{k}^{\prime}\right\rangle$ | $\Phi\left\langle\mathrm{k}^{\prime}\right\rangle$ | $\mathrm{SA}_{5}$ |
| $\mathrm{E}_{9}$ | ( $\langle\mathrm{b}\rangle$ | $\Pi\langle\mathrm{b}\rangle$ | $\mathrm{SA}_{9}$ |
| $\mathrm{E}_{10}$ | $\boldsymbol{*}\langle\mathrm{t}\rangle$ | $\mathrm{X}\langle\mathrm{t}\rangle$ | $\mathrm{SA}_{10}$ |
| $\mathrm{E}_{11}$ | $\cdots\langle\mathrm{x}\rangle$ | Ч $\left\langle\right.$ ¢ ${ }^{\text {¢ }}$ | $\mathrm{SA}_{14}$ |
| $\mathrm{E}_{12}$ | \% $\langle\mathrm{n}\rangle$ | $4\langle n\rangle$ | $\mathrm{SA}_{13}$ |
| $\mathrm{E}_{13}$ | \% $\langle 1\rangle$ |  | $\mathrm{SA}_{18}$ |
| $\mathrm{E}_{14}$ | n $\langle\mathrm{k}\rangle$ | $\mathrm{H}\langle\mathrm{k}\rangle$ | $\mathrm{SA}_{12}$ |
| $\mathrm{E}_{15}$ | $\boldsymbol{\omega}\langle\mathrm{w}\rangle$ | (1) $\langle\mathrm{w}\rangle$ | $\mathrm{SA}_{6}$ |
| $\mathrm{E}_{16}$ | $\boldsymbol{0}\langle ¢\rangle$ | $\mathrm{O}\langle ¢\rangle$ | $\mathrm{SA}_{19}$ |
| $\mathrm{E}_{17}$ | H $\langle\mathrm{z}\rangle$ | H $\langle\delta\rangle$ | $\mathrm{SA}_{26}$ |
| $\mathrm{E}_{18}$ | $\boldsymbol{P}\langle\mathrm{j}\rangle$ | Q $\langle\mathrm{j}\rangle$ | $\mathrm{SA}_{27}$ |
| $\mathrm{E}_{19}$ | $\boldsymbol{P}\left\langle\mathrm{d}^{\prime}\right\rangle$ | - $\langle$ d $\rangle$ | $\mathrm{SA}_{22}$ |
| $\mathrm{E}_{20}$ | $7\langle\mathrm{~g}\rangle$ | $\mathrm{T}\langle\mathrm{g}\rangle$ | $\mathrm{SA}_{21}$ |
| $\mathrm{E}_{21}$ | m $\left\langle\mathrm{t}^{\prime}\right\rangle$ | III $\left\langle\mathbf{t}^{\prime}\right\rangle$ | $\mathrm{SA}_{24}$ |
| $\mathrm{E}_{22}$ | 2 $\left\langle\mathrm{s}^{\prime}\right\rangle$ | $\stackrel{\circ}{\text { n }}\left\langle\mathrm{s}^{\prime}\right\rangle$ | $\mathrm{SA}_{15}$ |
| $\mathrm{E}_{23}$ | $\boldsymbol{\theta}\left\langle{ }^{\text {d }}\right\rangle$ | H $\langle$ d $\rangle$ | $\mathrm{SA}_{20}$ |
| $\mathrm{E}_{24}$ | 6. $\langle\mathrm{f}\rangle$ | $\diamond\langle\mathrm{f}\rangle$ | $\mathrm{SA}_{17}$ |
|  | - | \ $\langle$ ś' $\rangle$ | $\mathrm{SA}_{16}$ |
|  | - | $\Pi\langle\dot{\mathrm{g}}$ 〉 | $\mathrm{SA}_{23}$ |
|  | - | X $\langle\mathrm{z}\rangle$ | $\mathrm{SA}_{25}$ |
|  | - | $8\langle\theta\rangle$ | $\mathrm{SA}_{28}$ |
|  | - | \% $\mathrm{f}\langle\mathrm{z}\rangle$ | $\mathrm{SA}_{29}$ |

table 1: Ethiopic and South Arabian abjad scripts.

Soon after its first attestations as abjad, the Ethiopic script was modified to an alphasyllabary in the $4^{\text {th }}$ century AD (Weninger 2011b:1126; Frantsouzoff 2010:583; Avanzini 2007a:153). The consonant graphemes in table 1 became basic syllabographs (i.e. fixed consonant-vowel sequences) with the inherent
vowel $\ddot{a}$, which seems to be the most frequent vowel in $G \partial^{〔} \partial z .{ }^{9}$ In addition to $\ddot{a}$, the vowels $u, i, a, e, \partial, o$ are phonemic in $\mathrm{G}^{\prime} \partial z$ (and Amharic). The mid-central vowel a also functions as epenthetic vowel to dissolve consonant clusters (Gragg 1997:177). According to Weninger (2011b:1128-1129) and Gragg (1997:178), the preferred syllable structure in $\mathrm{G}^{`} \partial z$ is CV(C). Words usually begin with a consonant, but almost never end in the vowel $\partial$. Except $\mathrm{C}+r$ sequences, as in krastos 'Christ', word-initial consonant clusters are dissolved by the epenthetic vowel. Word-medial and -final consonant sequences only involve either two distinct consonants, or else a geminated one.

The new Ethiopic graphemes in TABLE 2 represent CV sequences or vowelless C. Gemination is not marked. Graphemes for vowels, i.e. syllables of the type V, are lacking because the vowel diacritics do not function as independent graphemes (Salomon 2000:93). ${ }^{10}$ According to Salomon (2000:93), the merger of C+ə sequences and vowelless consonants into a single grapheme avoids the complications of indicating consonant clusters and vowel deletion found in Indic scripts, as native speakers intuitively know when a is pronounced or suppressed. This principle seems also to apply for gemination.

[^22]|  | Vowel Order |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $1^{\text {st }} g \partial\lceil\partial z$ | $2^{\text {nd }} k a ¢ \partial b$ | $3^{\text {rd }}$ salas | $4^{\text {th }} \text { rabo }$ | $5^{\text {th }}$ xamas | $6^{\text {th }} s a d \partial s$ | $7^{\text {th }}$ saba ${ }^{\text {c }}$ |
| c－ | ${ }^{\text {c }}$［ ha | c＋u |  |  | C＋e |  |  |
| h | $\boldsymbol{v}$［ha］ | U＊ | 4. | 4 | \％ | $v$ | 『 |
| $\hbar$ | d［ћа］ | ＊ | t． | d | \＆ | $\boldsymbol{\text { ¢ }}$ | d |
| $m$ | ad | ar． | ${ }^{4} 4$ | ${ }^{4} 9$ | al | $\boldsymbol{q P}^{8}$ | qP |
| s＇ | $\omega$ | w－ | ${ }^{\text {u }}$ | ＂1 | 川 | $\mu$ | $\boldsymbol{\psi}$ |
| $r$ | ＜ | 4 | 6 | 6 | 6 | c． | c． |
| $s$ | ก | － | ก． | $\dagger$ | ¢ | ก | － |
| $k^{\prime}$ | \＄ | \＄ | 中 | ， | \＄ | \＄ | $\boldsymbol{\$}$ |
| b | 0 | $0 \cdot$ | 0. | 9 | 0 | 0 | 0 |
| t | ＋ | ＋ | t | ， | t | － | ＋ |
| $x$ | $\cdots$［xa］ | $\cdots$ | 2 | ； | b | a | f |
| $n$ | ＇ | \％ | 4 | $\boldsymbol{f}$ | B | \％ | $\boldsymbol{q}$ |
| $?$ | \％［？a］ | A | h． | $\lambda$ | \％ | $\%$ | $\lambda$ |
| $k$ | n | $n \cdot$ | n． | $\dagger$ | $n$ | n | n |
| w | $\boldsymbol{\sigma}$ | a． | ¢． | $\boldsymbol{P}$ | $\boldsymbol{\Phi}$ | $\boldsymbol{\sigma}$ ． | $\boldsymbol{\top}$ |
| $\Gamma$ | $\boldsymbol{O}$［¢a］ | 0 － | ${ }_{4}$ | 9 | ${ }_{6}$ | $\boldsymbol{\delta}$ | $\rho$ |
| z | H | H | H． | H | H | 7 | H |
| j | $p$ | $p$ | $\rho$. | $\rho$ | $p_{0}$ | e | $p$ ． |
| d | P | 9 | \％ | 9 | $\rho_{0}$ | $\rho$ | 8 |
| $g$ | 1 | 7 | 2. | ？ | 2 | 9 | 7 |
| $t^{\prime}$ | m | \％ | m． | ๆ | m | T | n |
| $p^{\prime}$ | $k$ | \％ | k． | \％ | \％ | \％ | \％ |
| $s^{\prime}$ | 2 | 2. | 2. | 2 | 8 | 8 | 2 |
| d | $\theta$ | $\theta$－ | 2. | 9 | 2 | ${ }^{\text {d }}$ | $\rho$ |
| $f$ | 6. | 4. | 6 | 4. | 6 | ¢ | 6. |
| $p$ | T | F | T | T | T | T | \％ |

TABLE 2：Ethiopic alphasyllabary．

In the Ethiopic alphasyllabary，for instance，the grapheme $\mathbf{0}\langle\mathrm{b}\rangle$－representing ［b］in the Ethiopic abjad－was reinterpreted as basic syllabograph 〈bä〉．Se－ quences of $b$ followed by other vowels are indicated by diacritic circles，or hori－ zontal and vertical strokes attached to the basic syllabograph（cf．Ham－ merschmidt 1994：318－319；Getatchew 1996：571－572）．Thus，bu is written by add－ ing a horizontal stroke to the mid－right side $\boldsymbol{n} \cdot(\mathrm{bu})$ ，bi by a horizontal stroke at the bottom－right side $\mathbf{\Omega} .\langle\mathrm{bi}\rangle, b a$ by a vertical stroke at the right side $\mathbf{\Omega}\langle\mathrm{ba}\rangle$ ，be by
a circle at the right bottom $\mathbf{\Omega}\langle\mathrm{be}\rangle$, and bo by a vertical stroke at the left side $\mathbf{n}\langle$ bo . Sequences with the vowel $a$ or lacking a vowel are marked by the same diacritic modification, e.g. for $b(\partial)$ a horizontal stroke is added at the mid-left side $\mathbf{0}\langle\mathbf{b}(\partial)\rangle$. As shown in TABLE 2, the vowel diacritics are consistent in certain blocks of graphemes, but there is no uniform diacritic-vowel relationship fitting all graphemes (cf. Hornus 2006:13-15).

The sequence of vowels in the Ethiopic script is fixed. It starts with the basic syllabograph Cä, which is called gəโəz - like the name of the language. This is followed by the graphemes marked for the vowels $u, i, a, e, \partial, o-$ which are called by the respective Gə'əz ordinal numbers, i.e. $\mathrm{C}+u$ is $k a\lceil\partial b$ 'second', $\mathrm{C}+i$ śalas 'third', etc. (Frantsouzoff 2010:583; Hammerschmidt 1994:318-319). ${ }^{11}$ The reason for this specific vowel sequence remains unclear (Ullendorff 1951a:210; 1955:159 fn. 9).

The Ethiopic alphasyllabary in table 2 contains two additional syllabographs, $\boldsymbol{T}\langle\mathrm{pä}\rangle$ and $\boldsymbol{\xi}\langle\mathrm{p}$ 'ä $\rangle$, which are lacking in the abjad script in table 1 (Ullendorff 1951a:208; Frantsouzoff 2010:582). Littmann (1953:354), among others, argues that the two syllabographs originated from the Greek letter phi, i.e. $\Pi / \pi$, as they almost exclusively occur in Greek loanwords. This is commonly accepted for $\boldsymbol{T}\langle\mathrm{pä}\rangle$, but $\mathbf{\xi}\left\langle\mathrm{p}^{\prime} \ddot{\mathrm{a}}\right\rangle$ is also found in a few other $\mathrm{G}^{\circ} \partial z$ words (Ullendorff 1951a:208-209). Getatchew (1996:570), therefore, considers $\boldsymbol{\xi}\left\langle\mathrm{p}^{\prime} \mathbf{a}\right\rangle$ a modification of the syllabograph $\mathbf{2}\langle\mathrm{s}$ 'ä $\rangle$.

The graphemes of the Ethiopic abjad and alphasyllabary have no special names, but are called according to the syllable they represent, i.e. ha for $\boldsymbol{v}(h a ̈\rangle$, lä for $\boldsymbol{\Lambda}\langle l a ̈\rangle, m a ̈$ for $\boldsymbol{\sigma}\langle$ mä〉, etc. (Hammerschmidt 1994:319; see also Frantsouzoff 2010:582; Ullendorff 1951a:213). Only the names of a few homophonous syllabographs in which the consonants lost their original phonemic contrast (cf. [4.4]) may contain additional modifiers, e.g. halleta ha for $\boldsymbol{v}\langle h a ̈\rangle$ vs. ћamäro ha for $\boldsymbol{\phi}\langle\hbar \bar{a}\rangle$ - both pronounced ha (cf. Hammerschmidt 1994:319). Frantsouzoff (2010:582) and Littmann (1953:351), by contrast, state that the syllabographs are called by the Hebrew or Greek letter names in Psalm 119 of the Bible, i.e. hoj for $\boldsymbol{U}\langle$ hä , law for $\boldsymbol{\Lambda}\langle l a ̈\rangle$, maj for $\boldsymbol{\sigma}\langle$ mä $\rangle$, etc. Ullendorff (1951a:211-214), Hammerschmidt (1994:319), Daniels (1997:33-34), and others, convincingly argue however that these names are later inventions, probably under the influence of Europeans.

The fixed sequence of the graphemes into an abecedary is called fidälä (gäbäta) ћawaraja 'the Apostolic alphabet' in Gə`əz (Chernetsov 2003:55), or fidäl gäbäta in Amharic (Azeb 2010:186). The syllabographs in table 2 and the consonants in table 1 are arranged in the same sequence, which is called hahu in [11] Cf. also Täklä Marjam (1930) for a description of the Ethiopic script in Gə`əz.

Ethiosemitic - reflecting the names of the first two syllabographs, i.e. $\boldsymbol{v}\langle h a ̈\rangle$ $\boldsymbol{v}\langle h u\rangle$. There is another sequence (cf. Azeb 2010:187), in which the syllabographs are ordered according to Northwest Semitic scripts. It starts with the string $\boldsymbol{\hbar}\langle$ Rä $\rangle \boldsymbol{n}\langle\langle\mathrm{bu}\rangle \mathbf{2}\langle\mathrm{gi}\rangle \boldsymbol{\Omega}\langle\mathrm{da}\rangle$, from which its name abugida is derived (Frantsouzoff 2010:582; Getatchew 1996:570).

The Ethiopic script is the only alphasyllabary among the various scripts for Semitic languages (Daniels 1997:24; Coulmas 2003:154; Voigt 2012:30; Frantsouzoff 2010:580). Other Semitic languages most commonly have abjad scripts, in which vowels are optionally marked by diacritics on the consonant grapheme, or by matres lectionis (Daniels 1997:27-30). ${ }^{12}$ The historic dispute about whether the modified Ethiopic script is a syllabary or an abjad (cf. Azeb 2010:183) is resolved by classifying it as a separate type, i.e. an alphasyllabary (Coulmas 2003:154-155) or an abugida (Daniels 1997:17, 23-24). ${ }^{13}$ According to Swank (2008), abugida is a writing system in which basic (i.e. unmarked) graphemes represent a consonant with an inherent vowel (usually a short a), while other vowels (or the lack of a vowel) are marked through diacritics attached to the basic grapheme. In an alphasyllabary, by contrast, the basic grapheme is a consonant to which diacritics for every vowel are attached (Swank 2008:75). As the distinction between them is not always straightforward or relevant, she groups them together under the label alphasyllabary (Swank 2008:86), which is followed here.

## [3.2] Graphemes for numbers

According to Chrisomalis (2012:239), the Greeks were the first to invent an alphabetic numerical system under which each letter of the alphabet is assigned a numerical value. These Greek alphabetic numerical letters were incorporated as number graphemes into the Ethiopic script (Hammerschmidt 1994:319; Daniels 1997:40; Weninger 2011b:1126) - probably already in the $4^{\text {th }}$ century when it still was an abjad (Ullendorff 1951a:217). Only in the $7^{\text {th }}$ century, however, the Ethiopic numerals acquired their current shape in which the Greek letters are enclosed by an upper and lower stroke - apparently to avoid confusion with other graphemes (cf. Hornus 2006:11). TABLE 3, which is adapted from Daniels (1997:40), shows the Ethiopic numerals and their Greek letter equivalents.

Chrisomalis (2012:232) classifies the Ethiopic numerals as basically cipheredadditive and also partly multiplicative. Higher numbers are encoded through a

[^23]linear combination of the numerals for digits, decimals and one hundred (from the highest numeral to the lowest) whose individual number values are added up, hence ciphered-additive. For instance, the number ' 123 ' is represented by $\overline{\mathrm{P}} \boldsymbol{T} \boldsymbol{\Gamma}<100203$, i.e. the sum of 100 plus 20 plus 3 . With numbers between 200 and 999 , the actual value of 'hundred' is marked by a digit preceding $\boldsymbol{\mathbb { P }}(100)$. Accordingly, the number ' 523 ' is encoded by $\overline{\operatorname{Tr}} \boldsymbol{T}(5100203$ ), in which 5 is multiplied with 100 , and then 20 plus 3 is added. This mixed pattern is also found with numbers above 1,999 , by using decimals or a combination of digits and decimals as multipliers for 'hundred'. The year '2006', for instance, can be written 1006 ), i.e. 20 multiplied by 100 to which 6 is added.

| Ethiopic numeral | Greek letter ts | Value | Ethiopic numeral $\qquad$ | Greek letter ecimals | Value |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $\underline{6}$ | A | '1' | I | I | '10' |
| - | B | ' 2 ' | T | K | ' 20 ' |
| [ | $\Gamma$ | '3' | ¢ | $\Lambda$ | '30' |
| on | $\Delta$ | '4' | 91 | M | '40' |
| $\underset{\sim}{2}$ | E | '5' | $\underline{\square}$ | N | '50' |
| $\underline{1}$ | ऽ | ' 6 ' | s | $\Xi$ | '60' |
| $\underline{2}$ | Z | '7' | e | 0 | '70' |
| 9 | H | '8' | $\cdots$ | п | ' 80 ' |
| - | $\Theta$ | ' 9 ' | $\underline{1}$ | Q | '90' |
| Other Numerals |  |  |  |  |  |
| T | P | '100' | $\stackrel{9}{9}$ | PP | '10,000' |

table 3: Numerals in the Ethiopic script.

The Ethiopic numerals only encode integers; there are no symbols for fractions or zero. Today these numerals are rarely used, e.g. in printed calendars and agendas. Elsewhere, they are commonly replaced by the European numeric notation based on Hindu-Arabic numerals (cf. Getatchew 1996:574; Daniels 1997:40).

## [3.3] Punctuation marks

The South Arabian vertical bar ( $\mid$ ) as a word divider is found in early Ethiopic inscriptions. Later, it was replaced by the colon (:). The lack of these symbols at the end of a line indicates that the word continues at the next line. By contrast to the South Arabian abjad, the Ethiopic script has various additional punctuation marks (Weninger 2011b:1126). These include the full stop (: ) to
mark the end of sentences, a paragraph separator ( $: \%$ ) , and several signs for enumerations, such as a comma ( $\overline{\bar{I}}$ ), a colon ( $\bar{\prime}$ ), a semi-colon ( $\overline{\bar{I}}$ ) and a preface colon (:- ) (Hornus 2006:10, Figure 7). ${ }^{14}$ Except for the word divider (:), the punctuation marks are not consistently applied (Hammerschmidt 1994:319; Ullendorff 1951a:216).

Nowadays, the word divider is often replaced by an empty space (Getatchew 1996:575; Hornus 2006:11). Other punctuation marks common in European writing systems have been incorporated, in particular the question mark (?), the exclamation mark (!), and the quotation marks ( « ») or ("") (Hornus 2006:11; see also Asteraye et al. 1999:9).

Signs for gemination, which conveys lexical and grammatical meaning in Ethiosemitic, are not native features of the Ethiopic script, but inventions of European scholars (Frantsouzoff 2010:584; Ullendorff 1951a:215). Gragg (1997:171), for instance, observes that two dots on top of a geminated consonant, e.g. $\ddot{\mathbf{i}}\langle\mathrm{bb} \ddot{\mathrm{a}}\rangle$, has been occurring since the $17^{\text {th }}$ century in grammars and dictionaries of Gə`əz written by European scholars. Hammerschmidt (1994:321) found a superscript version of the grapheme \({ }^{\mathbf{T}\left(\mathfrak{t}^{( }(a)\right\rangle}\) on top of a geminated consonant in a few manuscripts, but considers it a temporary help for pupils learning Gə`əz (cf. also Ullendorff 1951a:215). ${ }^{15}$

## [4] MODIFICATIONS BEFORE THE $19^{\text {TH }}$ CENTURY

The change of the Ethiopic abjad into an alphasyllabary in the $4^{\text {th }}$ century was followed by the invention of syllabographs for labialised velars (which were later extended to non-velar consonants), for alveopalatal consonants and for spirantised consonants (Frantsouzoff 2010:583). These modifications cannot be exactly dated, but could be caused by applying the Ethiopic script to writing Amharic (cf. Weninger 2011b:1126).

## [4.1] Labialised consonants

The labialised velars $k^{w}, g^{w}, k^{\prime w}, x^{w}$ are peculiar to Ethiosemitic. They are not found in other Semitic languages (Ullendorff 1951c:71), nor is their origin in Ethiosemitic known (cf. Podolsky 1991:14). The graphemes for labialised velars are derived from the syllabographs of the corresponding plain velars, i.e. $k, g, k$, $x$ in table 2, but systematically lack the graphemes for back vowels, i.e. $\mathrm{C}^{\mathrm{w}}+\mathrm{u}$ and $\mathrm{C}^{\mathrm{w}}+\mathrm{o}$ (Hammerschmidt 1994:319):
[14] Hornus (2006:10-11) mentions three vertical dots (: ) as another enumeration mark in Gə`əz. According to Ullendorff (1951a:216), this sign was introduced as question mark in the modified Tigrinya orthography from 1944, but was probably never used.
[15] Similar superscripts also occur in an indigenous musical annotation system which was developed by the monk Yared in the $6^{\text {th }}$ century (for further details, cf. Daniel 2006:14-15).

| C_ | Vowel Order |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $1^{\text {st }} \mathrm{Cä}$ | $2^{\text {nd }} \mathrm{C}+\mathrm{u}$ | $3^{\text {rd }} \mathrm{C}+i$ | $4^{\text {th }} \mathrm{C}+a$ | $5^{\text {th }} \mathrm{C}+e$ | $6^{\text {th }} \mathrm{C}(+2)$ | $7^{\text {th }} \mathrm{C}+0$ |
| $k^{\prime} w$ | 中 |  | ${ }^{4}$ | \$ | , | ${ }^{\text {* }}$ |  |
| $\chi^{w}$ | \% |  | \% | , | \% | $\cdots$ |  |
| $k^{w}$ | ho |  | h, | 3 | 3 | $\dagger$ |  |
| $g^{w}$ | 70 |  | $7 \cdot$ | 3 | 2 | $\cdots$ |  |

table 4: Labialised velars.

Labialisation is not marked uniformly. For the basic syllabographs, it is indicated by a circle attached to the mid-right side, e.g. plain $\boldsymbol{\phi}\langle k$ 'ä $\rangle$ becomes labialised $\boldsymbol{\phi}\left\langle\mathrm{k}^{\text {'w }} \mathbf{} \mathbf{a}\right\rangle$, but by an extension of the diacritics for the syllabographs with the vowels $a$ and $e$, thus $\boldsymbol{\Phi}\left\langle\mathrm{k}^{\prime} \mathrm{a}\right\rangle$ changes to $\boldsymbol{\boldsymbol { \Phi }}\left\langle\mathrm{k}^{\prime} \mathrm{w} \mathrm{a}\right\rangle$ and $\boldsymbol{\Phi}\left\langle\mathrm{k}^{\prime} \mathrm{e}\right\rangle$ to $\boldsymbol{\Phi}\left\langle\mathrm{k}^{\prime \mathrm{w}} \mathrm{e}\right\rangle$. The syllabographs for the labialised velars with the vowels $i$ and $\partial$ are both derived from the basic syllabograph of the plain velars by adding two different types of curved strokes at their upper-right side, e.g. plain $\boldsymbol{\phi}\left\langle\mathrm{k}^{\prime}\right.$ ä $\rangle$ is the base for labialised $\boldsymbol{\phi}^{\wedge}\left\langle\mathrm{k}^{\prime} \mathrm{w}_{\mathrm{i}}\right\rangle$ and $\boldsymbol{\phi}^{\star}\left\langle\mathrm{k}^{\prime \mathrm{w}}(\partial)\right\rangle$.

The syllabographs for the labialised velars (as well as for $p$ and $p^{\prime}$, cf. [3.1]) are lacking in the Ethiopic abjad, but occur in vocalised inscriptions from the $4^{\text {th }}$ century AD (Ullendorff 1951c:74; Weninger 2011b:1126). Frantsouzoff (2010:583) therefore concludes that the vowel diacritics and the syllabographs for labialised velars were invented at the same time, whereas Ullendorff (1951a:209) assumes that "insufficient epigraphic evidence" is responsible for the lack of intermediary stages.

At a much later but still unspecified time, syllabographs for labialised nonvelar consonants (except h, $\hbar$, ś, $1, \Omega, w, j, p$, d, p) were introduced (Hammerschmidt 1994:319; Frantsouzoff 2010:583). They only appear in a single syllabograph, being $\mathrm{C}^{\mathrm{w}}+a$, which is derived from its respective plain counterpart with the $5^{\text {th }}$ order vowel, as shown in table $5:{ }^{16}$

[^24]| Basic Alphasyllabary |  |  |  |  | Extended Alphasyllabary |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Plain |  | Labialised |  |  | Plain |  | Labialised |
| C- | $1^{\text {st }} \mathrm{Cä}$ | $4^{\text {th }} \mathrm{C}+a$ | $\mathrm{C}^{\mathbf{w}+a}$ |  | C_ | $1^{\text {st }} \mathrm{Cä}$ | $4^{\text {th }} \mathrm{C}+a$ | $\mathrm{C}^{\mathrm{w}}+\mathrm{a}$ |
| h | $v$ | 7 |  |  |  |  |  |  |
| $l$ | $n$ | 1 | 1 |  |  |  |  |  |
| $\hbar$ | d | d | (h) |  |  |  |  |  |
| m | at | 97 | 9 |  |  |  |  |  |
| s' | $\omega$ | "1 | (싼) |  |  |  |  |  |
| $r$ | 4 | 6 | $\check{\square}$ |  |  |  |  |  |
| $s$ | ก | $\dagger$ | $\underline{1}$ | Palatalised | $\int$ | $\pi$ | T | T |
| k | \$ | , | $\boldsymbol{\phi}^{\text {a }}$ | Spirantised | $\chi$ | ¢ | \% | 動 ${ }^{\text {a }}$ |
| $b$ | 0 | 9 | 0 | Spirantised | $v$ | त | 7 | \% |
| $t$ | + | - | t | Palatalised | 5 | F | \% | 安 |
| $x$ | - | ; | $3^{\text {a }}$ |  |  |  |  |  |
| $n$ | ! | $\boldsymbol{f}$ | $\varsigma$ | Palatalised | $n$ | T | \% | \% |
| $?$ | \% | $\lambda$ |  |  |  |  |  |  |
| k | n | $\dagger$ | $h^{\text {a }}$ | Spirantised | $\chi$ | 'i | 't | $\grave{x}^{\text {a }}$ |
| w | ¢ | $\boldsymbol{P}$ |  |  |  |  |  |  |
| ¢ | 0 | 9 |  |  |  |  |  |  |
| $z$ | H | H | H | Palatalised | 3 | Tr | $\boldsymbol{\gamma}$ | T |
| j | P | $\rho$ |  |  |  |  |  |  |
| d | P | 9 | $\rho$ | Palatalised | ds | T | \% | 5 |
| $g$ | 1 | , | $7^{\text {a }}$ |  |  |  |  |  |
| $t^{\prime}$ | m | \% | $\cdots$ | Palatalised | t' | แ | $\square_{6}$ | ๓. |
| $p^{\prime}$ | $\%$ | $\%$ | (\%) |  |  |  |  |  |
| $s^{\prime}$ | 2 | 2 | 3. |  |  |  |  |  |
| d | $\theta$ | 9 |  |  |  |  |  |  |
| $f$ | 6. | 4. | 4 |  |  |  |  |  |
| $p$ | T | T |  |  |  |  |  |  |

TABLE 5: Summary of labialised consonants.

More recently, even $\hbar$, ś, $p^{\prime}$, and secondarily palatalised and spirantised consonants acquired syllabographs representing $\mathrm{C}^{\mathrm{w}}+a$, which are included in the official abecedary of the Ethiopic script (cf. Azeb 2010:187).

## [4.2] Alveopalatal consonants

The Ethiopic alphasyllabary was used exclusively for writing Gə`z for several centuries. When it was adapted for the first time for another Ethiosemitic lan-
guage，specifically Amharic，in the $14^{\text {th }}$ century，six additional syllabograph se－ ries for the alveopalatal consonants $\int, 3, t \sqrt{4}, t_{5}, t^{\prime}, n$ were created by modifying their alveolar counterparts（Frantsouzoff 2010：583；Hornus 2006：15）．

| $\mathrm{C}_{-}$ | Vowel Order |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $1^{\text {st }} \mathrm{Cä}$ | $2^{\text {nd }} \mathrm{C}+u$ | $3^{\text {rd }} \mathrm{C}+i$ | $4^{\text {th }} \mathrm{C}+a$ | $5^{\text {th }} \mathrm{C}+e$ | $6^{\text {th }} \mathrm{C}(+2)$ | $7^{\text {th }} \mathrm{C}+0$ |
| $\int$ | $\pi$ | 7 | T | T | $\pi$ | ＇ | T |
| 5 | \％ | 早 | 安 | \％ | 矣 | 第 | ＋ |
| $n$ | \％ | \％ | \％ |  | ＇ | \％ | \％ |
| 3 | Tr | 7 F | TI． | $\boldsymbol{T}$ | T6 | \％ | r |
| ds | $\underline{R}$ | 玺 | \％ | \％ | $\underline{\square}$ | S | 8 |
| t＇ | ถ | $\square$ | ¢． | $\sigma_{2}$ | $\square$ | ${ }_{6}$ | $6^{63}$ |

TABLE 6：Palatalised alveolars．

Ullendorff（1951a：214）remarks that Amharic may not necessarily have caused the invention of these syllabographs，as alveopalatal consonants are also found in Tigrinya and Tigre．However，as these languages only began to be written down relatively recently（cf．［6］），it is reasonable to consider Amharic as the trigger for this invention．

In contrast to labialisation，palatalisation is almost regularly marked by a horizontal stroke on top of the syllabograph for the corresponding alveolar consonant，e．g．the palatalised $\bar{\pi}\left\langle\int a ̈\right\rangle$ is derived from $\mathbf{n}\langle$ sä $\rangle, \boldsymbol{\pi}\left\langle\int u\right\rangle$ from $\boldsymbol{n} \cdot\langle$ su $\rangle$ ，etc． The syllabograph starting with the consonant 3 is characterised by two sepa－ rate horizontal strokes attached to the two upper ends of its alveolar counter－ part，i．e．plain $\mathbf{H}\langle z a ̈\rangle$ becomes palatalised $\boldsymbol{T r}\langle 3 a ̈\rangle$ ．Only the syllabographs based on $t^{\prime}$ attach circles to the three lower extensions of the plain counterparts， thus palatalised $\boldsymbol{\infty}\left\langle t^{\prime}\right.$＇ä $\rangle$ derives from plain $\boldsymbol{m}\left\langle\mathrm{t}^{\prime} \ddot{a}\right\rangle$ ．Regarding this irregularity， Hornus $(2006: 15,37)$ and Ullendorff（1951a：214）are of the opinion that the syl－ labographs for $t^{\prime}$＇were initially derived by attaching small strokes to the upper corners of their plain counterparts，i．e．a grapheme $\left\langle t^{\prime}\right.$＇ä $\rangle$ similar to $\boldsymbol{\pi r}$ instead of $\lfloor$ ，as found in Ludolf＇s Historia Aethiopica from 1681 （cf．Ludolphus 1982：6r）． However，Praetorius（1879：17）noticed that $\boldsymbol{\pi r}$ is restricted to Ludolf＇s publica－ tions，so it could also result from the hypercorrect use of the horizontal strokes found with $\mathbf{7 r}\langle 3$ ä $\rangle$ ．

## ［4．3］Additional syllabographs

Writing in Amharic probably triggered further innovations in the Ethiopic al－ phasyllabary．In Gə $\partial z$ ，the basic syllabographs starting with the gutturals $h, \hbar$ ， $x,\lceil, ?$ are irregularly pronounced with the vowel $a$ instead of regular ä（cf．Foot－
note 9). Consequently, there was no written representation for the syllables hä and $1 \ddot{a}$ in Amharic. Therefore, the syllable hä (or related $\chi \ddot{a} \sim \chi \ddot{a}$ ), which is fairly frequent in Amharic, began to be represented by the syllabograph ' $\quad \overline{\boldsymbol{n}}\langle\chi \vec{a}\rangle-$ which is derived by adding a horizontal stroke on top of $\mathbf{h}\langle k a ̈\rangle$. The spirantisation of * $k$ to $h$ (via $\chi$ and $x$ ) through a diachronic sound change is reflected in a number of cognates from Gə`əz and Amharic (cf. Podolsky 1991:29-32). Since early Amharic writers were certainly aware of this sound change, they could have indicated it by modifying the syllabograph for $\mathrm{G}^{〔} \partial z \mathbf{h}\langle k a ̈\rangle$. This might explain the occurrence of ' $\boldsymbol{n}\langle\chi \ddot{a}\rangle$ as a basic syllabograph, which can be modified for all other vowels and for labialisation.

The creation of the marginal syllabograph $\Pi\langle\{a ̈\rangle$ by attaching a horizontal stroke to $\boldsymbol{\hbar}\langle\{\ddot{a}\rangle$ (which is irregularly pronounced $1 a$ ) is probably related to this. By contrast to ' $\overline{\boldsymbol{n}}\langle\chi \ddot{a}\rangle$, the syllabograph $\dddot{\mathbf{h}}\langle$ lä $\rangle$ is never modified by vowel diacritics. Moreover, the syllable $1 \ddot{a}$ is exceptional in Amharic because it only occurs
 be completely absent in Tigre and Tigrinya. Probably due to its rarity, $\overparen{\boldsymbol{K}}\langle$ Rä $\rangle$ is not included in the official abecedary (cf. Azeb 2010:187).

In Tigrinya, the velar plosive $k$ and ejective $k$ ' have the spirantised uvular consonants $\chi$ and $\chi^{\prime}$ as phonologically conditioned allophones (Kogan 1997:425). Similarly to Amharic, the spirantised allophones are marked by a horizontal stroke on the syllabographs of the plain consonants, i.e. $\boldsymbol{n}\langle\chi \ddot{a}\rangle$ from $\mathbf{h}\langle k a ̈\rangle$, and $\boldsymbol{\Phi}\left\langle\chi^{\prime} \vec{a}\right\rangle$ from $\boldsymbol{\phi}\left\langle\mathrm{k}^{\prime} \ddot{a}\right\rangle$. These modified syllabographs can be combined with vowel diacritics and mark labialisation.

The horizontal stroke on the syllabograph $\overrightarrow{\mathbf{n}}\langle v a ̈\rangle$ connects it to $\boldsymbol{\Omega}\langle b a ̈\rangle$, but $v$ (i.e. spirantised b) is not a native phoneme in Ethiosemitic, as it exclusively occurs in loanwords. Asteraye et al. (1999:8) ascribe both the invention of $\ddot{\boldsymbol{n}}\langle\mathrm{vä}\rangle$, as well as the syllabograph series for the palatal approximant $К$, i.e. $\boldsymbol{\pi} \quad\langle К \ddot{a}\rangle$ derived from $\boldsymbol{\Lambda}\langle l a ̈\rangle$ and the palatal co-articulated nasal $m^{j}$, i.e. $\left.\boldsymbol{\pi} \boldsymbol{\pi}\right\rangle\left\langle\mathrm{m}^{\mathrm{j}}{ }^{\boldsymbol{a}}\right\rangle$ derived from $\boldsymbol{\sigma D}\langle m a ̈\rangle$, to Catholic missionaries from the $17^{\text {th }}$ century who created them for transcribing Portuguese. The syllabograph series for ' $\boldsymbol{\boldsymbol { n }}\langle К \ddot{\mathbf{a}}\rangle$
 both represent $m^{j} a$, continued to occur in texts until the $19^{\text {th }}$ century (cf. Praetorius 1879:19).

## [4.4] Alternating graphemes

The corpus of literary works in Gə`əz is divided into two periods. In the Aksumite period from the \(4^{\text {th }}\) to the \(7^{\text {th }}\) centuries, Gə`əz was spoken as a native language, but it only functioned as a learnt language used for literary purposes in the post-Aksumite period from the $13^{\text {th }}$ to $19^{\text {th }}$ centuries (cf. Kropp 1986:315-

316; Weninger 2005:465). According to Avanzini (2007b:161), all of the syllabographs in TABLE 2 represent distinct Ga`əz phonemes in use until the \(6^{\text {th }}\) century AD. \({ }^{17}\) Since then, some of them continue to be used interchangeably, namely \(\boldsymbol{k}\langle\) ใä \(\rangle\) and \(\boldsymbol{0}\langle\{a ̈\rangle\) for the glottal stop \(1, \boldsymbol{v}\langle h a ̈\rangle, \boldsymbol{\omega}\langle\hbar a ̈\rangle\) and \(\geqslant\langle\) xä \(\rangle\) for the fricative \(h\),  \(s^{\prime}\). Thus, after Gə`əz ceased being spoken, these alternations represent etymologising writing (cf. Hammerschmidt 1994:320; Hornus 2006:15), since the writers of later Ga`əz texts spoke another mother tongue in which some of these consonants are not distinguished (Weninger 2011b:1128; Gragg 1997:170-173). All attempts to eliminate these spelling variants in the modern Ethiosemitic languages written in the Ethiopic alphasyllabary have so far failed (cf., e.g. Cowley 1967; Amsalu 2006:21-24 for Amharic; Voigt 2011:1176 for Tigrinya; Wagner 2004:356-357 for Harari; Hussein 2010:85-87 for Silt'e).

Furthermore, Praetorius (1879:18) observes that the syllabograph $\boldsymbol{x}_{7}\left\langle\mathrm{~m}^{j} \mathrm{a}\right\rangle$, became a spelling variant of the syllabograph $\left.\boldsymbol{\sigma}, \mathrm{m}^{\mathrm{w}} \mathrm{a}\right\rangle$ for labialised $m^{w} a$. The rare use of the syllabographs for $m^{j}$ certainly facilitated the new interpretation of $\sigma_{7}\left\langle\mathrm{~m}^{\mathrm{j}} \mathrm{a}\right\rangle$ as $\left\langle\mathrm{m}^{\mathrm{w}} \mathrm{a}\right\rangle$. Similarly, the syllabograph $\boldsymbol{4}\left\langle\mathrm{f}^{\mathrm{w}} \mathrm{a}\right\rangle$ has an optional variant $\boldsymbol{\sigma}\left\langle\mathrm{f}^{\mathrm{w}} \mathbf{a}\right\rangle$ with a horizontal stroke on its top - beside a third variant $\boldsymbol{\mathbf { T }}\left\langle\mathrm{f}^{\mathrm{w}} \mathrm{a}\right\rangle$ derived from the syllabograph of the $6^{\text {th }}$ order vowel (cf. also Cowley 1967).

## [5] OVERVIEW OF MODIFICATIONS AFTER THE $19^{\mathrm{TH}}$ CENTURY

Protestant and Catholic missionary activity in Ethiopia and Eritrea intensified in the $19^{\text {th }}$ century, accompanied by the linguistic description of various vernacular languages, including the development of orthographies (cf., e.g. Voogt 2014:135-136). The new orthographies were often an adapted Ethiopic alphasyllabary, in which new graphemes were frequently created by modifying existing syllabographs. ${ }^{18}$ For writing Oromo (Cushitic), for instance, the basic syllabograph for the implosive $d$ was derived from $\boldsymbol{\Omega}$ (dä), either by striking out its upper part, i.e. $\boldsymbol{\rho}\langle\mathrm{d} \ddot{\rangle}\rangle$, or by a short vertical stroke on top of it, i.e. $\boldsymbol{\rho}$ 〈dä〉 (Gragg 1976:168). Another example is the velar nasal $\eta$ in Bilin whose basic syllabograph 'Th $\langle\mathfrak{Z}\rangle$ is a modification of $\boldsymbol{\eta}\langle\mathrm{gä}\rangle$ (Smidt 2003:586; Asteraye et al. 1999:5).

In the 1980s, four new syllabograph series were invented for the preglottalised consonants ${ }^{7} l,{ }^{2} m,{ }^{2} r$ and ${ }^{2} n$ in Sidaama by striking out the corresponding plain syllabographs, i.e. $\boldsymbol{\Lambda}\langle l a ̈\rangle$ changed to $\mathbf{\lambda}\left\langle{ }^{2} l a ̈\right\rangle, \mathbf{Z}\langle$ nä $\rangle$ to $\boldsymbol{z}\left\langle{ }^{2}\right.$ nä $\rangle$, etc. (Asteraye et al. 1999:8). For writing Sebat Bet Gurage, additional syllabograph

[^25]series were introduced for the palatalised velars $k^{j}, g^{j}, k^{j}, \chi^{j}$ and the rounded labials $m^{w}, b^{w}, f^{w}, p^{w}$ ．

| C－ | Vowel Order |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $1^{\text {st }} \mathrm{Ca}$ | $2^{\text {nd }} \mathrm{C}+u$ | $3^{\text {rd }} \mathrm{C}+i$ | $4^{\text {th }} \mathrm{C}+a$ | $5^{\text {th }} \mathrm{C}+e$ | $6^{\text {th }} \mathrm{C}(+2)$ | $7^{\text {th }} \mathrm{C}+\mathrm{O}$ |
| $k^{j}$ | K | 耏 | ñ． | $\boldsymbol{\gamma}$ | K | H | Y |
| $g^{j}$ | Y | \％ | Y． | \％ | I | व | $y$ |
| $k^{\prime}$ | $\boldsymbol{\$}$ | ¢ | ¢ | \＄ | $\boldsymbol{¢}$ | ¢ | $\underset{\text { ¢ }}{ }$ |
| $\chi^{j}$ | \％ | 第 | 光． | \％ | 党 | 第 | \％ |

TABLE 7：Additional syllabographs for palatalised velars in Gurage．
The palatalised velars are uniformly marked by a diacritic hook ${ }^{\vee}$ on top of the syllabograph for the corresponding plain velar．${ }^{19}$

Rounded labials are indicated by the labialisation diacritics of velars（cf． Asteraye et al．1999：4－5）．Note that the labialised grapheme for the $5^{\text {th }}$ order already existed in the extended Ethiopic alphasyllabary for Amharic（cf．table 5）．

| C－ | Vowel Order |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $1^{\text {st }} \mathrm{Cä}$ | $2^{\text {nd }} \mathrm{C}+\mathrm{u}$ | $3^{\text {rd }} \mathrm{C}+i$ | $4^{\text {th }} \mathrm{C}+a$ | $5^{\text {th }} \mathrm{C}+e$ | $6^{\text {th }} \mathrm{C}(+2)$ | $7^{\text {th }} \mathrm{C}+0$ |
| $m^{w}$ | $\boldsymbol{\sigma 0}$ |  | ＊\％， | 9 | 0 | 9＊＊ |  |
| $b^{w}$ | $0{ }^{\circ}$ |  | 04 | 0 | 0 | $0{ }^{0}$ |  |
| $f^{w}$ | 68 |  | 6 | 4 | 40 | ¢ |  |
| $p^{w}$ | T |  | T | T | T | T |  |

TABLE 8：Additional syllabographs for rounded labials in Gurage．
Additional modifications occur for writing new consonants in languages like Benchnon（Omotic）or Me＇en（Nilo－Saharan）（cf．Asteraye et al．1999：5）．

Vowel length and gemination are less frequently indicated in the Ethiopic alphasyllabary，even if they are phonemic．The first convention for indicating vowel length is found in Oromo，in which the five short vowels $/ \mathrm{a}, \mathrm{e}, \mathrm{i}, \mathrm{u}, \mathrm{o} /$ contrast with their long counterparts．The original qualitative contrast be－ tween the $1^{\text {st }}$ and $4^{\text {th }}$ order vowels $a ̈$ vs．$a$ ，and the $3^{\text {rd }}$ and $6^{\text {th }}$ order vowels $i$ vs．a in the Ethiopic alphasyllabary was given a length interpretation to distinguish between short $a$ vs．long aa，and long ii vs．short $i$ in writing Oromo（Gragg 1997：168），as，e．g．in short $\mathbf{n}$（ba）vs．long $\mathbf{Q}\langle$ baa）．Length distinctions for the re－

[^26]maining vowels $/ \mathrm{u}, \mathrm{e}, \mathrm{o} /$ are not indicated. This convention was later also applied for writing Silt'e (Hussein 2010:49).

One version of the Harari script invented another way to distinguish between the five short and long vowels /a, e, i, $\mathrm{u}, \mathrm{o} /$ (Wagner 2004:357-359). The distinction between short $a$ versus long aa is represented by the graphemes for the $1^{\text {st }}$ and the $4^{\text {th }}$ order, as in Oromo. For the remaining vowels, the regular syllabograph indicates a short duration, while long vowels are marked by the additional glides $\boldsymbol{\omega} \cdot\langle\mathrm{w}\rangle$ and $\boldsymbol{e}\langle\mathrm{j}\rangle$ as matres lectionis. Syllabographs with front vowels, i.e. $\mathrm{C}+i$ and $\mathrm{C}+e$, indicate length by $\boldsymbol{\ell}(\mathrm{j})$, but the syllabographs with back vowels, i.e. $\mathrm{C}+\mathrm{u}$ and $\mathrm{C}+\mathrm{o}$, use $\boldsymbol{\sigma} \cdot(\mathrm{w}\rangle$, e.g. short $\mathbf{\Omega}$. $\langle\mathrm{bi}\rangle$ vs. long $\mathbf{\Omega} . \boldsymbol{\ell}(\mathrm{b}$ i j$) \sim[$ bii] or short $\mathbf{n}(\mathrm{bo})$ vs. long $\boldsymbol{\Omega} \boldsymbol{\omega} \cdot(\mathrm{bo} w) \sim[\mathrm{boo}]$. Furthermore, the syllabograph for the $6^{\text {th }}$ order represents a vowelless consonant. If it immediately precedes another syllabograph, gemination is indicated, e.g. $\boldsymbol{n 0}\langle\mathrm{b}$ ba〉 represents [bba].

In the Ethiopic script adapted for the Cushitic language K'abeena (cf. Moges 2005), the original syllabograph series based on $\boldsymbol{\hbar}$ ( 3 ä $\rangle$ following another syllabograph was reemployed as marker for long vowels, while gemination is marked as in Harari. In Bilin (Cushitic), the basic syllabograph $\boldsymbol{v}$ (hä), originally pronounced as ha (cf. Footnote 9), became the conventionalised representation of the syllable hä (Fallon 2006:93). Furthermore, the syllabograph $\overline{7}$ - given as $\left\langle\mathrm{x}^{\mathrm{w}}\right\rangle$ in Fallon (2006:95) - encodes a labialised velar in Bilin, but spirantised $\chi$ in other languages.

## [6] SPREAD OF THE ETHIOPIC SCRIPT

Languages other than Gəəəz were rarely written in the Ethiopic script before the $19^{\text {th }}$ century (Hornus 2006:15). A remarkable exception is Amharic, in which several literary specimens are extant - the oldest are probably panegyrics praising Ethiopian kings from the $14^{\text {th }}$ century (cf. Meyer 2011a:1179 for an overview). Between the $16^{\text {th }}$ and $17^{\text {th }}$ centuries, Catholic missionaries proselytised in Amharic for which they prepared catechisms (Meyer 2011b:1214). Moreover, they taught children reading and writing in Amharic and Tigrinya, as well as in Portuguese (cf. Cohen \& Martínez 2007:280; Pankhurst 1976a:310). When the missionaries were expelled in the first half of the $17^{\text {th }}$ century, Gəəəz again became the main literary language for almost another two hundred years, during which time the Ethiopian Orthodox Church transmitted the skills to read and write in the Ethiopic script (Hornus 2006:19).

The Ethio-Eritrean region was already known in Europe in the Middle Ages due to the presence of Ethiopian Orthodox priests in Jerusalem and Rome. At that time, European scholars referred to Ethiopia by the term India and used Chaldaic as the name for the Ethiopic script (Hornus 2006:27; Kelly 2015). At the
beginning of the $16^{\text {th }}$ century, the German Johannes Potken created the first Ethiopic letters for printing, in which the Psalters in Gəəəz were published in 1513 (cf. Fiaccadori \& Juel-Jensen 2007:136; Hornus 2006). In the second half of the $17^{\text {th }}$ century, another German, Hiob Ludolf, established a lasting scientific cooperation with the Ethiopian monk Abba Gregorius (i.e. Giyorgis), whom he met in Rome. Subsequently, Ludolf published grammars and dictionaries for Gə`əz and Amharic, and a historical cultural treatise on Ethiopia (Ludolphus 1982; cf. also Hammerschmidt 1965:258-259; Beltz 1985). These works, however, remained unrecognised in the Ethio-Eritrean region. ${ }^{20}$

European interest in Ethiopia and Eritrea increased at the beginning of the $19^{\text {th }}$ century, when Protestant and Catholic missionaries started proselytising by using local vernacular languages. Among the first languages to be reduced to writing in the Ethiopic script were Tigre and Tigrinya (both Semitic), but also Bilin and Oromo (both Cushitic) (cf. Hammerschmidt 1994:320).

The first linguistic description of Tigre dates back to 1868 (Morin 2011:11501151; Voigt 2009:155). In 1871, Swedish missionaries adapted the Ethiopic script for writing Tigre, in which the Gospel according to Mark was published in 1889, and the New Testament in 1902 (Frantsouzoff 2010:584). The first novel in Tigre appeared in 2007. Muslim Tigre refused to use the Ethiopic script; instead, they use an adapted Arabic script (Morin 2011:1150). According to Cohen \& Martínez (2007:280), Tigrinya was first written at the beginning of the $17^{\text {th }}$ century. Ghirmai (1999:68), in contrast, only considers the Gospels published in 1866 as the beginning of Tigrinya literacy, even though linguistic and missionary work in Tigrinya started earlier (cf. Praetorius 1879:9-14).

In 1857, the Catholic missionary Giuseppe Sapeto published a multilingual vocabulary in which Bilin is written in the Ethiopic script. The publication of the Gospel of Mark followed in 1882 (Fallon 2006:93). In 1996, however, the Ethiopic script was replaced by a Roman script for writing Bilin (Fallon 2006:97).

Printing in Oromo started in 1839, when the French geographer EdméFrancois Jomard published a collection of prayers, love songs and war chants, which he obtained from a freed slave in Paris (Pankhurst 1976b:172-174). At almost the same time, Karl Tutschek took care for the education of another freed Oromo slave in Germany, with whom he published the first Oromo dictionary in 1844 followed by a grammar in 1845 (cf. Gragg 1976:167). In Eritrea and Ethiopia, missionaries were working on Oromo from the 1830s, resulting in the publication of grammatical sketches, vocabularies, and text collections from 1840 onwards (Gragg 1976:167-168). The early Oromo publications were

[^27]written in a modified Roman script, which, however, was replaced in the 1870s by the Ethiopic script through Onesimus Nesib - a freed Oromo slave educated in the Swedish missionary school at Munkullo (cf. Gragg 1976:168; Frantsouzoff 2010:584; Smidt 2010:70).

The $19^{\text {th }}$ century also brought about major changes in language matters at the Ethiopian royal court, by promoting Amharic as the only official language. Emperor Tewodros II (r. 1855-1868) ordered his royal chronicle to be written in Amharic, disregarding the old tradition of Gə`əz being the exclusive literary language. His successor, Yohannis IV (r. 1872-1889), reinstated Gə`əz as the written language, but under Menelik II (r. 1889-1913) Amharic eventually replaced $G^{`} \partial z$ and became the main literary language. Menelik II appointed Am-haric-speaking officials as administrators in newly annexed areas in the south, in which it subsequently became the de facto lingua franca (cf. Meyer 2011b:1214). In addition, Amharic was spread and promoted through schools since the introduction of modern education at the beginning of the $20^{\text {th }}$ century (Pankhurst 1976a:315). In early missionary schools and during the Italian occupation, various Ethiopian and foreign languages were used in modern schools. In 1944, however, Haile Sellassie I (r. 1930-1974) ordered by decree that Amharic be the only means of instruction in primary education and that English be the principal foreign language in secondary education (cf. Meyer 2011b:12141215). Subsequently, Amharic was declared the sole national language of Ethiopia in 1955. Although the DERG, i.e. the socialist government of Ethiopia from 1974-1991, also provided other Ethiopian languages with a de jure official status, de facto Amharic retained its dominant position. As less than $10 \%$ of the population was literate at the beginning of the 1970s, the DERG gave priority to the eradication of illiteracy (McNab 1990:70). Literacy campaigns were organised between 1979 and the mid-1980s, in which several Ethiopian vernacular languages were used for adult literacy education (McNab 1990:74). Initially, only the major languages Amharic, Oromo, Tigrinya, Wolaitta and Somali were utilised, but later languages with fewer speakers were added, namely Gedeo, Kambaata, Hadiyyisa, Kunama, Tigre, Afar, Saho, Kafa, Sidaama and Silt'e. New orthographies based on the Ethiopic script were prepared for Afar, Saho, Kafa, Sidaama and Silt'e (McNab 1990:73; Wedekind 1994:822-823). The DERG deliberately decided to use only the Ethiopic script for writing Ethiopian languages, which was institutionally organised and supervised through the National Language Academy. Previously, the Ethiopic script had been spread by native speakers or missionaries who individually adapted it for writing Ethiopian languages (Asteraye et al. 1999:3).

The Ethiopic script spread further after 1991, when the current Ethiopian
government granted all ethnolinguistic groups the right to utilise their native languages in their own administrative regions. Initially, languages belonging to different language families - for instance the Cushitic K'abeena, Awngi and Xhamtanga, the Omotic Bench and Koorete, and the Nilo-Saharan Anywa and Me'en - were written in a modified version of the Ethiopic script (cf. Asteraye et al. 1999:2; Azeb 2010:193).

A side effect of the missionary activities in the $19^{\text {th }}$ century was the introduction of printed materials in the Ethiopic script to Ethiopia and Eritrea; the first printed book in the Ethiopian script probably arrived there in 1810 (Hornus 2006:39). ${ }^{21}$ This is remarkable, as missionaries generally preferred Romanbased orthographies for the codification of African languages (cf. BendorSamuel 1996).

In the second half of the $19^{\text {th }}$ century, printing presses were already established in various Ethiopian and Eritrean towns (cf. Pankhurst 2010). However, the production of literacy materials in languages with new or modified syllabographs in the Ethiopic script was not without its challenges. As specific characters were often not available on typing or printing machines, they had to be marked by hand (McNab 1990:78). The increasing availability of electronic communication technology in public and private spheres from the late 1990s onwards helped to solve this problem by establishing Ethiocode (ES 781:2002) in 2002 as a standardised Unicode format for the Ethiopic script, with further extensions under Unicode 3.0 (Daniel 2006; Asteraye et al. 1999). Thus, the Ethiopic script and its modifications were eventually institutionalised on an international level.

## [7] SCRIPTS IN ETHIOPIA AND THEIR SOCIAL CONNOTATIONS

Writing in the Ethio-Eritrean region began in the foreign languages of Sabaic or its local variety Pseudo-Sabaic, and Greek. When Aksum evolved as a powerful empire in the Horn of Africa at the beginning of the $1^{\text {st }}$ millennium AD, inscriptions in the vernacular language Gəəz, probably the dominating native language at the royal court, began to appear in the Ethiopic abjad script (cf. [2]). The invention of a writing system for Gə`zz and its subsequent use in inscriptions was certainly intended to demonstrate the sovereignty of the Aksumite emperors.

The transformation of the Ethiopic abjad to an alphasyllabary in the $4^{\text {th }}$ century coincided with the promotion of Christianity as state religion and the foundation of the Ethiopian Orthodox Church, which was followed by the translation of the scriptures and religious treatises into Gəəəz (cf. [2]). From the $4^{\text {th }}$ to

[^28]the $19^{\text {th }}$ centuries, the Ethiopian Orthodox Church was the sole institution for teaching reading and writing Gə`əz in the Ethiopic script (cf. Pankhurst 1976a). Although Gə`əz ceased being spoken as a native language between the $8^{\text {th }}$ and $10^{\text {th }}$ centuries, it was maintained as a liturgical language in the Ethiopian Orthodox Church (Richter 1997:543). Moreover, a diglossic situation prevailed in the Christian Ethiopian kingdom in which Gə`zz functioned as the written language, while Amharic was the spoken lingua franca at the court, in regional administration, and in the military (cf. Cooper 1976:289; but also Meyer 2011b:1213-1214). Consequently, Gəəz and the Ethiopic script, in which it was written, became closely associated with Ethiopian Orthodox Christianity and the Ethiopian royal court.

Beside G``zz, Arabic has been in use for a long time in Muslim states and communities in the Ethio-Eritrean region, in which it functions as a religious language and as a medium for writing. Continuing to the present, Arabic is taught in Quran schools all over Ethiopia and Eritrea (Wetter 2006:51). Although as early as 615 followers of the Prophet Mohammed found refuge in Aksum, the spread of Islam in the Ethio-Eritrean region is ascribed to Arabian merchants and travellers (Wetter 2006:52; Abbink 1998:111, 113). The foundation of the Sultanate of Shewa as the first Muslim state in 896 was soon followed by others, including the city state of Harar, which developed into an important centre of medieval Muslim scholarship (Wetter 2006:52). In the $18^{\text {th }}$ century, centres of Islamic learning were established in eastern Wello, which attracted Muslims from other areas (Wetter 2006:53). Islamic teaching was often conducted in vernacular languages, since many Muslims had only a limited command of Arabic. According to Drewes (1976:186), Sheikh Țalha from Wello was the first to utilise Amharic for his religious teachings in the $18^{\text {th }}$ century. Modified Arabic scripts, known as Ajäm, were created for writing Harari, Amharic, Argobba, Oromo, Silt'e and probably other languages (cf. Wetter 2006:5354; Mumin 2009:33-40). Except Harari (cf. Banti 2005:74-79; Wagner 1983:9-16), the Ajäm literature in these languages is still not fully studied (cf. Pankhurst 1994:257-259).

Apart from a few attempts by Catholic missionaries to teach Portuguese in the $17^{\text {th }}$ century (Cohen \& Martínez 2007:280), the Roman script was only introduced into the Ethio-Eritrean region at the end of the $19^{\text {th }}$ century, when it was used for the codification of vernacular languages, as well as in foreign education. Thus, Italian first served as the medium of instruction in a missionary school in Asmara in 1897, but then became the dominant foreign language during the Italian occupation (Pankhurst 1976a:313-314). When Menelik II opened the first government school in Addis Ababa in 1908, French became the medi-
um of instruction, while Italian, English, and Amharic were only subjects (Pankhurst 1976a:315). Since the 1950s, English has been the dominant foreign language, being taught as a subject in primary education, but then functioning as the medium of instruction in secondary and tertiary education. It is only since 1991 that the Roman script has been widely used for writing vernacular languages. ${ }^{22}$

Most autochthonous scripts in Africa came into existence after the 1950s, a development which is probably related to the strengthening of independence movements (Voogt 2014:137-138). Ahmed (2005) mentions that Harari was written in an "ornamental secret" script until the 1970s. In addition, Sheikh Bakri Sapalō invented an alphasyllabary for Oromo during the 1950s, which differs from the Ethiopic script in the form of the syllabographs and contains diacritics for vowel length and gemination (cf. Hayward \& Mohammed 1981). Sheikh Bakri Sapalō was probably influenced by indigenous scripts for Somali from the 1920s and 1930s, like the Osmania or Gadabuursi scripts (cf. Tosco 2010; 2015). As Harari and Oromo were already written languages at that time, the invention of the autochthonous scripts could well be personally motivated. ${ }^{23}$

The use of several scripts for writing a single language is not infrequent. Since 1991, Oromo has been officially written in Qubee, a modified Roman script that replaced the previous writing system based on the Ethiopic script. Moreover, some Muslims still write Oromo in an Ajäm script. A similar case is Harari (cf. Wagner 2004). It was written in Ajäm until the 1980s, which was replaced by a modified Ethiopic script in 1986. In addition, Harari was written in the abovementioned secret script, and also in a modified Roman script for a short period after 1991. In the 1990s, K'abeena was was reduced to writing in a modified Ethiopic script (cf. §[4.4]), which was then replaced by a Roman script in 2014. There are plenty of other similar examples.

The use of a particular script for writing a language often has social implications (cf. Coulmas 2000; Moges 2010:120). Thus, Muslims strongly preferred to write in Arabic or in Ajäm scripts, as they connected the Ethiopic script straightforwardly with Christianity (Wetter 2006:53). Furthermore, the Ethiopic script is commonly associated with Amhara's domination (cf., e.g. Tilahun 2000). Consequently, some ethnolinguistic groups abandoned the Ethiopic script in favour of a Roman script after the fall of the DERG in 1991 (cf. Azeb 2010:192). This process started with the replacement of the Ethiopic script for
[22] Cf., e.g. Moges \& Turton's (2005) suggestion for a Mursi script.
[23] With regard to Sheikh Bakri, for instance, Mohammed (2003:157) states, "his ultimate objective was to glorify Afaan Oromo with its own writing system ..."

Oromo by Qubee in 1991 (Mekuria 1997:349). Subsequently, the Ethiopic script of other Cushitic and Omotic languages was replaced by a Roman-based orthography, including Sidaama (cf. Yri 2004), Afar, Gedeo, Hadiyyisa, Kambaata (cf. Treis 2008:54-56) and Wolaitta (cf. Hirut 2005; 2014).

It is generally argued that the Roman-based orthography provides a better representation of the phonology, as it can easily mark vowel length and gemination. ${ }^{24}$ This is certainly true to some extent, but is not the only reason. Replacing the Ethiopic script with a Roman-based orthography seems to be a symbol of linguistic independence and cultural emancipation vis-à-vis the suppression of ethnolinguistic differences under the umbrella of national unity during the reign of Haile Sellassie I and the DERG. More recent script changes, however, are rather a sign of loyalty or disloyalty to the immediate neighbours with whom a group wants to be formally associated - or not. For instance, the official announcement of a modified Ethiopic script for writing Gurage in 2014 was followed by the decision of the K'abeena to replace their former Ethiopic script with a Roman-based orthography. As the K'abeena are a minority group within the Gurage Zone, this decision clearly emphasises their linguistic and cultural differences to the surrounding Gurage, but connects it to other speakers of Cushitic languages in the region.

## [8] SUMMARY

The Ethiopic script has a long history, in the course of which it was modified in several ways. The Ethiopic abjad script was adapted from the South Arabian script, but soon changed into an alphasyllabary - probably inspired by Indic scripts - which also included additional graphemes and numerals due to Greek influence. When the Ethiopic script was utilised to write languages other than Gə`əz, its syllabographs were modified to represent new sounds.

Initially, Gə $\partial z$ - the language of the royal court and later of the Ethiopian Orthodox Church - was the only language written in the Ethiopic script. Even after $\mathrm{Ga}^{〔} \partial z$ ceased being spoken, it was retained as the language of the liturgy in the Ethiopian Orthodox Church and as main literary language at the royal court until the $19^{\text {th }}$ century. At that time, the political interests of Ethiopian emperors favoured Amharic as the written language at the court. This was soon followed by the introduction of modern education, mass media, and printing presses in which Amharic was the dominant language. Although a number of vernacular languages were reduced to writing in the Ethiopic script in the $19^{\text {th }}$

[^29]century and later, serious attempts to use them for mother tongue education have only occurred since 1991.

This development evidences that the Ethiopic script can easily be adapted to the needs of specific languages. However, in addition to writing, the script also has a social implication. As the Ethiopic script was mainly used for writing Ga`əz, the liturgical language in the Ethiopian Orthodox Church, both of them were tightly connected with Christianity. Therefore, the Ethiopic script was disliked by Muslims who preferred Arabic or Ajäm scripts. Catholic missionaries in the \(17^{\text {th }}\) century, by contrast, avoided Gə`əz, but used the Ethiopic script for writing Amharic, the spoken lingua franca at the royal court. Only after the $19^{\text {th }}$ century did Ethiopian rulers actively promote Amharic and the Ethiopic script as a unifying bond for the Ethiopian nation, by suppressing the use of other vernacular languages in official domains and by prohibiting the use of other scripts for writing vernacular languages. As a result, many ethnolinguistic groups in Ethiopia prefer to write their language in a socio-cultural neutral Roman-based orthography in order to signal their linguistic and cultural autonomy within the current Ethiopian state.

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# VISUAL RECOGNITION OF GRAPHIC VARIANTS OF AMHARIC LETTERS: PSYCHOLINGUISTIC EXPERIMENTS 

FEDA NEGESSE AND DERIB ADO

## ABSTRACT

One of the problems of Amharic orthography is a lack of consistency where the four Amharic sounds (/h/, /h/, /s/ and $/ \mathrm{s}^{\prime} /$ ) are mapped onto more than a single letter. The objective of these psychological experiments was to investigate the visual recognition of the graphic variants of the letters, both in isolation and within words. The experiments involved computation of the frequency counts of the letters in the Ten Ten Corpus for Amharic and the result revealed that there is a clear pattern of preference for the letters: the letters representing /h/ had the pattern <U> < $\boldsymbol{h}\rangle$ <" $\rangle$, the letters representing / $1 /$ had the pattern $<\lambda\rangle<0>$, the letters representing /s/ had the pattern <i>> $\langle\omega\rangle$, and the letters representing /s'/ had the pattern $<\boldsymbol{\gamma}\rangle\langle\theta>$ in descending order of frequency. Similarly, the experiments indicated that frequency counts are significantly related to visual recognition of a letter, with the more frequent letters recognized faster with fewer errors. It was also observed that the target letters were recognized with a shorter reaction time when they were paired with themselves, but the recognition time was longer when they occurred with their graphic variants. Moreover, significantly higher percentage of errors were made when the target letters were matched with their graphic variants or their distractors in the alphabet recognition task. Similar patterns were also observed in the lexical decision task when the target letters were presented in words and pseudo-words. More rigorous psycholinguistic experiments, which will involve a large number of participants, are recommended to validate the results of the current experiments.

## [1] INTRODUCTION

There is a large body of empirical evidence which shows that letters constitute the smallest perceptual units in visual recognition of words (Fiset et al. 2008). For instance, Pelli et al. (2003) reported that a word cannot be read if its letters are not separately decoded. Employing a masking technique, they observed that the stimulus energy for the recognition of a word is directly related to the number of letters. Similarly, Martelli, Majaj \& Pelli (2005) found that word
recognition starts with the identification of individual letters and this finding is inconsistent with the Gestalt view that words are holistically recognized (Pelli, Farell \& Moore 2003). In Hong Kong, where early reading focuses on identification of logograms or characters, children found it difficult to read English words by associating graphic symbols with their corresponding sounds, but when taught phonemic awareness, they showed a significant improvement in their word recognition skills (McBride-Chang \& Treiman 2003). A study conducted by Share and Gur (1999) also indicated that alphabetic and phonological skills play a key role in the improvement of word recognition ability of children in early reading. The studies reviewed above point to the importance of letters in word recognition.

## [2] VISUAL LETTER RECOGNITION

Two contradictory views exist to explain the processes of word recognition, which also cast light on the visual recognition of letters. The orthographic depth hypothesis states that graphic symbols which constitute a word are changed into sounds and then into a phonological representation of the word before semantic recoding (Chitiri \& Willows 1994, Cho \& Chen 1999). However, in logographic languages, word recognition depends on the visual decoding of a word as a whole unit directly into its semantic representation without a phonological interface (Huang \& Hanley 1994, Ju \& Jackson 1995). On the other hand, according to the universal phonological principle, word recognition involves an automatic activation of phonological information, irrespective of orthography (Lesch \& Pollatsek 1993, Lukatela \& Turvey 1994). Common to both views is that word recognition begins with the decoding of letters or logographs, which are composed of physical features such as vertical, diagonal or horizontal lines, closed or open curves, and intersection (Gibson 1969). These features constitute basic structures or global shapes of letters, and it is believed that identifying these global features is enough for the visual system to recognise letters (James et al. 2005). Nonetheless, studies (Sanocki 1992, Sanocki \& Dyson 2012) indicate that response time is shorter when strings are presented in the same font and that lowercase letters are easier to recognize, which means readers also decode information about shapes or fonts of letters.

There has been a lot of evidence from neurological studies which identified neural substrates related to processes, which are responsible for the decoding of features of letters. For example, Hubel and Wiesel (1968) noted that there were cells that appeared to be especially sensitive to visual stimuli, which mapped onto such things as vertical lines, horizontal lines, angles, and even motion. The objective of this investigation was to provide the neurological evi-
dence that converged with the notion that pattern recognition ultimately depends upon primitive feature analytic processes. Using positron emission tomography, Petersen et al. (1990) found a significant flow of blood variations in specific areas of the cortex, corresponding to feature-like detection systems in humans. In addition, an event-related potential study indicated that while processing letter shapes, subjects can have access to top-down information found in visual word form representations (Martin et al. 2006). The visual system does not scan letters in a sequence, rather it extracts features of letters simultaneously in a word (Rayner \& Johnson 2005, Adelman, Marquis \& Sabatos-DeVito 2010). Letter-by-letter reading is not the behaviour of normal readers and is considered a neural deficit associated with a reader's inability to fixate a chunk of letters (Pugh et al. 2001, Rayner \& Johnson 2005). Taken together, the studies reviewed above suggest that letter recognition in words involves parallel processes where letter features can be directly decoded from the incoming stimuli or /and where the information about letter identity can be retrieved from memory.

## [3] factors affecting visual letter recognition

Previous studies indicate that spatial resolution, contrast, letter case, disposition of the human visual system, and the type of cognitive activity needed are factors which influence letter identification tasks: Pelli, Palomers \& Majaj (2004), Grainger, Tydgat \& Issele (2010), Demirel, Anderson, Dakin \& Thibos (2012), Kwon \& Legge (2013). One such study was conducted by Arguin et al. (2008) who reported that when compared with other features (curves open right, curves open bottom, verticals, slants tilted left, curves open top, intersections, slants tilted right and horizontals), terminations provide more vital information for differentiating letters. They argue that the weight given to letter terminations can be influenced by our visual system, which tends to focus on such features. The visual system seems to draw more on one feature when the other one fails to provide all the required information. When the spatial resolution is poor, the system needs higher contrast to identify letters (Kwon \& Legge 2013). On the other hand, an experiment conducted on English uppercase letters shows that removal of vertices of letters impedes identification more than that of midsegments, as filling in the missing information may be difficult when vertices are deleted (Lanthier et al. 2009). The studies are contradictory; rather they suggest that the letter features compensate one another and the visual system utilizes available information to identify letters and some features carry more weight than others.

Several studies show that letter frequency seems to influence timed tasks
such as letter matching, naming and classification tasks, but it does not appear to affect accuracy in identification tasks (Appelman \& Mayzner 1981). Behavioural studies also documented that contexts are one of the key factors which affect recognition of letters. It is also reported that letters are recognised faster in words than in isolation and they are better identified when put in words than in nonwords, or in pronounceable rather than unpronounceable nonwords (Coch \& Mitra 2010). In addition, Rey \& Schiller (2005) indicated that the recognition of a letter takes longer when it is embedded in a complex grapheme (e.g. 'A' in BREAD) than when embedded in a simple grapheme (e.g. 'A' in PLACE). It is speculated that the letter ' A ' in the word, BREAD competes with three vowel graphemes whereas it competes with only two vowel graphemes in the word, PLACE, taking relatively shorter time. Probably, it seems more difficult to recognise a letter in a complex grapheme than in a simple grapheme (Rey et al. 2000). On the contrary, a word context helps readers to predict the remaining letter(s) based particularly on the first letters, a phenomenon termed as phonemic restoration (Kashino 2006). For instance, an English reader can predict the last letter of the word 'fable' as there is only one possible candidate. Related to the tendency of readers to attend to some letters of a word is the observation that they fixate first and longer on the first letters than on other letters in the word, which suggests that readers are perceptually biased towards letters in an initial position, due to their relative importance (Evans et al. 2009).

## [3] FEATURES OF AMHARIC ORTHOGRAPHY

Orthographies are ingenious human creations, which have evolved over centuries to represent various linguistic elements of the spoken language such as phoneme, syllable, and morphophonemes (Frost 2005). One such invention is Amharic orthography or fidel, in which each character has seven orders, representing syllabic combinations of consonants and vowels. The Amharic writing system is dominantly syllabary (Leslau 2000) but some writers (Moges 2010, Leslau 2000) argue that it is alphasyllabic as the sixth order of fidel can occur with or without the central high vowel in different positions in words ( e.g. $<\mu<>/$ /s9ra/ 'work' ; < $\omega \mathrm{C}>/ \mathrm{ss} /$ / 'root'). The language has 33 basic syllabographs and 231 ( $33 \times 7$ ) variants composed of the basic syllabographs and the seven vowels (TABLE 1).

| $1^{\text {st }}$ | $2^{\text {nd }}$ | $3{ }^{\text {rd }}$ | $4^{\text {th }}$ | $5^{\text {th }}$ | $6^{\text {th }}$ | $7^{\text {th }}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $v$ | $u$ | \％ | 4 | \％ | $v$ | U |
| 1 | $\cdots$ | 4. | 1 | \％ | ล | to |
| ＊ | ds | d． | d | db | ¢ | ${ }_{\text {d }}$ |
| av | av－ | ${ }^{\text {a }}$ \％ | ${ }_{9} 9$ | ${ }_{\square}{ }_{8}$ | qD | q0 |
| $\omega$ | ${ }^{\sim}$ | ㅆ． | 씨 | 以 | $\mu$ | $\psi$ |
| 4 | 4 | 6 | 6 | 6 | c． | $\mathfrak{C}$ |
| a | － | d． | $\dagger$ | ¢ | ì | j |
| $\pi$ | 第 | K． | $\pi$ | 鴯 | त | $\pi$ |
| 中 | 中 | 中 | ，${ }^{\text {d }}$ | \＄ | ¢ | \＄ |
| 0 | $0 \cdot$ | n． | $\cap$ | n | $\cdots$ | 0 |
| ＋ | ＊ | t | ； | b | ＋ | \％ |
| 年 | 年 | 军 | \％ | 管 | 第 | 并 |
| ¢ | $\cdots$ | ＇2． | ； | ＇b | ${ }^{4}$ | q |
| 4 | 4 | \％ | 9 | b | 3 | 9 |
| \％ | $\cdots$ | \％ | \％ | \％ | 3 | \％ |
| $\hbar$ | 京 | h | h | \％ | $\cdots$ | \％ |
| $\mathrm{h}$ | $n$ | h． | $\eta$ | h | h | n |
| గ | 管 | ¢． | 斤 | \％ | ¢ | ¢ |
| － | ${ }^{\circ}$ ． | Q | $\varphi$ | ¢ | $\cdots \cdot$ | ¢ |
| 0 | $0 \cdot$ | $\mathrm{q}_{4}$ | 9 | $\mathrm{ab}_{\text {b }}$ | o | $\rho$ |
| H | ＋ | H． | H | H | H | H |
| Tr | ${ }^{7}$ | T． | $\uparrow$ | ${ }^{6} 6$ | \％ | Tr |
| $p$ | $\rho$ | $\rho$ | $\rho$ | $\rho_{0}$ | ， | $p$ ． |
|  | ¢ | $\cdots$ | $\stackrel{9}{9}$ | $\rho_{0}$ | $\rho$ | $\stackrel{8}{8}$ |
| $\pi$ | $\sigma_{r}$ | 爵 | $\xi_{i}$ | ？ | R | \％ |
| 7 | 7 | 2 | ？ | 2 | ๆ | $\dagger$ |
| $\cdots$ | $\pi \cdot$ | a． | 9 | $\square$ | T | $\cdots$ |
| ↔ | $\square$ | ณ1． | $\square_{6}$ | ↔ | ${ }_{\text {g b }}$ | $6^{63}$ |
| \％ | 名 | \％ | \％ | \％ | 安 | \％ |
| 2 | 8. | 2. | 2 | 2 | \％ | 2 |
| $\theta$ | $\theta$ | 2 | 9 | q | a | 9 |
| 6. | 4. | 6 | 4 | 60 | 9. | 6． |
| $T$ | F | T | ， | T | T | T |

TABLE 1：List of Amharic basic letters（fidel）with their corresponding seven or－ ders，where the shapes are constrained by the vowels they represent．The let－ ters for the borrowed and lately included＜ $\overrightarrow{\boldsymbol{n}}>$ and the symbols for labialized consonants are not on the list．

The first order appears to be the basic form, while the rest are derived when the structure of the basic letter is modified in some regular ways. The structural change in the first order, which is a combination of the consonant and the vowel $/ 3 /$, is intended to represent the remaining six vowel letters (/a/, /e/, $/ \mathrm{u} /, / \mathrm{o} /, \mathrm{i} /, / з /, / 9 / 1$. The change involves modifying the structure of the basic character by adding a straight line, or shortening or lengthening one of its main legs. It also includes the addition of small extensions, such as strokes, loops to the right, left, top or bottom of the basic character, which helps to derive the other vowels (TABLE 1). Amharic letters have similar shapes, which may make the task of recognition hard for machine and humans (Bloor 1995). These features are particularly interesting in research on visual letter recognition, because in alphasyllabic languages such as Amharic small changes in the basic physical features may affect orthographic identities of letters and phonological representations of their vocalic components.

Unlike English and other languages which employ Latin-based writing systems, Amharic does not have lower and upper cases. However, Amharic letters can be written in different fonts, as with any other language, but the fonts may not be as important as the shapes of the letters because the shapes constitute structures that determine the identity of the consonant and the corresponding vowel. Skilled readers of the language know that they have to pay close attention to the physical features of the characters, since they could easily miss the vowel signs which are structural parts of the consonants found in different orders (table 1).

The other distinguishing feature of Amharic orthography is orthographic inconsistency, where some phonemes are represented by more than one character or letter (Ziegler, Ferrand \& Montant 2004, Ranbom \& Connine 2011). This overrepresentation of some phonemes is attributed to the historical fact that the Amharic orthography has evolved from Ge'ez, in which the redundant letters stand for distinctive sounds but latterly merged to represent a single phoneme and were inherited into the Amharic orthography (Daniels, 1999). From a linguistic point of view, we wondered how frequently the redundant letters are used in representing their corresponding phonemes. We also ask if users of the language recognise the redundant letters and their graphic variants differently in terms of reaction time and response accuracy. In addition, we wondered how much gender and frequency of use interact with the visual recognition of the redundant letters. Finally, we raise the issue of context, to know if the redundant letters are recognised faster in isolation than in words. To our knowledge,

[^30]no study has been carried out to answer the above questions and thus our intention is to conduct psycholinguistic experiments to find answers for the questions.
[4] method
We conducted two related experiments and the first experiment was intended to assess the recognition of the redundant letters in isolation, while the second experiment was aimed at examining the recognition of the letters in words. The methods employed in both psycholinguistic experiments were similar and thus no separate descriptions of method was needed for each experiment.

## [4.1] Participants

Thirty students who were enrolled in the summer and evening programs at the College of Education and Behavioural Sciences, and the College of Humanities, Language Studies, Journalism and Communication participated in the experiments. All of them were native speakers of Amharic and they reported no medical histories such visual, motoric and intellectual impairments which could interfere with their involvement in the experiments. The number of female and male participants is equal and their average age was 32 , with the standard deviation of 1.5 . The participants took part in the experiments on a voluntary basis and were told that they could withdraw at any time in the course of the experiments.

## [4.2] Stimuli

There were two sets of stimuli for the alphabetic and lexical decision task experiments. In the alphabetic decision task, the target letters were paired up with themselves (e.g., <' $h>$ both representing / $/ \mathrm{a}$ / ) , with their graphic variants (e.g. < $\lambda 0>$ both representing / Ra/), and with distractors (e.g. < $\lambda \lambda>$ the first one representing $/ \mathrm{a} a$ and the second one representing $/ \mathrm{l} \varepsilon /$ ) representing different phonemes (figure 1). Only letters which have the same vowels were paired up, which means that letters in different fidel orders were not combined to make a pair. When the target letters were paired with the distractors, similarities in shape and size were considered.


FIGURE 1: A schematic pairing of the letter stimuli for the experiments: the lines linked the target letters with themselves, with their graphic variants and with other letters which served as distractors. The asterisk marks the distractors.

The total number of stimuli in the alphabetic decision task (4 pairing $x 3$ graphic variants x 7 orders +4 pairings of two graphic variants x 7 orders x 3 syllabographic kinds) is 164 . The stimuli were randomised and no stimulus was presented more than once. The frequency counts of the stimuli were calculated per million words in the corpus being developed by the Habit Project ${ }^{2}$ (figure 2).


FIGURE 2: Frequency counts of the letters computed per million words.
The intention in computing the frequency counts of the graphic elements was to see if frequency of occurrence in the text corpus being built by Natural Lan-
[2] The Habit project is a collaborative project between Masaryk University of Czech and the Norwegian University of Science and Technology, and University of Oslo. We are grateful to the Habit project for allowing us access to the Amharic Ten Ten text corpus.
guage Processing Centre of Masaryk University with the cooperation of Oslo University and Norwegian University of Science and Technology would affect a visual recognition of the graphic characters. It is possible to see that the three letters $\langle\boldsymbol{l}\rangle,<^{\prime} h>$ and $<u>$ are much more frequent than their graphic variants. The difference in frequency of occurrence between $<\gamma>$ and $<\theta>$ is not very large, but $<\lambda>$ is more frequent than its variant.

Most Amharic writers use the 'preferred' letter for those sounds which have more than one representation. For instance, in the Amharic Ten Ten corpus,

 million. The historically appropriate form (according to Ge'ez writing tradition) for the term 'king' is $\langle 37\rangle \nu\rangle$, but Amharic writers also use the form < $<77 . \lambda\rangle$. In the Amharic Ten Ten corpus, the preferred form $<^{3} 7 \uparrow \psi^{\mu}$ appears 97.5 per million and the other form <37 $\boldsymbol{i}>$ appears 56.33 per million, demonstrating that a significant portion of writers do not care about the etymology of words. It has to be noted that this count is found in a religious text dominated corpus, which is more conservative in selection of letters whenever there is more than one possibility. If one tries to include all other genres, the numbers will definitely be in favour of the free will use of the letters. It is probable that the letters may be losing their sociolinguistic value to instead just exist as graphic variants representing the same phoneme.

## [4.3] Apparatus

All the experiments were run with DMDX (Forster and Forster, 2003). The stimuli were presented on a 17 " HP LCD monitor with a refresh rate of 70 Hz and a resolution of 1280 by 1024 pixels, placed at a distance of about 60 cm from the participants. The monitor was controlled by a PC Core Duo (HP Precision 390). The stimuli were also presented in lowercase Courier New font 12, and appeared on the screen as black characters on a grey background.

## [4.4] Procedures

The experiment was conducted in our Phonetics Laboratory with HP PCs connected to high resolution LCD monitors. Stimuli presentation and data recording were controlled by DMDX software (Forster and Forster, 2003). A trial began with a centred $500-\mathrm{ms}$ fixation point ( + ) that was immediately replaced by the target word, which remained on the screen for a maximum of 1300 ms until a response was produced. For the alphabetic decision task, the participants were told to press the right shift key if the stimuli (a pair of letters) displayed on the screen represented the same phonemes and press the let shift key if the stimuli
represented different phonemes. For the lexical decision task, they were told to press the right shift key if the stimulus (a string of letters) displayed on the screen was a real word in Amharic and press the let shift key if the stimulus was not a real word in Amharic. The participants were told to respond as quickly and accurately as possible, without making many errors. Before the experiments, the participants familiarised themselves with the procedure by doing a short lexical decision task.
[5] Results
[5.1] Experiment 1
This experiment is an alphabetic decision task intended to assess (in isolation) the visual recognition of the graphic variants of Amharic letters which stand for the four Amharic phonemes. The results of the experiment are presented based on two variables: gender and stimulus type.

## Reaction Time

Gender is one of the variables that can affect reaction time to a graphic stimulus, and thus we wanted to know if there is a significant difference between female and male with respect to the reaction time in visual recognition of the graphic variants. As figure 3 shows, the male participants ( $\mathrm{M}=592.75 \mathrm{~ms}$ ) took significantly more time than the female participants ( 575.87 ms ) did in deciding whether the Amharic letters in question were the same or different $[F(1,30)$ $=8.79, P=0.003]$.


FIGURE 3: Reaction time of both genders in a same-different judgement task. The errorbars indicate $95 \%$ confidence intervals.

Because the recognition of letters is partly determined by their features, we expected that some target letters are recognised faster when they are presented with the same letters, than with their graphic variations. As explained earlier, we matched the target letter with itself (Self), its graphic variants (Allograph) and with a different letter (Distractor). We assumed that when a target letter is presented with itself, it would be easier to recognise than when it is presented with its graphic variant, or distractor, because of sameness of physical features and repetition priming.


FIGURE 4: The reaction time of the redundant Amharic letters and the reaction time was measured in milliseconds. The errorbars indicate $95 \%$ confidence intervals.

It is interesting to see that the reaction times of the letters were different when they were presented with themselves ( 532.04 ms ), their allographs $(621.84 \mathrm{~ms})$ and distractors ( 621.38 ms ). Consistent with our expectation, the reaction time of letters was very short when they were matched with themselves, which shows that the participants could more easily recognise the letters. The allographs and the distractors tend to take an almost equal amount of time to be processed by the participants and this suggests that visual recognition of the letters requires a similar amount of processing time. The difference is significant when the means of their reaction times were compared with One-way ANOVA [ $F(2,30)=151.00, P=0.00]$.

## Accuracy

As explained earlier, gender is one of the variables considered in the experiment to see it is linked to visual letter recognition. The experiment shows a clear gender difference in the percentage of correct recognition of the characters (figure 5). The female participants had a significantly greater percentage of accurate responses ( $77.2 \%$ ) in recognising the letters in isolation $\left[x^{2}(1,30)=\right.$ 8.64, $p=0.003]$, which is indicative of the association of gender and visual letter recognition.


FIGURE 5: The percentages of recognition accuracy of letter by male and female participants. The errorbars indicate $95 \%$ confidence intervals.

Percentages of accurate recognition were computed for the target letters (i.e. the most or more frequent letters), allographs and distractors in order to determine if the target letters received more correct responses than their graphic variants, which are relatively less frequent.


FIGURE 6: The percentages of recognition accuracy of letter by letter and stimulus types. The errorbars indicate $95 \%$ confidence intervals
figure 6 shows that the target letters ( $88.1 \%$ ) had significantly higher percentage of correct responses than their allographs or the distractors $\left[X^{2}(2,30)=329\right.$, $P=0.00$ ]. It is also interesting to see that the distractors ( $60.7 \%$ ) and the allographs ( $69.6 \%$ ) had a close percentage of accurate recognition, which may indicate that letter recognition requires processing their physical features. Alternatively, the participants might have decided if the letters in pairs were different or the same by matching their features, since matching letters with themselves and with their phonological representations may be easier due to repetition priming and phonological consistency.

## [5.2] Experiment 2

The second experiment was concerned with the visual recognition of Amharic graphic variants in words, where the variables were gender and stimulus category. The variables were assessed in terms of reaction time and percentage of accurate recognition.

## Reaction Time

Reaction time was examined based on such variables as gender and stimulus
type to see if significant differences exist in the time participants took to recognise the graphic variants of Amharic letters. Both male ( $M=590.74 \mathrm{~ms}$ ) and female ( $M=586.26 \mathrm{~ms}$ ) participants recognised the letters in a similar amount of time, which suggests that gender difference is not significant in recognising letters in isolation $[F(1,30)=0.29, P=0.005]$. However, it is noted that the female participants took a significantly shorter time to recognise the letters in isolation, which indicates that gender may have not a significant effect on the recognition in graphic variants of the letters when the letters are presented in words.


FIGURE 7: Reaction time of male and female participants in recognition of letters in word contexts. The errorbars indicate $95 \%$ confidence intervals.

Frequency of occurrence and stimulus type
We expected that some letters would be recognised faster than their graphic variants, depending on their frequency when the target letters were presented in words. The participants took a longer time to recognise the less frequent letters, which suggests that frequency of occurrences (which means frequency of use) affects recognition of letters in words, but the effect was not significant in this experiement $[F(1,30)=1.33, P=0.25]$.


FIGURE 8: Mean reaction time of the participants computed based on letter frequency and stimulus type. The errorbars indicate $95 \%$ confidence intervals.

It is also possible to see that the targets $(583.12 \mathrm{~ms})$ (which are the more frequent letters) were recognised significantly faster than their allographs (592.70 ms ), and the allographs took a significantly shorter time than the distractors $\operatorname{did}(614.29 \mathrm{~ms}) \operatorname{did}[F(1,30)=9.79, P=0.00]$. We hypothesize that the targets are the graphemes representing the sounds, while the allographs are their graphic variants which are mapped into their graphemes.

## Accuracy

figure 9 reveals that gender is associated with the percentage of recognition accuracy of letters in words. The female participants had greater percentage of accuracy as compared to male participants and the difference is significant when the data were submitted to the Chi Square Test $\left[X^{2}(1,30)=35.02, P=0.00\right]$. It is not clear why gender difference is significantly associated with percentage of correct recognition of letters, regardless of whether letters are presented in isolation or words.


FIGURE 9: Percentages of correct and wrong answers for male and female participants. The errorbars indicate $95 \%$ confidence intervals.

With regard to incorrect recognition, it was observed that the male respondents tended to make more errors than their female counterparts did in the second experiment and the difference was significant, showing interaction of gender with percentage of visual letter recognition.

Frequency of occurrence and stimulus type
Letter frequency and stimulus type are expected to have a significant association with percentage of accurate recognition of letters in words. Consistent with the previous studies and our intuitive expectations, letters with greater frequency of occurrence had a significantly higher percentage of correct recognition $\left[X^{2}(1,30)=4.09, P=0.04\right]$ and this shows that frequency of occurrence has a marginally significant association with a letter recognition.


FIGURE 10: Percentages of correct and wrong responses computed for letter frequency and stimulus type.

In addition, stimulus type (which is whether the letter is a target, a graphic variant or a different character acting as a distractor) affected letter recognition. The target letters (63\%) which have a higher frequency of occurrence were recognised with the highest percentage of accuracy and their allographs (59\%) were discriminated with a greater accuracy rate than the distractors (53.3\%), which were presented in nonsense words. This association between stimulus type and percentage of accurate recognition was so great that it could reach a level of statistical significance $\left[\mathrm{x}^{2}(2,30)=34.22, \mathrm{P}=0.05\right.$ ], as confirmed by the Chi- Square Test.

## [6] Discussion

The main objective of this study was to assess the effects of frequency, gender and contexts on visual recognition of the four Amharic letters and their graphic variants. Specifically, the study aimed at examining the impact of the variables on reaction time and percentage of accurate recognition of the letters.

## [6.1] Gender difference

A significant gender difference was found for reaction time (only in alphabetic decision task), for accuracy of response in both experiments, the female participants outperforming the male ones. In this regard, this study has replicated the findings of the previous studies which reported that females excel over males in visual word recognition, taking a shorter time and having a higher
percentage of accurate responses (Kaushanskaya et al. 2011, Bouchière et al. 2010). The gender difference is attributed to women's reliance on long-term memory and declarative memory in retrieving the mental templates of the letters, and on women's greater attentiveness in recognition tasks (Kaushanskaya et al. 2011). In addition, in our experiments, the participants were told to respond as quickly as possible without making many errors and this might have caused females to be more sensitive to time and have a shorter reaction time, because a previous study revealed that females pay more attention to time than males do in decision-making tasks (Lizárraga, Baquedano \& Cardelle-Elawar 2007).

## [6.2] Frequency of occurrence and stimulus type

Frequency of occurrence of letters was considered in the second experiment where we thought it was relevant, and the result of the experiment has indicated that no significant effect of letter frequency on reaction time was attested, although the more frequent letters were recognised faster. Lack of significant effect may be due to the fact that letter frequency effect is mediated by letter position, with the word initial letter carrying more weight in word recognition as reported by past studies (Stevens and Grainger 2003, Inhoff, Radach, Eite \& Skelly 2003, Lavidor, Hayes, Shillcock, \& Ellis 2004, Grainger, Tydgat \& Issele 2010). No provision was made for such a mediating factor in our computation of letter frequency (Chetail 2015). However, consistent with previous studies (Bouchière et al. 2010) and our intuition, letters which are more frequent had a higher percentage of accuracy.

The last interesting finding of the study is that a significant effect of stimulus type on reaction time was found in both experiments, with the targets (letters which were paired with themselves in the first experiment) taking a significantly shorter response latency and having more accurate responses than their graphic variants and distractors in nonsense words. It was also observed that the graphic variants of the four letters were recognised with shorter reaction time and a higher percentage of accurate responses. It is possible to see that orthographic inconsistency (where more than one graphic character is mapped into one phoneme) negatively affects recognition of letters in isolation and in word contexts (Grainger et al. 2003). In addition, more effects or associations of the variables (frequency, stimulus type and gender) were observed in the second experiment where the letters were presented in real words, and this replicates the finding of previous studies which reported a word superiority effect as contrasted to nonsense words (Grainger et al., 2003, Lanthier et al., 2009, Coch and Mitra 2010 ).
[6.3] Physical features of letters
In the alphabetic decision task of our experiment, the participants had a shorter reaction time and a higher percentage of accurate responses when they were presented with the same letters in a pair, than when presented with graphic variants or different letters in a pair. The finding led us to the conclusion that during letter recognition, readers might have attended to their physical features, regardless of whether the letters represent the same or different phonemes. When the participants were asked to decide if a pair of letters with the same features stand for the same phoneme, their recognition rate was relatively higher, as the neural network already activated for the first character might be readily available for the second letter, so reducing the processing time, which may include the time for searching for the right mental template for the letter being recognised. Previous studies in neuroscience reported that letters with same features activate same neural networks (Petersen et al., 1990) and this can result in a shorter reaction time. It is possible that the participants could have used their background knowledge about the orthography of the language when they mapped the letters onto their phonological representations (Martin et al. 2006). They know that Amharic does not have a letter which stands for more than one phoneme, and thus when they have known that the letters in a pair are the same, their decision will be automatic.

Similarly, when a letter was presented with its graphic variants, the participants might need both orthographic and phonological information to determine whether or not the letters represent the same phoneme (McClelland \& Rumelhart 1981, Rey et al. 2000). Since the letters have different features, processing the features of each letter, mapping onto their respective orthographic representations, are necessary cognitive activities (Pušnik et al. 2016). However, knowing the orthographic representations of a letter and its graphic variants does not help the participants to automatically find their phonological representations; mapping different letters onto the same phonological representation may require more cognitive effort, resulting in a relatively longer reaction time (Flowers et al. 2004). In our experiment, this time is longer than the time needed for determining if a pair of the same letters stands for the same phoneme, which suggests that mapping letters onto different phonological representations requires more processing time or more mental effort (Sanocki \& Dyson 2012).

Priming effects could also account for the differences in recognition of Amharic letters and their graphic variants, and priming experiments on uppercase and lowercase letters are particularly very relevant (Arguin and Bub 1995, Ziegler et al. 2000). In such experiments, it was hypothesized that uppercase and
lowercase letters (e.g., a-A) which have different shapes could produce a priming effect only in a naming task, because the task requires access to phonological representations of the letters. The hypothesis was based on the observation that the letters would share the same phonological representation, regardless of differences in physical features (Arguin and Bub 1995). However, it was not clear whether participants should have access to their phonological representations in visual alphabetic decision tasks and if the letters had the same or different abstract orthographic representations. A series of experiments conducted by (Ziegler et al.2000) confirmed that the letters can prime each other in alphabetic decision and naming tasks, regardless of their shapes. By the same token, in our experiments in alphabetic decision tasks where letters were presented with themselves ( e.g., <' $h \neq>$ ) and with their graphic variants (e.g., <' $0>$ ), identity priming and cross-variant priming might have caused the difference in reaction time and accuracy of responses. In both cases, the effect is facilitatory but it is evidently higher in the identity priming.

## [7] CONCluSions

Gender had a significant effect on the processing time of the Amharic letters when the letters were presented in isolation, not when they were in words, with the female participants having shorter response latency. The female participants also had a significantly higher percentage of correct responses, showing a significant association between gender and accurate recognition of letters both in isolation and in words. The participants took a longer time to recognise the less frequent letters, which suggests that frequency of occurrence has an impact on recognition of letters in words, but not to the extent that its effect is significant. However, a significant association was found between a letter frequency and accurate recognition, with the more frequent letters receiving a higher percentage of correct responses. Orthographic inconsistency seems to significantly affect response latency and accurate recognition of redundant letters, as the target letters were recognised significantly faster with a higher percentage of correct responses when there is one-to-one orthographic and phonological mapping rather than when there is more than one mapping.

## [8] LIMITATIONS AND FUTURE RESEARCH

We used DMDX, which is not as robust as other psycholinguistic software packages (such as E-Prime) in calculating reaction time. We believe that this limitation may have affected the results of our experiments to some extent. Future research which is more comprehensive and robust in its experimental design and use of software is needed to validate the results of our experiments.

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# SOME OBSERVATIONS ON HADIYYISA ORTHOGRAPHY 

SHIMELIS MAZENGIA

## ABSTRACT

This study attempts to identify aspects of the orthography of Hadiyyisa (one of the Highland East Cushitic languages) that need to be improved and to suggest possible solutions to this. Accordingly, a short Hadiyyisa paragraph was dictated to and was written by randomly selected elementary, high school and first-year university students. The results showed that the students had a problem of distinguishing phonological quantity, that is, between simplex and geminate consonants as well as between short and long vowels. Consequently, representing geminates and long vowels as simple segments occurred frequently. Some aspects of orthographic inconvenience which require adjustments were encountered and solutions were suggested from the perspectives of regularity and economy. Yet another constraint was suggested in relation to the transferability of incompatible knowledge of Hadiyyisa to English. The performance of female students, especially at high school and university levels, was found to be lower than that of the male students and the study suggests that this needs to be further investigated.

## [1] INTRODUCTION

This paper portrays the salient features of the Hadiyyisa orthography and discusses aspects that seem to require improvements. In addition, it tries to identify some areas that require attention so as to make the orthography more practical. It is by no means intended to be critical of the users of the orthography, but rather to draw the attention of those concerned towards tuning up the orthography for better writing and reading.

The language of the Hadiyya people, Hadiyyisa, belongs to the Highland East Cushitic group (a sub-group of the Cushitic family). In the 1970s and early 1980s, Hadiyyisa was one of the fifteen languages in Ethiopia with which a literacy campaign was conducted using the Ethiopic script. The latter is essentially a syllabary each of whose characters incorporates a consonant and a vowel. The system, however, manifests a feature of consonantary, because a character with the high (close) central vowel /i/ may drop that vowel at the syllable-final position (e.g. *nibi > nib 'bee'). In 1994, the Latin script was adopted for Hadiyyisa,
as was also the case with some other Cushitic languages of Ethiopia. Consequently, of the Cushitic group in the country, some use the Ethiopic script and others the Latin script. Currently, the Latin-based orthography of Hadiyyisa is in use especially in schools and at college, as well as university levels. At the elementary level (first cycle-grades 1-4), the language is used as a medium of instruction. At grade five level and above, it is offered as a subject. In Wachamo University, which is found in the vicinity of Hosa'na, the capital of the Hadiyya Zone, Hadiyyisa has become a field of specialization, as from the Ethiopian academic year 2007 (September 2014 - July 2015). In addition to making teachinglearning materials available at various levels, a bilingual dictionary, HadiyyisIngilliisis Saga'l Doona (Hadiyya-English Dictionary) has been published. In the dictionary, each Hadiyyisa entry is followed by an equivalent English word or phrase in parentheses. The meanings of the headwords, sometimes with additional explanations, are provided in Hadiyyisa. The dictionary was meant to be used by students and is, therefore, limited in distribution. For general readers, there is so far only one book, authored by Getahun Waatummo Doolle and entitled Hadiyy Heessechchaa Kobi'llishsha (Hadiyyisa Stories and Proverbs). Hadiyyisa is now one of the languages broadcast over the radio in the Southern Nations, Nationalities and Peoples Regional State (SNNPRS).

The orthography of Hadiyyisa, which is based on the Latin script, is alphabetic, where each grapheme (including each digraph) represents a phoneme. Like Hadiyyisa, for instance, English, is written in the Latin alphabet; but one cannot claim the orthography of the latter to be fully phonemic since all too often writing and pronunciation are at variance. In the English orthography, graphemes do not always represent phonemes. The section that follows presents the phonemes of Hadiyyisa.

## [2] PHONEMES

There are 23 consonant phonemes in Hadiyyisa (Tadesse 2015: 20). However, the language uses additional five consonants for loanwords. As regards the inventory of vowel phonemes, the language has five short phonemic vowels, whose five long counterparts are also of phonemic value; thus, together constituting ten vowel phonemes. The two tables (in Figure 1 and 2) below provide respectively the inventory of the consonant and vowel phonemes of Hadiyyisa. In each column of figure 1, the symbols on the left represent voiceless consonants, while those on the right voiced consonants. Symbols in parentheses represent consonants used for loanwords.


FIGURE 1: Consonant phonemes.

|  | Front | Central | Back |  |
| :--- | :--- | :--- | :--- | :--- |
| High | i | ii |  |  |
| Mid | e | ee |  | uu |
| Low |  |  | a aa |  |

FIGURE 2: Vowel phonemes.
In FIGURE 1, the five symbols in parentheses, as indicated above, represent sounds which occur in loanwords and are not typical to Hadiyyisa. Tadesse (2015: 21) points out that in loanwords, /p v 3 s'/ are usually replaced by $/ \mathrm{b} f \mathrm{~d}$ $t^{\prime} /$ respectively. As regards the palatal nasal $/ n /$, although its occurrence in loanwords is attested, it is usually replaced by the alveolar nasal $/ n /$ (e.g., sanna 'Monday' < sənno (Amharic) 'Monday'). It does also occur in some ideophones (e.g., hanni 'bite' (orthographic representation hanynyi)); but its overall function in the language is not significant ${ }^{1}$. Hence, discounting the five borrowed consonants, Hadiyyisa has 23 consonant phonemes.

## [3] THE ALPHABET

The Hadiyyisa alphabet, which represents the above consonant and vowel phonemes, consists of 33 graphemes. Of these, 28 are consonants and 5 are vowels (the graphemes of long vowels are not represented in the alphabet). Twenty-six of the graphemes of the alphabet correspond with the twenty-six letters of the English alphabet. The Hadiyyisa alphabet adds seven more, that is, six digraphs and the symbol of the glottal stop, which is represented by the apostrophe:
< CH NY PH SH TS ZH ' >. In table 1 below are the 33 graphemes of the Hadiy-

[^31]yisa alphabet, in both majuscule and minuscule forms. Corresponding to each letter is given its name or how it is pronounced in the alphabetical list. The glottal stop, although in use since the adoption of the Latin alphabet, had not been considered a consonant until very recently. In the list below, I have put it, like Tadesse (2015: 17), at the end.

Unlike in English, < x > represents the ejective stop [ $t^{\prime}$ ] in Hadiyyisa, as is also the case in some Ethiopian Cushitic orthographies, that is, in Oromo, Sidaama, Kambata and Gede'o. The glottal stop has only one form, < ' >; it does not have allographic variants of majuscule and miniscule forms like the rest of the graphemes. Except for vowels $<\mathrm{E}, \mathrm{I}, \mathrm{O}, \mathrm{U}>$, the names of all the consonants and that of vowel < A > terminate in the vowel sound [-a]. As stated above, the relevance of five of the twenty-eight consonants, viz. < P, V, NY, TS ZH > (two simplex and three digraphs), is justified by their use for writing loanwords.

| $\mathbf{N}^{\text {o }}$ | Grapheme (Majuscule/ Miniscule) | Grapheme Name |
| :---: | :---: | :---: |
| 1 | A a | [a] |
| 2 | B b | [ba] |
| 3 | C c | [ 59 a ] |
| 4 | CH ch | [fa] |
| 5 | D d | [da] |
| 6 | Ee | [e] |
| 7 | Ff | [fa] |
| 8 | Gg | [ga] |
| 9 | H h | [ha] |
| 10 | I i | [i] |
| 11 | Jj | [dza] |
| 12 | K k | [ka] |
| 13 | L1 | [la] |
| 14 | M m | [ma] |
| 15 | N n | [na] |
| 16 | NY ny | [na] |
| 17 | Oo | [o] |
| 18 | P p | [pa] |
| 19 | PH ph | [p'a] |
| 20 | Qq | [k'a] |
| 21 | R r | [ra] |
| 22 | S s | [sa] |
| 23 | SH sh | [ 5 ] |
| 24 | Tt | [ta] |
| 25 | TS ts | [s'a] |
| 26 | U u | [u] |
| 27 | Vv | [va] |
| 28 | W w | [wa] |
| 29 | Xx | [t'a] |
| 30 | Y y | [ya] |
| 31 | Z z | [za] |
| 32 | ZH zh | [3a] |
| 33 | ' (no <br> allograph) | [?a] |

table 1: The Hadiyyisa alphabet.

## [4] HOW STUDENTS WRITE HADIYYISA

As indicated above, the orthography of Handiyyisa is, as yet, only functional in educational establishments. In other words, it is not yet in use for administrative purposes and business. As a result, correspondences among government and private institutions are conducted in Amharic which is also the working language of the Federal State of Ethiopia.

To find out how students write Hadiyyisa using the Latin-based alphabet, thirty students were picked randomly in Hosa'na, the capital of the Hadiyya Zone, from (i) Ersa Adada Elementary School, (ii) Wachamo Preparatory School (grades 11 and 12) and (iii) Wachamo University. That is, ten students were picked from each educational establishment. They were respectively from grades 1-5, grade 11 and university first year. Of each group, five students were female and the other five male. The ten students of each group were asked to write a paragraph of thirty-six words in Hadiyyisa (see Appendix). The paragraph is based on a fable and orthographically consists of the consonant graphemes (including the representation of geminates) of the frequent phonemes in Hadiyyisa, except for $<J>$. The other two missed graphemes, < PH, Z > , are infrequent in distribution, including in the other Highland East Cushitic languages (Tadesse 2015: 22). As for the vowels of the language, all short and long forms are encountered repeatedly in the paragraph.

The paragraph was read to each group of students by a native speaker of the language very slowly and, whenever a student appeared to be in doubt, repeating words and sentences. Then, what each student wrote was assessed on the basis of errors made. The results are given below in three tables (see figure 3, 4 and 5). Errors in identical words were counted only once. Similarly, errors related to not using capital letters were also considered as a problem and were counted only once. Errors with respect to missing or distorting words were counted on the basis of an average of two errors per word, that is, considering each word error as two spelling errors, since the average spelling errors in a distorted word were found to be two. The overall assessment of the students' performance was based on the following ten parameters:
(i) Misuse of capital letter (Cap.)
(ii) Hyper-gemination (Gem.+)
(iii) Hypo-gemination (Gem.-)
(iv) Consonant insertion (Cons.+)
(v) Consonant missing or misrepresentation (Cons.-)
(vi) Hyper-lengthening (vowel)(Vl. L.+)
(vii) Hypo-lengthening (vowel) (Vl. L.-)
(viii) Vowel insertion (Vl.+)
(ix) Vowel missing or misrepresentation (Vl.-)
(x) Word missing or misrepresentation (Word)

Below, figure 3, 4 and 5 present errors made by students at elementary, high school and university levels, respectively:

|  | Cap. | Gem+ | Gem- | $\begin{aligned} & \hline \text { Vwl } \\ & \mathrm{L}^{+} \\ & \hline \end{aligned}$ | Vwl L ${ }^{-}$ | Vwl ${ }^{+}$ | Vwl ${ }^{-}$ | Cons+ | Cons ${ }^{\text {- }}$ | Word - | Sum |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 F | 1 | 4 | 11 | 4 | 8 | 4 | 10 | --- | 6 | 8 (4) | 56 |
| 2 F | 1 | -- | 5 | --- | 5 | --- | 5 | --- | 4 | 44 (22) | 64 |
| 3 F | 1 | --- | 10 | --- | 7 | 1 | 15 | --- | 10 | 16 (8) | 60 |
| 4 F | 1 | 3 | 3 | --- | 1 | --- | 2 | --- | 1 | --- | 11 |
| 5 F | (A grade two girl unable to write) |  |  |  |  |  |  |  |  | 72 (36) | 72 |
| Sum | 4 | 7 | 29 | 4 | 21 | 5 | 32 | --- | 21 | $\begin{aligned} & 140 \\ & (70) \end{aligned}$ | 263 |
| \% | 1.52 | 2.66 | 11.03 | 1.52 | 7.98 | 1.9 | 12.17 | --- | 7.98 | 53.23 | 100\% |
| 6 M | 1 | 1 | 19 | --- | 15 | --- | 13 | --- | 9 | 2 (1) | 60 |
| 7 M | 1 | --- | 19 | --- | 21 | 1 | 13 | --- | 7 | --- | 62 |
| 8 M | 1 | 5 | 12 | 2 | 16 | 1 | 2 | 1 | --- | --- | 40 |
| 9 M | 1 | --- | 12 | 5 | 11 | --- | 3 | --- | --- | --- | 32 |
| 10 M | (A grade one boy unable to write) |  |  |  |  |  |  |  |  | 72 (36) | 72 |
| Sum | 4 | 6 | 62 | 7 | 63 | 2 | 31 | 1 | 16 | 74 | 266 |
| \% | 1.5 | 2.26 | 23.31 | 2.63 | 23.68 | 0.75 | 11.65 | 0.38 | 6.02 | 27.82 | 100\% |
| Total | 8 | 13 | 91 | 11 | 84 | 7 | 63 | 1 | 37 | 214 | 529 |
| \% | 1.51 | 2.46 | 17.2 | 2.08 | 15.88 | 1.32 | 11.91 | 0.19 | 6.99 | 40.45 | 100\% |

FIGURE 3: Elementary level orthographic errors. F = female; M = male.

|  | Cap. | Gem ${ }^{+}$ | Gem- | Vwl L ${ }^{+}$ | Vwl L- | Vwl ${ }^{+}$ | Vwl ${ }^{-}$ | Cons ${ }^{+}$ | Cons | Word - | Sum |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 F | 1 | 3 | 13 | 3 | 14 | 2 | 7 | 1 | 6 | 10 (5) | 60 |
| 2 F | 1 | 1 | 13 | --- | 16 | 1 | 9 | --- | 6 | 6 (3) | 53 |
| 3 F | 1 | 2 | 11 | --- | 8 | 1 | 20 | --- | 6 | 12 (6) | 61 |
| 4 F | 1 | 2 | 20 | 5 | 15 | 2 | 2 | 2 | 3 | 2 (1) | 54 |
| 5 F | 1 | 1 | 10 | 4 | 16 | --- | 12 | --- | 7 | 4 (2) | 55 |
| Sum | 5 | 9 | 67 | 12 | 69 | 6 | 50 | 3 | 28 | 34 (17) | 283 |
| \% | 1.77 | 3.18 | 23.67 | 4.24 | 24.38 | 2.12 | 17.67 | 1.06 | 9.89 | 12.01 | 100\% |
| 6 M | --- | 9 | 13 | 1 | 15 | 2 | 1 | --- | --- | --- | 41 |
| 7 M | 1 | 5 | 5 | 9 | 9 | 2 | 6 | 3 | 2 | --- | 42 |
| 8 M | 1 | 10 | 5 | --- | 3 | 1 | --- | 1 | --- | --- | 21 |
| 9 M | 1 | 9 | 10 | 1 | 10 | 2 | 1 | 1 | 1 | --- | 36 |
| 10 M | 1 | 1 | 10 | --- | 10 | 2 | 30 | --- | 11 | 12 (6) | 77 |
| Sum | 4 | 34 | 43 | 11 | 47 | 9 | 38 | 5 | 14 | 12 (6) | 217 |
| \% | 1.84 | 15.67 | 19.82 | 5.07 | 21.66 | 4.15 | 17.51 | 2.3 | 6.45 | 5.53 | 100\% |
| Total | 9 | 43 | 110 | 23 | 116 | 15 | 88 | 8 | 42 | 46 | 500 |
| \% | 1.8 | 8.6 | 22 | 4.6 | 23.2 | 3 | 17.6 | 1.6 | 8.4 | 9.2 | 100\% |

FIGURE 4: High school level orthographic errors.

|  | Cap. | Gem+ | Gem- | V1 L+ | V1 $\mathrm{L}^{-}$ | V1 ${ }^{+}$ | V1- | Cons+ | Cons ${ }^{-}$ | Word - | Sum |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1 F | 1 | --- | 2 | --- | 1 | --- | --- | --- | --- | --- | 4 |
| 2 F | 1 | 7 | 3 | 1 | 5 | 2 | 1 | --- | 1 | --- | 21 |
| 3 F | 1 | 6 | 7 | 9 | 16 | --- | 1 | --- | --- | 4 (2) | 44 |
| 4 F | --- | 8 | 4 | --- | --- | --- | --- | --- | --- | --- | 12 |
| 5 F | --- | 3 | 2 | --- | --- | 1 | 1 | - | 1 | --- | 8 |
| Sum | 3 | 24 | 18 | 10 | 22 | 3 | 3 | 0 | 2 | 4 (2) | 89 |
| \% | 3.37 | 26.97 | 20.22 | 11.24 | 24.72 | 3.37 | 3.37 | 0 | 2.25 | 4.49 | 100\% |
| 6 M | - | 3 | 6 | --- | --- | --- | 1 | --- | --- | --- | 10 |
| 7 M | 1 | 7 | 4 | --- | 3 | --- | 1 | --- | --- | - | 16 |
| 8 M | --- | --- | 9 | 5 | 4 | --- | --- | --- | --- | --- | 18 |
| 9 M | - | --- | 2 | --- | 1 | --- | --- | --- | --- | --- | 3 |
| 10 M | - | --- | 1 | --- | --- | --- | --- | --- | --- | --- | 1 |
| Sum | 1 | 10 | 22 | 5 | 8 | --- | 2 | - | --- | --- | 48 |
| \% | 2.08 | 20.83 | 45.83 | 10.42 | 16.67 | 0 | 4.17 | 0 | 0 | 0 | 100\% |
| Total | 4 | 34 | 40 | 15 | 30 | 3 | 5 | 0 | 2 | 4 | 137 |
| \% | 2.92 | 24.82 | 29.2 | 10.95 | 21.9 | 2.19 | 3.65 | 0 | 1.46 | 2.92 | 100\% |

FIGURE 5: University level orthographic errors.

Comparison of performance at the three levels shows that the highest number of errors was made by the elementary students, 529 [45.37\%] (see figure 3), while that of the high school students is the next highest, 500 [42.88\%] (see FIGURE 4). By comparison, the number of errors of the university students, who had been teachers, is significantly lower, 137 [11.75\%] (see figure 5). With respect to the average number of errors per student, that of the elementary is 53 [45.30\%] while that of the high school 50 [42.74\%] and that of the university 14 [11.97\%]. At the high school and university levels, the female students made more errors ( $13.2 \%$ and $29.92 \%$ more than the male students, respectively) while at the elementary level it is the male students who made more errors by a narrow margin ( $0.56 \%$ ). As the preceding figures illustrate, at the high school level and, in a more pronounced manner at the university level, the performance of female students has been found to be low compared to that of the male students. Although the problem merits further investigation, it is considered to be a reflection of the burden of social responsibilities that teenage females and, more so, adult females are made to bear. The assumption is that the performance of female students, which is actually better than that of male students at the elementary level, though with a small margin, gradually decreases as they proceed to high school and university levels since, conversely, domestic chores as well as other family and social responsibilities increase.

The three most error-prone orthographic features at the elementary level were (from the most to the least prone): missing or distorting words, hypogemination, that is, failure to geminate consonants and hypo-lengthening, that is, failure to lengthen vowels. At the high school level the most error-prone orthographic features were: hypo-lengthening, hypo-gemination and vowel omission or substitution. Finally, those of the university level were: hypogemination as well as hyper-gemination and hypo-lengthening. The preceding results show that hypo-gemination and hypo-lengthening are the most common error types across the three educational levels. Decreasing or increasing quantity vis-à-vis consonants and vowels is not dependent on any pattern except for hyper-gemination of the digraph < sh>. The latter case is perhaps due to the influence of <ch > which occurs word-medially in a geminated form except when followed by sonorants (Tadesse (2015: 23). Word missing or distortion essentially concerns long words with multiple morphemes (up to four).
table 2 below presents the orthographic problems in the order of the first to the third most recurrent types at each educational level. The percentage of each error type at each level is relative to the percentage of the total number of errors.

|  | Elementary | $\mathbf{\%}$ | High School | $\mathbf{\%}$ | University | $\mathbf{\%}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\mathbf{1}$ | Word <br> missing/distortion | 41 | Hypo-lengthening | 23 | Hypo- <br> gemination | 29 |
| $\mathbf{2}$ | Hypo-gemination | 17 | Hypo-gemination | 22 | Hyper- <br> Hemination | 25 |
| $\mathbf{3}$ | Hypo-lengthening | 16 | Vowel omission <br> /substitution | 18 | Hypo- <br> lengthening | 22 |

TABLE 2: Hierarchy of recurrent orthographic errors.
We may generalize that the orthographic problem that occurs frequently at all three educational levels results from a failure to distinguish phonological quan-tity-that is, being unable to distinguish between simplex and geminate consonants, as well as between short and long vowels. Of the two problems of sound perception, that is, perceiving with increased quantity or with reduced quantity, the latter appears to be the most recurrent. In other words, the error type which is the most frequent in the use of the Hadiyyisa orthography could be characterized as reduction; that is, representing geminates with simplex consonants and long vowels with short ones.

FIGURE 6 presents the summary of errors in relation to gender at the elementary, high school and university levels. Missing or distorting words is the most recurrent error for the female students. By contrast, this error type is the third most recurrent for male students. On the other hand, for the male students, the main problem is a failure to geminate consonants. Notice that the three areas where most errors are committed (hypo-gemination, hypolengthening and word missing/distortion) are the same for both female and male students, though the hierarchy is different for each category.

|  | Cap. | Gem. ${ }^{\text {+ }}$ | Gem. ${ }^{-}$ | V1 L+ | V1 $L^{-}$ | V1+ | $\mathrm{Vl}{ }^{-}$ | Cons ${ }^{+}$ | Cons- | Word | Sum |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Female | 12 | 40 | 114 | 26 | 112 | 14 | 85 | 3 | 51 | 178 | 635 |
| \% | 1.89 | 6.3 | 17.95 | 4.09 | 17.64 | 2.2 | 13.39 | 0.47 | 8.03 | 28.03 | 100\% |
| Male | 9 | 50 | 127 | 23 | 118 | 11 | 71 | 6 | 30 | 86 | 531 |
| \% | 1.69 | 9.42 | 23.92 | 4.33 | 22.22 | 2.07 | 13.37 | 1.13 | 5.65 | 16.2 | 100\% |
| Total | 21 | 90 | 241 | 49 | 230 | 25 | 156 | 9 | 81 | 264 | 1166 |
| \% | 1.8 | 7.72 | 20.67 | 4.2 | 19.73 | 2.14 | 13.38 | 0.77 | 6.95 | 22.64 | 100\% |

FIGURE 6: Orthographic errors in relation to gender.

## [5] OTHER ISSUES TO NOTE

In addition to the above discussed orthographic problems, there are other issues which seem to deserve proper attention. These are problems realized from the viewpoint of regularity, economy and negative transfer. Let us look at each one of them in turn.

## [5.1] Regularity

It is generally assumed that one of the characteristics of a good orthography is regularity, because it eases the burden of applying various rules and facilitates learnability. From the perspective of this assumption, the varied forms of the graphemes of the class of ejectives in the Hadiyyisa orthography, < c ph q ts $\mathrm{x}>$, could be regularized. They may respectively take the forms < c' $p^{\prime} k^{\prime} s^{\prime} t^{\prime}>$, each consonant accompanied by the apostrophe as a diacritic.

As regards, especially, the grapheme $\langle x\rangle$, the fact that it is a simplex is a positive property, although the sound it has been made to represent (the alveolar ejective stop $/ t^{\prime} /$ ), and the sound it is usually known for, for instance in the English orthography usually [ks], do not relate at all. It is true that in the orthographies of some other Cushitic languages too, as mentioned in section 3 above, it does represent the alveolar ejective stop $/ t^{\prime} /$. Furthermore, a study on the harmonization of Cushitic orthographies also recommends the use of the grapheme for the representation of the alveolar ejective stop (Qorro et al. 2014). Nonetheless, in some Cushitic languages it represents different sounds. For instance, in Afar it represents the alveolar implosive / $d /$, in Somali the voiceless pharyngeal fricative $/ \hbar /$, and in Konso the uvular fricative $/ \chi /$.

As indicated above, if regularity and simplicity are to be opted for, it is perhaps reasonable to replace $<x>$ in Hadiyyisa with < t' > . Similarly, replacing < c ph ts > with < c' p' s' >, which would be formally symmetrical with < t' >, also seems sensible. Moreover, as discussed below, the replacement of $<c>b y<c$ ' > would also alleviate the encumbrance of < ch > , especially in its geminated form < chch >; that is, < c > would substitute for < ch > and the gemination would appear as $\langle\mathrm{cc}\rangle^{2}$. As for the ejective $\left.<\mathrm{q}\right\rangle$, it may follow suit and could be replaced by $<\mathrm{k}^{\prime}>$. Nonetheless, taking account of its simplex form and its wider use, it may be retained. In fact, < q > is commonly used by most of the Ethiopian Cushitic languages for the velar ejective stop, except for Afar and Konso in whose orthographies it represents the voiced pharyngeal fricative $/ \varsigma /$, and the velar voiced implosive / $g /$, respectively.

The recommended graphemes for the class of ejectives in Hadiyyisa, < $c^{\prime} p^{\prime} s^{\prime}$
[2] This is similar to Yri's suggestion for Sidaama, another Highland East Cushitic language (2004:51).
$t^{\prime}>$, might be objected to on the grounds that in each case the simplex consonant and the accompanying diacritic apostrophe (which is also used for the representation of the glottal stop) could possibly be pronounced separately. However, the problem does not seem to be a matter of concern for two reasons: first, the learners would be familiarized with the proposed graphemes in the manner, for instance, they are familiarized with the digraph < sh >. It was reported by some elementary Hadiyyisa teachers that there was almost no instance of learners pronouncing the constituents of < sh > separately as [s] and [ $h$ ], once they were familiarized with the diagraph. Secondly, there do not seem to be Hadiyyisa words in which the glottal stop follows the initial consonants of the proposed ejective digraphs; for example, where [c] is followed by ['] and each is pronounced independently.

## [5.2] Economy

This is a linguistic criterion which suggests that an analysis needs to be short and simple, in so far as the adequacy of the description or explanation aimed at can be ensured. Based on this criterion, the two subsections below propose the need for simplifying some digraphs and their consequent encumbered gemination in Hadiyyisa.

## Simplifying digraphs and gemination

Of the six digraphs in the Hadiyyisa alphabet, three, <ch sh ph >, represent typical sounds of the language, whereas the other three, < ny ts zh >, represent sounds of loanwords. The fact that the geminated forms of these digraphs overburden the orthography of the language is a matter of concern to those who wish to see the practical and effective use of the orthography - the more economical and simpler, the better. To deal with the problem, replacing the digraphs with simplex alternatives would be the best option. It is with this rationale that the replacement of $<\mathrm{ch}>\mathrm{by}<\mathrm{c}>$ has been suggested above. It is also in preference of simplicity that the replacement of < ph and ts >by < p' and s' > has been recommended. With respect to the other three digraphs, < sh ny zh >, it does not seem possible to straightforwardly extract simplex or less encumbered alternatives from the alphabet to replace them. Therefore, retaining them as they are seems to be the only viable option.

The geminate form of $<c>$ could simply be $<c c>$, as indicated above, while those of < $p^{\prime}$ ' ny sh $z h>$ may undergo reduction rather than simply doubling them as < p'p' s's' nyny shsh zhzh >. Thus, the reduced alternative forms would appear as < $p p^{\prime} s s^{\prime} n n y^{3}$ ssh $z z h$ >. In the first two, a single apostrophe is used in-
[3] The reduction of nyny to nny and, based on the same principle, the reduction of the other Sidaama
stead of two, while in the last three the second element of each digraph is reduced to one. Of course, there are still three symbols in each geminated form, but this is presumed to be a better option compared to four symbols in a geminate.

The other alternative for the representation of geminates of digraphs is to use each diagraph as it is. That is, a digraph is pronounced either as simple or as geminate depending on the pronunciation that the digraph represents in a word. This might create a phonetic problem for some readers of Hadiyyisa texts (especially beginners). Nonetheless, if the users of the orthography approve of it, it could be considered.

## Economy overriding

In the earlier educational materials, such Hadiyyisa words as ga'nna 'address', wo'lla 'calves', ha'mma 'root of false banana (inset)', baa'yyaato 'give information', etc. appeared as such. However, of late, these words and their like appear with their geminate component simplified, that is, the double consonants are reduced to simplex - ga'na, wo'la, ha'ma, baa'yaato. The reason given for the alteration is the assumption that the language does not permit a cluster of three consonants (excepting gemination of digraphs). In his discussion of the restriction of co-occurrence, Tadesse (2015: 28ff.) points out that there is no word-final consonant cluster in Hadiyya, since words end in a vowel; and that there is no attestation of word-initial cluster. With respect to word-medial position, he indicates that the language allows a cluster of two consonants. However, as seen from the above words and similar ones, it appears that the language allows for a word-medial cluster of three consonants involving the glottal stop followed by a sonorant geminate $-\mathrm{CC}^{1} \mathrm{C}^{1}$ ( C being sonorant). Therefore, the orthography of the language should have reflected this reality by representing the words in the latter fashion. Nonetheless, since there are no contrastive words to the ones with gemination of sonorants after the glottal stop, $\mathrm{CC}^{1} \mathrm{C}^{1}$, and giving value to economy, adopting the simplified representation of the words (reducing $\mathrm{C}^{1} \mathrm{C}^{1}$ to CC despite the pronunciation) seems acceptable.

## [5.3] Negative Transferability

As indicated above, the graphemes of the Hadiyyisa alphabet and those of the English alphabet are essentially the same. However, some of the consonants

[^32]and all of the vowels demonstrate discrepancies in the ways they are pronounced in the orthographies of the two languages. While trying to pronounce them in English words, Hadiyyisa speaking children, especially those of the lower grades, tend to resort to the pronunciation of their own language. Among those simplex and digraphic consonants which manifest transferred distortion in pronunciation are < c ny ph q x >. As seen from the examples below, transferring the Hadiyyisa pronunciation to English would result in incomprehensibility.

| English words | English pronunciation | Hadiyyisa pronunciation |
| :---: | :---: | :---: |
| cat | [kæt] | *[c'at] |
| any | [eni] | *[an] |
| physical | [fizikıl] | *[p'ysic'al] |
| quit | [kwit] | *[k'uit] |
| box | [boks] | *[bot'] |

The example given below also illustrates a similar problem, especially with respect to vowels. That is, the vowels in the English words are made to assume Hadiyyisa pronunciation.

| English words | English pronunciation | Hadiyyisa pronunciation |
| :---: | :---: | :---: |
| draw | [dro:] | *[draw] |
| keep | [ki:p] | *[keep] |
| one | [wan] | *['one] |
| but | [bst] | *[but] |
| kite | [kait] | *[kite] |

In view of the impact of negative transferability (sometimes also in the direction from English to Hadiyyisa), it is high time a solution was sought for the problem. In this regard, one helpful step, though not a complete solution, could be to let children first gain a degree of relative proficiency in their mother tongue rather than being introduced to English along with their mother tongue at the same time at a very early grade. The staggered introduction of languages could allow children and teachers to focus on one language at a time.

## [6] CONCLUSION

As indicated from the outset, the objective of this study is to describe the main features of the Hadiyyisa orthography, to identify problems related to it as well as to the users, so as to make suggestions for improvements. Accordingly, the assessment made with regard to student orthographic performance revealed
that there are, indeed, problems related to the orthography as well as to the users, that need to be addressed. Of the user problems considered here, the one related to gender may draw a particular interest. The fact that the performance of female students at high school and university levels is comparatively low needs to be further investigated. As indicated above, a provisional explanation could possibly be the relatively greater social responsibilities that teenage females and women are made to bear, which would perhaps not allow them to pay enough attention to their education.

Problems related to the use of the Hadiyyisa orthography are not limited to students. As seen from the performance of the students at university level, the problems are also found with teachers. The university students whose performance was assessed had been teachers with some training to teach the Hadiyyisa language. This is, therefore, an indication that the strategy to solve the problems related to the orthography and its use should primarily focus on teachers. Furthermore, making a standard dictionary available is also crucial.

Writing systems are usually subject to demands for improvement, that is, for simplicity, learnability and/or political reasons (Coulmas 2013: 108ff.). However, as underscored by Sebba (2007: 133), changing an established orthography is extremely difficult, since conservative elements who are in favour of maintaining the status quo resist any change. As regards the orthography of Hadiyyisa, it seems reasonable to make the necessary adjustments before aspects of the orthography which actually need to be improved get deeply entrenched and before users develop sentiments towards the status quo. In fact, as pointed out by Yri (2004: 12), improving orthography could be an on-going process. Otherwise, the option is living with the problems, as is the case, for instance, with English in which what is written and what is pronounced all too often do not correspond. However, that has meant, for instance, the creation of serious spelling problems for non-native users of English. Apart from realizing that improving orthography could be a continuous process, obtaining the consent of the stake holders is crucially important. All those who use an orthogra-phy-individuals as well as institutions-need to join in if improvements are to materialize.

| 1SG | 1st person singular | ep | epenthesis |
| :--- | :--- | :--- | :--- |
| 2SG | 2nd person singular | GEN | genitive |
| 3SGF | 3rd person singular feminine | IPFV | imperfective |
| 3SGM | 3rd person singular masculine | INST | instrumental |
| AGR | agreement | INTR | interrogative |
| CNV converb | NOM | nominative |  |
| COMP complementizer | PFV | perfective |  |
| COP | copula | PROG | progressive |
| DAT | dative |  |  |

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## APPENDIX I: A PARAGRAPH IN HADIYYISA

Daageechchii qamachchii afuutta'a attoorattonam daageechchi qamachchina "Saraxxi qorosho'i iibbadinne hooshe'akkamaare, xee'aa woga" yukko. Kan ammanenne qamachchi dabaraa, "Saraxxi qorosho'i iibbadinne xee'ooisa hinkidenne laqqeena xantitto." yaa xa'mmukko. Daageechchi odim dabaraa "Araat googinne higukkuuyyi wocookkoka macceesaateette." yukkoo yakko'o.

Source: Onkis G/Kidaan. 1986 H.D (1993/94). "Hadiyyi Heessiinsee
Kobi'llishshiinsee Hoffokam" (Hadiyyisa stories and proverbs). In Losa'n Caakka (The light of Education), Hosa'na, p. 22.

## TRANSLATION OF THE PARAGRAPH

While a monkey and an ape were chatting, the monkey said to the ape, "Flatbread of sorghum with fresh milk is absolutely delicious." Then, the ape asked, "How do you know that flatbread of sorghum with fresh milk is delicious?" The monkey replied, "I heard it from passers by."

APPENDIX II: THE PARAGRAPH WITH GLOSSING

| Daageechch-ii <br> monkey-CONJ | qamachch-ii <br> ape-CONJ | afuur-ta'a <br> sit-3SGF.CNV | atoorar-tonam <br> chat-3SGF.PROG |
| :--- | :--- | :--- | :--- |
| daageechch-i <br> monkey-NOM | qamachch-ina <br> ape-DAT |  |  |
| "Saraxxi | qorosho'-i <br> sorghum.GEN | iibbad-i-nne <br> flatbread-NOM | fresh.milk-ep-INST |
| hooshe'-akkamaare, |  |  |  |
| take.mouthful-when |  |  |  |

While a monkey and an ape were chatting, the monkey said to the ape,
"Flatbread of sorghum with fresh milk is absolutely delicious."

| Kan <br> this | ammane-nne <br> time-INST | qamachch-i <br> ape-NOM | dabar-aa, <br> return-CNV |
| :--- | :--- | :--- | :--- |
| "Saraxxi | qorosho'-i | iibbad-i-nne | xee'-oo'isa |
| sorghum.GEN | flatbread-NOM | fresh.milk-ep-INST | delicious-COMP |
| hinkide-nne | laqqeena | xan-titto." | yaa xa'mm-ukko. |
| how-INST | know | able-2SG.INTR | say.CNV ask-3SGM.PFV |


| Daageechch-i | odim dabar-aa | "Araat-i | goog-i-nne |
| :--- | :--- | :--- | :--- |
| monkey-NOM | also return-CNV | passerby-NOM | road-ep-INST |

hig-ukk-uuyyi woc-ookko-ka maccees-aa-teette." yukko yakko'o. pass-3SGM-PROG talk-3SG.IPFV-AGR hear.1SG-CNV-COP said.he said.they

Then the ape asked, "How do you know that flatbread of sorghum with fresh milk is delicious?'
The monkey replied, "I heard it from passers by."

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# ON THE ROLE OF SOUTH ARABIAN AND ETHIO-SEMITIC WITHIN A COMPARATIVE SEMITIC LEXICOGRAPHICAL PROJECT 

LUTZ EDZARD

## ABSTRACT

Genetic classification in general depends to a large extent on the criteria selected. Inspired by Kogan 2015 and other sources, this paper looks at specific lexical peculiarities and semantic traits in the South Semitic (mainly modern South Arabian and Ethio-Semitic) lexicon, in order to determine the value of the South Semitic lexicon for genetic classification within Semitic at large.

## [1] INTRODUCTION

This paper focuses on the role and importance of the lexicon for genetic classification, more specifically on the role of (mainly modern) South Arabian and Ethio-Semitic in this context, a role which recently has been highlighted by Kogan (2015). It is a truism that linguistic classification to a large degree depends on the criteria selected, i.e. phonological, morphological, and other data. Therefore, the main criteria, or rather shared innovations that are usually cited in this connection, are summarized in the following (cf. Faber 1997: 7-12):

- East Semitic is characterized by the development of an adjectival ending $-\bar{u} t$ (pl. m.) and by the dative suffixes -kum and -šum;
- West Semitic is characterized by the suffix conjugation denoting past tense (as opposed to the Akkadian stative) and a prohibitive negator 'al;
- Central Semitic is characterized by a series of pharyngealized consonants, a prefix conjugation for nonpast without gemination of the second root consonant and the leveling of prefix vowels in this conjugation, the generalization of a -t-suffix (as opposed to $-k$-) in the suffix conjugation, and the development of a compound negative marker *bal; the Northwest Semitic part of Central Semitic (as being distinct from Arabic) is characterized by the change of word-initial $w$ to $y$ (except for the con-
junction $w$-) and a doubly marked plural (internal and external); further internal isoglosses apply;
- South Semitic is characterized by the generalization of a -k- suffix (as opposed to -t-above) in the suffix conjugation and by the generalization of (')al as a verbal negator; Eastern South Semitic (Modern South Arabian), as opposed to Western South Semitic (Old South Arabian and EthioSemitic) features a pre-fixed definite article $C(a)$, with $C$ being one of the gutturals ', h, or $h$.

Goldenberg (2013: 45f.) lists the following further classification criteria:

- the distribution of the intraflexion ("broken plural") in Arabic, SouthArabian, and Ethio-Semitic;
- internal vowel lengthening in the binyanim (forms III and VI in Arabic);
- consistent use of - $a$ - in all active forms of the suffix conjugation;
- the existence of two prefix conjugations (Akkadian, Modern South Arabian, Ethio-Semitic);
- the emergence of the -na ending (3pl.f, 2pl.f) in Central Semitic (cf. Hetzron 1976);
- the isogloss $p$ (Akkadian, Aramaic, Canaanite) vs. $f$ (Arabic, SouthArabian, Ethio-Semitic.

Representing the "traditional" criteria, Faber (1997) arrived at the following model (apud Huehnergard and Rubin 2011: 260):


FIGURE 1: Stemma according to Faber 1997.
Hetzron (1976), to whom we owe the concept of "archaic heterogeneity" and "shared morpho-lexical innovations" in Semitic, had arrived at the following genealogical representation (apud Huehnergard and Rubin 2011: 262):


FIGURE 2: Stemma According to Huehnergard and Rubin 2011.
Porkhomovsky (1997) and others have since then refined the previous model as follows. It is noteworthy that both Modern South Arabian ("MSA") and EthioSemitic ("Ethiopian") branch off at a quite high level in this model (apud Huehnergard and Rubin 2011: 263):

figure 3: Stemma according to Porkhomovsky 1997.
Kogan (2015), who focuses entirely on the role of the lexicon, also ascribes quite early genealogical independence to both (modern) South Arabian and EthioSemitic. He arrives at the following model, curiously mirroring East and West in his representation (Kogan 2015: 600). The encircled language groups in Kogan's model can be interpreted as representing linguistic areas in which contact phenomena are especially relevant. In terms of the goals of this paper, Kogan's model underlines the linguistic distinctiveness of the South-Semitic area:


FIGURE 4: Stemma according to Kogan 2015.

## [2] ISSUES OF LEXICAL CLASSIFICATION

One aspect clearly affecting the lexical distinctiveness of Ethio-Semitic is the Cushitic substratum in Ethio-Semitic (cf. Leslau 1945, 1952; Appleyard 1977). Appleyard (1977) identifies Cushitic loans especially in the following semantic fields: "man", comprising general terms, kinship terms, and parts of the body; "the domestic environment", comprising agricultural activities and implements, crops, domestic animals, food and its preparation, and the [realm of the] house; "the natural environment", comprising natural phenomena, flora, and fauna; "social organization", comprising law and government, economy, warfare, and religion; and "grammatical items", comprising pronouns, numerals, and particles. In addition, the core Semitic stock of the Modern South Arabian and Ethio-Semitic vocabulary also displays specific semantic traits in its lexicon, traits that may be due to linguistic contact or may even reflect early retentions.

Before turning to look more closely at a selected sample of Ethio-Semitic data, here is a brief overview of some issues that have the potential to complicate lexical classification, keeping the Ethio-Semitic scenario in mind.
[2.1] Issues of choice of lemmata: lexical lists based on genetic cognates vs. lexical lists based on target language
Grosso modo, lexical lists can be based either on genetic cognates within a language family, irrespective of the precise meaning of the lexical items in the individual languages (e.g., Bergsträsser 1983: 210-223) or on lists of words with (approximately) the same meaning in a target language, which, however, need not be genetically related (e.g., Bennett 1998: 232-249). Kogan (2015) takes both strategies into consideration, but pays special attention to the second strategy, building his arguments on a kind of modified Swadesh list.
The lemma "sun" in Semitic may serve to illustrate the situation. While East and Central Semitic (and also Epigraphic South Arabian, "ESA") use the root $\checkmark$ š-m-s in variations, the modern South Arabian languages resort to the lemmata for "day" ( $\sqrt{ } \mathrm{y}-\mathrm{w}-\mathrm{m}$ ) and "pre-noon" ( $V$ ḍ-h-y) respectively, roots which are also attested in other branches of Semitic but constitute lexical innovations in the cited South Semitic branches. Here is an overview of the lemma "sun" in Semitic (cf. also Leslau 1987: 149):

The lemma "sun" in Semitic
Akkadian šamšum

Aramaic šemšā riviř

| ESA | šms |
| :---: | :---: |
| Arabic | شَمْسْ |
| Mehri | ḥə－yáwm（yum／šum） |
| Hִarsūsī | he－yōm |
| Jibbāli | yum |
| Gə｀əz | dahāy ө¢，e |
| Amharic | șähay 日ヵ，e |
| Argobba | çähed |
| Gurage | çet |
| （cf．Arabic duḥā ضُحَ＇pre－noon＇and Hebrew ṣaḥ |  |

［2．2］Issues of diachronic inner－subgroup loan
Diachronic loans within the same genetic subgroup（e．g．，from Gə｀əz to Amhar－ ic）can also create confusion in the realm of phonology．A well－known（proba－ bly universal）phenomenon is the fact that proper nouns（place names and per－ sonal names）tend to be phonologically（and orthographically）more conserva－ tive than correlating common nouns and verbs．Within Ethio－Semitic，one can observe that the phonological structure of nouns in Gə｀əz containing gutturals is still preserved in loaned terms in Amharic（at least orthographically），where－ as the gutturals are lost in the respective verbal forms belonging to the same root．Here is an example comprising four terms（cf．also Edzard 2015b：189）：

| guttural retained |  | vs |  |  | guttural lost |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | tamhort | ＇lesson＇ | ＋${ }^{\text {a }}$ \％ | tämari | ＇student |
| aveide | mäshaf［mäṣhaf］ | ＇book＇ | 26. | ṣafä | ＇he wrote＇ |
|  | dähna［dä（h）na］ | ＇well＇ | ．93 | danä | ＇he recovered＇ |
| \％${ }^{\text {¢ }}$ | sa＇al | ＇picture＇ | Ч્川 | salä | ＇he painted＇ |

［2．3］Issues of inner－family loan
An especially intricate issue is the distinction between genetically related cog－ nates on the one hand and and inner－family loans on the other．The latter term refers to loan between languages of the same genetic subgroup，which may en－ gender semantic specification of an indigenous term due to its interaction with a genetic cognate．In the case of the latter，usual lautgesetzlich correspondences need no longer obtain．Also the semantics need not be exactly maintained in the borrowing process．An example，featuring loans from Gə｀əz to Arabic，is the following（cf．Weninger 2007；Edzard 2015b：187）：

| Gə`əz |  | Arabic |  |
| :---: | :---: | :---: | :---: |
| の行 | waqf | 'bracelet' $>$ waqf | 'bracelet' |
| nnc. | kabaro | 'drum, timbrel' > kabar | '(kettle-)drum' |
| omqidit | maṣhaf | '(any kind of) book' > muṣhaf (especially copy of the Qur'ān)' | 'book' |
| momac. | manbar | 'chair, throne' $>$ minbar | 'pulpit' |
|  |  | (no root $\sqrt{ } \mathrm{n}-\mathrm{b}-\mathrm{r}$ 'to sit' in Arabic) |  |

[2.4] Issues of autochthonous vocabulary vs. loaned vocabulary in target languages
Of special interest is the case where lexical doublets emerge as a result of in-ner-family borrowing. In this case, the respective lemma is both attested autochthonously and in a loaned version (cf. Edzard 2015a for a contextualization of this issue). Typically, the borrowed lemma then has a specialized meaning. While Arabic, for instance, features the autochthonous word $\theta \bar{a} b a$ 'he returned', one also finds the Aramaic loanword tāba 'he repented' (i.e. "returned" in a moral sense). Brockelmann had already examined this issue in his Grundriss (Brockelmann 1908-1913, vol. 1: 119). Examples are the following (cf. also Lonnet 2005; Tezel 2010; Leslau 1990):

| Arabic | bann $\bar{a}^{\text { }}$ |  | Mehri Mehri | bənnāy 'bricklayer' (loaned) mənnōy | vs. |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Aramaic | ta | > | Arabic | 'bricklayer' (autochthonous) tāba 'he repented' (loaned) | vs. |
|  | 'he repented' |  |  |  |  |
|  |  |  | Arabic | $\theta \bar{a} b a$ 'he returned' (autochthonous) |  |
| Akkadian | ušēṣī <br> 'he sent out' | > | Aramaic | šessī‘ he accomplished' (loaned) | vs. |
|  |  |  | Aramaic | $i ' \bar{a}$ 'he grew' (autochthonous) |  |
| Arabic $\sqrt{ }$ | ${ }^{3}-x-r$ | > | Ṭūrōyo | m'āxar 'to be late' (loaned) | vs. |
|  |  |  | Ṭūrōyo | hrēno |  |
|  |  |  |  | '(an)other' (autochthonous) |  |
| Arabic | madar <br> 'clouds of mud' | > | Amharic | ove.c. mädär 'clay' (loaned) | vs. |
|  |  |  | Amharic | go.e. madar 'earth ground' (autochthonous) |  |

［2．5］Issues of semantic innovations in Ethio－Semitic
First of all，the example of the lemma＂sun＂in Semitic has already been men－ tioned．Kogan（2015），who takes a modified version of the Swadesh list as a point of departure，points out the following further examples of semantic inno－ vation in Ethio－Semitic（cf．Kogan 2015：444－446）：
$\sqrt{ }$ l－ḥ－ṣ＇to peel，bark＇
Gә｀əz $\boldsymbol{\pi} \boldsymbol{\omega} \boldsymbol{\theta}$ laḥaḍa
Amharic＾n laṭä
Tigrinya nぁz läḥaṣä
$\checkmark$ k－b－d＇liver，stomach，belly＇
Gə｀əz hne：kabd
Amharic ư： $\operatorname{hod}($ käbd $>*$ häbd $>*$ häwd $>\operatorname{hod})$
Tigrinya h－n！．s．käbdi
$\checkmark$ m－d－r＇earth，ground，soil＇
Ga｀əz goe：c modr
Amharic g？e．c madar
Tigrinya $\boldsymbol{q}$＠． $\boldsymbol{\iota}$ madri

V b－l－‘＇to eat，consume，devour＇
Gə｀əz n＾o bal＇a
Amharic n＾bälla
Tigrinya nA\＆bäl＇e
$\checkmark$ deheh－y ‘shine，sun＇
Gә｀əz өヵ， $\boldsymbol{l}$ dahāy
Amharic өヵ， $\boldsymbol{e}$ ḍahāy［ṣähay］／п $\boldsymbol{\ell}$ ṭay
Tigrinya өн，$\ell$ ḍahāy［ṣähay］

V k－l－＇＇both，two＇
Gə｀əz nA\％kal＇e
Amharic u－n市hulätt
Tigrinya hat kalatte
［2．6］Ethiopian terms of uncertain origin（Swadesh list）
The etymological origin a of a given word cannot be determined with certainty
in every case. Ethio-Semitic examples include the following (cf. Kogan 2015: 446-448):
$\checkmark$ hem-d 'ashes'
Gə`əz $\boldsymbol{\phi} \boldsymbol{\sigma o} \boldsymbol{\rho}$ h hamad
Amharic hoos. amäd
Tigrinya $\boldsymbol{\kappa} \boldsymbol{\sigma} \boldsymbol{\rho} \boldsymbol{e}$ hamäd

```
\ q-ṣ-l 'leaf
Gว`\partialz क&R^q q}\mp@subsup{}{}{w}aṣ
Amharic $̀mA qoṭäl
Tigrinya $&`. q}\mp@subsup{q}{}{w
```

V s-b-' 'man'
Ga`əz ndt sab Amharic nov• säw Tigrinya inthe säb'ay \(\checkmark\) q-y-h 'red' Gə`əz \$!̣ぁ qayyoh
Amharic $\boldsymbol{\phi} \boldsymbol{\ell}$ qäyy
Tigrinya \$!̣ウ qäyyoh
V m-w-q 'warm’

Amharic on. $\boldsymbol{\phi}$ muq
Tigrinya $\mathbf{9 P \mathbf { \$ }} \mathrm{moq}$

## [2.7] Permutations

Cognate roots do not always appear in exactly the same order. The concept of "metathesis" is not meaningful in every case. Rather, at least in some cases, the semantics of a given term appear to be linked to the (non-ordered) set of the root consonants.
non-Ethiopic
Akkadian epēqum 'enclose'
Arabic falqaṭa 'hurry'
Soqotri ig'alil 'roll oneself'
Arabic jaraza/jazara 'tear, bite'
Arabic faḥara/hafara 'dig, notch'

Ga‘əz
$\boldsymbol{\omega \phi \text { b. h haqafa 'hug, embrace, ...' }}$
\$Amb. qaltafa 'hurry'
o7n 'agala 'place in layers, ...'
14.h/7HC garaza/gazara 'cut, circumcise’
b.hl.fahara 'dig (up), bury

## [3] THREE SAMPLE ENTRIES

In the following, four sample entries will considered: $\sqrt{ } n-f-s, \sqrt{ } d-b-r, ~ \sqrt{ } r-k-b$, and $\sqrt{ } h-g-r$, which shed light on the previously mentioned importance of South Arabian and Ethio-Semitic for classification.
[3.1] $\sqrt{ } n-f-s$
This root is attested across Semitic and is relatively straightforward in the distribution of its semantic range. As this root served as a model example within the Doha project, context is also provided in this case. For the semantic connection between "life" and "tomb", see also Steiner 2015.

## East Semitic

Akkadian $\sqrt{ } \mathrm{n}-\mathrm{p}$-š

- verb: napāšum 'to breathe freely, blow, relax, expand'
li-ip-pu-uš-ilum 'let him breathe, O God’ (personal name)
- noun: napišum 'breath(ing)'
napištu( $m$ ) '(essence of) life; throat'


## West Semitic

Central Semitic
Arabic $\sqrt{ } n-f-s$

- verb: نَفُسَ nafusa 'to be precious; نَفْسَ nafisa 'to be parsimonious, envious'
- noun: نَفْس nafs, pl. نُنْفُس nufūs, 'أْفُس 'anfus 'soul, psyche, desire, appetite, being, person, self'
نَفَس nafas, pl. أنْفاس 'anfās 'breath, sip'

Nabatean $\sqrt{ } \mathrm{n}$-f-s
nafs 'tomb'
ty nfs mr'w 'l-qys bn 'mrw mlk 'l-'rb
'This is the tomb of MR'LQYS, son of 'MRW, king of the 'RB'
(an-Namāra inscription; cf. Retsö 2003: 467-470)

Northwest Semitic
Ugaritic $\sqrt{ } \mathrm{n}-\mathrm{p}-\mathrm{s}$
$n p s ̌$ 'soul, (sexual) appetite'
'ap npš 'funerary document'

Phoenician $\sqrt{ } n-p-s ̌$
$n p s ̌$ I 'person, personnel, emotions'
$l-n p s ̌ b t$ 'šl'-štt $m k l$ '[paid] to the personnel of the temple of the consorts of MKL'
$n p s ̌$ II 'funerary monument, tombstone'
$n^{2} p s \check{s}^{\prime}$ scdyt '[this the] funerary monument of ŠcDYT'
Northwest Semitic in general (Phoenician, Punic, Moabite, Ammonite, El-
Amarna; Nabatean, Palmyra, Hatra) V n-p/b-š
$n p s ̌$ I 'life'
$n p s ̌-k[y]$ 'lqḥ 'I will take your life'
$n p / b s ̌$ II 'person'
$w-t b ' h n b s ̌-k$ 'and you(r person) will seek'
$n p / b s ̌$ III 'soul'
$w$-tšty nbš pnmw 'and may the soul of PNMW drink'
$n p / b s ̌$ IV 'disposition'
$n p / b s ̌$ V 'funerary monument'

Hebrew $\sqrt{ } \mathrm{n}$-p-š
 positional reflexive pronoun
nepeš hayyā 'living soul' (Gen 1:20)

נַפְּשִׁילְ lo-napš-ī 'for myself, for my own sake'

Aramaic
Babylonian Aramaic $\sqrt{ } n$-p-š

- verb: נפשׂ napaš 1. 'to increase, to be numerous'; 2. 'to be empty'
- noun: נַפַשָׁא nap̄šā ‘soul, body, self, human being'; reflexive pronoun

Palestinian Aramaic $\sqrt{ } \mathrm{n}-\mathrm{p}-\mathrm{s}$

nap̄ēš 'soul, living person, self, tomb, monument'
Syriac Aramaic $\sqrt{ } \mathrm{n}$-p-š

- verb: ná nap̄aš 'to breathe out, exhale; perhaps also 'to desire'
 pronoun'

South Semitic
Eastern South Semitic

Modern South Arabian (Mehri, Jibbāli, Ḥarsūsi, Soqoṭri)
Mehri $\sqrt{ } \mathrm{n}-\mathrm{f}(-\mathrm{s})$

- noun ḥə-nōf 'self'
- verb: anōfes 'to make space'; əntəfūs 'to be safely delivered of a child'; šznfūs
'to welcome s.o.'
- noun: nafs/nəfáws 'individual, soul, person'

Jibbāli $\sqrt{ } n-f$
núf 'self'

Ḥarsūsi $\sqrt{ } \mathrm{n}$-f

- noun ḥe-nōf/ḥe-nyehōf 'self'

Soqoṭri $\sqrt{ } \mathrm{n}-\mathrm{h}-\mathrm{f}\left(\mathrm{h}=\mathrm{s} / \mathrm{š}\right.$; metathesis of $\mathrm{C}_{2}$ and $\left.\mathrm{C}_{3}\right)$
nhof 'soul'
Regarding the importance of South Semitic, Kogan (2015: 578) remarks: "The MSA terms with the meaning "self" are hard to separate from PS *napš- (note especially the plural nö́foš in Soqotri), but Jib. núf makes it clear that the ProtoMSA form should be reconstructed without *š-, which does not shift to $h$ and cannot be dropped in Jibbali (cf. SED I [= Militarev and Kogan 2000, LE] No. 46v and 51 v )."

Western South Semitic
Epigraphic/Old South Arabian (mainly Sabaic) $\sqrt{ } n-f-s$

- verb: $h f_{s_{1}}$ (assimilated $n$ ) 'to open up (water channel)'
- noun:
$n f s_{1}$ I 'soul, person, self, life'
$n f s_{1}$ II 'funerary monument'
$n f s_{1}$ III 'woman in childbed'

Ethiopian Semitic
North Ethiopic
Gə`əz $\sqrt{ }$ n-f-s

- verb: '1母in nafsa 'to blow (wind, spirit)'
$\boldsymbol{\hbar \% 6 d}$ 'anfasa 'to breathe, exhale, rest, give relief'
- noun: pronoun
'4૬it nafsāt 'body, genitals'

South Ethiopic
Amharic $\sqrt{ }$ n－f－s
－verb： 16.0 näffäsä＇to blow（wind，spirit）＇
†＇b．ơ tänäffäsä＇breathe＇
－noun：14．п／＂ィ．in näfas／nəfas＇wind＇

ל母in n•C．näfsä ṭur＇pregnant＇
4ヶin＇näfsat＇insect＇
$\checkmark d-b-r$
This root has a wider semantic range．Indeed，in the case of this root we are probably looking at a variety of different homophonic lexical entries．Ethio－ Semitic presents the additional semantic aspect of＂monastery＂，i．e．something lying on the back of a mountain．In Mehri and Amharic，one can observe inter－ esting cases of metathesis．

East Semitic
Akkadian $V$ d－b－r
－verb：dupurrum＇to depart，recede＇
－noun：madbaru，mud（a）baru＇steppe，desert＇
dibiru＇mischief＇
dubur＇fundament＇

West Semitic
Central Semitic
Arabic $V$ d－b－r
－verb：دَبَرَ dabara＇turn one＇s back，elapse＇
دَدَّرَ dabbara＇make arrangements＇
－noun：دُبْر dubr＇rump，backside＇
دَبْرَة dabra＇turn（of fate）＇
دَبور dabūr＇west wind＇
دَبَوْ dabbūr＇hornet，wasp＇
Northwest Semitic
Ugarit $\sqrt{ }$ d－b－r
－verb：dbr 1．＇drive away＇；2．＇to say，declare＇
－noun：dbr＇matter，thing＇
$d b r$＇plague，pestilence＇

Phoenician $\sqrt{ }$ d-b-r

- verb: dbr 'to say'
- noun: dbr 1. 'thing, matter, act' 2. 'word, promise'; 3. 'pl. affairs, acts, history';

4. 'statement, declaration'

Hebrew $V$ d-b-r


- noun: דָדָָ dābāar I. 1. ‘word, speech'; 2. ‘dictum, saying, speech'; 3. 'words of a poet'; 4. 'God's words to the prophets'; 5. 'promise'; 6. 'assignment'; 7. 'wish'; 8. 'suggestion'; 9. 'message'; 10. 'appointment'
II. 1. 'thing'; 2. 'incident'; 3. 'doing, business, traffic'; 4. 'matter'; 5. 'portion' Tָּרַ deber 'cattle plague'
דּרֶּ dōber 'pasture'
Ton dobir 'the most holy'


Aramaic
Babylonian / Palestinian Aramaic $\sqrt{ }$ d-b-r

- verb: דבר dbr 'to take, act'


דִּנִּיר dibbēr'divine speech‘

Syriac Aramaic $\sqrt{ }$ d-b-r

- verb: is. dabar 1. 'to lead, guide, drive, take with oneself, to merry, pass of time'; 2. 'to move, bestir, depart, ride a horse, wander, go back, return'
- noun: Kमُicśỉ debūrtā 1. 'bee'; 2. 'wasp, hornet'

King dabārā 1. 'cultivation of the ground'; 2. 'plowing, tiling'; 3. 'driving';
4. movement, agitation'


South Semitic
Eastern South Semitic
Modern South Arabian
Mehri $\sqrt{ }$ d-b-r

- verb: adōbar 'to turn the back'
dábar 'to think, reflect'
$\checkmark$ r-d-b
- noun: 'ardyīb/'ardyōb 'nape of the neck and the top of the shoulders' Ḥarsūsi V d-b-r
- verb: ādēber 'to turn away (from)'

Soqotri $\sqrt{ }$ d-b-r

- noun: 'ídbeher 'bee'
$\checkmark \mathrm{r}-\mathrm{d}-\mathrm{b}$
- noun: 'ardīb 'nape of the neck and top of the shoulders'

Western South Semitic
Epigraphic/Old South Arabian
Sabaic $V$ d-b-r

- noun: $d b r$ 'payment in the form of work (?)'

Ethiopian Semitic
North Ethiopic
Gə`əz V d-b-r

- verb: $\boldsymbol{+} \boldsymbol{\Omega} \boldsymbol{n}$ c tadabbara 'to lie on one's back'

R! $\boldsymbol{C}$ dabara 'establish a monastery'
$\boldsymbol{f} \boldsymbol{f} \boldsymbol{n} \boldsymbol{\omega}$ dabrawa 'be well-developed, be well-grown (child), engage in illicit sex'

- noun: ㅇ.nc dabr 'mountain, region where there is a monastery, convent, monastery'
$\boldsymbol{\Re} \boldsymbol{n} \boldsymbol{n c}:$ : R.nc dābar, dabr 'territory, city, village'
भ1九. : s. $10 . C$ dāber, dābir 'shrine, sanctuary, innermost room, ecclesiastic council'

South Ethiopic
Amharic $V$ d-b-r
 packed merchandise to form a sort of shelter (merchant when setting up camp for the night)'; 3. 'to raise the rank of a church to däbr (main church which provides sanctuary to individuals seeking refuge from persecution or prosecution)'; 4. 'to delimit the sacred confines of a church'; 5. 'to pile, stack, heap up, to put in a row or line'
f. $\Omega$ C däbbärä 1. 'to be chubby, to thrive (baby); 2. 'to mature, reach full maturity, grow to full size'

- noun: 尺flc däbr, däbar 'main church (one of high status which is surrounded by a sacred grove, endowed with ample lands [until 1975] and served by many däbtära-cantors)'
$\boldsymbol{P}$.nढ dabre 1. 'a large pottery vessel, crock, ewer'; 2. ' pet name a peasant gives to the ox that tramples the grain'
$\checkmark$ ǧ-r-b
 chicken'; 3. 'reverse (of a coin)'; 4. 'the underside of the onğärä, i.e. the part that lies against the griddle'; 5. 'rear (back)'; 6. 'behind (prep.)'


## [3.2] $\sqrt{ } r-k-b$

The third sample root is again relatively straightforward, with equally broad attestation across Semitic, but features the additional semantic aspect of "taking possession" in Ethio-Semitic.

## East Semitic

Akkadian $\sqrt{ } \mathrm{r}-\mathrm{k}$-b

- verb: rakābum 1. 'to mount, ride on (chariot, boat, animal; of gods 'ride' wind, storm etc.)', 2. 'mount (sexually) of animal, man'; 3. 'to be superimposed (of moon 'cover, eclipse' star)'; 4. 'of plough share (šinnum) to cut furrow'


## West Semitic

Central Semitic
Arabic $\sqrt{ }$ r-k-b

- verb: رَكَبَ rakiba 'ride, mount (an animal), travel'
- noun: رَكْب rakb 'riders, horsemen'

مَرْكَب markab ‘ship, vessel'

Northwest Semitic
Ugarit $\sqrt{ } \mathrm{r}-\mathrm{k}-\mathrm{b}$

- verb: $r k b$ 'to mount (especially a chariot)'
- noun: $r k b$ 'charioteer, (epithet of the god $B^{\prime} L$ )'

Hebrew $V$ r-k-b

- verb: רָכָ rākab 1. 'ride'; 2. 'drive'; 3. 'to get on, mount'
- noun: רֶֶ rekeb 1. 'convoy'; 2. 'train'; 3. 'wagon, chariot'; 4. the upper grinding stone of a hand mill'
רַכַּ rakkā̄ 1 1. 'rider'; 2. 'charioteer'

Aramaic
Babylonian / Palestinian Aramaic $\sqrt{ } \mathrm{r}-\mathrm{k}-\mathrm{b}$

- verb: רכב rkb 1. 'to ride, mount': 2. 'to impose upon so.'; 3. 'to copulate (of animals)'
- noun: מַרַכַבְחָא markablata 'chariot, saddle'
rkb 1. 'rider'; 2. 'upper millstone’
Syriac Aramaic $\sqrt{ } \mathrm{r}-\mathrm{k}-\mathrm{b}$
- verb: صさ̉ $\begin{aligned} \text { rakeb 1. 'to mount, bestride, ride a horse, mule, camel'; 2. 'to cover }\end{aligned}$ in breeding'
- noun: í ínakbā 1 . 'the upper millstone'; 2. 'the iron axle of a millstone'
 mal for riding, horse'; 3. 'riding, horsemanship'
 the compounding of medicines, a recipe'; 3. 'structure of the body'; 4. 'literary composition'


## South Semitic

Eastern South Semitic
Modern South Arabian
Mehri $\sqrt{ }$ r-k-b

- verb: rēbob 'to ride'; 2. 'to mount'; 3. 'to sleep with a woman'
arōkzb 'to put (a pot) on the fire'
$r t \partial k u \bar{b}$ 'to get on to the right road and go straight along it'
- noun: rakb 'ledge on a cliff (of about the size one could sleep on)'
rōkəb 'rider
mərkēb/ məráwkəb 'boat'
Jibbāli $\sqrt{ }$ r-k-b
- verb: rékab 'to ride, mount (also with a sexual connotation)'
erókub 'to put (a pot) on the fire'
rótkab 1. 'to jump on one another (in play or sexual intercourse)'; 2. 'to commit an offence'
- noun: $\varepsilon r k i ́ b, y u r s ̃ o ́ b ~ ' r i d i n g-c a m e l ' ~$
rókub 'rider'
merkéb/mirćbkəb 'boat'


## Ḥarsūsi V r-k-b

- verb: rēkeb 'to mount, ride'
arēkeb 'to put food in a pot to cook over the fire'
- noun: rékbi 'horseman'
rekīb 'riding camels'
márkeb 'ship'
merkebét＇saddle－sore＇

Soqotri V r－k－b
－verb：rékob（rikub）＇to mount＇
－noun：rékkeb＇knight＇
márkeb＇boat＇

Western South Semitic
Epigraphic／Old South Arabian
Sabaic $\sqrt{ }$ r－k－b
－verb：rkb＇to ride a horse’
－noun：rkb 1．＇rider，specifically cameleer＇；2．＇camelry＇；3．coll．＇riding animals＇
Ethiopian Semitic
North Ethiopic
Gə｀əz V r－k－b
－verb：«nn rakaba 1．＇find，get，acquire，obtain，attain，receive，gain，reach，take possession of，possess，overtake，apprehend，invent，find out，discover，per－ ceive，suppose＇；2．＇come upon，fall upon，befall，occur，come to pass，happen， be becoming to，be proper＇
－noun：C＇h－n＇t rokubāt＇beings＇
chrn rakb＇congregation，meeting，council，assembly＇
$\lessdot \uparrow \boldsymbol{T h}$ rukābe＇joining together，intercourse＇
chn市rakbat＇discovery，finding，acquisition，existence’

## South Ethiopic

Amharic $\sqrt{ } \mathrm{r}-\mathrm{k}-\mathrm{b}$
－verb：«hn，†¿nn räkäbä，täräkkäbä＇take over（a business），take possession，be turned over（weapons）
そňınn ’asräkkäbä ‘deliver（merchandise），turn over（weapons），surrender （arms），hand in，hand over＇
－noun：九c＇hn＇arkab＇sirup＇
［3．3］$\sqrt{ } \mathrm{h}-\mathrm{g}-\mathrm{r}$
This root is primarily attested in South Semitic．Leslau（1991：216）does not re－ late the South Semitic meaning＂city，land＂to the concept＂migration＂，as at－ tested in Arabic，South Arabian，and Ethio－Semitic．

West Semitic
Central Semitic

Arabic $\sqrt{ } \mathrm{h}-\mathrm{g}-\mathrm{r}$
هاجَرَ hāğara 'emigrate‘
هِجْرَة hiǧra 'emigration'

Hebrew $\sqrt{ }$ h-g-r
דֵַּר higgēr 'emigrate', immigrate'
PN: הָהָר hāḡār 'Hagar, Egyptian slave and concubine’

South Semitic
Eastern South Semitic
Modern South Arabian
Mehri $\sqrt{ }$ h-g-r

- verb: hagūr 'to buy food for one's family'
hōgar 1. 'to leave your family and emigrate'; 2. 'to travel at midday, between 11 and 3 o'clock'
hēgar 'to be hot at midday'

Jibbāli $\sqrt{ }$ h-g-r

- verb: hógór 'to (leave o's family and) emigrate'
ohógur 'to come, go at midday (between 11 and 3 o'clock)'
- noun: hogar 'midday'

Western South Semitic
Epigraphic/Old South Arabian
Sabaic $\sqrt{ }$ h-g-r

- noun: hgr 1. 'town, city - administrative center of a $s^{\prime} b$ (group of clans)';

2. 'settled territory'
hgrhmw 'town-dwellers'

Ethiopian Semitic
North Ethiopic
Gə`əz V h-g-r

- noun: vาc. 'city, town, village, province, district, country, homeland, inhabited, region'


## South Semitic

Amharic $\sqrt{ } \emptyset$-g-r

- noun: ŁNC agär 'country, nation, territory, (region, land), district, state, land (country, fatherland)'


## [4] CONCLUSION

Even this short glimpse at the South Semitic (South Arabian and Ethio-Semitic) lexicon is revealing and rewarding. Clearly, South Arabian often features different or at least additional semantic traits in the lexicon. A systematic evaluation of sources such as Cohen 1970 - as well as the Semitic dictionaries with comparative evidence (notably Leslau 1987), will certainly bring to light more interesting material. The usefulness of lexicostatistics for genetic classification continues to be a point of discussion.

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# WHAT IS IN A NAME? PERSONAL NAMES IN HADIYYA 

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## ABSTRACT

The aim of this paper is to describe the system behind personal names in Hadiyya. The bulk of the paper analyses the semantics of personal names. Hadiyya personal names express social, economic and political circumstances accompanying the birth of a child. Name givers express their wishes, desires and emotions through personal names. The close examination of names over generations indicates a gradual shift from typical Hadiyya names to modified Amharic-based names. Since the advent of Christianity in the region, Biblical names have also become common. The historical underpinnings for the shift to Amharic-based and Biblical names are language and cultural contact. All Hadiyya personal names display vowel endings that mark case and gender. Like other nouns in the language, personal names can have simple, derived or compound form. Interestingly, most Hadiyya personal names can be translated freely with relative or agentive readings. Personal names can have a perfective reading describing past experience or an imperfective reading expressing wishes for the future. Though Hadiyya is a morphologically complex language and hence all the above grammatical notions are overtly marked, they are omitted in the morphology of personal names. The use of inflectional and derivational morphemes is minimal. Hadiyya personal names are therefore special word classes that tend to display a simplified morphosyntactic structure and free translation.
[1] INTRODUCTION: THE PEOPLE AND THE LANGUAGE
The Hadiyya people live mainly in the Hadiyya zone of the Southern Nations, Nationalities and Peoples Region (SNNPR) of Ethiopia. The zone is divided into eleven Weredas (districts) with Hosaa'na as its capital. Its neighbouring zones are Silt'i and Gurage to the north, Kambaata and T'ambaaro to the southeast and Wolaitta to the south. The Omo River to the west and southwest separates the Hadiyya zone from the Oromia region and Yem special Wereda (Taddese 2015, Samuel 2009). Hosaa'na is one of the developing cities in SNNPR hosting a number of ethnic groups: Hadiyya, Amhara, Kambaata, Silt'i and Soddo Gurage (Taddese 2015). The population size of the Hadiyya ethnic group is 1.35 million
(2007 National Census). The Haddiyya people are largely agro-pastoralists who make their income mainly from agriculture and animal husbandry. Enset (false banana) and its products are the most common sources of food. Wheat, maize, t'eff and other crops are also widely grown. The Hadiyya are largely followers of Christianity, while a very insignificant minority neighbouring the Silt'i ethnic group are followers of Islam (Samuel 2009).

The Hadiyya call their language Hadiyy-is-a deriving it from the ethnonym through suffixing the glottonym formative -is-a. It is also known as Hadiyy-i-suum-e ('Mouth of Hadiyya') or Hadiyy-i-sagar-a ('voice of Hadiyya') (Taddese 2015). Based on the 2007 census, $95 \%$ of the Hadiyya people speak Hadiyya as their mother tongue. Hadiyya is therefore one of the major Ethiopian languages with more than a million speakers. It is a language spoken by thousands of monolinguals and also spoken by the Kambaata, Wolaitta, Gurage and Alaaba ethnic groups as their second language (Taddese 2015). Amharic is spoken as a second language by most Hadiyya speakers in towns and also serves as a vehicular language among speakers of different languages. Hadiyya was transcribed into writing for the first time during the Literacy Campaign in the 1970s using the Ethiopic script. As from 1994, however, the writing system is based on the Latin script. The Latin-based orthography is more phonetic and hence what is pronounced is written. Hadiyya is a medium of instruction for primary education and is taught as a subject at high school and college levels.

Genetically, Hadiyya is a member of the Highland East Cushitic language family together with Sidaama, Kambaata, Gedeo and Burji. Grammatical and sociolinguistic descriptions of the language have been written by Hudson (1976), Haileyesus (1984) (BA senior paper), Moges (1984) (BA senior paper), Getahun (1980) (BA senior essay), Sim (1989), Samuel (2009) and Taddese (2007, 2015). Hadiyya is known to have four variants -- Leemo, Baadawwaacho, Shaashoogo and Sooro - although these have not yet been extensively studied (Tadesse, 2015). Hadiyya is a language with five short and five long vowels. As a Cushitic language, vowel length is phonemic in Hadiyya, as in mar-a ('pus') vs. maar-a ('meat'), kor-a ('flee') vs. koor-a ('saddle'), 2agg-a ('drink') vs. 2aag-a ('entrance'), etc. The consonant inventory has twenty-three consonants: six stops, five fricatives, two affricates, four ejectives, two nasals, two liquids and two glides. Consonant gemination is a phonemic feature as in t'aat'-a ('cover') vs. t'aat't'-a ('ready'), das-a ('slow') vs. dass-a ('crash'), etc. (Taddese, 2015:23). Morphologically, Hadiyya is an inflectional language with a relatively complex verbal inflection. It is a head final language with an SOV word order.

This paper attempts to describe Hadiyya personal names and the practices underlying them. It gives an insight into the formal and semantic-pragmatic
descriptions of these names. The most relevant previous works are Getahun's (1980) senior essay and Abraham's (2014) MA thesis. The senior essay is written in Amharic and all the data are presented in the Ethiopic orthography, which makes it difficult to understand clearly the internal phonological and morphological structures of personal names. As it lacks a linguistic transcription, it is difficult to pronounce the names as they are uttered in the language. The present work differs from the MA thesis by Abraham in its broader data and indepth semantic, sociolinguistic and morphological analyses as well categorization of names.

The raw data and information were collected mainly from Hoommachcho and Hosaa'na during successive fieldtrips that took place in 2015 and recently in March 2016 as part of the linguistic capacity building research. Native speakers of Hadiyya known as being knowledgeable about their language and culture were consulted. The qualitative data consists of seven hundred full names (one hundred taken from Hoommachcho elementary school and six hundred taken from Hosaa'na high school, representing the urban and rural settings, respectively). These names all followed the CHILD + FATHER + GRAND FATHER pattern, which has helped to analyse Hadiyya names chronologically. Note that since each of the seven hundred children had three names, the total number of names to investigate was two thousand one hundred. During later verification of the authenticity of data in the field, a variety of valuable information was added. Names were both translated literally and also phonetically transcribed by strictly following the International Phonetic Alphabet (IPA). Note the following correspondence between the Latin-based Hadiyya orthography and the IPA symbols used in this paper.

## Hadiyya Orthography IPA symbols used in this paper

| $X$ | $t^{\prime}$ |
| :--- | :--- |
| $Q$ | $k^{\prime}$ |
| $C$ | $f^{\prime}$ |
| Ph | $p^{\prime}$ |
| Sh | $\int$ |
| Ch | $t^{\prime}$ |
| $J$ | $d 5$ |
| C | $?$ |

The fricative 3 , the ejective $s$ ' and the nasal $n$ that appear in loanwords are represented as $z h$, ts and $n y$, respectively in the Hadiyya orthography (for details on the orthography, see Shimelis - this volume).
[2] TYPES OF HADIYYA PERSONAL NAMES
The study of personal names, or anthroponomy, has attracted the attention of sociolinguistic and anthropological linguistic researchers for the multifaceted information it offers not only about name bearers and name givers, but also about the socio-economic, political and cultural circumstances surrounding the birth of a child (see Bean 1980, Carroll 1985, Essien 2000, Herbert 1995, Hough, 2000). Like most of the African naming practices (see Akinnaso 1980, Crane 1982, Koopman, 1979, Madubuike, 1994, Zelealem 2005), Hadiyya names serve as more than mere tags. Behind Hadiyya names, there are the Hadiyya people, their environment, their language and their way of life. They express their past, present and future through personal names. A Hadiyya name can denote one's clan or ethnic identity. According to Getahun (1980:40), the name Hadiyya means 'too tolerant' or 'too responsible' and can serve as a personal name. Name bestowal is mainly a family affair. In few cases, neighbours or elderly people may give names to newborn babies. As a patrilineal society, during the birth of a child, three ululations herald the birth of a female child whereas four ululations herald the birth of a male child. Another patrilineal practice common until recently among the Hadiyya has been the wife's use of her husband's name as a family name; this was stopped in the 1970s following the adoption of women's rights.

Elderly informants remember that, until the advent of modern education and administration in the 1930s, naming in Hadiyya followed a FATHER + CHILD order, which was latter replaced by a CHILD + FATHER order. As described in the following sections, male names end with the case and gender marker -0 , and when such a male name appears with a father's name that also end in -0 , a rhyme is formed, as in erctaab-o danbaal-o, suulit-o leereb-o and ?awaan-o biirem-o. A person can have two or more names in a family but the official name should be one, i.e. mononymous. As a prototypical Ethiopian feature, Hadiyya does not include any family names or surnames.

Abraham (2014) divided Hadiyya personal names into those based on circumstance, survival, supplicate, power, blessing, satisfaction, fauna, flora, place, age, matrimonial, balliuw $\iint$ a (special forms of address by women) and honor. Getahun (1980) identified names conveying good wishes, heroism, wealth or time as the most frequently bestowed personal names. Hadiyya personal names can be categorized broadly into circumstance, religion and timebased names. Other names are bestowed metaphorically from natural objects such as animals and animal products, plants and so on. There are also coaxing and pseudo names.

## [2.1] Circumstance-based names

Naming practices among the Hadiyya are intimately connected to the different circumstances accompanying the birth of a child. As the Hadiyya do with the riddles, proverbs and stories of their oral traditions, Hadiyya name givers use personal names to describe the good and bad experiences that speak to their hearts. With names, they express their past, present and future. Personal names reflect good wishes, peaceful coexistence and victorious episodes. Compare the following data, in which name givers remember particular times that paved the way to economic, social and political gains.

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| laamb-eeb-o ('one who brought peace') | laamb-a <br> ('peace') | $\begin{gathered} \text { eeb-o } \\ \text { ('bring') } \end{gathered}$ | overall peace in the family or the area |
| er-t'umm-e <br> ('good peace') | $\begin{gathered} e r \\ \left(\text { 'good' }^{\prime}\right) \end{gathered}$ | t'umm-a ('peace') | people enjoying peaceful times |
| $\begin{gathered} \text { foor-siid-o }{ }^{1} \\ \text { ('one who got life') } \end{gathered}$ | foor-e <br> ('life') | $\begin{aligned} & \text { siid-e } \\ & \text { ('get') } \end{aligned}$ | a family overcame a social or economic problem |
| ap'p'-is-o <br> ('one who caused comfort') | $\begin{aligned} & \text { laap'p'-a } \\ & \text { ('comfort') } \end{aligned}$ | (causative marker) | a child is born during comfortable times |
| t'aa?m-is-o ('one who caused morning sun') | $\begin{gathered} \text { t'aa?m-a } \\ \text { ('morning sun') } \end{gathered}$ | $\begin{gathered} -i s-o \\ \text { (causative marker) } \end{gathered}$ | abundant cattle, crops, health, etc. |
| mooll-oor-o ('one who brought the clan together') | mooll-o <br> ('clan') | $\begin{aligned} & \text { wor-o } \\ & \text { ('bring') } \end{aligned}$ | members of the clan live healthy and peaceful lives together |
| traakk-eeb-o ('one who brought light') | t'aakk-a <br> ('light') | $\begin{gathered} e e b-o \\ \text { ('bring') } \end{gathered}$ | glorious things occur in the family or the area |

TABLE 1: Names referring to favourable circumstances

The data in Table 1 show that Hadiyya people use personal names to express
[1] For the concepts 'life', 'breath' and 'soul', one word serves.
the high value they ascribe to peace, unity and comfort within and beyond the family.

Hadiyya names also express the psychological and physical comfort in life that derive from a good harvest, victory in war or winning a court dispute. The name hayd-aam-o ('with honor/honorable') from hayd-a ('honor') and -aam (adjectivizer) refers to the event that has brought honor to the family in various activities. The name heell-is-o ('one who caused success') from heell-o ('success') and the causative suffix -is, reflects a successful situation in the family or the area at large. Mal-hoor-e ('one who prevented suspicion') (from mal-o ('suspicion') and hoor- ('to prevent') expresses the relief of a family from various problems that brought suspicion upon the family. The name t'uutff-oor-o ('one who prevented pain'), from t'uut $t f-a$ ('pain') and hoor- ('to prevent') is bestowed upon a baby born after an easy labour, or after any other recovery from painful circumstances. Compare the following table concerning names that reflect satisfaction, honor and victory.

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| fuufl-is-o ('one who made one fat') | $\begin{aligned} & \text { fuupl-a } \\ & \text { ('fat') } \end{aligned}$ | $\begin{gathered} -i s-o \\ \text { (causative marker) } \end{gathered}$ | family members gain weight due to comfort |
| $\begin{aligned} & \text { heell-aam-o } \\ & \text { ('with success') } \end{aligned}$ | $\begin{aligned} & \text { heell-o } \\ & \text { ('success') } \end{aligned}$ | $\begin{gathered} \text {-aam-o } \\ \text { (adjectivizer) } \end{gathered}$ | family members enjoy successful times |
| godd-eeb-o ('one who brought wealth') | godd-a ('wealth') | $\begin{gathered} e e b-o \\ \text { ('bring') } \end{gathered}$ | persons enjoy wealth |
| deett-eeb-o ('one who brought honor') | deett-a <br> ('honor') | $\begin{gathered} \text { eeb-o } \\ \text { ('bring') } \end{gathered}$ | there is a feeling of honor due to heroic deeds, significant wealth, etc. |
| $\begin{gathered} \text { dil-eeb-o } \\ \text { ('one who } \\ \text { brought victory') } \end{gathered}$ | $\begin{gathered} \text { dil-a } \\ \text { ('victory') } \end{gathered}$ | $\begin{gathered} \text { eeb-o } \\ \text { ('bring') } \end{gathered}$ | people enjoy victory in war and conflict |

TABLE 2: Names referring to successful circumstances

Names such as laap'p'o ('comfort') and maass-o ('excess/splendid') or maass-aam-o ('with excess/splendid') also indicate one's economic, social and political
success in life. The data in Table 2 proves that the Hadiyya society expresses its good times in every walk of life through personal names.

The following er-based compound names reflect good activities performed in the family, in the village or the area at large. These names also reflect the name-giver's good wishes for the name bearer:

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| $\begin{gathered} \text { er-mif-e } \\ \text { ('good fruit') } \end{gathered}$ | $\begin{gathered} e r \\ (\text { 'good') } \end{gathered}$ | $\begin{gathered} \text { mif-a } \\ \text { ('fruit') } \end{gathered}$ | refers to the acceptance of a child as an asset to the family |
| er-kibb-e <br> ('good company') | $\begin{gathered} \text { er } \\ \text { ('good') } \end{gathered}$ | $\begin{gathered} \text { kibb-e } \\ \text { ('company’) } \end{gathered}$ | refers to a child as a new member pride to the family |
| erkob-e ('good companion') | $\begin{gathered} e r \\ \text { ('good') } \end{gathered}$ | $\begin{gathered} \text { kob-a } \\ \text { ('companion') } \end{gathered}$ | refers to a child as a new member pride to the family |
| er-mann-o <br> ('good man') | $\begin{gathered} e r \\ \text { ('good') } \end{gathered}$ | mann-a <br> ('man') | refers to wishes for a child to be a trustworthy useful member |
| er-abb-o ('good brother') | ('good’) | abb-o <br> ('brother') | refers to a demanded male child |
| $\begin{aligned} & \text { er-goog-e } \\ & \text { ('good path') } \end{aligned}$ | $\begin{gathered} \text { er } \\ \text { ('good’) } \end{gathered}$ | goog-o <br> ('path') | refers to a conducive time |
| er-k'aall-o ('good future') | ('good’) | k'aall-o <br> ('future') | refers to a bright future |

TABLE 3: Names referring to good circumstances

Name givers describe the good qualities of a family member and favourable times through personal names. Thus the names in Tables 1, 2 and 3 express circumstances that are valued positively by the community.

The Hadiyya people hold victory and fame in high regard: fame in valiant deeds, fame in accumulating property, fame in winning debates, fame in making fruitful conciliation, etc. The following table shows the list of names that express fame or victory over an enemy or in a court case:

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| daar-t'iib-o <br> ('one who expanded territory/border') | daar-a <br> ('territory/border') | t'iib-o <br> ('push') | expansion of territory after the defeat of an enemy |
| $\begin{aligned} & \text { dil-aam-o } \\ & \text { ('with victory') } \end{aligned}$ | $\begin{gathered} \text { dil-a } \\ \text { ('victory') } \end{gathered}$ | aam <br> (adjectivizer) | victory in a court case, battle, etc. |
| sad-or-o <br> ('one who brought fame') | $\begin{aligned} & \text { sad-e } \\ & \text { ('fame') } \end{aligned}$ | wor-o ('bring') | a family or one of its members becomes wealthy or a hero |
| deett-eeb-o ('one who brought honor') | deett-a <br> ('honor') | $\begin{gathered} e e b-o \\ \text { ('bring') } \end{gathered}$ | a family is honored in social or financial gains |
| $\begin{aligned} & \text { er-sad-o } \\ & \text { ('good fame') } \end{aligned}$ | $\begin{gathered} \text { er } \\ \text { ('good') } \end{gathered}$ | $\begin{gathered} \text { sad-o } \\ \text { ('fame') } \end{gathered}$ | fame is achieved in various activities |

TABLE 4: Names referring to victorious circumstances

The name had-moor-a ('many bull oxen'), from (had-a ('many') and moor-a ('bull ox'), is given to a male child in the hope that he will have great stamina to his immediate family and beyond. Getahun (1980:28) mentions the male name waariik'-o, derived from a river called Waar-a. This name was given to a child when a pregnant woman's relatives defeated her kidnappers and brought her back home. This name suggests that in former times kidnapping of girls was a common practice, with the potential for inciting conflict, among the Hadiyya. The names sull-aam-o ('with relatives'), sull-or-o ('one who brought his relatives home'), summ-or-e ('one who brought name'), summ-aam-o ('with name'), suull-iitt-o ('one who loved his relatives') and sul-dooll-o ('one who selected his relatives') express the high regard that the Hadiyya give to strong family (the word suull-a can also mean 'clan' or 'race') attachments and securing a name that is well-known (fame).

Hadiyya names are also bestowed in connection with events of war, conflict, drought, death in the family, penalty and other unhappy circumstances. This is particularly true in the names of fathers ( $f$ ) and grandfathers (ff). The following ora-based names indicate the difficult times resulted from war and other serious problems before or during the birth of a child.

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| or-eeb-o | or- $a^{2}$ | eeb- |  |
| ('one who <br> brought war') <br> or-dooll-o | ('war') | ('bring') | war and conflict |
| ('war epoch') | ('war-a | dooll-o |  |
| or-sin-o <br> ('war epoch') <br> or-t'iib-o <br> ('epoch') <br> ('one who insti- <br> gated war') | ('war-a | war and conflict |  |

TABLE 5: Names referring to bad circumstances (war)

If a child is born at a time when a family has been accused of wrongdoing, is burdened with debt or is a party to a court case, names such as haw-t'iib-o ('one who caused a problem', from (haww-o ('problem') and t'iib-o ('push'), baat-aam-o ('with debt'), from baat-a ('debt') and -aam-o (adjectivizer) and haf-eeb-o ('one who brought conspiracy'), from haf-a ('conspiracy') and eeb-o ('bring') are bestowed. The name bank'-eeb-o ('one who brought thunder/disaster'), from bank'$a$ ('thunder/disaster') and eeb-o ('bring') reflects the sufferings of a family or the Hadiyya area from man-made or natural calamities. Names such as haww-is$o$ ('one who caused a problem'), from haww-a ('problem') and -is-o (causative marker), yakk-is-o ('one who caused challenge'), from yakk-a ('challenge') and -is-o (causative marker) and t'ut tf-eeb-o ('one who brought pain'), from t'uuttf-a ('pain') and -aam-o (adjectivizer) are bestowed on children born during painful times, including life-threatening labour pains experienced by the mother. The name goor-eeb-o ('one who brought debt'), from goor-a ('debt') and eeb-o ('bring') indicates that the child was born during a period when the family was burdened with debt. Abraham (2014) mentions hoffiit't'-o ('scarce') as a name given to a baby born during a time of scarcity of things such as grain, rain, etc.

Other names are connected to suffering brought about by drought and famine. By these names, the Hadiyya society expresses the difficult times experienced in connection with a shortage of rainfall and the resulting crop failures.
[2] or-a could also mean 'spear' or 'fight'.
[3] dooll-e and sin-e are synonyms. Whereas the former is widely used, the latter is an old word known to elderly speakers (Taddese, p.c.)

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| bil-t'iib-o <br> ('one who brought a dry <br> season') <br> bill-oor-e | bill-e <br> ('dry season') | t'iib-o <br> ('push') | A long dry season |
| ('one who prevented a <br> dry season') <br> t'oom-eeb-o <br> ('one who brought hun- <br> ger') | bill-e <br> ('dry season') | hoor-e <br> ('prevent') | A long dry season |
| ('hunger') | eeb-o <br> ('bring') | hunger |  |

TABLE 6: Names referring to bad circumstances (drought and famine)
t'oom- $a$ ('hunger') is a loanword from the Amharic word s'om-, which refers to religious fasting. In Hadiyya, however, it is used with a different but related meaning, referring to an empty stomach due to scarcity of food. The word for 'religious fasting' in Hadiyya is soommaan- (Amharic: s'om) and if a child is born during a time of fasting, the child may be named soommaan-e (in the case of a female child) or soommaan-o (in the case of a male child). The name haankut-o ('mess maker') is given to a child born during a time of family problems. The name ?unn-is-o ('one who caused horror') has a similar but more serious connotation.

The Hadiyya also use personal names to express grief on the death of a family member or an eminent local person. Because it is a male-dominant society, the death of a father seems to be taken more seriously than the death of a mother. Compare the examples below:

| Name | Constituent 1 | Constituent 2 | Circumstance |
| :---: | :---: | :---: | :---: |
| an-sab-0 <br> ('one who hated fa- <br> ther') | ann-a <br> ('father') | sab-o <br> ('hate') | Death or long- <br> term absence of a <br> father |
| ('one who hated suc- <br> cess') | heell-o <br> ('success') | sab-o <br> ('hate') | Family discomfort <br> due to death or <br> loss of property |
| le-waar- <br> ('death came') | leh-o <br> ('death') | waar-o <br> ('come') | Death of a family <br> member or a re- <br> nowned local per- <br> son |
| gaabb-or-e <br> ('one who brought <br> death') | gaabb-a <br> ('sorrow') | wor-e | Death of an im- <br> mediate family <br> ('bring') |

TABLE 7: Names referring to bad circumstances (death)

Name givers also express their times of healing in personal names. The name foor-siid-o ('one who sowed soul again'), for example, refers to the healing time of a family or the village or the Hadiyya people from difficult times such as family loss, epidemic, drought, conflict, etc. The name waat-iir-o ('one whom God thought about') is connected to a time of relief after parents or family members have experienced painful circumstances.

## [2.2] Religious names

The majority of Hadiyya people are Christians and hence avid consumers of Biblical names (see Treis (2008: 109) for a similar phenomenon among the Kambaata)). It is believed that the Hadiyya began to bestow Biblical names on their children after Christianity was introduced into the Hadiyya area in the 1930s, when naming practice began to depart from traditional Hadiyya names in favour of Biblical and Amharic names (Tesfaye, p.c.). All the names of apostles in Hadiyya are forms of the Amharic versions modified through syllable adjustments and vowel ending as shown in Table 8 below:

[^33]| English Bible | Amharic Bible | Hadiyya Bible |
| :---: | :---: | :---: |
| Simon | Sim?on | Simi?oone/Simoone |
| Peter | P"et"ros | P"eet"iroose |
| Andrew | indiriyas | Indiriyaase/Indiraase |
| John | Yohanis | Yohaannise |
| Philip | Filip"os | Filip"""oose |
| Bartholomew | Bärtolomewos | Barteleemose |
| Thomas | Tomas | Toomaase |
| Matthew | Metewos | Maatewoose/Maatoose |
| Thaddaeus | Tadewos | Taadewoose/Taadoose |
| Jacob | Yak"ob | Yaak"oobe |

table 8: Biblical names

All the names of apostles in the Hadiyya Bible end in the absolutive ending $-e$, which appears most often with female names. Among the apostles' names, Judas/Yihuda does not appear as it implies betrayal. Bartholomew appears to be a rare name, perhaps because of its long syllable structure. The four gospel writers in the English, Amharic and Hadiyya Bibles are written as Matthew > Matewos > Maatewoos-e, Mark > Mark'os > Maark'oos-e, Luke > Luk'as > Luk'k'aas-e and John > Yohannis > Yohaannis-e and are frequently used as names. In addition to the names of the Apostles and Gospel writers, Biblical names from old and new testaments are avidly used. These include Paul > P'awlos > P'aawuloos-e, Jeremy > Ermiyas > Ermiyaas-e, Jonas > Yonas > Yoonaas-e, Daniel > Dan?el > Daaneel-e, Elias > Eliyas > Eliyaas-e, Abraham > Abriham > Abraam-e, David > Dawit > Daawwit-e, etc. It appears that Biblical names are frequently observed in male names. Though there are a number of female names in the Bible, name givers do not use them for the newborn baby girls. Getahun (1980) has mentioned one Biblical female name: maaraam-e ('Mary').

As the Hadiyya are predominantly protestant, names of angels and the Virgin Mary, which are commonly used by members of Orthodox and Catholic churches, are rare. Hence, names of the saints and angels, such as George > Giyorgis, Gabriel > Gäbriel, and Michael > Mikael, are used only by non-protestant Hadiyya. God-based names are also common, as in waa1-t'umm-o ('peace of God'), from waa1-a ('God') and t'umm-a ('peace') and waa1-mif-o ('fruit of God'), from waa1- $a$ ('God') and mif-a ('fruit'). Abraham (2014) has included waa1-i-ball-a ('day of God'), waa?-i-lomb-o ('glory of God') and waa?-i-land-e ('daughter of God') as personal names very much connected to God. All these and several other religious names indicate the devotion of the Hadiyya to Christianity.

## [2.3] Time-based names

It is a common practice among the Hadiyya to give names based on the times of the day and seasons of the year. A baby born during a suitable rainy season may be named after t'een-eeb-o, which means 'one who brought rain', and a baby born during spring may be named after fiit-aam-o, meaning 'with flower' (Abraham, 2014). The name hagayy-o ('rainy season') may also be given to a child born during the rainy season, and has a positive connotation because it is the season during which all the surrounding areas become green and hence grazing is sufficient and planting and sowing are successful. Similarly, the name k'araat'-o ('autumn') connotes the birth of a child at the beginning of the rainy and sowing season. As mentioned in Table 6, the names bill-oor-e ('one who prevented dry season'), from bill-e ('dry season') and hoor-e ('prevent') and bil-t'iib-o ('one who pushed away the dry season'), from bill-e ('dry season') and t'iib-o ('push') are given to children born immediately after a prolonged dry season has passed and a rainy season begun. These names express fear of drought and famine due to crop failure and the death of cattle.

There are also names that express the time of the day when a baby is born. Sooddann-o means 'dawn' and is given when a child is born early in the morning. In the same way, if a child is born early in the morning, it may have the name bak'it-o which means 'early in the morning'. The name laagis-o ('morning sun ray') refers to a child born at around 7:30 am after dawn. The name bolol-o ('flash') is given to a child born when the sun flashes in the morning; this name also expresses the bright future of the family. Lall-aag-o ('dusk/sun entrance') is given as a name when a child is born in the evening. Likewise, the name lar-aag-o ('cattle entrance'), from lar-o ('cattle') and aag-a ('entrance') is given to a baby born when cattle enter their dens in the evening. Laal-ill-o, which means 'the eye of the day' is given to a child born in mid-day (Abraham, 2014). The name ball-is-o ('who caused to be late') connotes the late birth of a child than expected. t'aa?m-is-o ('who caused the morning sun to shine') is a name given to a child born during the enchanting morning sun-light. Similarly, if a child is born in the morning sun, the names er-tfaa?m-e ('good morning sun') and t'aalm-e ('morning sun') are also given. When a child is born in the morning generally, the name dar-iill-o ('one who came in the morning') is bestowed. hiim-aag-o ('night entrance', from hiim-a ('night') and aag-o ('entrance') is a name given to babies born late evening. The name gassak'k'o ('passed the night with'), from gass- ('pass the night with') and $-a k^{\prime} k^{\prime}-o$ (reflexive) is given to a child born at night in the presence of someone who passed the night together with a family.

Some names are given in connection with bravery and pride observed in a
certain time. Larag-o, for instance, is given as a name if someone in the family courageously steals cattle in broad daylight. The name ayyaam-o ('day') is given to a baby born on a day when an important event happened to the family. Taa-bor-e ('week'), er-taab-o ('good week'), er-sin-o ('good year') and er-ball-o ('good day') are all names given to children in reference to the occurrence of an event memorable to the family or the area at large at the time of the child's birth.

## [2.4] Coaxing and pseudo names

Names in Hadiyya can be modified as a way of expressing love and endearment by reducing the number of syllables. Hence, modified names are shortened forms of full names and contain a maximum of two syllables. In the examples below, the three-syllabled names become two-syllabled short names.

| duun-aam-o | $C V_{1} V_{1} C V_{1} V_{1} C V$ | $>$ | duun-e | $C V_{1} V_{1} C V$ |
| :--- | :--- | :--- | :--- | :--- |
| maass-oor-e | $C V_{1} V_{1} C_{1} C_{1} V_{1} V_{1} C V$ | $>$ | maass-e | $C V_{1} V_{1} C_{1} C_{1} V$ |
| t'uutff-oor-o | $C V_{1} V_{1} C_{1} C_{1} V_{1} V_{1} C V$ | $>$ | t'uutff-e | $C V_{1} V_{1} C_{1} C_{1} V$ |
| mant-oos-e | $C V C_{1} C_{2} V_{1} V_{1} C V$ | $>$ | mant-o | $C V C_{1} C_{2} V$ |
| dil-aam-o | $C V C V_{1} V_{1} C V$ | $>$ | dil-e | $C V C V$ |
| siibb-aam-o | $C V_{1} V_{1} C_{1} C_{1} V_{1} V_{1} C V$ | $>$ siibb-e | $C V_{1} V_{1} C_{1} C_{1} V$ |  |
| hand-aam-o | $C V C_{1} C_{2} V_{1} V_{1} C V$ | $>$ | hand-e | $C V C_{1} C_{2} V$ |
| deett-eeb-o | $C V_{1} V_{1} C_{1} C_{1} V_{1} V_{1} C V$ | $>$ | deett-e | $C V_{1} V_{1} C_{1} C_{1} V$ |

Modified names can appear metaphorically, as in Riibb-ad-o ('fresh milk'). Such names are given to the most beloved child born in the time. The name gud-aall-e ('my equal') is mostly given to the first child or to a child most loved. A beautiful baby girl is named after bunt'-e, which also means 'my little gift'.

The Hadiyya are known to have collective names used to address persons who fit into the same age range. Hence, children up to 4 years old are addressed with the collective name $t^{\prime}$ 'iil- $t f f-0$ (male) and $t^{\prime}$ iil- $f f f-e$ (female) (with the singulative marker $-t f t)$; from $4+$ up to 7 years, they are addressed with $300 \int f-i t f t-o$ (male) and $100 \iint-i t f f-e$ (female); from $7+$ up to 10, they are addressed with beet-o (boy) and land-itffoo (girl) (suppletive forms); and when they are over 12, they are called woraad-iftf-o (male) and baadz-aam-e (female) (suppletive forms). After marriage, a male is addressed as mant $f-0$ (man) and a female as meen-t-it $f f-0$ (woman) (Getahun, 1980:14). Getahun (1980:14) also added that in adulthood, a male is addressed as hardel-e (male) and a female harde?-ett-e (female), while an elderly male is addressed as lo-mmantf-o ('elderly man'), from lob ('big') and mantf-o ('man') and an elderly female is addressed as lo-mmantf-e ('elderly woman'), from lob ('big') and mantf-e ('woman').

Until recently, the Hadiyya practiced a traditional ceremony known as sum-
ma weef-antf-a ('name bestowal'), from weef- ('call') and -antf-a (nominalizer) which enabled girls and boys of like age to come together and bestow bynames or nicknames to address each other endearingly. The ceremony used to take place once every year, and in addition to bestowing bynames, young girls and boys were trained for future married life. The bestowal of these unofficial names was performed in the spring when grain is abundant and the fields are green. The participants could choose a certain house in the village and stay for one or two weeks together. Names bestowed during this ceremony were based on physical appearance, conduct, wisdom and ability to perform work. Such names include laadd-ifff-e (female) and laadd-itff-o (male) ('good looking'); haabb-itff-e (female) and haabb-itff-o (male) ('long haired'); daalal-e (female) and daalal-o (male) ('well-mannered'); kubbayy-e (female) and kubbayy-o (male) ('short in stature') bitir-e (female) and bitir-o (male) ('having uneven teeth'); $m i f i k$ '-e (female) and mifik'o (male) ('laugher'); and so on. These girls and boys may address each other using such special names even after the short-lived ceremony.

It is customary in Africa to give pseudo names to children to avert spiritual danger. The purpose of giving pseudo names (sometimes with disgusting meaning) to children is to make names worthless so that the evil spirit could not attack them. The repeated loss of children is the most common triggering factor for bestowing pseudo names. It is believed that a pseudo name provides camouflage that can hide its bearer from the evil spirit. These names include keteer- $a$ ('ugly faced'); agiffoo ('slave') daageefffoo ('ape'); daaneet fffo ('elephant'); and Saank'-o ('charcoal-colored'). Names such as samm-aam-o ('with big head'), Sufuro ('dirt') and waawwur-o ('crow') are also pseudo names given to children to avoid the evil spirit and enable them to live longer.

## [2.5] Other names

As described above, Hadiyya names show a wide array of meanings connected with the life of a child, family and the Hadiyya people. Though the majority of these names are based on circumstance or religion, some names are metaphors for geographical and body-part concepts. These include danbal-o from danbal-a ('lake') referring to a family or area enjoying an extensive, calm and suitable location for their settlement, symbolized by a lake. The names lob-duun-o ('big mountain'), from lob ('big') and duun-a ('mountain') and mak-ang-o ('right hand'), from mak- $a$ ('right') and ang- $a$ ('hand') reflect the great pride of the family on the the birth of a baby. Among the few names derived from astronomic objects, the name booll-aank-o ('star') is given to a child in the hope that he will shine and become the pride of the family. There are persons identified by the
name wattf-aam-o, which means 'with surplus wealth'. Note that watff-aam-o is the former name of Hosaa'na (the Zonal capital) and the name of the newly established University.

Milk is one of the staple foods among the Hadiyya. Hence, milk-based metaphorical names are common. A child that is born during a period when the area enjoys plentiful cows, calves and milk, may be given the name offf-or-e from otffto ('traditional milk container') and wor-e ('bring'). The name ad-sab-e ('one who refused milk'), from ad-o ('milk') and sab-e ('refuse') is given to a baby girl born during a period when cattle death has caused a scarcity of milk. The names ad-ink'-e ('milk teeth'), from ad-o ('milk') and ink'-e ('teeth'); ad-ag-o ('one who drank milk'), from ad-o ('milk') and ag-o ('drink'); ad-iitt-o ('milk lover'), from ad-o ('milk') and iitt-o ('love'); and ad-eeb-o ('one who brought milk'), from ad-o ('milk') and eeb-o ('bring') are common names with a similar connotation. Names of milk products such as gimm-a ('whey') and giłin-a ('yogurt') are also given to children born during a period when milk is abundant.

Names may also be derived metaphorically from domesticated and wild animals. Some names derived from wild animals include huumaant-o ('stork'), hobb-e ('lion'), kabeer-o ('leopard'), loobittf-o ('hippo'), boobiftf-o ('buffalo'), we-ergaants-e ('giraffe') and daaneetfffo ('elephant'). The name huumaant-o ('stork') is given to a child in the hope that he will live long like a stork, which is believed to have a long life span. Obviously, the lion is associated with courage and bravery; hence name givers who name a child hobb-e want the child to be the king of people, as the lion is the king of animals. Formerly, the Hadiyya were fond of hunting and hence if a member of a family killed a lion, leopard or an elephant, a child born around this time would be given the name of the animal. The physical appearance, appetite, speed and breeding habit of animals may also contribute to the use of their names as metaphors. From domesticated animals, horse or bridle are frequently used as personal names. A child born to a family that owns a horse for riding may be given the name dzaab-eeb-o ('one who brought bit of bridle'), from ${ }_{5}$ aab-a ('bit of bridle') and eeb-o ('bring') or dbaab-aam-o ('with bit of bridle'). The names bula ('grey horse'), bul-aam-o ('with grey horse'), and biiff-aam-o ('with brown horse') all reflect the Hadiyya’s liking of horses.

Hadiyya personal names can also be taken from plants. Examples include leeg-itftf-o ('straight, thin and long plant'), fiit-aam-o ('with flower'), sarat-e ('red sorghum'), atur-e ('Carissa spinarum’), hoom-aam-o ('with juniper tree’), odakk$i t f f$-o ('oak tree'), weer-iik'-o ('broken olive tree'), maasan-o ('Croton macrostachyus'), duubaan-e ('Syzigium sp.'), and aras-e ('wheat') (see also Abraham 2014). Plants that produce specific sounds in the wind, and plants that are useful for
shade, firewood, house building and other cultural activities are used metaphorically as personal names.

Hadiyya names for the most part reflect a patrilineal society. This is evidenced by the preponderance of father-based names and lack of mother-based names. In addition to the examples given elsewhere (see Table 7), the names ann-aam-o ('with father'), referring to an individual or family that is famous for owning a significant amount of land, ann-eeb-o ('one who brought father'), ann$a k^{\prime} k$ 'o ('hero like his father'), and ann-iyy-o ('one who took care of father'), reflect this phenomenon. Names such as or-aam-o ('with war'), or-sang-o ('war leader'), k'ap'p'an-o ('pair of spears') and several other war-based names (see also Table 5) have no female counterparts. The name giitff-aam-o ('with people, folk'), from giitftfoo ('people, folk') ${ }^{5}$ and -aam-o (adjectivizer) reflects an extended family. In search of truth, the Hadiyya bestow a name like hank'-eeb-o ('one who brought truth'), from hank'-a ('truth') and eeb-o ('bring'). The names t'ad-is-o ('caused me to forget'), from t'ad- ('forget') and -is-o (causative); dsabb-oor-e ('one who prevented ailment'), from dbabb-o ('ailment') and hoor-e ('prevent'); and t'iss-oor-e ('one who prevented pain', from t'iss-o ('pain') and hoor-e ('prevent') are given to children whose birth brought relief from painful times such as the death of a family member or a relative, penalty, loss of crop or other property or death of cattle (see also Tables 6 and 7). The name allaar-o ('shepherd') is given to a child in the hope that he will be responsible for taking care of cattle. If name givers want the child to be a hitter, they give names like t'abans-o ('one who slapped') and t'ak'k'ees-o ('courageous, fighter'). With the names mantoos-e ('one who hit persons') and fillees-o ('one who cut into pieces'), hut'-iis-o ('one who made others tremble'), mater-o ('one who could not be touched'), laban-e ('flame'), name givers acknowledge the heroic deeds of a family member or express their wishes for the child to be hero. If a child is born during a time of excess food and other wealth, the name maadd-eeb-o ('one who brought wealth') is given (see also Tables 3 and 4).

Color-based names may be given in reference to the skin color of the baby or the color of a natural object observed during birth. Hence, the names heemettfa ('black'), daam-a ('red'), bol-e ('bright'), from the color of a certain type of horse), daankuul-a ('dark brown'), from a special type of honey), and book'-e ('white spots on the face'), from cattle, are bestowed. Abraham (2014) mentions that the red soil name borbor-e is used as a female personal name. Strong and weak personalities can be considered in personal names. These include tolol-o ('headstrong/stubborn') and taffees-o ('unstable').
[5] Interestingly, my informants told me that the word giitff-o has also a recently introduced additional meaning for Nation/Nationality through semantic extension.

Names can be bestowed on the bases of the physical appearance or the habits of an immediate family or a child during birth. Names that describe the physical appearance of a person include getffeer-a ('short'), yabur-o ('lippy'), k'eerall-o ('tall'), gamm-eeb-o (lit. 'one who brought long beard', meaning 'grew long beard'), firang-o ('six fingered') and t'it'aaww-o ('sharp voiced'). gormif-e is a name given to a beautiful baby girl who has a light skin color (see also Abraham, 2014). Names that describe habits include waakkat-o ('selfish'), koror-o ('one who snored'), wint'-is-o ('one who caused tireless efforts'), yakk-ees-o ('one who caused problems') and daant'-eeb-o ('one who brought bravery').

There are number-based names too. The name tokk-ol-o ('only one') indicates that the baby is the only male child in a family. The name kum-aam-o ('with thousand') is given to a child born into a family that has significant property holdings. The names hons-i-gan-o ('hitter of nine persons'), heer-gan-o ('hitter of all'), Saar-t'iib-o (lit. 'one who pushed away boasters'), mann-aam-o ('with man'); and mooll-aam-o ('with clan') express the large number of relatives who can proudly defend their family and the area from any attack. The name lam-tiir-o ('two hearted') refers to the strong personality of a family member or expresses the wishes of name givers for a child to have such a personality. The names sat't'-ang-o ('third arm') and sat't'-ann-a ('third father') refer to the wishes of name givers for the child to be the third strong person in a family, along with two others. The name soor-doll-o ('lover of four') refers to a father who has had children with four wives. When twins are born, one of them can bear the name k'af-aam-o ('with twins').

Clan names such as maand-e and Saafoog-o are used as personal names to express membership in the clan. The name er-gand-o ('good neighbour') refers to the ethnic groups (Kambaata, Silt'e and Gurage) that are neighbours of the Hadiyya. Similarly, eena-attfoo ('Enor man') and ama-atfto ('Amhara man') describe the ethnic identity of a person.

## [2.6] Non-Hadiyya names

Many names in Hadiyya are taken from Amharic. These names are very common especially in the young and adult generations, not the oldest generation (see a similar phenomenon, for instance, in Kambaata (Treis 2008:109)). Hadiyya elders believe that modern education, modern administration and frequent contact with Amharic speakers are the major reasons for the spread of Amharic and Amharic-based names among Hadiyya speakers. Informants recall that most people started with a Hadiyya name given by their family members but had to change it to an Amharic name after they joined modern schools. These names are taken from Amharic with slight modifications as illustrated below.

| Amharic | Hadiyya |  |  |
| :---: | :---: | :---: | :---: |
| Female names | Male names | Female names | Male names |
| Adanäfff | Adanä | Adaanatffe | Adaana |
| Abärraf | Abärra | Abarraafe | Abarra |
| Ayyäläfff | Ayyälä | Ayyalatffe | Ayyala |
| Bälaynäf | Bälaynäh | Balaaynafe | Balayne |
| Mässäläffy | Masala | Massalatffe | Massala |
| Alämitu | Alämu | Alamiito | Alamo |
| Zäwditu | Zäwdu | Zawdiito | Zawde |
| Taggäsäffy | Taggäsä | Taaggasafffe | Taaggasa |

TABLE 9: Borrowed names from Amharic

Amharic-based male personal names such as wondimu ('brother'), siläfi ('for a thousand'), zälaläm ('eternal'), tämäsgän ('be praised'), s'ägaye ('my glory'), etc. are also among the most frequently-used names. Since Hadiyya lacks central vowels, the Hadiyaa version of an Amharic name that contains these vowels replaces them with non-central vowels. The vowel $u$, which never appears word finally in Haddiya, is consistently replaced by $a, e$ or $o$. There are changes of short into long vowels and syllable adjustments to make them fit into the Hadiyya phonotactics. Interestingly, these modifications are easily discerned in spoken Hadiyya. In writing using the Ethiopic script, borrowed names are written as they are in Amharic. In the Latin script, however, they follow the Hadiyya grammar and orthography. As mentioned in section 2.2, after the advent of Christianity in Ethiopia, Biblical names have become very common and hence have significantly contributed to the decreased popularity of Hadiyya names, especially for male personal names.

The complete range of available data shows that the Hadiyya give Amharicbased names to females much more commonly than to males. In a list of six hundred recent high school graduates (aged 18 to 23), ninety seven are females, out of which ninety one have basically Amharic names (about 98 percent). Some of the most frequently used Amharic names include a-bärr-af ('you set light'), it-e-näf ('you are my sister'), it-agänn-ähu ('I got a sister'), aläm-s'ähay ('world sun'), and t'ädt-it-u ('the honey mead'). One hundred randomly selected names from Hoommachcho, comprising forty-seven grade two students and fifty-three grade one students, indicate that five percent are Hadiyya names and 95 percent are Amharic names. The five percent with Hadiyya names are all males; consequently, all of the females had Amharic names. Data also show that among fathers of the current youngest generation, 26 percent have Hadiyya names, 63 percent have Amharic names, and 11 percent have Biblical names
that follow the Amharic pattern. Among grandfathers, 19 percent have Amharic names and 81 percent have Hadiyya names. Hence, Hadiyya names have given way to Amharic and Biblical names increasingly over recent generations.

According to Getahun (1980:16), the Hadiyya also borrow personal names from Wolaitta, Oromo and Sidaama. Commonly borrowed Oromo names include lata, which refers to the big and attractive stature of a person; ayyaano, which refers to an effort to become better in production, knowledge, wealth, health, etc. like someone else who became successful in life; and hordoofo ('to follow'). Since these languages share a number of grammatical features, modification appears to be a rare phenomenon. Rarely, the Hadiyya use Koran-based names due to either close contact with Moslem neighbours such as Silt'i or religious affiliation to Islam (see also Getahun, 1980:16).

## [3] SOME POINTS ON THE MORPHOLOGY OF PERSONAL NAMES

Personal names reflect the grammar of a language and mostly share the properties of nouns. In Hadiyya, all personal names end with either $-a,-o$ or $-e$, a prototypical linguistic feature of the Highland East Cushitic languages: cf. Anbessa (2000) for Sidaama; Crass (2005) for K'aabeena; Schneider-Blum (2007) for Alaaba; and Treis (2008) for Kambaata. In Hadiyya, these vowel endings denote the absolutive case, which is also used in the citation form of nouns including proper nouns (Sim 1989, Tadesse 2015). In most cases, proper names ending with $-e$ are absolutive feminine, those ending with -0 are absolutive masculine, and those ending with $-a$ are both absolutive feminine and masculine, as shown in Table 10 below.

| -a | -0 | -e |
| :---: | :---: | :---: |
| leeg-a | ann-iitt-o | mag-ann-e |
| ('thin/slender') | ('father lover') | ('powerful, furious') |
| 2obbol-a | laamb-eeb-o | lattf-oor-e |
| ('swift') | ('brought peace') | ('one who prevented cry') |
| keteer-a | saggaar-o | tuull-oor-e |
| ('ugly faced') | ('trot') | ('one who prevented shame') |
| gass-ak'k'-a | kee?m-is-o | saw-oor-e |
| ('front-runner') | ('made me proud') | ('one who prevented worry') |
| il-biir-a | oos-abb-o | abb-oor-e |
| ('clear eyed') | ('children's brother') | ('one who prevented brother') |
| kuul-a | hirigg-o | t'uutff-oor-e |
| ('brown') | ('calm') | ('one who prevented pain') |

table 10: Vowel endings in personal names

As confirmed by Taddese (2015) and the present data, there are instances where the above postulation is not accurate. For example, proper nouns such as ?abbuut-e ('rich/wealthy'), diim-hoor-e ('one who prevented trouble'), gaabb-oor$e$ ('one who prevented regret'), etc., which end in $-e$, are nonetheless absolutive masculine. Similarily, proper nouns such as leer-o ('calm'), lint-o ('clear as water'), maass-o ('blessing'), kibb-o ('company'), etc., which end in -0 , are nonetheless absolutive feminine. The occurrence of such names is hence not formally but semantically motivated. Taddese (2015) mentions $-a$ as the most frequent ending vowel in nouns generally. In proper nouns, however, -0 is the most frequent ending vowel. Another reason for the greater frequency of proper names ending in -o is the preponderance of male names in Hadiyya and female names in Amharic. The derivation of male and female names from the base is shown in Table 11 below:

| Base form | Male names | Female names | Gloss |
| :--- | :--- | :--- | :--- |
| er-goog- | er-goog-o | er-goog-e | ('good path') |
| er-mif- | er-mif-o | er-mif-e | ('good fruit') |
| er-kibb- | er-kibb-o | er-kibb-e | ('good company') |
| er-mann- | er-mann-o | er-mann-e | ('good person') |
| er-kob- | er-kob-o | er-kob-e | ('good friend') |
| dan- | dan-aam-o | dan-aam-e | ('with attraction') |
| mif- | mif-aam-o | mif-aam-e | ('with fruit') |
| haf- | haf-aam-o | haf-aam-e | ('with shadow') |

TABLE 11: Derivation of male and female names

As described above, semantic-pragmatic factors play a role in the distribution of female and male names. Names based on wealth, beauty and peace, such as in laamb-o ('peaceful, fair'), daad-o ('green grass for benediction') and lafl-o ('owner of many cattle') are given exclusively to females. Names with a similar connotation but ending in $-e$, such as ide ('wife of king' or 'elderly woman'), laf-wor-e ('one who brought satisfaction'), dan-aam-e ('attractive/beautiful') and lelebb-e ('excess butter/wealth') are also given to females. This patterns indicates that name-givers rely not only on form but also on semantic content when choosing names. The name hund-aayy-o ('the sister of all'), from hund ('all') and aayy- $a$ ('sister') and had-aayy-o ('sister of many people'), from had('many') and aayya ('sister') are given to girls born into a family (or an extended family) with predominantly male children. On the other hand, if a baby girl is born into a family with predominantely female children, she may be named land-aayy-e ('sister of sisters'). The following list of names shows the most
common Hadiyya names for women aged roughly above 45:

| laPm-aayy-e | ('the second sister') | lomb-aam-e | ('with greatness') |
| :--- | :--- | :--- | :--- |
| er-mooll-e | ('good clan') | fiit-aam-e | ('with flower') |
| er-land-e | ('good girl') | maadd-aam-e | ('with wealth') |

The following names shown in Table 12, reflecting courage, honor and bravery, are given exclusively to males and hence it seems that the Hadiyya discriminate based on gender.

| name | Meaning |
| :---: | :---: |
| k'ot'ar-a | ('brave, strong') |
| bunnaar-e | ('brave, hero') |
| had-batf'-o | ('winner of many people') |
| had-moor-o | ('master of people') |
| deett-eeb-o | ('one who brought honor') |
| hund-i-bakk-o | ('representative of all') |
| maadd-eeb-o | ('one who brought plenty') |
| git-oor-o | ('one who prevented enemy') |
| or-t'iib-o | ('one who pushed war') |
| gudum-o | ('one who helped') |
| adil-a | ('king, leader') |

TABLE 12: Semantic motivations of male names

A few names apply to both genders irrespective of the vowel endings. Such names include nafs-oor-e ('one who prevented breath/soul/life'), which is given to a child born at a time when there is a disturbing situation in the family or the village. naat 5 'oor-e ('one who prevented scolding') is a name given to a child whose parents had previously been scolded by the community because they could not give birth. The names laar-aam-o ('with wealth') and daap'p'-oor-e ('one who prevented envy') are given to a child when the family becomes wealthy and hence stops looking at the property of others with envy.

Phonologically, segments are commonly deleted or inserted into Hadiyya names in order to avoid impermissible consonant clusters. For this reason, /h/ in hoor- ('prevent') and /w/ in wor- ('bring') are deleted in compound names. Similarly, daap'p'-hoor-e becomes daap'p'-oor-e. The name sull-dooll-o ('one who selected his relatives') changes to sul-doopl-o after the deletion of $l$ due to the fact that three consonant clusters cannot appear in the language. The letter $i$ is also commonly inserted in order to make phonotactic adjustments, as in ?oo $\int 5-$

to $100 \iint-i-f f f-e$. Assimilation in place of articulation is observed in the names lob-mantf-o ('elderly man'), which changes to lo-mmantf-o (from lob ('big') and mantf-o ('man')) and lob-mantf-e ('elderly woman') which changes to lo-mmantf-e (from lob ('big') and mantf-e ('woman')).

In Hadiyya, personal names are for the most part trisyllabic, as in gudumo CVCVCV ('shoulder, helper'), ?amaado $\mathrm{CVCV}_{1} \mathrm{~V}_{1} \mathrm{CV}$ ('proud/vain'), tuull-oor-e $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{C}_{1} \mathrm{C}_{1} \mathrm{VVCV}$ ('one who prevented shame'), gaassak'k'o $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{C}_{1} \mathrm{C}_{1} \mathrm{VC}_{1} \mathrm{C}_{1} \mathrm{~V}$ ('front runner'), haafeebo $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{CVCV}$ ('brought mercy'), etc. There are also less frequent bisyllabic names, such as deero $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{CV}$ ('good- looking') and deemmo $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{C}_{1} \mathrm{C}_{1} \mathrm{~V}$ ('dense eyebrow'). The longest and most rare quadrisyllabic personal names are honsigano $\mathrm{CVC}_{1} \mathrm{C}_{2} \mathrm{VCVCV}$ and giillimantfo $\mathrm{CV}_{1} \mathrm{~V}_{1} \mathrm{C}_{1} \mathrm{C}_{2} \mathrm{VCVC}_{1} \mathrm{C}_{1} \mathrm{~V}$.

In very limited instances, personal names such as daanee-t $4 f$ fo ('big eater') and leeg-itftf-o ('straight, thin and long plant') appear with the singulative marker - $5 t 5$. In the names mant $5 t-0$ ('person') (singulative) and manna ('persons'), the singulative and plural numbers of the language are manifested.

Taddese (2015) writes that all Hadiyya adjectives are derived from verbs and nouns and share the endings $-a,-o$ and $-e$ with them. Hence, Hadiyya proper names are either adjectives or nouns. Names derived from simple adjectives include k'eeraall-a ('tall'), bunnar-e ('brave, hero'), k'efad-o ('attractive'), and getfer-a ('short'). Other adjectival names are derived from their noun counterparts, as in fiit-a ('flower') or fiit-aam-o ('with flower'); t'uuf-a ('wealth') or ty'uuf-aam-o ('with wealth'); and and k'alb-a ('heart/mind') or k'alb-aam-o ('with strong heart').

Hadiyya names may be either simple or compound names. Whereas simple names carry the meaning of a single word, compound or complex names carry the meaning of two words. Comparatively, simple names are less frequent than compound or complex names. Such less simple names include maass-o ('excess'), miin-e ('forehead'), hobb-e ('lion'), dimbaab-e ('palm tree'), laap'p'-o ('comfort') and so on.

Most names in Hadiyya are compound names. The following examples represent $\mathrm{N}+\mathrm{V}$ and $\mathrm{ADJ}+\mathrm{N}$ compounds.

| goo?n-oos-o | goo?n- | oos-o |
| :--- | :--- | :--- |
| ('male children') | male | children |
| (given to a male child born when more male children are needed) |  |  |

nafs-oor-e $\quad$\begin{tabular}{l}
Nafs <br>
('one who prevented breath/soul/life') <br>
breath/soul/life

$\quad$

oor-e <br>
prevent
\end{tabular}

| k'albor-o | k'alb-a | wor-o |
| :--- | :--- | :---: |
| ('one who brought heart/mind') | heart/mind | bring |
| (given to a child who is born when a solution has been found for a prevailing |  |  |
| problem in the family or area) |  |  |


| ann-iyy-0 | ann-a | iyy-o |
| :--- | :--- | :--- |
| ('one who took care of father') | father | take care |
| (to a child who is expected to be a caretaker of his father) |  |  |


| tuull-oor-e | hoor-e | tuull-e |
| :--- | :--- | :--- |
| ('one who prevented shame') | shame | prevent |

(given to a child in the hope that he will take care of his parents in case of emergency such as payment for debt or bail)

| il-biir-o | ill-e | biir-o |
| :--- | :---: | :---: |
| ('clear eye') | eye | clear |
| (in reference to a member of a family who speaks his mind courageously) |  |  |


| lob-ang-o | lob | ang-o |
| :--- | :--- | :--- |
| ('big arm') | big | arm |

(when a child is born in the hope that he will be a strong person who can reach all in the future.)

As shown in the first and second column of Table 13 below, most of the Hadiyya personal names with an AJD+N structural pattern have er ('good'), or lob ('big') as a modifier. The third column shows genitive NP structures with anna ('father') as the base.
[6] Though amm-iyy-o 'one who took care of mother' is a possible construction, it does not exist as such due to the stereotype in societal perception.

| er | lob | ann-a |
| :---: | :---: | :---: |
| er-mann-o | lob-duun-o | git-ann-a |
| ('good person') | ('big mountain') | ('father of river') |
| er-beet-o | lob-ang-o | baar-ann-a |
| ('good child') | ('big hand') | ('father of horse (with special golden color)') |
| er-seemm-0 <br> ('good name’) | lob-eeb-o ('one who brought big thing') | bet-aan-a ('father of child') |
| er-makk-o <br> ('good arm') | lob-gaad-o <br> ('big campaign') | $\begin{aligned} & \text { moor-ann-a } \\ & \text { ('father of bull') } \end{aligned}$ |
| er-dant-o ('good friend') | lob-giitff-o <br> ('big race') | $\begin{gathered} \text { or-ann-a } \\ \text { ('father of war') } \end{gathered}$ |

TABLE 13: Most frequently occurring compound names

Bi-morphemic personal names also exist, such as laap'p'-o ('comfort'), hobb-e ('lion'), yabur-o ('lippy'), etc. with base and inflection internal structure. The bulk of Hadiyya names are however trimorphemic. Such personal names most often appear with the bound morpheme -aam (adjectivizer) and the verb stems eeb- ('bring') and hoor- ('prevent') (see also Getahun 1980:34).

| -aam | eeb- | hoor- |
| :---: | :---: | :---: |
| lamb-aam-o <br> ('with honor') | mor-eeb-o |  |
| ('one who brought bull') | nafs-oor-e <br> lomb-aam-o <br> ('with honor') <br> ('one who prevented <br> breath/soul/life') <br> naat'o-hoor-e |  |
| kob-aam-o <br> ('with friend') | haf-eeb-o <br> ('one who brought shade') | ('one who prevented a scold- <br> ing') |
| mooll-aam-o <br> ('with descent') | godd-eeb-o <br> malo-hoor-e |  |
| ('one who brought satisfaction') |  |  |$\quad$| ('one who prevented suspi- |
| :---: |
| cion') |

table 14: Most common Hadiyya names with three morphemes

Personal names with -aam express the possession of a particular abstract or material affect such as good luck, fame, power, wealth, courage, satisfaction, and so on. Names with hoor express the prevention of bad circumstances such
as death, hunger, famine, suspicion, scold, etc. The name ma-soor-o ('What can I feed on?') is an interrogative construction from two words, namely maha ('what') and soor-o ('ration/food'). This name is given to a child born in connection with food scarcity.

Several tri-morphemic names contain the causative morpheme -is as illustrated below:

| heell-is-o | One who caused success |
| :--- | :--- |
| laap'p'-is-o | One who caused comfort |
| li2-is-o | One who caused growth |
| mugg-is-o | One who caused shock |
| makk-is-o | One who caused strong arm <br> (brought strength) |
| lomb-is-o | One who caused honor |

There are a few hybrid names that contain Amharic and Hadiyya linguistic properties in their internal structure, such as the following:

| Hybrid name | Amharic | Hadiyya |
| :--- | :--- | :--- |
| wonţal-o | wondzäl ('crime') | -o |
| salf-aag-o | sälf('queue/parade') | aag-o ('entrance') |
| daar-fir-o | dar ('end/side') | fir-o ('go') |
| t'aaf-eeb-o | t'/s'af- ('write') | -eeb-o ('bring') |
| t'ink'-is-o | t'ink ('distress') | -is-o (causative) |

The above data reveals that the base forms are Amharic and the inflections are Haddiya.

## [4] CONCLUDING REMARKS

In names, the Hadiyya society expresses its desires, feelings, emotions, challenges, happiness, sorrow and a number of other socio-cultural and economic circumstances. They use names to record history, in the process supplying much information about what has happened, where, when, by whom and why. Like the rest of the Ethiopian ethnolinguistic groups, the Hadiyya use personal names to express their suffering on account of natural or man-made calamities. Most of the names are derived from events before birth, during pregnancy and shortly after birth.

Almost all names of people who are currently grandparents are in Hadiyya. Biblical and Amharic names are noticeable in the current generation of parents. The influence of Amharic and Bible based names is very strong in names
recently given to children. Until recently, unofficial bynames were common among friends, but this practice seems to be dying out.

Personal names are like any other word classes in the language, because they all end in the case and gender vowels $a, e$ or $o$. Hadiyya personal names constitute simple or compound structures. There are more compound names than simple names. Compound names with er ('good'), lob ('big'), eeb-('bring'), hoor- ('prevent') and t'iib- ('push') are frequent. Names with the adjectivizer -aam and the causative marker -is are also common. Most names are bi- and trisyllabic and all end in case and gender marking vowels, like other nouns and adjectives. This linguistic property operates in borrowed names from Amharic and the Bible through modification. In coaxing names, shortening of syllables takes place. Syntactically, a full name constitutes a child + father + grandfather pattern that fits into the modifier + modified pattern of the language.

Perhaps an interesting feature of Hadiyya personal names is their deviation in form and meaning from the usual word classes in the language. Under normal circumstances, Hadiyya nouns show number, case and definiteness. Verbs are inflected for agreement and tense/aspect markers. All these grammatical features are not overtly displayed in personal names. There are very few instances with the singulative marker - ff f. They are deprived of nominal derivations such as agentive, infinitival, abstract, instrumental, etc. The jussive and imperative forms that are common in other languages are absent. From verbal extensions, causative is commonly manifested by use of the suffix -is. The most frequently appearing personal names take the form of derived adjectives and attach the adjectivizer morpheme -amm in compound forms. There are names with verbal meaning but without inflections such as aspect/tense and mood markers. Nonetheless, Hadiyya personal names can be freely translated by reference to a past experience or future wish. The overwhelming majority of personal names have a relativized reading (who ...) but do not exhibit the actual morphological structure of a relative verb in a sentence (the relative suffix in Hadiyya is -kki (Taddese, 2015)). Native speakers translate names as agentive forms too (...er), but the grammar of the language demonstrates that these names do not exhibit the actual internal structure of agentive nominals with aan. In general, there is a mismatch between the actual grammar of the language and the translation or reading of names by native speakers. Hadiyya personal names are hence simplified forms of common nouns, adjectives or verbs. So long as the lexical meaning is correct, personal names can be translated in several ways not reflected in the grammar of the original name.

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# NORM SELECTION AND STANDARDISATION IN GAMO 

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## ABSTRACT

This research deals with norm selection practices and the accompanying challenges in the standardisation process of Gamo Omotic North Ometo language. The language has recently developed a written form which mainly serves as a medium of instruction. In attempting to explore the construction of written norms, this research has applied concepts that focus on how the use of a language affects a society (Labov 1970: 30, cited in Wardhaugh 2006:16) and what social conditions inspire the legitimisation and construction of a standard norm (Bourdieu 1991). A linguistic approach (Byron 1978:398) has been used to trace the norm selection practices in written Gamo. The data has come from written documents, interviews and focus group discussions. This analysis of the salient issues uncovers the underlying problems of the standardisation process (Kaplan and Baldauf 1997:88). The results demonstrated that the standard norm is based on the Northern dialects of Gamo, especially the Dače dialect. By assessing the current trends of standardisation and the social views towards it, this research argues for a 'dialect democracy approach' where norms of various dialects are unified and a neutral standard is established (Msimang 1998).

## [1] INTRODUCTION

Language standardisation as a process of variation reduction (Deumert 2004: 3) is not only a linguistic issue but also a social concern. The process applies limited variations to the linguistic habitus of a speech community without taking into account the age, gender, geography, ethnicity etc., differences they exhibit. In the history of many languages, such uniformity of use is maintained via various social conditions. Linguistic studies are, therefore, capable of revealing the social conditions that underlie the standardisation and legitimisation of languages (Bourdieu 1991:61). Accordingly, this research scrutinises the practices and social foundations of norm selection in Gamo. It further investigates social views towards the process and tries to locate areas for improvement.

Gamo is spoken by 1,044,589 people, (CSA 2008: 135), who have settled in the South Western part of Ethiopia. It comes under the Afroasiatic, North Omotic,

Gonga-Benoyem, North Ometo group in the genetic classification of Ethiopian languages (Fleming 1976). Gamo has a written form that mainly serves as a medium of instruction in schools. The language has undergone series of developments from being a dialect of written languages to becoming an autonomous school variety. It encompasses around 42 dialects that, depending on their intelligibility level and geographical location, are grouped into South Gamo and North Gamo varieties (Wondimu 2010:182). South Gamo cluster comprises the Ganta, Garbansa, Mele, Balta, Shara, Kole, etc., dialects and North Gamo includes the Dače, K’uča, Ochollo, Dorze, etc., varieties (Hirut 2005, 2013b, Wondimu 2010). These dialects exhibit substantial variation. Phonologically, K'uča differs in its use of /t/ and /z/ whereas the others use /ts/and/cz/sounds respectively. A substantial morphological variation has also been demonstrated among the two groups. In Northern dialects, for instance, plurality is marked using (-ta), but (-ede) is used in Southern varieties, as in ifata/ itfece (brothers), borata/ majdede (oxen). On the other hand, the average lexical items shared between the two groups falls to $65 \%$ (Wondimu 2010:66), so making them less intelligible. The variations in the dialects are immense, with the Northern groups coming under the North Ometo cluster and the Southern dialects sharing features of East Ometo (see Hirut 2013b, Wondimu 2010, Jordan 2009 for further grammatical relations among the dialects).

## [2] CONTEXTUALIZING LANGUAGE STANDARDISATION

Language standardisation, as a major component of language planning, draws on concepts from the field of macro-sociolinguistics or the sociology of language. As Coulmas (1998:1) has put it, apart from its micro-level focus:
'Macro-sociolinguistics studies what societies do with their languages, that is, attitudes and attachments that account for the functional distribution of speech forms in society, language shift, maintenance, and replacement, the delimitation and interaction of speech communities.'

The sociology of language (Wardhaugh 2006: 13) considers language as an entity that functions in a social context, and so language planning aims to allocate the functions that a language plays in society. Labov (1970: 30), cited in Wardhaugh (2006: 16), has also stated that the questions and problems of language standardisation are major concepts in this field. These questions and problems can be studied at macro/national or micro level, where the development of a particular language is investigated (Baldauf 2006:154).

Language standardisation is the process of norm selection and codification
of a newly written language (Wardhaugh 2006: 33). In Haugen's (1966a), cited in Wardhugh 2006: 34) framework, standardisation begins with norm selection. It refers to the selection of grammar and usage to place a non standard language in wider communication settings. Those norms may be selected from a single dialect (mono-centric), or they can involve features of many dialects (polycentric) (Msimang 1998: 165). Commonly, dialects spoken by politically, economically or numerically dominant groups gain prominence over the less dominant ones. These prominent forms are then published in books, dictionaries and literature and are inculcated in the next generation mainly through the education system (Bourdieu 1991: 48). In many practices, codification constructs a hierarchy of dialects (Ferguson 1968:31) and users, by granting legitimacy to some uses and depicting others as illegitimate (Shohamy 2006: 31). In such a way, the construction of a standard language envisages the normalising of individuals' linguistic habitus, by evaluating their productions (written and spoken) against the "legitimate" uses (Bourdieu 1991: 48).

For the standardisation to be neutral, a more inclusive method called 'dialect democracy approach', which involves various dialects of a language, can be adopted (Msimang 1998: 165). Language exists within an ecosystem that constitutes dialects and speakers and their culture. It follows that all dialects and speakers deserve an equal chance of inclusion in the standard. Active participation by the target society in the process is a fundamental factor for the acceptance of the standard norm, which should emanate from and go in line with the needs and practices of the society (Deumert and Vandenbussche 2003:464). This avoids disparity between standardisation and public interest. Spolsky (2007: 2) has mentioned that as a social phenomenon, language policy relies on the 'consensual behaviours and beliefs of individual members of the speech community'. If the development fails to achieve this and a standard is simply imposed, it remains alien to the intended users and its implementation faces serious social resistance (Lane 2014: 3).

The notion of language standardisation is multi faceted, but this research focuses on the development of written standard in Gamo. If indigenous languages are promoted to serve in various social domains, they need to develop a standard variety by which every social member abides. In practice, users implement language in a variety of ways in their spoken habitus and this cannot be avoided or controlled. It is equally important to select the essential elements of these varieties in order to portray the language in writing. In this context, orthography development and text book preparation that empower the language to function in mother tongue education (Spolsky 2004: 46) and other social domains (Garvin 1993:39) become pivotal tasks. With regard to this, Kaplan
and Baldauf (1997:41) have written that to literate speakers of non standard languages, standardisation of orthography is fundamental. The standard establishes the foundations for common understanding among diverse societies (Kaplan and Baldauf 1997: 66) and maintains the language by addressing users at various time and locations. Elkartea (2010:14 \& 15) also states:
'... and that it is very difficult for a language to survive unless it is used in education, cultural transmission, mass media and the public administration. ... But in order to be able to teach or give information in one's own language, it must be possible to write it, and to write it in a common code accepted and shared by its speakers.'

The major challenge in the standardisation of multidialectal languages is making decisions on the intelligibility of dialects and social acceptance. For instance, the idea of harmonising the Nguni and Sotho language clusters of South Africa did not work, mainly due to 'lack of support from the population at large and due to the great resistance shown to it', irrespective of the grounds for rejection (Orman 2008: 9). Likewise, the challenge in Gamo is immense because its dialects are not thoroughly studied and described, so little is known about them. Furthermore, conditions that would permit selection of one form over the others are not set by anybody (GebreYohanis 2000: II \& III).

## [3] BRIEF History OF WRITTEN GAMO

Gamo has been a spoken language for many years. Its written history began when a composite written language was constructed from North Ometo clusters which included Wolaitta, Gamo, Gofa and Dawuro. With the advent of mother tongue education in the country, a common Latin based orthography was designed for the Wolaitta, Gamo, Gofa and Dawuro languages in 1993. At that time, the four varieties were thought to be forms of one language, and Wolaitta, due to its existing written history, was selected to serve as the medium of instruction in the four areas. However, members of the Gamo society whose language was thus relegated rejected the attempt, and so the idea was shot down before its implementation (Hirut 2013a:376).

The officials immediately wanted to establish a more inclusive language that could serve the whole society across the four areas. They came up with the idea of harmonising the languages by having words of each variety represented. However, when writers started preparing text books, the Wolaittas changed their minds and preferred to continue using the books previously prepared in Wolaitta. This created a potential opportunity for Wolaitta to maintain its writ-
ten system ahead of the other varieties. The rest were merged into one form and the development of Gamo progressed very steadily as a result.

Text books were written by amalgamating the three languages into a form called DaGaGo, which stands for Dawuro, Gamo and Gofa, in 1995. This time written Gamo first appeared as a standardised text material for learning. This action was not, once again, what the society wanted for mother tongue education, and so it did not take long before the whole society opposed the amalgamation of the languages.

The situation became worse, however, when Wolaitta was absurdly added to DaGaGo and WoGaGoDa, another written language composed of Wolaitta, Gamo, Gofa and Dawuro varieties, was formed in 1998. It seems that the officials did not learn any lessons from DaGaGo. The social implications of merging the languages were ignored, and text books were printed in WoGaGoDa and distributed across the whole area which administratively included Wolaitta, Gamo, Gofa and Dawuro. This decision caused a more serious dispute than had DaGaGo. Speakers from every corner of Wolaitta, Gamo, Gofa and Dawuro objected to the government's propensity to consider them speakers of homogeneous varieties and to impose a standard (Hirut 2007). They felt that the action amounted to a linguistic, ethnic and cultural coercion. This situation necessitated the revision of decisions regarding language matters in the area and WoGaGoDa was abandoned once again in 2000.

The examples of DaGaGo and WoGaGoDa point to the fact that any attempt of standardisation without the active participation of the society concerned and 'the voice from below,' (Linn 2010), quoted in (Røyneland 2013), results in failure of the whole system (Spolsky 2004: 31-37). In both cases, the endeavour was to create a harmonised standard that could serve as a linguistic basis to politically and administratively unite society. Since the languages exhibit considerable lexical, semantic and grammatical differences and speakers regard themselves as ethno-linguistically and historically independent (Hirut 2005, 2013a: 376), the effort to use language as a method to gain political virtues did not work in either case. These sociolinguistic situations required change in the organisational policy of the region, and in 2000 the former Semen Omo Zone was restructured into three administrative zones that include Wolaitta Zone, Gamo Gofa Zone and Dawuro Zone. This paved the way to use, develop and promote each language in the respective areas. Consequently, since then, Gamo has been used as an autonomous language of instruction in the locality.
[4] THE CHALLENGES OF NORM SELECTION IN GAMO
Questions of inclusion and exclusion of norms make the selection phase of mul-
tidialectal language standardisation extremely challenging. In exploring the challenges in Gamo, data were gathered from documents, interviews and focus group discussions. Due to its young written history, Gamo lacks a fully standard dialect. Its codification in books, dictionaries and literature, is also not extensive. Text books are the main printed documents where the standard is implemented. As Sebba (2007:47) puts it, text books are the most regulated materials in implementing a fixed form. A few other publications, including Gebreyohanis (2000), Wondimu (2015) and Hayward and Eshetu (2014), are written through individual endeavours.

The documents used in this study were, therefore, text books, Wondimu (2015) and Gebreyohanis (2000). The text books and Gebreyohanis (2000) were published by the zonal administration, so they help to explore the top down standardisation practices. On the other hand, as I discussed with the author, Wondimu (2015) was written in the norm applied in the text books, since it was prepared for use as a learning aid. Stories and folktales were then extracted from five text books and from Wondimu (2015) respectively. From these, 329 main words were selected and their codification was identified from Gebreyohanis (2000).

The prevalence of these words in five Gamo dialects: namely Dače, K'uča, Ochollo, Dorze and Ganta was investigated. Words used in each dialect were counted to assess the selection of norms from each of them. Similarly, interview and focus group discussion data sets were extracted from the corpus of speakers' views towards the standardisation process. The corpus data included interviews conducted with 16 volunteer informants, and five focus group sessions with 26 Gamo speakers. The participants were officials, language developers, text book writers/ editors, teachers and students. The students were taken from Arbaminch Teachers' College, ("ATC"). In the interests of preserving informants' privacy, anonymised names were used in the analysis.
The word count analysis added to interviews and discussions, as noted by Deumert and Vanendenbussche (2003:458 \& 465), helps to explore the traditional 'from above ' standardisation practice, variation reduction and dialect convergence and divergence, and discloses the salient problems of the process (Kaplan and Baldauf 1997:88). Since the norm selection policy of written Gamo is not explicitly stated in writing, a thorough study about contemporary practices would succumb to the implicit policy of standardisation. With regard to this, Spolsky (2001: 153) has stated:
... language policy exists even where it has not been made explicit or established by authority. Many countries and institutions and social groups do not have formal or written language policies,
so that the nature of their language policy must be derived from a study of their language practice or beliefs.

A consistent written norm that writers can apply in Gamo is desirable (Hirut 2007). The lack of a standard norm limited people's access to publication in the language. Both publishers and writers were unsure as to which variety they could publish, since it was neither defined by law nor established by preceding writers. Getachew (Jan 15), writer and editor of text books in Gamo, noted: 'there was no former literature that you can quote or you can use as a reference... there was no base to refer to convince people that this variety is more preferable to the other variety.'

The absence of clarity on norms resulted in inconsistently written materials. Writers took norms which, they thought, were spoken by the majority of the community, but many other forms were overlooked. The following table reveals that most of the words in the texts were taken from the Northern dialects.

| Dialects | Sampled <br> text books | Wondimu <br> $\mathbf{( 2 0 1 5 )}$ | Total | Gebreyohanis <br> $(\mathbf{2 0 0 0})^{1}$ |
| :---: | :---: | :---: | :---: | :---: |
| D, K', O, D | 92 | 45 | 137 | 16 |
| D, O, D | 27 | 4 | 31 | 1 |
| D, K', O | 4 | 6 | 10 | - |
| D, K', D | 2 | - | 2 | - |
| D, O, D, G | 3 | 6 | 9 | - |
| D, K', O, G | - | 1 | 1 | - |
| D, K' | 3 | 15 | 18 | 1 |
| D, O | - | 2 | 2 | - |
| O, D | 1 | 1 | 2 | 1 |
| D | 4 | 3 | 7 | - |
| K' | 8 | 8 | 16 | 1 |
| O | 1 | - | 1 | - |
| G | 1 | 1 | 2 | 14 |
| Common in all | 45 | 46 | 91 | 34 |
| Total | 191 | 138 | 329 |  |

TABLE 1: Number of words taken from texts and the dialects they represent Note: $\mathrm{D}=$ Dače, K'=K'uča, $\mathrm{O}=$ Ochollo, $\mathrm{D}=$ Dorze, $\mathrm{G}=\mathrm{Ganta}$.
[1] A dictionary where the meaning texts' words could be looked up

As can be seen from Table 1, most of the words (137) in the texts were the ones commonly used in North Gamo varieties of Dače, K'uča, Ochollo and Dorze. Sixteen of these words were found in Gebreyohanis (2000). These dialects, as has been mentioned by Wondimu (2010:65), share a lot of their lexical items, and so it is no wonder that they have many words in common here too. On the other hand, Ganta has different words to these groups. The following words, from the texts, show the variation:

| (1) Ganta | Dače, K'uča, Ochollo, Dorze | English |
| :--- | :--- | :--- |
| dosakosine | dosses | loves |
| attase | attenna | will happen |
| ketati | guuridi | early |
| ellusi | eson | quickly |
| bizzo | issino | one |

The first two pairs, dossakosine/ dosses and attase/attena have a common root, but the last three are entirely different in both groups.

The texts also used 31 words from Dače, Ochollo and Dorze and only one of these was found in Gebreyohanis (2000). K'uča and Ganta have different representations for these. K'uča mainly differs in using /t/ where the rest use /ts/, as in words such as loytstsidi/ loyttidi (well), mitstsi/ mitta (wood), sintstsa/ sinta (face). In earlier times, these variations were not so exaggerated. For instance, Gamo words listed in Alemayehu's (2002) survey of Ometo dialects were written interchangeably in /ts/ as in haytstsa (ear) or in /t/, as in maata (grass). But in present times, some K'uča speakers have become more sensitive to pronunciation and have been demanding text books published in their variety.

It can also be seen from Table 1 that ten words were shared among Dače, K'uča and Ochollo, eighteen between Dače and K'uča and the other nine among Dače, Ochollo, Dorze and Ganta. Two were from Ochollo and Dorze. Text books used two words from Dače, K'uča and Dorze and Wondimu (2015) used two words of Dače and Ochollo and one from Dače, K'uča, Ochollo and Ganta. From these, two words were available in Gebreyohanis (2000).

Since Dače, K'uča, Ochollo and Dorze are lexically proximate dialects, if a writer uses a word from K'uča or Ochollo, there is the possibility of finding the same word in the other dialects too. Conversely, Ganta is different and its words are not used comparatively in the texts. Due to the fact that the five dialects are daughters of one language, they have considerable number of words in common (91).

While looking at words specific to each dialect, one could find sixteen from K'uča, seven Dače, and two Ganta words. One Ochollo word was used in the text
books. A list of fourteen Ganta words, mostly ones not shown in the texts but parallel to the ones used in the other varieties, and one K'uča word prevailed in Gebreyohanis (2000). Although the dictionary contains Ganta words, it decried half of them as 'colloquial' expressions. This kind of commentary, in Bourdieu's (1991:48) term 'a sign of exclusion,' misshapes the attitude constructed towards those words and impedes their use in public and private arenas (Locher and Strassler 2008: 6). As Shohamy (2006: 31) has also put it, this type of standardisation discriminates against some language forms as being illegitimate and others as being legitimate usages.

On the surface, it seems impossible to trace a single dialect that provides the basis for the written norms in Gamo. However, in principle, Dače was implicitly used as a major source of words. This can be calculated from the number of words used in each dialect, including the shared ones, from Table 1.
(2) Dialects Dače Ochollo K'uča Dorze Ganta

Frequency $308 \quad 284 \quad 273 \quad 272 \quad 103$
As can be noted, Dače had 308 words and Ochollo was represented by 284 . K'uča and Dorze had a nearly equal number of words respectively, 273 and 272. On the other hand, Ganta had only 103 words, most of which are shared amongst all the dialects (see Table 1). Dače, thus, had the greatest representation, since it shares many words with the others.

Those words which Dače shares with others were written adhering to its grammar. To illustrate, K'uča uses the alveolar stop /t/ in places where Dače and others use the alveolar affricate /ts/, and texts applied the latter in the words as in mitstsa (tree), haatstsa (water), suntsa (name), etc. Similarly, the perfective aspect marker in Dače and Ganta is - d-,-s in K'uča and -r- in Ochollo and Dorze. In the texts - d - is mainly used, as in the words ootsides (worked), ojitftides (asked), gides (said), etc. Ganta also has -d- in its past marker, but differs from Dače in its lexis and other morphological constructions (Hirut 2013b). Therefore, writers have preferred Dače, not Ganta, in their application.

## [5] THE DEVELOPMENT OF DAČE AS A STANDARD NORM

It has been determined that Dače is the main source of words in written Gamo. It was noticed during field work that informants associated Gamo with Dače, even though they did not explicitly state that the written dialect is Dače. In classrooms, every teacher is expected to write in the way that Gamo is written in text books. Dače is also used as an alternative name to Gamo in some websites, such as SILE. It is also a language of intra dialect communication and most public speeches. Further, every publication in Gamo undergoes an evaluation of
its compatibility to the legitimate norms at the Office of Culture and Tourism in the town of Arbaminch. The analogy of Gamo to Dače and the need to use it as a base to establish standard Gamo is not set out in any legal document, but instead grew out of social conditions pertaining to coincidence and demographic factors.

Dače was first used when text books were prepared in DaGaGo (see section 3). During that time, each variety had a representative who participated in the amalgamation process. The delegate from Gamo, who was coincidentally a Dače speaker, used his own dialect when Gamo was mixed with the others. Following this process, the zonal administrations passed a decision that each of the substrate languages should be used in official written and spoken transactions, and accordingly, Dače was approved for use in office communications in areas where Gamo was spoken. The trend of using Dače in writing has persisted informally with present writers, even after Gamo has become an autonomous language of Gamo society, without any formal selection or survey of social consent or expert resolution. So, it can be argued that the language of the elite, who had the access necessary to put their variety into writing, is now maintained as the norm for written Gamo.

The other factor that accounted for norm selection is the number of speakers. Gamos reside in nine districts/woredas, sub administrations of Gamo Gofa zone, where they speak various dialects, whose names coincide in most cases with the names of districts. As can be seen from Table 2, Dače has wide coverage across Gamo areas.

| Districts | Population | Dialects |
| :---: | :---: | :---: |
| K'uča | 149,287 | K'uča |
| Boreda | 67,960 | K'uca |
| Merab Abaya | 74,967 | K'ogota |
| Arbaminč Zuriya | 164,529 | Dače, Ganta, Ochollo, Shara |
| Čentfa | 111,686 | K'ogota, Dooko, Dorze |
| Ditta | 83,987 | Dače |
| Daramalo | 81,625 | Dače |
| Kamba | 155,979 | Dače, Balta |
|  |  | Dače, Mele, Garbansa, Kole, |
| Bonke | 159,089 | Zargulla |
| Total | $1,049,109$ | 13 |

TABLE 2: Population of Gamo districts and some dialects spoken there. Source of population cencus: CSA (2008:13).

As can be seen from Table 2, in Arbamič zuria, which is populated by 164,529
people, Dače, Ganta, Ochollo and Shara dialects are spoken. Bonke district, with 159,089 residents, is occupied by Dače, Mele, Garbansa, Kole and Zargulla speakers. It can also be seen that the K'uča variety has an estimated total of 217, 247 speakers in K'uča and Boroda districts, whereas Dače is spoken by a total of 165,612 inhabitants in Ditta and Daramalo and it coexists with Balta in Kamba ( 155,979 residents). In Čentfa, home to 111,686 people, K'ogota, Dooko and Dorze are spoken. K'ogota is also used in Merab Abaya by 74,967 people.

Geographically, Arbaminč Zuriya, Kemba and Bonke are South Gamo areas, while the rest are located to the North of Gamo. According to the sociolinguistic data, Dače is widely distributed across Gamo districts. It is spoken in five of the nine districts, whereas K'uča and K'ogota are spoken in only two areas. The other dialects are limited to one district. It is also noticeable that Dače exists not only in the Northern part but also in Southern parts, where Ganta, Balta, Garbansa, Mele, Kole and Zargulla varieties are also spoken. According to Wondimu (2010), Dače spread to these areas after a group of Gamo community called Dačes conquered those places during civil war among Gamo local kings long ago. Thus, it is possible to deduce that the majority of the population in Gamo can speak, or at least understand, Dače.

Due to the above numeric factor, writers have adhered to Dače in writing text books and other materials. Regarding this, Moges (Jan 2013), an official in the education sector, noted that 'we took the widely spoken dialect that enables Gamo society to communicate with each other easily'. In addition, other participants who were in favour of the selection policy mentioned that the chosen dialect has many more speakers than others. The legitimacy of this norm is, therefore, currently consolidated not only in schools, but also in Arbaminch Teachers' College where the Gamo department has been set up.

## [6] OTHER VARIETIES IN THE TEXT BOOKS

Text book writers tried to handle the challenge of lexical discrepancy in Gamo by providing Amharic, English and Gamo words as an option in brackets next to the prominent norm. Until the standard variety has been gradually inculcated in the users, using brackets can be a means to establish clarity of messages conveyed. Without a defined system, this mechanism, nonetheless, has pedagogical and social repercussions.

The following table and discussion show that alternative words of Gamo, Amharic and English are used arbitrarily in the text books analysed so far.

|  |  | Varieties |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Text books | Number of <br> pages | Gamo | Amharic | English | Total |
| Gamo Language <br> Grade 1 (2012) <br> Gamo Language <br> Grade 2 (2003) <br> Gamo Language <br> Grade 3 (2012) | 120 | 8 | 1 | - | 9 |
| Mathematics Grade <br> 3(2010) | 62 | 9 | 4 | - | 13 |
| Gamo Language <br> Grade 10 (2010) | 140 | 84 | 14 | 12 | 110 |
| Total | 457 | 64 | 13 | 7 | 84 |

TABLE 3: Alternative words in the text books and the languages they are resourced from.

As can be seen from Table 3, a Grade 3 Mathematics text book contained the highest number of words (110) given with alternatives. Among the alternatives, 14 were Amharic and 12 were English words. The rest (84) were from Gamo. The Grade 10 text book had 84 words which 13 were Amharic, 7 English and 64 Gamo words. 33 words (2 Amharic and 31 English) appeared in the Grade 3 Gamo text book. Comparative to its size ( 48 pages), the number of alternative words are also high in this text book. The number of alternatives decreased in Grade 2 with 13 (4 Amharic, 9 Gamo) words and in Grade 1 with 9 (1 Amharic and 8 Gamo) words. In most cases, the alternatives did not appear every time once they had been used next to the main words.

Most of the main words and the alternatives of Gamo were from dialects of the same sub group. Words that come under this group include the following:

| (3)Main words <br> (Gamo) | Alternatives <br> (Gamo) |  |
| :--- | :--- | :--- |
| hajitstsa | bonččo | leaf |
| Kandon | hanotan | like this |
| wok'u | aapun | how much |
| majo | aфala | cloth |
| oosantfta | ugga | working bees |
| asa mačča | indo | someone's wife, woman |
| ero | akeeko | Know, comprehend |

In Gamo, speakers use widely varied words. Due to this, the writers put alternatives for clarity whenever they found a concept represented differently across the dialects. For instance, both wok'u and appun mean how much. Speakers of these dialects are equally competent in both forms. Though the words can be used interchangeably, placing one in parenthesis next to the other adds a burden to learners. This indicates that decisions limiting the number of words in the written norm are not in place.

An insignificant number of Ganta words were available as main words. Those found in the text books include:

| (4) | Main words <br> ( Ganta) | Alternatives <br> ( North Gamo) | English |
| :--- | :--- | :--- | :--- |
| tajbettoosona | k'oodettoosona counted |  |  |
|  | jessaso | de?izaso | living place |

Most participants in this study were against the use of Ganta varieties in the main position, and the Northern forms as subordinates. Bekele (Nov 2015), a student at ATC, said, 'If theirs is written first, we can't be able to know it. Ours is known by everyone. It is fine if theirs is in bracket.' This implies the domination of the majority usages in the construction of the standard norm, while the minority usages are deprived of equal status in the process.
The other sources of alternative words were the Amharic and English languages. Amharic is widely used in private, official and market communications in Gamo. It is spoken as a second language by many Gamos. English is also the medium of instruction in secondary and college classes and given as a subject from lower and upper primary grades onwards. The following are Amharic main words, for which Gamo equivalents were offered as subordinates.

| Main words <br> (Amharic) | Alternatives <br> (Gamo) | English |
| :--- | :--- | :--- |
| et'ara | k'aadara | fate |
| kiilote | hiilla | skill |
| makiina | kaame | car |
| afSaganaw | ličanaw | To pack |

Amharic words were given though the intended meaning could be conveyed in the target language. For instance, the word k'aadara autonomously refers to fate, so the need to use et'ara is less. Hillata means skills and the Amharic translation kiiloteta, which means kihilot, is not necessary.

Some Amharic words were used in brackets next to Gamo expressions:
(6)
Main words
(Gamo)
mara
pajjatetstsa
kawojo
mole ojk'etsan
ak'izaasata
Alternatives English
(Amharic)
ičči
t'ena
nigiisttenibe
asa asigaariwootf
English
pupa
health
Queen bee
fishers

By comparison to the former groups, the target words used as main forms, with the Amharic ones as subordinates, are very few. Generally, using Amharic words as an alternative, when Gamo words can describe a concept on their own, hampers the development of Gamo as a written language.

Similarly, English alternatives were given to Gamo words. Unlike the Amharic words, the English options were included when the Gamo words were either newly created words or with extended meanings, such as the following ones:
(7)

| Main words <br> (Gamo) | Alternatives <br> (English) | English |
| :--- | :--- | :--- |
| k'awosa | grammeere | grammar |
| issikootstsamatstsa | koomijuniitij | community <br> topic |
| kaara | topic | topic |
| bilat'aaфo | poetry | poetry |
| siitaadata | direct speet | direct speech |
| čoo?u giidi | arbitrary | arbitrary |
| zaaribejo | irevifine | revision |
| ajфek'oppa | Topic sentence | topic sentence |
| k'aalafik'o | dikiffineere | dictionary |

All of the above Gamo words are used to introduce new concepts to the language. Therefore, this researcher believes that offering English terms in such situations, pending Gamo words becoming well established, enhances learners' understanding of the new terms. Nonetheless, publications that come afterwards should maintain the new words so that uniformity and lexical elaboration can be achieved.

All in all, except for the case with English words, the technique followed to use other varieties as a resource does not promote indigenous language development. The way in which Amharic words are used hinders indigenous knowledge development and discourages the construction of concepts in the
mother tongue. The layout of the text books also becomes less attractive to learners, since the text is frequently disrupted by parenthesis during reading. It further implies the dominant role which Amharic plays in the written domain in the area.

## [7] conclusion

Research has identified that the norms of written Gamo were selected from the Northern varieties. By contrast, only a negligible number of Ganta words were used in the materials (see Table 1). While Gamo is a multidialectal language, selection of words from a single dialect area shows the prevalence of dialect reduction and convergence in the standardisation process (Deumert 2004:3). The selection aspires to build social unity among the ethnic groups. This, however, is best achieved by including diverse forms than by illuminating diversity in the language. There is a general consensus that individuals easily participate in a system that works in a language in which they are competent (Orman 2008: 156). However, the way standard Gamo is constructed is a great challenge to children who speak dialects overlooked in the selection like Ganta. Given the limited access they have to the legitimate school language, which culminates in their having inadequate competence in it, as compared to other fellow students who acquire it at home, their achievement in schools obviously declines (Bourdieu 1991:259).

It can also be remarked that, in Gamo, written norms are not formally chosen, and selection policies are not explicit. Issues of mediating dialect variation in writing are not clear and the lack of an overt policy has led to each person write in whatever way they felt. This can be attributed to a high degree of dialect diversity and lack of commitment on the part of the administration, linguists and researchers. If Gamo is implemented in education and other social spheres, an organised and well-planned standardisation that includes voices from grass root level will be required (Fishman 1972:26). While emphasising the need for a well planned standardisation, Getachew (Jan 2015) said, 'students were doing better in subjects that were taught in Gamo than Amharic or English subjects, especially in the lower grade level. But if it had been well planned and standardised, the result could have been better.'

A planned standardisation which takes account of social needs and practices, reflects the diversity of the language by accommodating distinct features of dialects, and with which all Gamo speakers can identify themselves, can be achieved using a dialect democracy approach (Msimang 1998:167). Handling issues of diversity maintains a 'standardised representation of the language' (Kaplan and Baldauf 1997: 41). Writers abide by the standard when they realise
that their own dialectal features are accommodated, and the whole society benefits fairly from the social and economic virtues of a neutral standard. Melaku (Nov 2015), a student in ATC believed: 'If a person writes in one of the dialects, it is only that person who benefits from it. Students who come from various places do not get any advantage.' Norms of each dialect gain valuable place in the standard. To achieve this end, thorough dialect studies play a vital role. Some studies (Hirut 2005, 2013a, 2013 b, Wondimu 2010, Jordan 2009) in fact contribute a great amount to our present understanding of diversity in Gamo.

Based on those studies and the empirical data presented here, it can be said that the Northern dialects have a common unified standard. However, this does not mean that they are completely homogenous. Some of them, such as K'uča, Ochollo and Dorze, have features peculiar to each of them (Wondimu 2010). Though participants believed in the concept of solidarity among Gamos, they did state that significant characters of their dialects were not given attention in the standardisation. As Lane (2014: 3) has mentioned, societies whose forms of language are excluded from the standard feel that they are alienated from the group to which they used to belong. Selam (Nov 2015) from ATC, who speaks the Ochollo variety, sadly expressed the repercussions of excluding her dialectical form from the written norm as follows:
'Since I came to this campus, only those of us who came from Lante speak Ochollo. It is neither written in the books nor spoken by others. We use their variety (the written dialect) ${ }^{2}$ when we speak with them. It is not available in books. If I sometimes speak my variety, they don't understand it. So, I translate what I said to them. Even the teachers do not use it. Our identity is Gamo and we speak Gamo, but they often said, are you speaking Gamo? what is this? So, I don't speak my variety with them. I communicate here in their dialect and when I go back I speak Ochollo.'

This extract indicates the need to include other dialects so that all speakers can develop a sense of belongingness to the standard, and everyone can grasp the heterogeneous nature of Gamo. If the written norm now serves as a means of intragroup communication, it is clear that it soon becomes the prestigious form and displaces the other varieties, even from the spoken domain.

On the other hand, Ganta remains divergent from the written norm and shares only a few of the words employed in the texts. One Ganta participant
[2] My explanation
mentioned that before he went to school, he spoke only Ganta, and learnt the written variety in schools. This imposes an obligatory situation for Ganta to be preserved for domestic use and to be perceived as a language spoken in a limited geographical area and for a presupposed limited time period. As Elkartea (2010: 14 \&15) emphasises, the survival of a language is highly dependent on its role in the society. Hence, unless these divergent varieties are promoted, used for wider communication and valued in schools, their survival remains at risk.

Though participants of the study emphasised the need to accommodate features of other dialects in the written norm, they did not agree on independently including Ganta words in the standard. They mentioned that Ganta covers a small area and that the major part of society does not comprehend it. They have strong conviction on putting Ganta in brackets next to Dače. This foreshadows the marginalised social position being given to Ganta dialect.

Since standardisation is a gradual process (Kaplan and Baldauf 1997:66), these compelling goals of the society oblige it to set short and long term plans for Gamo. As a short term goal, maintaining the role of Dače as a base, features of various dialects should be allowed into the standard. On the other hand, due to its lexical and grammatical divergence from the other dialects (Hirut 2013b) and the stance of most participants, Ganta cannot be entirely mixed with the others. Its words can be represented in the written norm pending the development of its own writing system. This makes the standard impartial and closer to every student's spoken repertoire. Students and teachers also deserve the freedom to trans-language between their dialect and the standard so that they can utilise their potential and effort for a better result. Through time, the Northern forms can be harmonised and standardised in their own right and the Southern forms can establish their own written norm as well. Since these geographically categorised dialects are daughters of one language, Gamo, they can share a common orthography and newly created words.

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# LANGUAGE PLANNING CHALLENGED BY IDENTITY CONTESTATION IN A MULTILINGUAL SETTING: THE CASE OF GAMO 

HIRUT WOLDEMARIAM

## ABSTRACT

A common language-planning problem in places with plural societies is deciding which language should be the language of education. Indeed, decisions regarding which languages should be established as the medium of instruction (MOI hereafter) are political decisions which, if ill managed, can lead to appalling consequences. Often, political ideologies and identity contestations interact with and bring influence to on the interpretation of linguistic endeavors. Linguistic diversity in the Gamo area has become entangled with political interests in the process of (re)articulating and implementing the current multilingual language policy in Ethiopia. Contrasting positions have been taken in the course of implementation of the policy. On the one hand, the local authorities have tended to adopt a type of assimilationist approach. Considering the close genetic relationship among the linguistic groups, a common MOI has been prescribed for several ethno-linguistic groups in the former North Omo Zone. On the other hand, despite the existing strong linguistic similarities and mutual intelligibility, various groups have asserted that they differ from each other. Mutual intelligibility between them has been denied. The process has resulted in unstable language planning. The issue of identity and distinctiveness has persisted even among the sub-groups of Gamo, the focus of this study. This shows that the language of education has been viewed both as a social practice and as a symbolic system through which identity is marked and represented. The issue of the language of education has become complex in multilingual settings of Gamo, since it is compounded with ethnic identity. In the Gamo area, the situation has resulted in the repeated alteration of language planning and reorganization of the structure of the administrative unit. The aim of this study is to investigate the trajectories and challenges of implementing the new language policy in the multilingual administrational unit to which Gamo belongs. It shows how issues of identity have made it difficult to achieve settled language planning in a multilingual area.

## [1] BACKGROUND

Ethiopia is a linguistically and ethnically heterogeneous country with over 80 officially recognized languages (Central Statistical Agency of Ethiopia, 2010). The linguistic heterogeneity increases as one goes from the center of the country to the west and southwest. The Southern Nations Nationalities and Peoples (SNNP) Regional State of Ethiopia, particularly the Gamo-Gofa Zone, on which this study focuses, is known for its multitude and high concentration of languages and dialects.

As often frequently the case in multilingual countries, a single language, which is Amharic, has played a role of a lingua franca for most people in Ethiopia, regardless of their ethnic background. For several decades in the 20th century, Amharic enjoyed the status of national language in Ethiopia. It also served as the only language of literacy and education (Lanza and Woldemariam 2014).

At the beginning of modern education in Ethiopia, in the early decades of the 20th century, the first schools offered education in French (cf. McNab 1988). In the 1940s, English replaced French as the most common medium of instruction for education in Ethiopia, as a result of its increasing global significance and in recognition of its widespread international use (Pankhurst 1976:315, Yigezu 2010: 32). Earlier studies have claimed that prior to the Italian war, the Imperial government had little interference in language and education matters until its first decree in 1944, which targeted missionary activities. The 1944 decree was itself a reaction to the Italian colonial administration's introduction of a "language policy", whereby five local languages were selected for education and administration in different corners of the country. It was only in 1958, i.e. fourteen years after the 1944 decree and fifty years after the first government schools were opened in 1908, that Amharic was constituted as a medium of instruction (Pankhurst 1972; see also Azeb Amha 2010: 189-191).

The dominance of Amharic has its roots in the state-building process and was imposed on the multi-ethnic state in an attempt to achieve national cohesion (Cooper, 1989; Yonatan, 2010). History shows that during Emperor Haile Selassie's reign (1930-1974), the process of amharization became institutionalized. The language policies of that era were aimed at producing an Amharicspeaking society, and consequently, at discouraging the use of other Ethiopian languages. The development of written forms of language other than Amharic was therefore forbidden (Cooper 1976, 1989; Cohen 2006; Woldemariam \& Lanza 2014). The use of Amharic as the most important language, particularly in literacy, was sustained countrywide even during the socialist regime (1974-1991).

In 1990s, the country underwent a dramatic change in regimes and several major political, social and economic changes came about at the same time (cf.

Pausewang et al. 2002; Smith 2008). A new constitution was initiated, advocating a policy of ethnic federalism was initiated. Consequently, Ethiopia's Federal Constitution now guarantees that persons belonging to various ethnic and linguistic minorities shall not be denied the right to enjoy their own culture and to use their own language. Various proclamations have been made to undertake decentralization of decision-making between central and regional administrations. In practice with language issues, decision making goes down as far as Zone level, an administrational unit within a Regional State. The newly formed Ethiopian government then introduced a national educational policy, which allows the use of "mother-tongues" as the MOI for primary education of all public schools.

In the new era, the system has changed from an assimilationist model to a multiculturalist model. Education includes both the students' mother-tongues as well as the lingua franca Amharic (and English), and it can therefore be argued that it will promote bi- or multi-lingualism (Vedder \& Virta 2005; Huge \& et al. 2007; Küspert-Rakotondrainy 2013). With the new constitution that advocates a policy of "Ethnic Federalism", Ethiopia's Federal Constitution (particularly, Articles 5 and 39) guarantees that persons belonging to various ethnic and linguistic minorities will not be denied the right to enjoy their own culture and to use their own language. Various proclamations have been made to undertake decentralization of decision-making between central and regional administrations, including the decentralization of language choice under the federal constitution, which has led to the use of languages other than Amharic by members of different ethno-linguistic communities. There has also been also a policy switch to emphasizing the Latin script for Cushitic languages in particular, as well as the decentralization of language choice (Hoben 1994; Smith 2008, Lanza \& Woldemariam 2014).

As mentioned earlier, Ethiopia has introduced a national Educational and Training Policy that promotes "mother-tongue education" and publication of text materials in vernacular languages. Notwithstanding this, implementation of the policy shows that demographically major languages serve as the official working languages and languages of education throughout an administration region or a zone. Hence "mother-tongue" in most regions in reality meant, and still generally means, the regional official languages (cf: Woldemariam \& Lanza 2014).

The Gamo people inhabit a fairly extensive territory of the Southern Na tions, Nationalities and People's Region, about 500 km south west of Addis Ababa. In the new federal system of Ethiopia, Gamo was first classified along with several other groups within the SNNP Regional State, under the administrative
zone known as North Omo. The major boundaries of what was the North Omo Zone from 1991 to 2000 were established by the Dergue regime in 1987. The Administrative unit was created by taking elements from each of the three imperial Regional Administrations, Gamo Gofa, Sidamo, and Kafa, which had up to that point been retained by the Dergue, and was subsequently known (somewhat confusingly) as the Gamo-Gofa Administrative Region (see Vaughan, 2003:251). The North Omo Zone comprised multiple ethno-linguistic groups, of which four groups, namely Wolaitta, Gamo, Gofa and Dawuro, are the majority groups. All of those belong to the Ometo genetic group within the Omotic language family (see Fleming 1976). The earlier North Omo Zone has been divided into three smaller administrational zones, mainly as a result of tension aroused in relation to language issues (see section 2). Currently, Gamo, along with many other ethno-linguistic groups, belongs to the Gamo-Gofa Zone, one of the three units of the earlier larger administration unit.

The area where Gamo is spoken is known for its multitude and high concentration of genetically related linguistic variations. The area demonstrates a distinctive dialect continuum, ranging from the varieties considered as dialects to those claiming to be separate languages. These include Chencha, Dita, Kucha Dorze, Ochollo, Dache, Ganta, Boreda, Kemba, Bonke, etc. Due to a lack of exhaustive research work on the area, it is not possible either to determine the exact number of dialects or to define their clear status. No study has been done so far on the mutual intelligibility of Gamo variations. Nonetheless, informants agree that there is a high level of degree of mutual intelligibility. However, there are a few dialects that tend to be divergent. These are, according the informants, Ochollo, Ganta, Kucha, Boreda and Dorze. As an earlier research study noted (Woldemariam 2007), it is often difficult for students to understand a lesson in the Gamo language because of dialect differences. Students also complain about their grades, arguing that teachers have evaluated them incorrectly due to dialectal differences. There were also instances in which a word used by teachers appears to be taboo in the students' dialect, and vice versa, resulting in tension and confusion that then affects the classroom interaction (Woldemariam, 2007:221).

This paper has four main sections. These are: 1) Background; 2) Methodology; 3) Discussion and observation; 4) Summary, concluding remarks and recommendations. The third section on discussion and observation, which presents the main finds of the study, is organized into the following five subsections: one medium of instruction for all; the attempt to use a harmonized language as an MOI; the use of Gamo as an MOI and new contestation among its dialects; language ideology towards Amharic and English; and language issues
related to minority groups.

## [2] METHODOLOGY

The overall design of this research study is qualitative in nature. This approach was considered suitable because this paper is an exploratory study and aims at gaining an understanding of the practices and challenges of mother-tongue education in the multilingual setting of the Gamo area. The information was gathered mainly through interviews. The study is also founded on other data sources, such as field notes, written documents and observations. The informants were purposively selected on the basis of their typicality. They were teachers and experts involved in the language development and education sector in the Gamo district. Twelve teachers who were involved in mother-tongue education, and eight experts (also mainly teachers) of language development, were used in the interview. Interviews also took place with a couple of officers in the educational bureau.

In addition, written documents such as minutes, newspapers, and social media have been used to triangulate with the findings from the interviews. The researcher has undertaken consecutive fieldwork studies in Arbaminch, the main town of the Gamo-Gofa Zone, since 2005. Semi-structured interviews were carried out in 2013 and 2014 with experts of the educational office, teachers and parents involved in language development and teaching material preparation. The interviews were framed in a way that enabled the researcher to discover the various processes and practices being used in the implementation of mother-tongue education, the challenges encountered at various points in time, and the attitudes of the informants toward these. A special focus was given to issues of identity as the researcher had noted that identity contestation wasa major factor challenging the implementation of the language policy in the area.

## [2.1] Data Collection procedure

Informants were accessed through the Educational and Cultural Offices of the Gamo-Gofa zone that facilitated the research. In order to proceed with the process of collecting data, the informants' permission was requested. The informants were assured that their anonymity would bepreserved. The informants were not persuaded to participate in this study and did so of their own free will. They were given the opportunity to withdraw from the study if they desired to do so. All the interviews were conducted in either the schools or offices or a place chosen by the participants. A friendly and non-intimidating atmosphere was created for participants to feel free and talk unreservedly. As a re-
sult, the participants gave the researcher permission to audio record the interviews verbatim.

## [2.2] Theoretical frame

This study follows the different theoretical conceptions important for addressing the issue of language planning, as well as language and identity. Cooper (1989: 45) defines language policy and planning as 'deliberate efforts to influence the behavior of others with respect to the acquisition, structure or functional allocation of their language codes'. This essentially refers to the range of activities that contribute in different ways to the language planning process. Fishman (1974), identifies five types of language planning within the typology of approaches: status planning, which is usually decreed by law at the constitutional level and results in the declaration of languages as official; corpus planning, which involves norm selection, codification and terminology development; acquisition planning, which generally refers to language-in-education and makes provision for the learning of the various official and national languages; and usage planning, which attempts to extend the use of a language into new domains.

In conceptualizing the relationship between language and identity, the study follows the post-structuralist theory as outlined in Pennycook (2004) and Weedon (1997). Accordingly, the study takes account of the view that considers "the productive force of language in constituting identity rather than identity being a pregiven construct that is reflected in language use" (Pennycook, 2004: 13). In line with post-structuralist theory, Weedon (1997:21) argues that: "language is the place where actual and possible forms of social organization and their likely social and political consequences are defined and contested. Yet it is also the place where our sense of our selves, our subjectivity, is constructed". By focusing on linguistic differences as a means of identity formation, this study follows the basic conception of identity as constructed through the marking of difference. As Woodward (1997:29) points out, the difference arises "through the symbolic systems of representation.... Identities are formed in relation to other identities, and the most common means of marking difference is by using binary oppositions, for example 'we and them', or 'self and other' (Woodward, 1997).
[3] DISCUSSIONS AND OBSERVATIONS

## [3.1] One medium of instruction for all in the administrational zone

For many years, an exclusive monolingual use of Amharic, and of English as a

MOI, was the practice in both primary and secondary/territory education in Ethiopia. Since the 1990s, the strategy has shifted to a multilingual policy (cf: Heugh et al, 2007: 44). With the new language policy, public primary schools in the country have started using mother-tongue education. However, implementation of the policy was left to respective regional and zonal authorities. From the start of such implementation there has been confusion between the moth-er-tongue and the major language of an administration unit.

In the former North Omo, where Gamo belonged, the implementation has been challenged, since the multilingual policy was challenged by the opposing stance adopted by the assimilationists. At the initial stage of the implementation, a common MOI was promoted to serve in all the public schools through outthe zone. The process went through a number of trial and error progressions, before Gamo was recognized as an independent MOI. Below, the various historical trajectories of mother tongue education in the Gamo area will be discussed.

As mentioned above, when the policy of mother-tongue education was first launched in 1992, the administrative zone, within which Gamo was classified, had a different structure from the present one. The zone was bigger and comprised several languages and dialects which were later reclassified into three separate zones. Demographically, the major members were Wolaitta, Gamo, Gofa and Dawuro. There were also other minority groups accommodated in the same administrative zone. These include Zayse, Zergula, Oyda, Koreete, etc. The languages in that administrative zone are genetically closely related and classified as the "Ometo" linguistic group within the Omotic language family (Fleming 1976). As pointed out by Bender (1976), members of the Ometo group share 50 to 90 percent of forms with each other (Bender 1976:51).

Even though the national language policy promotes multilingualism, the administration zone was trying to implement a policy that relies on a common language for all. Wolaitta, the most dominant language in the zone, with a relatively developed history as a written language, was selected to serve as a MOI. According to informants, text books, which were prepared in the Wolaitta language, have been distributed to all primary schools in the zone, including in the Gamo area. The main reasons behind that approach, according to informants, are the following. Existence of a high degree of linguistic similarities among the languages in the zone was considered as an opportunity, which can enable the speakers even to achieve mutual intelligible. As Wolaitta was used for bible translation, and the bible had been distributed and used across the vicinity for several years, it had already been well developed to function as a medium of communication. It was also believed that Wolaitta could be understood better
by all the others as a central language. Another reason, differing from the previous ones, was suggested as being the desire to facilitate political and social cohesion in the administrational unit by using a common language.

The language of the majority group is often preferred over other languages, as the common language in plural societies that subscribe to the assimilationist approach. Such an approach is driven by the "one language, one nation, one people" principle of linguistic or organic nationalism, which is premised on the notion that "the political and the national unit should be congruent" (May 2008:91, Gellner 2006:1).

However, the adoption of the Wolaitta language as a MOI for all speakers within the zone has been challenged by other groups in the zone, including Gamo. The process was accused of partiality for benefiting the language and culture of one group of people within a given administrative unit over that of others. Besides that, it was considered as a threat which could wipe out all linguistic identities in the area, replacing them with that of Wolaitta. The nonWolaitta groups in the zone argued that Wolaitta could not be considered as their children's mother-tongue in the schools. According to informants, the Gamo people were demonstrating that they are not Wolaitta and their language is not Wolaitta, but that instead they are Gamo and their language is Gamo. Informants agree that the objection against the use of Wolaitta as a MOI was not driven solely by linguistic difficulties, but was mainly driven by a political motivation to maintain the Gamo identity. Since language is an immediately audible indicator of identity, the exclusion from educational use has been considered as a targeted attack to destroy the non-Wolaitta identities in the zone. It was also taken as denial of the people's rights and that has resulted with anxiety among the Gamos. The issue was therefore not about language alone, though that also contributes, but was tied up with questions of identity and power. In this regard recent studies have taken a more nuanced approach, recognizing the social positioning, partiality, contestability, instability and mutability of the ways in which language uses and beliefs are linked to relations of power and political arrangements in societies (Gal 1998; Woolard 1998; Blommaert 1999).

Consequently, a corrective measure was taken by the then administration to restrict the use of Wolaitta to being a MOI only for the Wolaitta district. However, much to their disappointment, Gamos (also the other two groups) were not allowed to employ their respective languages as MOI. Instead, an approach to harmonizing the three major groups, namely Gamo, Gofa and Dawuro, was proposed. It was an innovatively inclusive but still monolingual approach - creating and adopting a composite language of literacy out of the three to serve $s$ a
common language for all.

## [3.2] The attempt to used a harmonized language as MOI

In 1994, while the Wolaitta language was left solely for the Wolaitta group, it was decided to harmonize the other three languages, namely Gamo, Gofa and Dawuro.

Researchers interchangeably use the concepts of language harmonization with language unification. The term denotes a particular kind of practice, where two or more related languages are combined to form one language. According to Asher \& Simpson (1994), as quoted by Babane \& Chauke (2015:346347), "language harmonization refers to a situation whereby two or more different languages are unified to form one language that does not contain contradictory features. It needs to be mentioned that harmonization does not necessarily refer to a situation where only languages are unified, but it could be dialects of a language which are harmonized to become one."

A team of teachers from Gamo, Gofa and Dawuro groups have been set up as a panel of experts and given the task of creating a harmonized synthesis of the three languages. The harmonized language was designated by an acronymic representative term GAGODA (Gamo-Gofa-Dawuro). According to information from the Gamo experts who were involved in the process, the course of action taken in order to achieve a fair representation of each of the three languages in a text was a big challenge, involving a lot of confrontation and dispute between members. Most of the time, members were in contention in order to get the most and the best representation of their respective languages. The procedure they were employed was the following. As much as possible, they attempted to use mutually shared common lexical items, or, when that was not possible, a form from one language was used and its equivalents from other languages would be given within parentheses or brackets. A more serious challenge was harmonizing grammatical features of the three languages, which vary from each other in terms of number, definiteness, case markers of nouns and verb conjugations. Mixing up the grammatical features of all the representative languages in a proportional way was the main procedure followed in order to make a text inclusive in a fair manner. Finally in 1995, the preparation of text books in GAGODA was completed and dispatched to all the public schools of the three ethnic groups. As reported by teachers, GAGODA was only put in practice for a couple of years. According to interviews with the teachers, the Gamo students often encountered unfamiliar linguistic elements in their lessons. The problem might arise from poor methods of harmonization. The process was carried out by teachers in the locality who did not in fact have the expertise or
know how to handle such a task. The process lacked the involvement of linguists or language experts. On top of that, according to informants, the negative attitude of most members of the community towards the harmonized language was another challenge in accepting GAGODA as a MOI. Accordingly most people considered the practice as a political motive to destroy group identities by blending them into a single unit.

On the side of the implementers, even before they had evaluated the effectiveness of GAGODA as a MOI, it was decided to incorporate Woalitta in the composite language to create WOGAGODA. As informants indicated, that decision was purely political, since it was made straight after the merging of the political parties of the four ethnic groups to form a coalition party. The main idea behind this was, according to informants: "If we could merge the political parties why not we do to the languages". It was a purely political decision, that did not take into account either the pedagogical benefits or the existing sensitive identity issues in the zone. As pointed out by the informants, the people of the four groups did not discuss nor endorse this decision made by the local authorities. A panel of experts, who were teachers from the four groups, were put together to prepare textbooks and other learning aids in WOGAGODA. When put into practice, the use of WOGAGODA as a language of learning faced widespread opposition. It was rejected by all four of the groups for being nobody's mother-tongue. In fact, according to informants, WOGAGODA was criticized as a retrogressive step, taking people away from an established form of their own language and diluting their respective languages with elements from others' languages. According to Gamo informants, the attempt made to create composite languages was considered as an effort "to blend and crush distinct identities into one". This indicates that as the process moves to deny members of the four groups the opportunity and means to develop and use their own particular language, they have became increasingly politically mobilized and ready to take action against the practice ${ }^{1}$. There were successive public uprisings and protests against WOGAGODA. The protests, which were also made by Wolaittas, have caused destruction of school properties, the burning of textbooks, and even the deaths of a few participants, sufficient to attract even international media attention. As reported by the BBC: "WOGAGODA was greeted by protests in the area. Just two weeks before the decision was reversed, at least two people were shot dead by local police, when riots broke out after two teachers at the local elementary school refused to teach in WOGAGODA" (BBC News Online
[1] It is to be noted that similar practices have also been undertaken in other multilingual zones in the SNNP Regional State.

Tuesday, 23 November, 1999, 14:46 GMT). Consequently, the local government was forced to reverse the decision to use WOGAGODA as a MOI, and decided instead that each group should use its respective language as a MOI in its respective locality. Following the disintegration of WOGAGODA as a MOI, a decision was made to restructure the North Omo Zone by splitting it into three smaller administration zones, in order to run each zone independently and to make the new language management easier. The three zones are: Gamo-Gofa, Wolaitta and Dawuro-Konta zones, leaving the Gamo-Gofa zone still complex with multiple ethno-linguistic groups.

When asked why they objected to GAGODA/WOGAGODA, the Gamo respondents pointed to the importance of the Gamo cultural and linguistic identity as the object of preservation, rather than perceptions of the political or even educational benefits. They were concerned about losing the Gamo identity, which, they thought, would presumably happen if the language was blended with the other languages of the area. Teachers also confirm that the use of WOGAGODA had substantial negative effects on the teaching-learning process, not only because of comprehensibility reasons, but mostly because it was labeled as an alien form, far from the real native tongue. That means that the most significant factor was linguistic purity.

## [3.3] The use of Gamo as a MOI and a new challenge from the dialect variants

After a long period of ups and downs, in 2000, Gamo has been recognized as an independent language of education. This position given to Gamo in the educational domain has been considered as being a recognition given to the Gamo ethnic identity as an independent group. The concerns related to losing the Gamo identity, which would happen if it was synthesized with other languages, have gone, and that has led to relief among members.

Gamo has been introduced as a MOI from grade one to grade four. English takes over as a MOI from grade five onwards. Gamo is also used as a subject from grade one to grade 10, and has been introduced as a program in the Arbaminch Teachers' Training College. In addition, a diploma program on the Gamo language has been started at the Arbaminch University. As indicated by the experts from Educational bureau of the Gamo-Gofa Zone, the use of Gamo in the mother-tongue program has resulted in a significant increase in the enrolment rate, as well as a high completion rate.

Soon after the success story was achieved, issue of dialect variation within Gamo became a new challenge. The Dache dialect, which was taken as a standard form in the process of developing Gamo as a MOI, has become a subject of contest by other sub-groups of Gamo. According to informants, the rationale
behind choosing Dache over the other dialects to serve as a standard form was not clear. Some people believe that the experts, who were working on the Gamo language development, have come from the Dache dialect, and they got the opportunity to influence the language planning to their advantage. Accordingly, in the process of textbook preparation, the experts used the Dache dialect, which is their own native tongue. Informants from the non-Dache varieties think that the use of Dache as a standard form is a deliberate attempt to create a mono-dialectal form of Gamo. This indicates the fact that identity based contestations are difficult to address, since identity is a constructed thing, and people keep on constructing and reconstructing identities according to situations.

Recently, in September 2014, a group of local leaders from the Kucha dialect were presenting an appeal for the recognition of Kucha as a distinct ethnolinguistic group outside Gamo. They were protesting against their Gamo identity, and strongly asserting that their Kucha group identity should be recognized by the administration. They further claimed for independent administrational autonomy outside Gamo, and for their children to be taught in the Kucha dialect (they claimed that Kucha is an independent language). The demonstrators have even taken violent action, such as burning school books and destroying other public properties, steps which have put them in conflict with police officers. Consequently, some members were arrested. However, the request has not received any positive response. The following is a description of the situation in the Kucha district by one social media, also confirmed by the informants.
"Many elementary and secondary schools have been closed in Kucha Woreda, a town that has been wobbled due to 'identity' related protests and conflicts for the past few months. The students seek a right to study in their own language and the rights violations in the area to stop. After the Federal police surrounded the area, 25 to 40 students have been detained. As the tension escalates, at least 40 people that have been released recently have been rearrested."
http://danilemulu.blogspot.no/2013/11/schools-closed-after-protests-in-kucha.html

It seems that members of the dialect are emphasising around the phonological differences Kucha has from other dialects. My own earlier research (Woldemariam 2013) indicates that Kucha differs phonologically from the others. As indicated below, the phonemic inventory of the Kucha dialect appears different from the rest, since it lacks two consonants, namely, /ts/, and /s'/. By
contrast, the Kucha Gamo has $/ \mathrm{t}^{\prime} /$ which is not found in the other dialects. Kucha replaces /tt/ in place of /ts/ in the cognates. The following cognates illustrate the sound correspondences attested between $/ \mathrm{t}^{\prime} /$ and $/ \mathrm{s}^{\prime} /$, as well as the sound correspondences between /tt/-/ts/ as found in Kucha versus the others.

| Ochollo | Dorze | Boreda | Kucha | Gloss |
| :---: | :---: | :---: | :---: | :---: |
| s'unguts | s'unguts | s'unguts u | t'unguntta | 'nail' |
| mek'ets | mek'ets | mek'etsi | mek'etta | 'bone' |
| kets | kets | kets a | ketta | 'house' |

table 1: the contrast between $\mathrm{s}^{\prime}$ and t ' and ts .

As indicated above, Kucha uses the phoneme $/ \mathrm{s}^{\prime} /$ where the others use $/ \mathrm{t}$ '/. It is also shown that/ts/ of Occhollo, Dorze, Boreda corresponds to / $\mathrm{tt} / \mathrm{in}$ Kucha.

Another phonological feature that makes Kucha different from the other dialects of Gamo is the following. A word-initial alveolar ejective $t$ ' in Kucha corresponds to the alveolar implosive $d$ in other dialects such as Bonke, Kemba and Dita. Comparative reading of the following cognates establishes the point:

| Kucha | Other dialects | Gloss |
| :---: | :---: | :---: |
| t'ale | dale | 'medicine' |
| t'iilee | diille | 'flour' |
| t'isko | disko | 'sleep' |

TABLE 2: The contrast betwee $\mathrm{t}^{\prime}$ and $\mathcal{d}^{\text {in }}$ Kucha and other dialects.

There is also a correspondence in which $r$ of Kucha occurs as / $d$ / intervocalically elsewhere, as shown in Table (3):

| Kucha | Other dialects | Gloss |
| :---: | :---: | :---: |
| mero | medo | 'appearance' |
| wora | woda | 'trophy' |
| gara | Gada | 'low land' |
| sire | Side | 'nose' |

TABLE 3: $r$ and $d$ in Kucha and other dialects.

The features shown above make the Kucha dialect more resemble Wolaitta, which contains $t^{\prime}$ in its phonemic inventory in cognates, whereas other Ometo languages use s'. This could be a result of contact, since the Kucha dialect is
spoken adjacent to Wolaitta. However, Kuchas have not claimed identification with Wolaittas. One can say that obviously there are dialect markers in Kucha, and they are magnified to serve political interests. As mentioned above, a distinct identity from both Gamo and Wolaitta has been requested. As pointed out by Tabouret-Keller (1997:317): "The link between language and identity is often so strong that a single feature of language use suffices to identify someone's membership in a given group. Language features are the link which binds individual and social identities together".

Similarly to Kucha, an appeal that demands an independent recognition of the Dorze dialect as a separate ethnic identity outside Gamo, has been presented by the senior members of the community. According to informants, the appeal was taken to all levels of governmental bodies starting from the zone, to the region, and, then, to the federal government. However, the request has not been yet granted any acceptance. The goal of the appeal is to make Dorze a language of education for children of the respective locality. Accordingly, that is what provides the confirmation of having a distinct identity. It was also indicated that if the group's identity claim is acknowledged, apart from developing Dorze as a language of education, the group expects to gain other sociopolitical benefits. These include an opportunity to participate in the political and administrational systems.

An interesting point here might be the shifting identities demonstrated by certain dialect speakers of Gamo. Depending on the situation, they focus on one of the two identities: that is, the Gamo identity and the smaller dialectal identity such as Kucha, Dorze, etc. When it was decided to use Wolaitta, or (WO) GAGODA as a medium of instruction, the main concern of all Gamos, irrespective of their dialectal background, was maintaining the Gamo identity. Then, once Gamo has been recognized as a mother-tongue, members of some of its dialects have made it a point to make a claim for independent recognition outside Gamo. The dialect members tended to behave as if the standard form of Gamo is incompressible to them and so they should be allowed to use their respective dialect as a MOI. Group discussions with Gamo language experts revealed that members of the Gamo dialects stand together when there is a threat against the Gamo identity, but tend to focus on their independent identity at other times.

Despite their dialectal differences, Gamo speakers organize themselves into one homogenous group when they sense a threat against the Gamo identity. An instance of this happened in 2015, when a controversial book ${ }^{2}$ which misrepre-

[^34]sented the Gamo group was authored and disseminated by a non-Gamo person. The book boldly asserted that there is neither culture nor language called 'Gamo'. Members of the Gamo community, regardless of their different dialectal backgrounds, stood together protesting against the author. The situation has ignited violent protests in Arbaminch town. As indicated by the informants, members of the group were deducing that there could be some political motive behind the book in targeting the Gamo identity. It was also considered as an insult to the Gamo people. Consecutively, a team of Gamo elders have taken the case to the attention of authorities at different levels, including to the Prime Minister's Office. This indicates how sensitive the Gamo people are about maintaining their Gamo identity. Nonetheless, there is a tendency to fall back to their dialectal identities, when the Gamo identity is not being challenged. In general, the situation with Gamo exemplifies the fact that language and identity should not be seen as singular, fixed, and intrinsic to the group or individual, but instead should be viewed as socially constituted; a reflexive, dynamic product of the social, historical and political contexts of a group's or individual's lived experiences.

One might argue that raising the dialectal identities at the point, when Gamo has achieved the status of being a MOI, seems a process not merely of discovering or acknowledging a difference from the rest of Gamo, but, more fundamentally, of inventing differences by downplaying similarity. Such a situation is best described in Irvine \& Gal (2000:35)'s words as follows:
"The significance of linguistic differentiation is embedded in the politics of a region and its observers. Just as having an army presupposes some outside force, some real or putative opposition to be faced, so does identifying a language presupposes a boundary or opposition to other languages with which it contrasts in some larger sociolinguistic field."

## [3.4] Language ideologies held by Gamos about the position of Amharic and English

Gamos demonstrate a positive attitude towards Amharic, the Federal Working Language of Ethiopia, and the English language. English is another language used in the educational system of Gamos. It is used as a MOI from grade 5 onwards, and as a subject from grade one. As understood from the interviews, in Gamo, as elsewhere in Ethiopia, English is considered as the language of the cultural elite and a symbol of belonging to the educated class. While contesting to keep their ethnic and linguistic identity, Gamos tend to prefer their children to learn in Amharic and English. Parents believe that Amharic and English are languages that can make their children competitive at national and interna-
tional levels. Most parents are skeptical about the benefits of the use of Gamo as MOI for their children. In fact, those who are financially able will take their children out of public schools and get them admitted to private schools that use Amharic or English as MOI. This shows that it is primarily for political reasons that they fight to maintain their language and identity through the school system. Otherwise, most of them believe that Amharic and English will grant a better future for their children.

As is the case for the rest of the country, Amharic is the other language used in the education system of the Gamo area. The language is introduced as a subject from grade 3 in the public schools. In addition in Arbaminch, public schools also offer a program with Amharic as a MOI. At the earlier stage of implementing mother tongue education, Gamo was the only MOI allowed in public schools throughout the town. However, considering the cosmopolitan nature of the town, schools have since then been made to offer a bilingual program with Amharic as a MOI for those who choose to have that, in addition to the use of Gamo as a MOI. This shows the dynamic nature of the implementation of the language policy in order to accommodate the needs of all citizens in the area.

With regard to the role of Amharic in the education system, as interviews with teachers have indicated, its unofficial use outweighs its official use. It is used as an informal MOI in classes where English is supposed to be a MOI, that is, from grade 5 onwards. As stated by a teacher: "Whenever there is a language barrier facing students and teachers in the classroom interaction, most of the time, both teachers as well as students switch to Amharic". This is mainly due to the low English proficiency of both students as well as teachers. Besides, there is a pronounced positive attitude towards Amharic among parents as well as teachers who perceive those speakers of Amharic, and those who learn in Amharic, as being in a better position than others to access opportunities at the level of Federal Government. Parents believe that by learning Amharic, their children will become competitive in the national labor market. From their perspective, in Bourdieu's (1991) terms, Amharic and English are perceived as languages that can offer the speakers an important 'linguistic capital' that will allow them to acquire 'symbolic power' (Bourdieu 1991:14-15).

The Gamo-Gofa zone has opted to continue the policy of using Amharic as a working language of the zone, as the case in the SNNP regional state. As the result, all formal meetings in the area are conducted in Amharic. Reports, official documents, and minutes are also written in Amharic. Public services, namely transportation, trade, banking etc., use Amharic.

According to informants, for a short period of time there was an attempt to use Gamo as an official language. It was used for conducting meetings, official
correspondences, and record keeping, as well as in business signs. However, after a very short period of time, it was replaced by Amharic. As indicated by the informants, the attempt to use Gamo for official purposes has created uneasiness among the other groups in the administrational zone. Besides, since the working language of the SNNP region is Amharic, the use of Gamo created technical difficulties with the process of correspondences with and reporting to the regional headquarters. Circumstances have, therefore, called for Amharic, which is a common but neutral language, to better serve the purpose. Amharic has become a better choice as it is not associated with any particular group in the zone, but instead carries out a mere functional aspect. The language is perceived as the best tool for achieving equality among the various groups. Besides, there is a pronounced positive attitude towards Amharic among members of the society as demonstrated by teachers who were interviewed. Amharic is perceived as a language of greater opportunities in Ethiopia. From their perspective, in Bourdieu's (1992) terms, Amharic will offer them an important linguistic capital which will enable them to acquire economic and symbolic capital.

An exclusive use of Amharic and English has also been observed in the linguistic landscape of the town of Arbaminch. All government and public signs are bilingual in Amharic and English. The commonly seen patterns on signboards indicate the use of Amharic on top. Private signs put up by the owners of shops, restaurants, and bars etc., almost always use Amharic. This contrasts with the situation in the neighboring Wolaitta zone, which is monolingual, where the Wolaitta language is widely used in the public sphere.

## [3.5] Minority Groups and the issue of language of education

The minority groups in the Gamo-Gofa Zone, namely Oyda, Zergula, Zayse, Koreete, etc. have not been introduced into the mother-tongue education. They were rather presented with two choices: to accept Gamo (or Gofa in the case of Oyda) as MOI or use Amharic instead. Except for Zergula, all the groups opted to take Amharic as a MOI. Though most of them are bilingual in Gamo, and their languages are genetically closely related to Gamo, they preferred to use Amharic over Gamo. As understood from the interviews with the educational experts in the area, accepting Gamo as a mother-tongue was considered as accepting the Gamo identity, which also meant endangering their own respective identity. The use of Amharic was not perceived as a threat to their minority identity as it does not compete with their languages at the local level. Amharic has been perceived as a neutral language and even more as a language of high linguistic capital, as it is a working language of the federal government and a
language of wider communication in the country. The use of Amharic has been perceived as an advantage that can allow access to higher levels of socioeconomic and political benefits. In 2014, an effort was started by the zonal educational office to introduce Zayse, Koreete, Oyda and Geditcho (the name is used for Bayso language) into the school system. The plan is to use each one as a subject in its respective locality.

## [4] SUMMARY, CONCLUDING REMARKS AND RECOMMENDATIONS

Mother-tongue education has been playing a positive role among the Gamos for pedagogical benefits. At the beginning, the implementation of mother-tongue education in Gamo was challenged by the way multiethnic and multilingual nature of the area were being managed by local authorities. Various contradictory scenarios were noted. On the one hand, there was a general tendency to encourage ethnic groups to be conscious of their respective group identity, maintain it and celebrate it. As the result, ethnic groups, which have lived side by side for long periods of time, complementing and supplementing each other in multilingual symbiosis, speaking each other's languages, and mutually intelligible with each other, started acting as competing entities. One can say that a new Tower of Babel approach has been developing in multilingual settings. Ethnic groups have been contesting over having their respective linguistic identities recognized as dissimilar from the neighboring ones.

On the other hand, there was, at least at the earlier stage, a tendency towards employing an assimilative approach of language policy at the zonal level. As a result, attempts were made to use a single language or a harmonized unitary language as a MOI across the administrative zone.

The clash between the language practice and the expectations of the people has caused recurrent changes to language planning in the area. In fact, even during the recent fieldwork of the researcher, in 2015, there were ongoing movements by some dialects of Gamo for new language planning in their respective dialect. This implies that the process has not yet fully settled.

It was also noted that a continuous contesting for distinctiveness has started with the bigger groups, such as Gamo against the other major groups in the zone, and has moved down into the subgroups within Gamo. Before Gamo was acknowledged as an independent MOI, the most important goal was to promote it as a MOI, and so to maintain the Gamo identity. The Gamo identity was perceived to be endangered if the community had accredited either Wolaitta or the harmonized languages as a MOI. Therefore, it was not necessary to negotiate for dialectal identities such as Kucha or Dorze. Later on, after Gamo achieved recognition as an autonomous MOI, and the Dache dialect has been chosen to
be the standard dialect, sister dialects have stated contesting with each other. These disputes were severe enough to involve public protests, leading participants to conflict with the police and culminated in arrests.

In general, the linguistic differences betweenthe closely related languages of Ometo in the former North Omo Zone, and even more between the dialects of Gamo, have been, by in large, exaggerated. The position of appreciating distinctiveness has been taken primarily for political benefits rather than pedagogic. The existing linguistic variation, even among the dialects of Gamo, has been used to mask the real motivation, which, in the informants' opinion, is political. Language is a very sensitive political issue in Ethiopia (cf: Cohen 2000, Smith 2008, Küspert Rakotondrainy 2013). Otherwise, considering the linguistic closeness between the languages in the zone, as pointed out by the informants, the use of one common MOI could have worked, not only for the dialects of Gamo, but also for Gamo, Wolaitta, Gofa and Dawuro. Achieve this would requiresome careful harmonization efforts by linguistic experts. The case of GAGODA and WOGAGODA was an attempt handled by people who lacked the necessary expertise in linguistics. One can refer to the best experience in South Africa on the harmonization of Zulu, Xhosa, Ndebele and Swati (Alexander 1998) and that of Yugoslavia on harmonization of three languages (Deprez \& du Plessis, 2000).

Nonetheless, considering the existing high level of identity consciousness of the people, it would be better to try to enable linguistically divergent varieties to have their own respective language of education, rather than forcing them otherwise. The importance of mother-tongue education for pedagogical, psychological and sociological benefits of children achieved recognition long ago (UNESCO, 1953), and nowadays seems almost a common sense knowledge. So, if it is possible to give the opportunity to have a real mother-tongue education, this would be the best solution.

The most important issue, then, is what exactly mother-tongue means in linguistically diverse settings with very closely related linguistic varieties. What level of linguistic difference should be recognized as a separate mothertongue in education? Should we consider dialectal and sub-dialectal level differences for the language of education? Besides, language planning should consider identity planning, since these are two sides of the same coin. Acknowledging the existing diversity in a multilingual setting, and designing a customized approach to mother-tongue education that adapts well to the relevant situation, will be the best solution in achieving pedagogical effectiveness, as well as a fairer and more inclusive society.

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# SCHOOL GRAMMARS WITH EVERYDAY <br> VOCABULARY: SUGGESTION FOR A CULTURE SPECIFIC APPROACH, WITH SIDAAMU AFOO <br> AS AN EXAMPLE 

KJELL MAGNE YRI

## ABSTRACT

This contribution deals with the problematic area of specialised nomenclature in school material for languages that are comparatively new as languages of instruction. It concerns grammar, although in principle the same problems arise for those who write school materials for mathematics, chemistry, physics or any other subject taught in school. The nature of this contribution, however, is not the description of a research project in the normal sense, so it is not built up around a well formulated research question. Nonetheless, a working hypothesis can be seen to underlie the discussion. It is a reasonable assumption that if a grammatical terminology is created hastily and with quick ad hoc solutions based on English or a dominant language, it may impede transparency and learning in both the short and longer term. Consequently the hypothesis is that one finds the best solutions by starting from the local culture and everyday words, discussing and evaluating their merits as grammatical terms, and only resorting to loans or foreign influence if that approach fails. The suggestions that form this hypothesis are found in (1).

## [1] INTRODUCTION

Languages are spoken for a long time before they are written, read, and analysed. Since these three abilities are advanced cultural developments, and secondary to the basic culture of life sustenance, it is no surprise that all languages lack the vocabulary to talk about language. This picture changes when a language begins to be used as a medium of instruction, or when writers start to write about language itself. Starting from only around 2500 years ago, we have the first descriptions of phenomena in language, and we have them from Indian, Greek and other philosophers. We have inherited their thinking and linguistic vocabulary from such works as Panini's Sanskrit grammar and Plato's Cratylus. The first linguistic terms are metaphors, extensions of meaning from
some everyday domain to the domain of speech and writing. The verb Грव́ $\varphi \varepsilon \imath v$, "to scratch" in Greek, was extended to the activity of writing; legere "to pick up" in Latin was extended to the idea of reading. Grammarians of Latin and Greek between them developed a vocabulary, which to a great extent became commonly used as loanwords in European languages. Verb, noun, adjective, inflection, and conjugations, to mention but a few, are pure Latin words. Phrase, syntax, and morph are likewise Greek words. They were everyday terms for everyday concepts before they became specialised grammatical terms and spread around the world as loanwords. Hovdhaugen (1982) gives a fascinating insight into the long process that resulted in the now generally accepted grammatical terminology in "Western linguistics".

The dominating linguistic metalanguage now being English, the Latin and Greek loanwords find their way through English into school grammars of languages around the world, again often as loanwords, but also as translation loans.

## [2] PROBLEM AREA

In this study I investigate some aspects of the efforts in Sidaama to create linguistic terminology, and report on a project which is contributing towards that effort. Sidaama is a Highland East Cushitic language spoken in south central Ethiopia by people calling themselves Sidaama and numbering around 2.9 million according to the 2007 Ethiopian population census (Central Statistical Authority 2010:200). It is the $5^{\text {th }}$ largest language in Ethiopia after Oromiffa, Amharic, Tigrinya, and Somali. The self-described name of the language is Sidaamu Afoo (lit. Sidaama-of mouth), literally "language of the Sidaama".

Even though the history of written Sidaama is short, there are nonetheless some established terminology metaphors and loans which have become settled. Among them are 2afó" "mouth" for language (metaphor), k'aale for "word" (loan from Amharic k'al "word"), and su2ma "name" for noun (metaphor). There is no way of doing away with the terms for either writing or reading; the former is a metaphor in the spirit of Greek, viz. borreessa "to engrave", while the latter is a phonologically adapted loan from Amharic, viz. nabbaba "to read", adapted from Amharic anäbbäbä.

When it comes to the more sophisticated terms, my view is that the formation of the vocabulary should not be undertaken prematurely, because the

[^35]analysis of the language needs to have reached a well advanced stage. And on the basis of the Sidaama situation, which I know fairly well, I propose that it is also preferable to delay the process of terminology creation in other less analysed languages, while awaiting good descriptions of the language. However, I see no problem in undertaking the creative process of terminology coinage for those areas of the languages which are well analysed and where researchers have no great disagreement.

## [3] PRINCIPLES FOR THE CREATION OF GRAMMATICAL TERMS

In the following I set out to propose four principles for successful grammatical terminology. To a great extent, they are explicit statements of what appears to have been the actual principles from the beginning, but I do not want to imply that the Latin and Greek tradition is perfect in this respect. On the contrary, I advocate the need for a certain liberation from that tradition, if not from its principles, at least with regard to the conceptual background of the actual terms which are chosen or coined. For example, in searching for good terms for inflection or conjugation, there is no need for, or universal rationale behind, resorting to the concepts of "bending" which is the everyday concept behind inflection, or "tying together by means of a yoke", which is the agricultural concept behind conjugation.

Suggested principles for the coinage of grammatical terms
(i) The term should be a metaphor based on the local culture, rather than a loan.
(ii) It should be defendable from a linguistic point of view, i.e. based on analysis.
(iii) It should be to some extent intuitively self-explanatory.
(iv) It should be simple to remember.
[4] DISCUSSION OF SOME EXISTING EXAMPLES
Indriyas (1993 E.C.) is an attempt at a generative syntactic analysis of a sample sentence in Sidaama. It makes reference to a work which is called "Sidaamu Afii Jirte" (The Laws of the Sidaama Language), prepared in 1991 (E.C.). In the title, "the laws of the language" is apparently intended to be the translational equivalent of "grammar". As indicated above, mouth in Sidaama also is a metaphor for language. This term for grammar conforms to the points in 1,3 , and 4 in the
principles being proposed. To evaluate its merits under point 2 , the crucial word is jirte, "law, regulation, rule, norm, custom" (the equivalents as given in three dictionaries: Yri (1982), Gasparini (1983), and Shimelis (2007). Is grammar a set of such phenomena, or is there a better Sidaama term to describe the regularities and patterns of the language? Such are the considerations that would necessarily be undertaken, and no opinion with the respect to this is indicated here.

The above-mentioned contribution of Indriyas (1993 E.C.) is printed in Woganke "Our Culture", a magazine published annually by the Office for Culture and Tourism at Zone level in Hawassa on the occasion of the annual Sidaama Language and Culture Symposium. It is important because it is the only available sophisticated explanation of the syntax of Sidaama, which is written in the language itself. Shimelis (1998) contains fragments of phonological explanation, especially with reference to the writing system. And in the readers of elementary schools, one can find scattered grammatical terminology. Otherwise, the more complete grammars of Sidaama are written in English (Maccani 1990, Anbessa 2000 (PhD thesis) and 2014, Yri 2006, Kawachi 2007) and consequently do not suggest grammatical terminology in Sidaama.

Giving more examples of recently coined terms, I present the solution currently in effect for consonants and vowels. They are both based on the verb for talking, c'o-id-a "to speak" (morpheme breaks shown by a hyphen). "Vowel" is expressed with the causative active of this root, "cause to speak, address", nominalised as an instrument or a nomen agentis, viz. c'oi-Siif-aan-co "something which causes/helps one to speak/pronounce". Both Gasparini (1982) and Shimelis (2007) list "read" among the meanings of this causative verb, witnessing that the concept of "talking" is, or at one time was, the basis for the metaphorical extension "reading". "Consonant" is expressed as c'oi-fiif-am-aan-co, the only difference being that the latter form contains the passive morpheme am, hence "something which is caused to be spoken/read, something pronounced". The translations are my attempts to convey the literal meanings of the words.

Obviously the terms are new coinages that purport to explain linguistic facts about the differences between vowels and consonants in Sidaama. However, in my opinion, they are not based on linguistic analysis; that is, if my understanding of the verb used is somewhat near the correct one. I cannot see what phonetic knowledge they describe, in particular how the difference between vowels and consonants is adequately captured in the difference between causative active on one hand and causative passive on the other. Besides, being so similar to each other, they cannot be easy to keep apart in memory, either for pupils in
schools, or for adults. They are obviously coined in the same mould as the Amharic annababi ("vowel") and tänababi ("consonant") that at first glance also exploit the concept of reading (not talking) in the active and passive voices as the home domain of the two classes of sounds. The Amharic choice of terms, however, is inherited from Gə’əz and is related to the "fidel" system of writing, where a symbol represents a syllable. Further, the basic stem nababa in Gə’əz has "utter a sound, give voice to" among its sense descriptors, which explains the causative/adjutative active derivation of the term for vowel: "something which helps to give voice to (viz. to the consonant in the fidel grapheme)", while the consonant is "that which is (only) pronounced (by means of the vowel in the fidel grapheme)". That explains the passive voice in the term for consonant. As of 1992, Sidaama did not employ the fidel system, so the choice of terms can at best be defended by reference to the time when fidels were used for writing Sidaama, and even so by reference to the history of Amharic and Gə'əz. (The factual information towards the end of this paragraph is provided by Prof. Baye Yimam and Lutz Edzard in personal communication. It is reformulated by me, so that any resulting misrepresentation of facts is solely my responsibility.)

A superficial knowledge of the phonology of a language on the part of the decision makers is not only unfortunate for the phonological terminology, but also for the creation of the orthography. Graphemes of a language can be seen as grammatical terms in a wider sense, and should be subject to the same caution as other terms. In Shimelis (1998:xxii) some glottal stops are called lik'insu k'oonk'o "throat sounds", which is probably an adequate term. But the glottal stop is not listed among the consonants, and in some occurrences the symbol is not described as standing for a "throat sound", but as a device "separating identical vowels from each other". The present Sidaama orthography bears witness to the disadvantage of prematurely presenting linguistic results in the form of a new writing norm. For example, the glottal stop is sometimes written $<^{\prime}>$ (in clusters with liquids, and also as geminated between vowels of any quality), sometimes <"> (ungeminated between identical vowels), and sometimes omitted altogether (word initially and ungeminated between vowels of different quality). For a systematic evaluation of the Sidaama orthography see Yri (2004).
[5] ONE POSSIBLE THEORETICAL ORIENTATION - CONSTRUCTION GRAMMAR (CG)

Rather than using Latin and Greek through the mediation of English or another dominant language as a mould or straightjacket, translating grammatical terms
from them, I suggest another way. It may result in a temporary solution, or in a lasting solution, but its main idea is not to hurry. My suggestion is to take seriously the principles outlined above in (1), without committing oneself to choices to be adhered to forever. Let me first outline one possible theoretical foundation for such a suggestion, using the treatment of lexical categories, or parts of speech, in the so called construction grammar framework as an example.

It must be emphasised that the suggestion in (1) does not depend on those principles or any other particular theory of grammar. And although CG is an attractive framework because of its flexibility, only a fragment of the theory is presented here, viz. the skeleton of how to think about lexical categories. It is attractive because it treats each language on its own merits, claiming that the categories are not universal, but language specific.


FIGURE 1: Conceptual space for the parts of speech (Croft 2001:92).
In Croft's framework, this is a table that summarises the purposes for which the languages of the world use words and phrases. The upper case labels along the left hand margin are not terms for lexical categories like noun and adjective, to avoid thinking of any language in particular, but more abstract labels referring to uncontroversial semantic groupings. Figure 1 shows a semantic map of the concepts involved in the description of the functions or the meanings of constructions in any language.

Reference, modification and predication (along the top line) are some of the pragmatic functions of language, defining propositional acts. Objects, properties, and actions (along the left margin) represent major semantic classes. At the crossing points of the horizontal and the vertical lines we get an abstract characterisation of what in specific languages are different kinds of words or phrases, the prototypical categories of nouns, adjectives, and verbs (indicated by boldface letters in the chart). Along the top horizontal line, there might have been more propositional acts, like classification and quantification, and along the left margin there might have been more semantic classes, not just the three central ones.

In the following, capitalised labels are language specific (Noun), while lower case labels are universal prototypes, defined from their position in the semantic map (noun).

In traditional (school) grammars of a particular language, words belonging at these boldfaced crossing points are labelled Nouns, Verbs, Adjectives, Prepositions etc., following the Latin tradition, rather than receiving indigenous names that allude to their function. Once a label is coined, a category is established for the words that belong under this label, for example Nouns, and the words are listed as belonging to that category. That is exactly what I want to avoid before the language is thoroughly analysed, and I will show how it can be done in such a way that it helps both the child learners and those who undertake the standardisation efforts which are bound to follow at some point.

In a learner's elementary school grammar, these pragmatic functions and semantic classes may well be expressed by means of everyday language, without technical terms which will sometimes be difficult to penetrate. The appendix is an excerpt from a grammar project in progress, still in its initial stage, but following the principles outlined in (1). Applying the constructionist approach that categories are flexible, I do not commit myself or the student to a rigid categorisation. Rather, the function of words and phrases are explained in everyday words.

## [6] THE LAYOUT OF THE GRAMMAR AND THE LESSONS

It is imagined that my suggestion might work e.g. for the fifth grade in an elementary school.

First, there is a lengthy explanation of letters and sounds (not included in the appendix), focusing on the difference between them, and using the metaphor that letters are mirror images of sounds. The latter can only be spoken and heard, the former can be written, seen, and read. Normally, $5^{\text {th }}$ grade pupils are able to read and write fluently, so the grammar only helps them to get a deeper understanding, and to become conscious of some of the peculiarities of the orthography. The orthography, being inconsistent and self-contradictory from a phonological point of view, is bound to be difficult to learn, and thus presents pedagogical challenges.

The larger part of the grammar, at its present stage, deals with the Sidaama equivalents of Sentences, Nouns, Pronouns, Adjectives, Verbs, Copula, Demonstratives, and Tense/Aspect. Every lesson introduces one concept, or at most a very few related concepts. Then the body of the lesson is made up of a few short statements explaining this concept. Then follows a text for the pupils to
read carefully and search for instances of that concept in the text. ${ }^{2}$ The excerpt of the grammar that is presented here contains only enough to give an idea of its structure.

The grammar in the appendix contains the part that deals with sentences and, extremely abbreviated, the part that deals with word function, illustrated with some functions of a noun, that in Sidaama easily overlap with those of an adjective. To put it in CG terms, "the same word may refer or modify according to the construction in which it occurs". The accompanying English translation is for the benefit of the non Sidaama reader. A sentence is defined as a message, which sometimes consists only of one word, sometimes of more words. The word I use for message is sokka, that may mean "something sent, message, letter". The commonly used word for sentence, e.g. in Indriyas (1993) and all the Sidaama readers of the elementary schools, is c'oi fooliffo, a translation loan from the Amharic aräftä nägär, "the pause/break/rest of a matter/something spoken". I use both of these terms, although the translation loan is not a very intuitive choice. As for the term "word", I assume that the loanword k'aale is so entrenched that there is neither the need nor any easy means to replace it with an indigenous everyday word.

After the two topics that are treated in the excerpt, I go on to the more complex fields of the chart given in figure (1), viz. nouns functioning as predication (e.g. 'my brother is a patient'), as modifier (e.g. 'a widow woman'), and a great many others. Those are not included in this presentation.

It is not necessary at this point to draw any conclusion about the most recommended choices of specific grammatical terms. But from the treatment of topic 2, "The word", it would appear reasonable that su'ma "name" is a viable choice for a Sidaama grammatical concept noun, which is in fact the solution actually in effect in school material. It happens to be in line with the "Western" tradition.

The grammar goes on with examples and explanations that are attempts to overcome the Sidaama problem of classification of nouns (read: "referring expressions" and adjectives (read: "modifying expressions"). No such term as "adjective" is introduced, but by means of examples it is demonstrated that e.g. the

[^36]word gunnitte "widow" in some contexts "points to a thing (which includes persons and animals)", and that is its work in that context. Semantically we would have said that the word refers. With Latin as metalanguage we would have called it a Nomen, a Noun. But in other contexts, e.g. gunnitte manco, "widow woman" the same word "tells how a person/thing is", and that is its function in that context. Semantically, we would have said that it modifies, and in a rigid metalanguage we might have called it an Adjective. So the question arises: is it an Adjective or is it a Noun, or is it both? This problem is not trivial in Sidaama (see Yri (2007)).

By taking this approach, pupils are made more aware of the functions of words in certain constructions, rather than being forced to learn categories of words that are not even adequate labels, and which may have to be revised when the language is better analysed. While the intuitively attractive option of choosing su'ma "name" as the term for Noun probably will remain the lasting solution, one will have to struggle more with the category containing modifiers, which in Sidaama overlaps with Nouns. Focusing on the two pragmatic functions of referring and modifying might be easier to deal with, both theoretically and pedagogically. By the way, one suggestion for Adjective in Sidaama actually in use is su'mi ledo: "the companion of a Noun". One of its disadvantages is that it alludes to a purely formal, not functional characteristic of its meaning. One may object that a lot of different grammatical phenomena can appear "accompanying a name/Noun", without saying anything about "how the thing is".

In the drafted grammar, predication is described as "adding new knowledge". It is not included in the excerpt that is the appendix to this article. Words which "add new knowledge", are however, are not simply the Verbs of Sidaama, albeit including them. Predicates may also be all kinds of nominal and sentential constructions, with a Copula as the wizardly function determiner.

## [7] CONCLUSION

This is just a small introduction to a work in progress, along with the considerations that triggered it. The approach does not reduce the importance of the creation of a well-reflected set of grammatical terms. But those who create it should be native speakers (so that concerning Sidaama, the present author is disqualified from the outset, but hopefully entitled to have an opinion), and have enough linguistic insight not to form misleading terms, which may be the case if the task is undertaken too early in the standardisation process. A grammar composed along the lines suggested here may even help those who set about coining the conclusive metalanguage.

It is claimed here that the propositional acts of reference, modification, and predication, as well as the semantic classes of objects, properties and actions, can be made simple without technical terms. It is also assumed that the approach is feasible and would be profitable for any topic of grammar. The present suggested grammar does not distinguish between morphology and syntax. They are interwoven within each other. That, however, is a matter of organisation and not crucial to the main objective of this contribution: to create an awareness of the power of everyday words to describe grammatical phenomena in an intuitive and simple way.

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APPENDIX: SELECTED TOPICS OF GRAMMAR AND HOW THEY COULD BE PRESENTED IN SIMPLE WORDS

TOPIC 1 (FIRST PART): SOKKA - THE SENTENCE
Coyi'nannire ${ }^{3}$ wole doogonni sokka yinara dandiinanni.
What we say (speak about) in another way can be called a message.

Coyi'nanni woyite, yinanniha sayisiinsara sae sae seeda yanna hasiissanno, sae sae harancho yanna hasiissanno.
It may take a long time or a short time to say what you wanted to say.

Harancho sokka ikkituro, miteege mittu qaali calla hasiisanno. Lawishshu gede: If the message is short, we sometimes only need one word. For example:

No. "He is here" "She is here" "He is alive" etc.
Dino. "She is not at home" "He is not here" etc.
Ofolli! "Please, sit down"
Danchaho. "It is good"
Maati? "What is it?"
Mineho. "It is a house"
Dee'ni! "No, not at all"
Fulino? "Has he gone out?"
Ee! "Yes, (he has gone out)"

Aliidi borreessinoonniti mitte mitte sokka mitto mitto qaale callaati.
Each single message written above consists only of one word.

Togoo sokkano wole doogonni 'coyi foolishsho ${ }^{4}$ ' yinanni.
Such messages are also called 'sentences'.
Borreessineemmo woyite, sokka borreessine gundummoro, mitto malaate lendeemmo.
When writing, having finished writing the message, we add a sign at the end.

## Malaatta tennete:

[^37]The signs are these:
.?!

Tenne sase malaatta su'ma egennootto (egennootta).
You know the names of these three signs.
Tenne sase malaatta giddonni mitto laittoro (laittaro), mitte sokka gooffinota afatto (afatta).
If you see one of these three signs, you know that one message has ended.
Sokkate giddo wole malaattano heedhara dandiitanno:
Inside sentences there may be other marks:
; ,: - wkl (etc.)
(Here will be inserted the names and uses of all the marks which are deemed necessary)
$N I W A A W E$ - TEXT (LITERALLY"READING"): SAA-THECOW
Aadde Amalora mitte saa noosi. Ise su'mino Boontuuti. Hatte saa ado deesallote. ${ }^{5}$
Mr Amalo has a cow. Her name is Boontu. That cow provides enough milk.
Aadde Amalo saa lowo geeshsha asse baxannose. Hakkonnira hatte saa mininni gobbara fultara dibaxanno.
Mr. Amalo is very fond of the cow. Therefore he does not like it to go outside.
Isi ilaala fule hayisso mide abbe itisannose. Saano Aadde Amalo lowo geeshsha baxxannosi.
He goes up on the mountain and cuts grass which he brings for her to eat. The cow is also very fond of Mr. Amalo.

Isi ilaala fule hayisso mide abbara ha'riro, saa woddanni qarrissanno. When he climbs the mountain to cut grass to bring to her, the cow bellows and causes trouble.
[5] Kachara's (2002) original was deensallo, which Yaicob Wayu in personal communication corrected to deesallo. None of the available dictionaries contains the word in any form.

Mini ama Baabba Sooreette saa "Boontu'ya ballo, sammi yii! Woddootina! xaanni hasi'roottare abbannohena" yite awissuse.
The housewife Mrs. Sooreette tried to calm the cow; "Please Boontu, keep quiet; he will bring your food to you right now", she said soothing the cow.

Saa woddanni heedheenna, Aadde Amalo ilaalunni hayisso mide umoho duqqe kae dayi.
While the cow was bellowing, Mr. Amalo had cut grass on the mountain, and was carrying it on his head to her.

Iseno iso affe suunte, hayisso luqqisse adhitara golo shashshaffu.
When she saw him she quieted down, but in order to snatch at the grass she shook the wall.

Aadde Amalono saasi Boontura hanqe, hayisso uulla tuge, "Hawusa iti atina!" yee
Mr. Amalo bacame angry at his cow Boontu, threw the grass on the floor and said, "You disagreeable creature, eat!"
haqqichcho haa're gane bararraassi. Iseno xooqqe hedheenna, hayisso albaseenni wori.
He hit her with a stick and frightened her. While she fled, he put the grass in front of her.

Isi ofolle fooliishshi'rita saano higge hayisso ittu. Baabba Sooreette saa xuurte ado shaffanno.
As he sat down to rest, the cow also returned and ate the grass. Mrs. Sooreette milks the cow and processes the milk.

Saate ado shaffe, buuronna ado badde, gama mine horoonsidhu gedensaanni Processing the milk she separates the butter from it. First she uses part of it in the house,
gattinota dikko fushshite hirte, lowo womaashsha abbitanno.
then she takes the rest to the market and sells $i$. That way she earns a lot of money.

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LOOSO - HOMEWORK (TASKS):
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Tenne niwaawe giddo meu coyi foolishshi no?
How many sentences are there in this story?

Heedhanno malaatta maanna maa ayinateeti?
What kinds of signs exist?

TOPIC 1 (SECOND PART) : COYI FOOLISHSHO (2) - THE SENTENCE (2)
Sokka sase danna afidhino:
There are three kinds of sentences:

1. Ubbino. "She has fallen down"

Togoo sokka woy coyi foolishsho "duduwo" yinanni. Such a message or sentence is called a "piece of news" (statement).

Konne malaate (.) laittoro (laittaro), coyi foolishshi duduwo ikkinota afootto (afootta).
If you see this sign (.), you know that the sentence is a statement (piece of news).
2. Hadhino? "Did they/she go away?"

Togoo sokka woy coyi foolishsho "xa'mo" yinanni.
This kind of message or sentence is called a question.
Konne malaate (?) laittoro (laittaro), coyi foolishshi xa'mo ikkitinota afootto (afootta).
If you see this sign (?), you know that the sentence is a question.
3. Amme! "Both (all) of you; come here!"

Togoo sokka woy coyi foolishsho "hajajo" yinanni.
This kind of message or sentence is called a command.
Konne malaate (!) laittoro, coyi foolishshi hajajo ikkitinota afootto. If you see this sign (!), you know that the sentence is a command.

Coyi foolishshi dancha ikkiro, wo'ma sokka kulanno.

If a sentence is good, it tells a complete message.

Aleenni nabbawoottori (nabbawoottari) sasunku coyi foolishshi danchaho.
All the three sentences you read above are proper sentences.

Kunni woroonni noo qaalla, "Saa" yinanni niwaawe giddoonni fushshinoonnite: The words below are taken from the story called "The cow".

1. xaanni hasi'roottare "now that which you want"
2. iseno xooqqe hedheenna "while she ran away"
3. hirte, lowo womaashsha "after selling, much money"

Sasunku lawishshi wo'ma sokka dikulanno.
None of the three examples tells a complete message.

Hakkunni daafira danca coyi foolishsho di"ikkanno.
Therefore they are not good sentences.

Mimmitu ledo coyi'rama dandiinannihu, danchu coyi foolishshi widoonni
callaati.
Conversation is only possible by means of proper sentences.

Tenne coyi foolishshuwa galagalte lai:
Look at these sentences again:

1. Ubbino. "She fell down."
2. Ha'rino? "Did he go away?"
3. Amme! "Both (all) of you; come here!"

Sasunku coyi foolishshi giddo mitto mitto qaale calla noona, haranchoho.
All three sentences consist only of one word, so they are short.
Lowo yanna kulleemmo duduwo seedaho. Lowo yanna xa'mineemmo xa'mono seedate.
Very often the news we tell is long. Very often the questions we ask are long.
Lowo yanna hajanjeemmo hajajono seedate.
And very often the commands we give are long.

For example: (Lawishshu gede:)
Sukkaare hidhitara mamoote hadhu?
When did she go to buy sugar?

Tini xa'mo seedate.
This question is long.
Haqqa maxxanni heedhe ubbino.
While he was cutting branches off a tree, he fell down.

Kuni duduwi seedaho.
This piece of news (statement) is long.
Saada fushshitine ka'ine kawa amme!
When you have finished driving out the cattle, then come here both (all) of you!
Tini hajajo seedate.
This command is long.

NIWAAWE - READING (TEXT): RISA - THE FALCON
(The text itself is omitted in this presentation; only the associated homework is quoted.)
"Risa" yinanni niwaawe giddo, duduwo, xa'monna hajajo ikkitino coyi foolishshuwa duuchcha hasi'ri!
In the story called "The falcon", find all the sentences which are statements, questions, or commands.

TOPIC 2: MITtU MITTU QAALI LOOSO - THE WORK OF THE WORDS
Mine wole wole looso loosa hasiissannohe.
At home you have different kinds of work to do.
Mine loosikki maati?
What is your work at home?
Ati labbaaha ikkittoro, annakki kaa'latto.
If you are a boy, you help your father.

Isi lalo noosiro, saada hayikkisatto.
If your father has cattle, you lead the cattle to the water.

Meyaata ikkittaro, amakki kaa'latto.
If you are a girl, you help your mother.

Mine giira hasiissannona, meyaati dubbunni haqqe abbitanno.
Fire is necessary in a house, so girls fetch firewood from the forest.

Qaallano babbaxxanno.
In the same way words are different from each other.
Togoonnino loosinsa babbaxxanno.
Likewise their tasks are also different from each other.

COYENNA UDUUNNE - THINGS
Minu giddono dubbu giddono dikkoteno qaalla diafi'neemmo.
Be it in the house, in the forest, or at the market, words we do not find.
Afi'neemmohu coyenna uduunneeti.
What we find are different things.

Uullate aana coyinna uduunnu batinye no.
The world is full of things.

Mitto mitto uduunnichcho kinsara dandiinanni, woleha kinsara didandiinnanni.
Some of them we can touch, others we cannot.

Lawishshu gede, moyiccuno, mannuno, mini uduunneno, togonni ceano no. For example: There exist animals, house equipment, people and birds.

Insa duuchcha babbaxxino coyubbaati.
They are all different things.

Coyi'nanni qaali kayinni wole garaati.
The spoken words are different from these.

Qaalu loosi maati yiniro, mittu mittu qaali hakkonne coye malaatisanno woy riqiwanno.
The work of some words is to refer (expressed by means of "pointing to" = malaatisa and/or "replace" = riqiwa) to those things.
'Kincho' yinanni qaali kincho ikkino coye malaatisanno.
The word 'kincho' points to the thing which is a stone.
'Ado' yinanni qaali ado ikkino coye malaatisanno.
The word 'ado' points to the thing which is milk.
'Gunnitte' yinanni qaale minaannise reyinose mancho malaatisanno.
The word 'gunnitte' points to a woman whose husband has died.

LA 'NANNIKKI C'OYE - ABSTRACT MATTERS
Tunsichcho lainohu dino.
Nobody has seen darkness.
Ikkirono, tunsichcho maatiro anfoommo.
But we know what darkness is.
'Tunsichcho' yinanni qaali hakkonne la'nannikkinna kinsannikki coye malaatisanno.
The word 'tunsichcho' points to that thing which cannot be seen or touched.
Qaalu coye malaatisannota hiitto assine anfeemmo?
How can we know that a word points to a thing?

Qaalu coyi su'ma ikkiro, coye malaatisanno.
If the word is a name of a thing, then it is a pointing word.
(A piece of homework again is based on the previous story about the falcon:) Tenne niwaawe giddo, malaatisanno qaale duuchcha hasi'ri! Find all the pointing words (=all the Nouns) in this text.

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# SOCIO-POLITICAL DISCOURSE AND <br> COMMUNICATION IN SIDAAMA FOLK MEDIA 

NIGUSSIE MESHESHA MITIKE \& KJELL MAGNE YRI

## ABSTRACT


#### Abstract

The aim of this study was to highlight aspects of the socio-political discourse and communication in Sidaama through the analysis of three selected Sidaama folk media. Folk media include songs, proverbs, folktales, praises, curses, greetings and so on, but this contribution is limited to examples of hano "dance of married adults", faaro "song (with a wide variety of topics)", and hayye "lullaby", a representative but by no means complete selection. Dances are accompanied by poetic discourse that may be used for political and social ends. The selected material was subject to linguistic and contextual analysis, demonstrating the treatment of a variety of political and social topics in the folk media.


## [1] INTRODUCTION ${ }^{1}$

Many studies of political communication employ a rhetorical and discourse analysis approach (Nimmo and Sanders 1981). Discourse analysis is useful in the study of political communication because it contributes towards understanding deeper levels of meaning, through examination of how language is used to represent people of a certain group, class or race. The existing communication systems can shape and be shaped by the political structure, as differences are usually under or overplayed for competing political and ideological reasons. Such forms of political communication are usually made for the production or reproduction of social reality through language use (Mayr 2008).

In relation to this, the study has focused on discourse and communication analysis of Sidaama folk media in portraying socio-political realities. Folk media can be best referred to as indigenous equivalents of exogenous mass media. They include festivals, plays, puppet shows, dance, songs, storytelling and poetry (Valbuena 1986). Of the various indigenous channels, the folk media highly shape the political and social activities. This is because, according to Kumar (2006:95): "The traditional media are close to the hearts and minds of the peo-

[^38]ple, so their appeal is at personal, intimate level" and also "satisfy our innate need for self-expression, for moral instruction combined with entertainment".

Hence, studying the socio-political discourse and communication system would help to learn how language functions, and how meaning is created and understood in Sidaama folk media. From this vantage point, the present study has attempted to analyse how the Sidaama folk media are used to portray different socio-political realities by focusing on linguistic analysis.
[2] BACKGROUND AND PROBLEM STATEMENT
[2.1] Background
The language of the Sidaama people, often referred as Sidaamu afoo (as in Yri 2011), belongs to the Cushitic family and is numerically one of the top six languages in Ethiopia with its 2.9 million native speakers, according to the 2007 census published by The Central Statistical Authority of Ethiopia, (2010:200). A recent estimate states that there are more than four million speakers of the language (http://joshuaproject.net/people_groups/14630/ET).

The Sidaama have a number of clans, named after their forefathers who descended from their common great ancestors called Bushe and Maldea. Some elderly volunteer informants for the study said the major clans in Sidaama are seven, but others suggest that there are 12 (consider also Murdoch (1959) and Betana (1991)). The Sidaama people were part of the former Sidamo Teqlay Gizat 'province' during Haile Sellassie's regime and Sidamo's Kifle Hager "region" during the Marxist regime.

According to Hudson (2006) the Sidaama used to administer themselves and have kept their culture and tradition intact for many years. However, there were some historical and social factors that have influenced the culture and tradition. First, the Sidaama self-administration was affected by Menelik's expansion to the South when Sidaama came under Emperor Menelik II who ruled between 1889 and 1909 (consider too Henze 2001 and Bahru \& Pausewang 2002). Second, the neo evangelization process resulted in many changes, such as in the dressing, eating and many ritualistic activities of the people. In the third place, there was the feudal regime of Haile Sellasie, which required the homogenization of Ethiopian cultures, and the Marxist-led ideology of the Derg regime in Ethiopia, which looked at local cultures as a retarding force to development. These views have left their own negative impact on the Sidaama culture, as with all the others. Fourth, the better access people got to modern education and the expansion of roads and other infrastructure, including access to media, etc. have all paved the way for new ways of living among the people. Fifth, the subsequent empowerment of women and the younger generation in
recent years have also brought changes in the people's life style.
Even though some of the changes presented above brought various changes to the cultural heritage of the Sidaama, some of it is widely practiced through folk media. This is commonly observed among adults when they mainly practice affini or affino "the customary adjudication system", fichche "new year celebration", luwa "the age and political system", qeet'ala "joyous feast", barch'uma "circumcision", as well as in numerous other social institutions.

## [2.2] Problem Statement and Objectives

The Sidaama language and culture can be considered as one of the relatively well-studied ones among the Cushitic peoples of Ethiopia. Some of the major studies which focus on the socio-political and cultural aspects of Sidaama include Markos (2014), Markos et al (2011), Hudson (2006), Betana (1991) and Hamar (1970). In addition to this there are various investigations made by linguists on the language Sidaamu afoo. Major studies that deserve to be mentioned here include Tafesse (2015), Girum (2013), Anbessa $(2007,1987)$ and Yri (2011, 2004). Though different studies are available on the socio-cultural and linguistic aspects of the Sidaama, there is not much research examining Sidaama folk media in the light of discourse. Some of the existing related works include Nigussie $(2005,2015)$ and Mesay $(2016)$. However, they do not specifically deal with the socio-political discourse system of Sidaama folk media. By focusing on the examination of selected folk media, the present study wishes to contribute to fill the research gap.

The main objective of the study is, therefore, to identify and analyse sociopolitical discourse and communication aspects of Sidaama, through the linguistic analysis of selected Sidaama folk media, namely hano, faaro and hayye.

## [3] CONCEPTUAL FRAMEWORK

This study employs discourse analysis and speech act theory as its conceptual framework. Discourse analysis is used in order to identify the deeper level of meaning made by a society on socio-political matters. In relation to this, Morand (2000:37) notes the importance of discourse analysis in political communication by writing that 'power and politics are frequently exercised through the discourse made in institutions'. In a similar vein, the Sidaama use their own traditional practices and institutions to exercise power and politics among their members. The way people use the folk media as a discourse channel in different social institutions legitimizes power and politics among the people. This is observed through the analysis of language that demonstrates how power is enacted and communicated in superior or subordinate relations.

Consequently, discourse analysis indicates the dominant patterns of representation of people in politics, media and language use, Shohat \& Stam (1994). According to Van Dijk (1993), discourse analysis may reveal how social power is misused, dominance is created, and inequality is reproduced and resisted using communication media in the social and political contexts. Van Dijk actually refers to this as critical discourse analysis (CDA). Discourse analysis reveals the existing social and political relations of the oppressed and the oppressor, or the subordinate and the dominant positions being "discursively framed, constructed, reproduced or perpetuated", Morand (2000).

Beside the investigation of the discourse forms, John Austin's speech act principles are employed to analyse the selected folk media. Austin (1962: 3) delivering the William James Lectures at Harvard University in 1955 said "many utterances which look like statements are either not intended at all, or only intended in part" for sharing or recording some sort of explicit information about the facts. This may probably indicate that any form of representation through language or words can be intentional or partly intentional, but it is part of doing actions through words, as Austin puts it in his book 'How to do Things with Words'. According to him "ethical propositions", for instance, could be solely or partly intended 'to evince emotion or to prescribe conduct or to influence it in special ways'.

Austin claimed that utterances meet two salient conditions: first, that "utterances do not 'describe' or 'report' or 'constate' (not all true or false statements are descriptions) anything at all, are not 'true or false'; and [second] the uttering of the sentence is, or is a part of, the doing of an action". According to Austin the doing of actions may involve three acts: locutionary, perlocutionary and illocutionary acts. Based on Austin, Oishi (2006) discusses the three acts. Locutionary acts include phonetic acts, phatic acts, and rhetic acts. 'Phonetic acts are acts of pronouncing sounds, phatic acts are acts of uttering words or sentences in accordance with the phonological and syntactic rules', and rhetic acts are performed by 'uttering a sentence with sense and more or less definite reference'. The perlocutionary acts are about the effect of uttering a sentence. The illocutionary acts are performed by uttering a sentence by the speaker to perform an act having a certain force. These acts are speech acts which are performed in communication situations, conversations, or making discourses, Moeschler (u.d:2).

In relation to this, Morand (2000) also talks about how discourse is made within the various texts that help to perform acts. Discourse analysis usually helps to identify an ideology, a political structure, and a communication system, with the acts performed through the texts. Discourse in a text can be un-
derstood by studying the use of language in a communication context. This is because language and discourse are inextricably linked and any sort of discourse produced and reproduced in media, literature, science and technology is undertaken through language in order to perform some sort of acts, Syal and Jindal (2002: 10).
[4] METHODS OF THE STUDY
The study was carried out by employing explorative and qualitative research design so as to unveil the linguistic, cultural and communication realities that are little studied about Sidaama. The study is mainly a qualitative one and it makes use of key informant interviews, Focus Group Discussion (FGD), and observation. The interviews were carried out with elderly people who have a lot of knowledge about the Sidaama culture and tradition and are known for their familiarity with the Sidaama oral history, cultural rite and folk media. The FGD was conducted for live coverage of the songs and verbal and nonverbal communication of the people. Observation was used to study how the people perform their songs, and to examine the nonverbal communication styles of the people.

As it was a qualitative research design, the researcher first selected informants by obtaining information about the extent to which the candidates could provide useful information. Someone who was said to be knowledgeable was first found and asked, and he further led to the second person who could contribute further and so on through the snowball sampling method. The informants were taken from three clans, viz. Garbicho in the Aleta Wondo area, Chuko from the Aleta Chuko woreda, and Habela from the Shabedino woreda among the twelve clans presumably representing the highlander, the semi highlander and the township close to the lowland of Hawassa, respectively. FGD was also conducted in each place for the purpose of recording the discussions and the cultural songs, as well as some ritualistic activities.

## [5] ANALYSIS AND DISCUSSION

The folk media included in this study are hano, faaro and hayye. Hano is a song/dance performed by married adults during holiday and festivities, including at the time of fichche and when they are gathered for other social purposes. The faaro is also performed by males and females together with an alluring dance at market places, also during New Year "fichche" celebrations. The hayye "lullaby" is usually practiced by mothers, e.g. when they carry their babies on their back or grind crops or when they put them to sleep at home. Young girls usually also learn this during their socialization in childhood from both their
mothers and their locality. Praise and love songs are expressed with hano and faaro as folk media for socio-political criticisms, whereas hayye may be used for the same purposes, as well as for expressing world views.

In what follows, an example of each of the three selected folk media will be analysed linguistically in their discourse context, and various conclusions drawn from them will then be presented. The examples are represented as poems in orthographic notation, with idiomatic English translation. Wherever a line is extracted for linguistic analysis, morpheme analysis and glossing will be included.

## [5.1] Hano

One of the functions of this Sidaama traditional poetry is to oppose unjust political practices performed by the perpetuators. It was used e.g. to express protests about the feudal administration and political system. Though many years have gone since feudal administration ended, still the people sing such songs to remember their historical oppression. When performing them today, they may allude to the past feudal and Marxist systems to ventilate present political and social grievances. The 'hano' songs do help the people to ventilate their grievances and the discourse here mainly refers to past political structure, but additionally alludes to the present.

The selected hano
lena lemboolena
introductory formula (lemboo alludes to "lemboola" pigeon)
ani ha'ro dayammara
let me go to come back (repeated twice)
lishshi assine kande
let us step on them hard
kuriuu diinnankera
on these our enemies
bushsha same maraa
they struggle for the soil and go
bushsha malkanyootaho
death over the oppressors
loosi'roommoha horre
he plundered what I had worked for
umisira gore
he slaughtered them (my animals) for himself
ani uurre la"anna
while I stood looking at
isiniite itiha
the one who ate them for himself
sidaamu jajjabba'ya
my Sidaama elders (heroes)
mulla massine shinoonnita
that they were killed without any reason
habbooti hegerera "
do not forget it ever
The song is performed by mimicking the dance of the the bird wolliimma "golden feathered bird", here referred to as lemboola "pigeon". The dance imitates the movements of the bird's neck while dancing. There is open criticism of the feudal lords to whom the people had to pay tribute. Before the times of newspapers and twitter accounts this was an efficient channel through which to vent criticism of the oppression of the feudal lords.

Even though the introduction is that of a love song with reference to the grace of a dove, the song is full of harsh lexical items like diinna and malkagna with political implications. The second line in the song is sung twice and its verb has the subject suffix in the feminine form, indicating that the performer in the recorded sample is a woman. Her poetic message can best be interpreted in the context of a love song: "let me go/ I must go, but my intention is to come back." Hence, the introductory lines seem to be in harsh contrast to the remainder of the hano, that is to denounce oppression.

Obviously, the lines "let us step hard on our enemies", "they struggle for the soil and go", and "death over the oppressors" refer to the attitude towards oppression in Sidaama. The Sidaama were formerly marginalized from the political and economic participation. They were suffering victims of the political and economic system. Thus, they opposed the government of the time through words or the expressions they employed in their songs. The word bushsha, that has a concrete meaning "soil, land" is also used very negatively in the curse "soil (death!) to the oppressors" in the very next stanza.

The following lines of the hano give further adverse comments on the feudal practice: "he plundered what I had worked for; he slaughtered them (my animals) while I stood looking at the one who ate them for himself." The harsh words shorra "plunder" and gorra "slaughter" refer to the fact that the peasants had to bring sheep and goats to the land owners as tribute. The landlord used to usurp the fruits of the peasants' labour while the peasants were left destitute in their serfdom. It is described down to the disgraceful detail that the oppressor slaughtered and ate the animal while the poor man was watching.

The background of such use of the language is e.g. the fact that the past feudal government might claim more than $3 / 4$ of the production of the peasants as land tax. The only way to protest against such governance was to denounce the custom in songs.

The actual function of this genre might be both to denounce the bad governance of the past and to criticize the present authorities, in whatever respect deemed necessary. Thus, the hano is used as a medium to communicate the message.

## [5.2] Hayye

Usually the hayye "lullaby" is sung by mothers to soothe babies when they want them to sleep or when they are asleep. However, as in the case of hano, the topic may quickly shift to other, more social and political domains, for example opposing the acts of their husbands, the bad demeanour of the members of their societies, the political system, or passing along some other messages.

In general the Sidaama use their folk media to communicate to the young their political and social worries, dissatisfaction, or opposition. And the most commonly used genre in Sidaama folk media used for this purpose is the hayye. For example, in the selected hayye the women praise their queen Furra and curse the bad demeanour of her political opponents.

The selected hayye
ooso hayye hayye
children lullaby lullaby
Furra meentu biilo
Furra the queen of women
furra shihu shiimo
let the one who killed Furra become small
furra shiihu shiilo
let the one who killed Furra vanish
furra meentu biilo
Furra the queen of women
yanganynya ama furra
Hanganynya's mother Furra
furra shihu shiimo
let the one who killed Furra become small
furra noomme barra
during the time Furra was alive
laballu meentoho qishe
husbands used to cook for wives
ka'e ka'e reyito ise
let her raise from the dead (literally: may she die again having risen, having risen)
Women chant this song with the aim of sending the child to sleep. It is, thus, a perlocutionary act. However, this text is also performed with an illocutionary force that consists in the opposing of the ill-treatment of women. Hence, this hayye is an example of a discourse that reinforces existing social realities. The male dominance is created and reproduced by different expressions used in the society with the aim of maintaining status quo. Against this, Furra, former queen of Sidaama, is celebrated as a symbolic figure representing women's freedom.

In the stanzas "Furra the queen of women" and "let the one who killed Furra become small/vanish" the women curse the ones who killed her. The legend tells that Furra was killed by males after being placed on the back of a giraffe. The males killed her as a punishment for oppressing men and for her tricky questions. Metaphorically, Furra is taken as a symbol for women's freedom and the females sing about her longing for their freedom and opposing male oppression. The women narrate this in their hayye hoping to improve their husbands' ill behaviour, which is then the illocutionary force of the stanzas.

There is a certain nostalgia expressed in the stanzas "during the time of Furra husbands even cooked for their wives," like "alas, that she were alive again!" For a culture that maintains a strict division of labour between men and women, this is quite an unexpected and avant-garde attitude, that in these times of female liberation deserves more attention than it normally enjoys.

Thus, the women deny the political realm shaped by men and express symbolically their opposition to being bereft of their freedom in the poetic coinage of this lullaby.
Stanzas from another hayye further illustrate this:
bullichcho daware dawara hogoomma anni'ne amale though I manage to grind the flour, I can't manage your father's behavior marichchinni reekke reekkine worreenna ganinoe seekke?
with what, provided and put here by someone, has he hit me hard?
seekke ganieta ganasi garaho?
when he hit me hard, was his hitting me a right thing to do?
In the above folk medium the women express their dissatisfaction by making allusion from the grinding of corn to the bad behaviour of their husbands. The meaning here illustrates to the hardship of women's life. Usually in rural areas the women grind the corn using the traditional grinder, which is very tiring.

The above meaning is a symbolic expression where the word "grind" does indicate reshaping or refining of her husband's behaviour. Through the song the women oppose their ill-treatment.

The following are also stanzas from a hayye, that deal with the same topic:
beettu beera gallo
The son stayed at Beera
besere anni gudo beettunnita ganno
Gudo, Besere's father, hit his son's wife
gana garahoni?
Is hitting a right thing to do?
For the interpretation of this hayye it should be noted that there is no formal indicator that shows that the woman sings the lullaby about herself. The word "wife" is not even explicitly mentioned. The only grammatical item that reveals that the song is about an abused woman, is the nominalizing suffix -ta, that together with the case suffix -nni attached to beetto "son" in the form of an oblique case stem (beettu), gives the following information: the object of the mentioned father's hitting activity is a "female entity that is somehow associated with the mentioned son; it could be e.g. his daughter, his mother, or his wife." The performer of the lullaby could sing about herself, or about any other unlucky Sidaama woman, but the general message is: beating a woman is not right.

The whole hayye is a perlocutionary act that is performed through uttering the sentence. Here the singer is asking about the rights of women in the Sidaama society. She is opposing ill treatment of women in general. In Sidaama, hayye, among other genres, is a medium for venting such opposition. Such discourse represents protest media for the women who aspire for their freedom and equality that may be threatened by their male counterparts.

## [5.3] Faaro

The faaro song may belong to different closely related genres, but the transitive derived verb faarsa commonly means "to sing praise". The genre is determined by means of its topic, as the word faaro normally does not occur in its text, in contrast to e.g. the hayye. This dance/song is usually performed by both males and females during festivals and holidays, such as the Fichche (Sidaama New Year). The following is a song of criticism, but implicitly is a praise song.

## A praising faaro

dandoote badachiho sheellu
Shellu from Dandoote son of Badacha (twice repeated)
bixiichcho birra hirteennano
though you have sold bixiichcho (a lump of ensete pulp ready to be fried) for one birr
wondira sok'k'itooti ballo
please, do not let them go to Wondo
wondira ha'rinohu meellu
the women who went to Wondo (twice repeated)
ooso illo soniweelo
gave birth to malformed children
In the above folk media a locutionary act is performed with rhetic acts done by "uttering sentences with sense and more or less definite reference" to the young who might be liable to go to market places in the towns. This faaro is sung in praise of parents who didn't let their children go to towns. In Sidaama, people usually do not go to distant places, particularly cities, believing that it is not a good way of living. Going to towns in previous times was considered as social taboo. Consequently, the young were advised not to go to such places. If they happen to go, they are in the danger of adopting the shameless aspects of urban culture. Metaphorically, this is what is indicated in the syntactic forms above.

The song criticizes those who went to cities and had children there. The stanzas wondira ha'rinohu meellu and ooso illo soniweelo are phatic acts performed by uttering words or sentences in accordance with the syntactic rules. At the same time, the effect of uttering the sentences as perlocutionary acts is urging the members of the society to maintain their norms.

In general, social discourse and communication in a language focus on the cultural and other aspects of the people. This may range from maintaining one's culture to expressing social ills among the people. Austin's locutionary act is discernable as phonetic acts are performed pronouncing the sound "o" as assonance in the three words from the faro above: ooso illo soniweelo "they created malformed children."

This part of the song seems to deal with those women who go to urban areas and have children from illegal unions. Youngsters are advised not to go to towns or cities because there they will learn something that is not culturally acceptable. Through such discourse in the songs the people seek to preserve their culture.

According to the most frequent patterns of Sidaama grammar, the sentence is expected to be [[soniweelo] ooso] illo, the brackets indicating the syntactic
structure of [[modifier] head]. In other words, part of the song employs the common language structure, whereas other parts follow a less common syntax that might be explained as poetic usage. For the purpose of rhyming and emphasis, the word soniweelo comes in the last part of the construction, so it can rhyme with illo in the following line. In both of these possible word orders soniweelo is tied to the noun ooso as a modifier. This implies that the born child is malformed unless the child is born in marriage. This becomes part of the discourse and demonstrates the extent to which marriage is respected among the people.

The word soniweelo is composed of sona "shape, form, cleanness" + weelo "lacking"; according to the context the composite word may be translated as "ugly, formless, malformed". In this case it is a description of the children who are born as a consequence of the people's culture not being followed. This is a discourse that probably alludes the young who go to towns and cities, where they may be consumed by a new and dangerous culture.

Illo (a two syllable form equivalent to the three syllable word ilino) indicates a happening in the past, being inflected in the past imperfective. It seems to have a masculine subject, indicating the father of the mentioned child, but the subject is meellu, a grammatically masculine word which is an informal equivalent of "women". Here the reference is to women who went away to Wondo.

Austin's locutionary act, particularly the phonetic act, is performed by the acts of pronouncing the sounds " u " in ha'r-ino-hu and meellu, which were purposefully used with phonological assonance and at the same time it is a perlocutionary act performed with the effect of uttering the clause to warn the young, an illocutionary act. One underlying meaning of the above expression may be to denounce having children outside of marriage. Further, respect of one's tradition, social practices including marriage as an institution are advocated, while the invasion of urban culture from the towns and cities is criticized.

## A criticizing faaro

The following faaro is performed by females criticizing the one who they play faaro with.
kadoohe kandohe
let the one who stepped on you step on you (twice repeated)
midashsho anjohu
one who has smaller ribs
kadoonkehe midashsho anjohu
do not let a resourceless person step on you
hiikkii manchikki handi?

Where is your bull husband?
handohoni?
Is he a bull now?
handu hadiro hano kando
the bull danced hano in the cattle shed
Usually faaro, which is morphologically and semantically related to "faarsa", refers to praising. Thus, in the faaro players praise each other, or express their love to the one they dance with. In the above lines of the song, however, the male started singing by criticizing the female because her husband didn't control her as she came here to the public place. Indirectly, he wanted to attract the woman. Usually, it is said faaro kadi, which literally means "he danced faro" or "dance faro!" according to the position of high tone. The word kadoohe literally means "let someone step on you". Textually, it seems to be a criticism of the other person, but at discourse level it is the way of alluding to the other party, the woman, by making her ashamed of coming to the dancing place. It is sung like a conversation between the two. The first line is said by the man and the second by the woman as a response to the insult or criticism by the man. While she is dancing with the man she expresses that she is not happy to dance with him at the moment, rather she praised her husband. This song is usually a medium of praising, but it is also a sign to allure the woman into a love affair as in the above instance.

In the following expression the man asked her about the whereabouts of her husband since the man wanted to dance with her: hiikkii manchikki handi? "Where is your bull husband?"

Usually married women dance faaro together with some men. In the song they either appreciate each other or criticize. However, in this expression the man insulted her husband for letting her dance in public space. The next stanza is probably the woman's answer: handohoni? handu hadiro hano kando (=kadino). "Is he a bull now? The bull played hano in the cattle shed!"

Here a locutionary act is performed with the rhetic act of uttering a sentence with more or less definite reference to the husband while talking about the bull. The woman is not interested in the person who dances with her. She expresses her love for her husband by criticizing the man. Culturally, hando is used about a person who is not able to satisfy his wife and who is not able to understand things. As discourse, a bull is usually used as indication of an incapacitated person.
kadoonkehe midashsho anjohu "Do not let the weak (the one with few relatives) step on you." Here the woman is objecting to being abused by her husband. Her husband hits her and she opposes the abuse. She is also criticizing
him as he does not have many relatives. Midashsho literally denotes "the rib of a person", but it connotes to close and strong (wealthy) relatives. Here the discourse is that if a person does not have close and wealthy relatives, he is not respected even by his wife. Hence, the woman is insulting her husband for such a reason. The illocutionary act is performed by uttering a sentence by the speaker to insult her husband.

A man who suppresses his wife is always criticized in the hayye. In the earlier expression, as the women formerly used to grind crops or cereals using a traditional grinder, they used to express their dissatisfaction on their marriage. Women sing the hayye song as they grind corn and hold babies on their backs.

## A faaro love song

Love songs are made in the form of hano and faaro, which are the common media Sidaama use to pass on the intended message of the singers. Love songs are usually sung in the form of hano by females. Beside that, the faaro is also performed usually by males and females to express their love and appreciation, as in the following:
dansaanni dange dararote
Dange, whose father is Dansa, is a flower
daraarote danise
her face is a flower
danise luubili garro bararise
Her beauty has won the heart.
The phoneme/sound of each line initial word is the same. This is the technique of alliteration and serves for rhythmic purpose. The stylistic features in the poem demonstrate how the people traditionally communicate to express their appreciation using figurative language like "daraarote danise"; this is a sentence where "daraarote" (noun + copula) is the predicative of the clausal subject "danise" (her appearance). Austin's locutionary act comes into work here as both phonetic and phatic acts are performed. First, the word 'daraaro' has a sound effect. It actually refers to the name of a woman and at the same time the beauty of the woman, where it means flower. Thus, the phonetic act here helps to create meaning. The alliteration in the first line, and also in the beginning of each line with the sound "d", is used purposefully for rhythmic value. These are, hence, phonetic acts by pronouncing words in accordance with the phonological rules. In Sidaama, surprisingly, it was observed that the initial sounds of the first and father names are mostly the same, like in Dabasa Dangura, Kebada Kinkino, Batiso Bunkura etc., which give some sort of meaning
and this has been commonly practiced as the naming tradition of the people.

## [6] conclusion

The Sidaama folk media are quite useful among the people for maintaining the socio-political power and structure within society. At the same time, the folk media has helped to shape the political and social behaviour of members through performing speech acts in the local group. To find out this, both discourse analysis and Austin's speech act principles were applied as a framework.

The folk media reveal an old power structure or relations between the dominant 'melkanna' and the subordinated (the local people) as manifested in the discourses. The folk forms as discourse media are used to denounce past oppression and to ventilate present grievances. Through the folk media the people also object to the new cultural intrusion and domination. Though the texts seem to indicate some superfluous meanings, they have, in reality, deeper meanings.

In order to better analyse the discourses, Austin's speech act theory was used. This is because the analysis of Austin's speech acts helps in making the discourses more discernably about the political and social matters as portrayed in the folk media. The people use various folk media to perform different acts that enable the people to perform some acts with reference to societal values and good deeds of individuals. They carry out acts with the intention of creating some effect, a perlocutionary act, like performing hayye to send a baby to sleep, and perform an act while it also implicitly forces the hearer to perform an act based on the desires of the utterer. In hano, the same happens, but where the speaker utters a speech such as that in the hano he or she performs the speech act, locutionary act with rhetic acts done by uttering words or sentences with sense and more or less definite reference. At the same time, the acts indicate some deeper level meanings as discourse forms. The folk media such as hano, faaro and hayye are very common among the people to sustain the power and politics among the people, which indicate the dominant and subordinate relations. The folk media, with the songs and the rituals and others, help in linguistic and cultural negotiation towards performing acts that are commonly agreed upon by the people. These folk media are the manifestations of the social and political discourses, communication and the cultural practices among the people.

Basically, folk media are used in different speech contexts for making some discourses. They are the means which social meanings are created and communicated, and discourses are made. In other words, folk forms are the media through which the Sidaama people pass on messages for informing, educating,
persuading and entertaining generations, as do the modern mass media. The Sidaama folk media such as faaro, hano, and hayye are used to mediate the political and social discourses of the people. The political and social discourses in the folk media demonstrate that lexical and semantic uses are exploited to the utmost to create meanings for various contexts. Thus, the people use hano, faaro, and hayye as folk media for social and political ends.

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# SOCIAL AND PRAGMATIC RULES OF CURSING AND OTHER ROUTINE FORMULAS IN GURAGE AND NORWEGIAN CULTURE 

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## ABSTRACT

The Gurage are South Ethiosemitic speakers living in the Gurage Zone in Ethiopia. In the Gurage culture, cursing expressions have differing sociological significance. They are used both literally and pragmatically. Although the cursing expressions are endangered due to modern religions, they are not well studied and documented. The objective of this article is to describe the sociolinguistic and pragmatic meanings and the structural patterns of cursing expressions in the Gurage culture, and then to compare the expressions with Nordic countries' cursing to uncover if there are universal tendencies in the rules and routines of cursing. The study follows qualitative research methodology. The cursing expressions were partly collected from literature and largely elicited from key informants. For the cursing in Gurage, the Gumer variety, from among other 12 dialect clusters of Guragina, was chosen to maintain uniformity in description. The findings showed that self-cursing in Gurage is used to express regret, encouragement, admiration, congratulation, condolence and politeness. Alter cursing is used to cause fear, to express emotions and negative attitude towards others. Age and gender determine cursing practice. Only elder men can take part in formal group alter cursing. Women generally curse themselves and individuals in informal situations. Formal alter cursing in Gurage is graded by elders for its severity. Cursing in the Nordic countries of to-day is more restricted to psychological functions and a kind of identity construction. In the past, however, several of its functions were similar to the ones in Gurage.
[1] INTRODUCTION
[1.1] Background
This article presents different types of cursing in two language cultures, and takes account of some social and pragmatic rules that are regulating this special kind of linguistic behaviour.

Gurage refers to the Gurage Zone within the Southern Ethiopia, and to the
people of the area (Fekede 2014a) ${ }^{1}$. The language of the people is Guragina (Gebreyesus 1991; Fekede 2014c), which has about twelve clusters of dialects. A few of the dialects are less intelligible than the others (Fekede 2013, 2014b; Gutt 1980). The language is grouped into the South Ethiosemitic phylum within the Afro-Asiatic language family.

Norway is a small country in Northern Europe and belongs to the Nordic cultural area. The Norwegian language belongs to the North Germanic language family and is intelligible to Swedes, Danes and some Finns as well as the Norwegians. Norway has a small population and a more than a thousand years of Christian culture.

Any society's definition of what in general is linguistically taboo and especially is cursing, is to regulate social orders in a society. Cursing is prominent in both Gurage and Norwegian. However, there is varying vocabulary and several specific functions in the two cultures, some of which we try to document in this article.

Lexically, cursing belongs to the routine formulas, which occur in a vocabulary as fixed or semi-fixed expressions. Routine formulas often have undergone a split that divides their semantic and pragmatic meaning, like the German Gu ten Appetit or French Bon Appétit, which has the semantic meaning 'I hope that the food becomes you well' and a pragmatic meaning 'it is okay to start eating'. Routine formulas of cursing are under-documented in our dictionaries, maybe since they are mostly used orally, and many of them were also taboo to the lexicographers.

A preliminary and general definition of cursing is a negative speech act to cause fear or harm by some magical power of the expressions used. In addition, the Gurage people can utter cursing addressed to oneself as a positive means of expressing greetings and other polite routine formulas. In such cases, the cursing creates pleasure and warmth of welcome to the addressee rather than creating fear. In Norwegian cursing might also be used to boast of oneself or others but with taboo words in an ironical function, which also may be seen as a positive function of cursing. But the most common function is the negative one.

This article deals with cursing only, not other types of bad language, such as insults or vulgarities. Cursing, unlike other types of bad language, is a more serious speech act performed by the power of the words uttered. Therefore, the types of words or phrases that have to be used to express a curse are not ran-
[1] Hetzron and Bender (1976), however, consider Gurage to refer only to the geographical area in the Gurage Zone. Fekede (2002) and Tenkir (1991) provide the etymology of Gurage as: 'gura' referring to 'left' and '-ge' to 'land' or 'village'
dom, as in many insults and vulgarities, but usually selected carefully and graded for their severity.

The Gurage people earn their living through traditional farming. According to Henry (2006), the Gurage people are also renowned traders scattered across Ethiopia and overseas. The total population of the people as of the Central Statistics Authority (CSA) (2007) is 1,867377 .

The Nordic countries are industrialised and have about 20 million inhabitants with mutually understandable languages; Norway alone has a population of 5.2 million inhabitants. The culture is generally now urbanised and Westernmodern, but only 50 years ago, the culture was more rural and traditional.

As a society of traditional ways of living, Gurage is interesting for investigating whether its linguistic taboos and social ideas are different from those in urbanised, western societies like that of Norway. Such a comparison might also shed some light on the history of cursing and uncover if there are common patterns of use in different cultures which have little contact.

## [1.2] Statement of the Problem

Language use is a dynamic phenomenon; expressions that have been used in the past change over time because of changes in the social structure, socioeconomic development, and changes in ideology, including politics and religion. Cursing, as one aspect of language use, is also constantly in a state of change. In the Gurage context, cursing, particularly the institutionalised cursing by elderly peoples, has become endangered mainly due to modern religions, such as Christianity and Islam, but has also been influenced by other modern trends and sociological factors. Cursing for youngsters is less forceful than it is for elders. Despite this endangerment, the language of cursing in the Gurage culture is not documented; the way cursing language is used, and the various sociolinguistic and pragmatic meanings in the Gurage culture has not been studied. Thus, the present study is an attempt to document some of the cursing language, and to show its sociolinguistic and pragmatic uses in the Gurage culture.

In Nordic linguistics there are some studies of cursing. One of the first is Jespersen (1911) Om banden og sveergen (On cursing and swearing), which discusses the problem of modern people's mindless use of old cursing expressions without regarding their original meaning and function, and how modern cursing breaks several grammatical rules as a result of that (1911:34). Jespersen thinks that the function of cursing is mostly to make statements more forceful. But he also believes that people will curse less as education and good manners
increases in the modern society. He hence fears that the language will lose something picturesque (1911:39). It turns out that his fear was unjustified; investigations show that the use of cursing formulas is increasing in almost all types of communication in modern Norway (Fjeld 2014a). Nevertheless, most of the modern cursing vocabulary in Norwegian is not comprehensible to the language users; the formulas are semantically bleached, just as Jespersen predicted a hundred years ago.

## [1.3] Objective

The intention of this article is to investigate the different types of cursing in the two diverse cultures and languages of Gurage and Norway. We attempt to find out what is different and what is similar between those two traditions, and discuss whether the similarities might be universal for this special type of linguistic expressions.

The study presents our attempt to document some of the cursing vocabulary in the two languages and cultures, to show its sociolinguistic and pragmatic rules, and concludes with a short summary of the cursing in those two languages and cultures. In general, our main idea is to provide an account of cursing expressions in the Gurage and the Nordic culture and to describe their pragmatic functions. This has the following two specific objectives:
(i) to record the vocabulary for cursing in the two languages, to explain the way cursing expressions are used in different contexts and situations of language use, and to uncover the various functions they have; and
(ii) to map out specific patterns in the cursing expressions in Gurage and Norwegian.

## [1.4] Significance

The study will be significant in accounting for the development of the language of cursing, through documentation of the various socio-cultural and pragmatic meanings of cursing used by different social groups: male, female, youngsters, elders, etc. The findings of this comparative study, in the Ethiopian and Norwegian contexts, will contribute to the field of pragmatics and anthropological linguistics in general. The comparison of cursing vocabularies might even indicate some universals in the functions of cursing. Documentation of the vocabulary of cursing will also be a resource for dictionary making, where such vocabulary often is neglected.

## [1.5] Methodology

The study follows an eclectic and practical research methodology. The vocabulary used in the article is collected in different ways. Linguistic elicitation and texts on cursing are used to find the Gurage examples. The Gumer variety, among other 12 dialect clusters, was chosen because the dialect is least studied. Four informants were asked to reproduce some cursing expressions, two males and two females, aged $25-65$ years. The participants were interviewed on the topic of cursing and their responses were audio and video recorded, which subsequently were transcribed as text. The text was glossed morpheme-bymorpheme and then transliterated into English.

The Norwegian examples have been manually collected through observation and scrutiny of literature, newspapers and electronic text corpora. Through several years of language counselling, the vocabulary has been recorded, systematised and presented in Fjeld $(2002,2014)$, while some of the vocabulary was obtained from several articles of cursing in the Nordic literature, e.g. Stroh Wollin (2014), who has investigated cursing vocabulary in Swedish dramas through 300 years. Systematic investigation of dictionaries, especially Bokmålsordboka (Wangensteen 2005), and existing lexicographical collections of slips at the University of Oslo has been manually investigated.

## [1.6] Definitions and state of the art

Cursing can literally be defined as breaking a linguistic taboo with the intent to invoke harm on another person (Fjeld 2014:200), as cited in Jay (1992:2):
curse (vt): to call upon divine or supernatural power to send injury upon.
curse ( n ) a prayer or invocation for harm or injury to come to one.
In general, cursing is a bad wish for someone else (alter-cursing) or for oneself (ego-cursing). It is the use of language by a speaker to cause fear, an intended harm, by the very power of the language used, to an interlocutor or a self. This intended curse to self and others can have several pragmatic functions, depending on socio-cultural settings.

According to Jay (1992), words for cursing get their power through religious or social demarcation. Cursing implies danger for the speaker and has the function of transferring attention from the speaker to the target of the curse.

Wyss (1984:17) classifies curses as a magical or a prophetical speech act, and says that a curse is the negative counterpart to a blessing. A curse also implies a release of affectivity. Wyss further writes that cursing may occur as:

Affektentladung im weitesten Sinn, als Unheilswunsch, als ritualisierte Verdammung (Bann), als Fluchzauber und als Fluchgebet, ausgesprochen oder auf Tafeln geschrieben.
[emotional release in the broadest sense, as the wish to bring about misfortune, as a ritualised damnation (ban), as a cursing spell and as curse prayer, spoken or written on boards.]

A curse can be performed by an individual against an individual or a group, and by a group against an individual or a group. The supernatural power is attached to gods, deities, and other spirits who may have power to cause harm to the cursed.

There is so far little literature on cursing in Ethiopian languages, but we have consulted two works on cursing on the topic: Baye (2013) that compares cursing expressions in four Ethiopian languages: Amharic, Oromo, Wolayitta and Nuer, which belong to the Semitic, Cushitic, Omotic and Nilo-Saharan phylum, respectively. His findings showed that there are convergences conceptually and linguistically among the four languages' cursing expressions, as well as in the expressions of greetings (Baye, 1997).

Tesfaye (2012) describes self-cursing expressions used by women in the Kistane variety of Guragina. It is found that self-cursing is used to encourage, admire, condole, congratulate, and express politeness in greetings. This study does not deal with group cursing and individual cursing addressed to others.

There is a more comprehensive literature documenting cursing expressions in the Nordic languages, especially for Swedish, such as Ljung (1984). One of the earliest studies was Jespersen (1911) for Danish and Fjeld (2002) for Norwegian. However, most works have been unsystematic and have not tried to explain the functions or the meaning of the general vocabulary of cursing in a scientific way, cf. Fjeld (2014:199-202) for an overview of definitions and types in Nordic cursing.

A comparison between Ethiopian and Nordic cursing may thus give other perspectives on the pragmatics of cursing,

## [2] RESULTS

There can be several causes for cursing, e.g. neurological as in brain damage, emotional arousal, psychological as in deviance, religiosity, moral reasoning, coping skills, and sociological, such as formality, intimacy, taboo, privacy, gender role (since particular gender groups have to curse, for example, themselves for various purposes) and disgust. We shall not go further here into every possible explanation, but will instead focus our results with reference to some so-
cial variables, where gender is prominent in the comparison between Gurage and Norwegian.

We shall group our analysis into ego and alter cursing (cf. Fjeld 2014:206) because the Gurage people do curse themselves and others with different pragmatic functions from those in Norwegian. Finally, we discuss these findings in the form of a summary.

## [2.1] Self-Cursing

Based on the gender of the participants who curse themselves, we can group self-cursing in Gurage into two types: those practiced by both gender groups (male and female) and those practiced only by females. There is no type of selfcursing only practiced by men.
I) Self-cursing by men and women

Both men and women tend to curse themselves in different situations. The examples below show some cursing expressions which may be used by both gender groups:
(1) agrə-na tə-t-səppərə
leg-Poss ${ }^{2} \quad$ COND-PASS- break s-3sg
'Had my leg been broken'

This means 'instead of being here by travelling with my legs, it would have been great if my legs had broken so that I might not have come to see or do such a horrible thing'. This is a desiderative expression of cursing, whereby the speaker curses his/her leg that brought him/her to a place where an undesired thing happened to himself or someone else. It is an expression of regret for an unpleasant action or situation through self-cursing.

A similar desiderative kind of self-cursing is given in (2) below:

[^39]$\begin{array}{ll}\text { (2) } & \begin{array}{ll}\text { mot } & \text { t-osad-e } \\ \text { death } & \text { COND-take 1SO }\end{array}\end{array}$
'It would have been great if death
had taken me'
These kinds of self-cursing expressions, in this case wishing bad for oneself, may be made by male, or female, youngsters or adults in regret about a bad thing that happened to themselves, to loved one(s), or because they have seen or done something unpleasant or terrifying to others.

In Norwegian a typical self-cursing formula would be Søren klype meg (may Søren pinch me), as a mild self-curse, where Søren is an euphemised form of Satan, and to pinch is a mild way of expressing what he might do. A more severe kind of self-cursing would be Det er faen $i$ meg helt sikkert (May the devil take me if this is untrue), as a reinforcement of the truth value of a statement (cf. example 21a for Gurage).

Both types might be performed by modern men and women, but traditionally the euphemised form is typically female and the severe one is a typically male cursing formula.
II) Self cursing by women only

Self-cursing in Gurage is performed by women in most cases. Men do only selfcursing in exceptional cases, such as to express politeness or show that they are down to earth, like a woman. Women curse themselves in several situations and contexts to express ranges of contextual meanings. It is also worth noting that mothers (elderly women) curse themselves more often than girls. The most common self-cursing expressions of women and the contexts in which they are used can be categorised into six functional sub types, as presented in the following:
i) Encouragement

Mothers curse themselves to encourage their children to perform or do certain things, as in the example in (3):

| (3)ika-w- $\int$ adz-əna | afər |  |
| :--- | :--- | :--- |
|  | like-cOP-FOC | hand-1S.POSS |$\quad$ soil

This means 'you are doing very well, go ahead with doing the job'. This selfcursing can also be made when a child tries to do something but actually does
not manage it. The child is encouraged to do it again by boosting its moral, as for example to take a bitter medicine (cf. Leslau 1968; Tesfaye 2012 for Kistane).
(4)

| afər | ni-bra |
| :--- | ---: |
| soil | 1s-eat |
| 'Let me eat/ | drink soil' |

Metaphorically, such a curse means 'let me die,' but its function in the discourse can be a response for a child's speech, for example 'I am hungry', or when a child is eating with good appetite, and is about to finish the food; hence, the mother wants to offer the child some additional food. Similarly, afornist'e can be used to encourage a child to drink, if it has finished the liquid; hence, the mother feels that the drink was insufficient, and she wants to give it more. The context, therefore, determines the actual intended meaning of the cursing phrase used by the mothers.
ii) Admiration

Women may curse themselves to admire or thank somebody, often their children, as in the examples below:

| ads-ana k'ut' <br> hand-poss shrink | ja-bar |
| :--- | :--- | :--- |
| 'Let my hand get shrunk' | be-say |

The expression 'let my hand get shrunk' can mean you did great or 'thank you for your good job'. Thus, it has actually nothing to do with a shrinking of a hand.
(6) amf-əna afər jə-hir
mouth-poss soil 3s-happen
'Let my mouth be soil'
In (6) the intended meaning is 'wonderful, you spoke the truth ' or 'you replied with the right response', so the self-cursing does not necessarily mean a wish for the woman's mouth to die and thereby turn into soil, since a person dies in whole, not in part - for example just a mouth.
iii) Condolence

Women use self-cursing to express their condolence to the addressee in a conversation about losing property, getting hurt, missing a beloved, etc. The fol-
lowing are some examples of such expressions:

(7) | ija | ni-k'i |
| :--- | :--- |
|  | me |$\quad$ 1s-lose

This means that the addressee has lost something or someone, e.g. a child has escaped from his village and his whereabouts is not known, or someone has died, etc. The speaker, thus, expresses her condolences by cursing herself. The verbs used as cursing are based on the malefactive or the adverse circumstance that happened to the person spoken to (addressee).
(8)

| ija | ni-frat' |
| :--- | :---: |
| me | 1s-get.blind |
| 'Let me be blind' |  |

This implies that the addressee's beloved or child has become blind due to illness or an accident, hence, the speaker is expressing her condolences by cursing herself; actually, wishing that the bad circumstance had happened to her (the speaker) instead of to the addressee or the addressee's beloved.
iv) Congratulation

Self-cursing can be used to congratulate, particularly women when they give birth to a baby as in (9):
(9) jə-mbuw-ən jə-sət'-in
let-split-1s let-split-1s
'Let me be split'
This is emphatic cursing whereby a woman visiting another woman who gave birth to a baby curses herself saying 'may I be split like wood, and further be split into pieces the same way your body, particularly your organ with which you delivered a baby has split, and is causing you severe pain'. Such selfcursing actually is an expression of congratulation. The cursing is made only once, on the first visit of the woman who has given birth. On the other visiting days, the visitor says:

| (10) | marjam | ta- t 'awdi- hj |
| :--- | :--- | :--- |
| You, woman who gave to a birth-voc | marry | let-chat-2SF |

The expression in (10) is more a kind of wish than a congratulation. It is even not a self-cursing. In the Gurage culture, a woman who has given birth to a baby has to stay at home for two months; hence, during this seclusion period she feels lonely, as nobody stays with her except her baby. That is why visiting women wish her merry to chat to her during the periods of her loneliness.

Men can also use the same phrase 'let merry chat to you' on the second or later visits, but they do not use self-cursing either in the first nor second visits. They would rather use the following phrase:
$\begin{array}{lll}\text { (11) } & \text { gweta } & \text { atənəfə-nahj-i-m } \\ \text { God } & \text { save-2SF-BENF-PST }\end{array}$
This men's congratulation assumes the meaning that 'it was possible for you to die during delivery, but thanks to God who saved you'. So, men congratulate by expressing God's mercy instead of cursing themselves.
v) Communicate Politeness

Self-cursing is used to express politeness in welcoming, saying goodbye, asking for information or directions, etc. Each of these contextual meanings of selfcursing is exemplified below:
a) Welcoming:
(12) ja-tən-bi

3SM-come-mALF
'let it come onto me'

| b-afər | ni-ta-n |
| :--- | :--- |
| on-soil | 1s-come-1so |
| 'let me come on soil' |  |


| mot | bəfwər-əna | jə-tə-n |
| :--- | :--- | :--- |
| death | back-poss | 3s-come-3so |
| 'let death come on my back' |  |  |


| (15) | kisfət |
| :--- | :--- |
| rogue | ja-tə-bi |
|  | 3sm-come-MALF.3so |

'let a rogue come onto me'
All the welcoming phrases in (12-15) contain self-cursing. In (12) 'The self-curse refers to an indefinite bad thing to come adversely to the speaker, in (13) afar 'soil' is metaphorically used as 'death;' hence, the speaker is wishing death to come against herself; in (14), mot 'death' is expressed overtly, unlike in (12) and (13), so the woman is wishing the killer, death, sometimes referred to as zilel, to come and kill her. In (15), the woman curses herself for an unspecified rogue to come and affect herself negatively. The extent the woman cursed herself with words expressing different levels of adversity inversely express the degree of love or affection she has for the guest or addressee who is welcomed. For instance, ja-tan-bi 'let it bring me adversity' is a less evil curse than mot bafwar-ənajə-tə-n 'let death come onto my back'; similarly, the former expresses less love or affection than the latter. Hence, the guest knows to what extent s/he was welcomed by the welcoming phrases in the self-cursing used by the speaker.

The addressee often responds to the self-cursing, here welcoming, with $b$ $i j a-m$ [onto-me-too] meaning 'let the rogue, death, or whatever evil was mentioned comes onto me (the addressee), too.
b) Farewell

Gurage women consider or at least pretend to view departure, even for a short period of time, as if they will be missing that somebody - a parent, beloved, relative or guest for a long time. In such cases, they use self-cursing as an expression of farewell. A few examples are given below:

| (16) | b-ohe |
| :--- | :--- |
| in-good thing leg-1s.poss soil | agr-əna afər |
|  | 'in a good thing, let my leg be soil' |

The expression in (16) literally assumes the meaning: 'I wish you good things, and let my legs become soil for your benefit'. Actually, the expression means 'goodbye and I wish you all the best things.' The sympathetic cursing phrase agr-anaafar is simply an expression of courtesy.

| (17) | b-afər | ni-wər | hi | b-ohe | k'ar |
| :--- | :--- | :--- | :--- | :--- | :--- |
| on-soil | 1s-go | okay | in-good | thing |  |
|  | 'let me go on soil, okay, in good things' |  |  |  |  |

The phrase in (17) is similar to (16), but here the self-cursing word is stronger than the one in (16) where just the leg is assumed to be soil. In (17) the whole body is expected to be soil (metaphorically to die). The person to whom the farewell was addressed to, responds to the self-cursing expression by saying: ija-m [I-too] meaning 'let my leg be soil, too'/ 'let me be soil too,' which could be transliterated as 'let me die, too'

Men often say goodbye without cursing themselves. Hence, they may use other farewell phrases like:

| b-ohe | k'ar/zənga | b-ohe | ni-trahəb-nə |
| :--- | :--- | :--- | :--- |
| in-good | thing | in- good | 2PL-meet-2PL |
| 'in a good thing'/ 'let us meet in good' |  |  |  |

A male's farewell; thus, is a wish of peace on the way to the destination and/or a wish to meet the person again in peace and health sometimes in the future.
c) Polite request

| bafa-h-o | Sim-ahə | mwan-u |
| :--- | :--- | :--- |
| ailment-2SM.POSS-voc | name-poss | who-cop |
| your ailment, what is your name?; 'Please, tell me your name' |  |  |


| bafa-hj-o | ja-darsamo | bet | et-ata-w |
| :--- | :--- | :--- | :--- |
| ailment-2SF-voc | GEN-Darsamo | house | which-one-cop |
| 'your ailment, which one is Darsamo's house? |  |  |  |

In the examples in (19-20), bafaho 'please (M)' and bajahjo 'please (F)' are used as a polite request, although bafo literally means disease or ailment and $-h$ and $-h j$ show the possessive forms of 2SM and 2SF, respectively. Saying these polite request words means literally ' let me take from you whatever ailments you may have, but tell me.' It is important that such self-cursing words are used when the speaker is not familiar or acquainted with the addressee.

We can see from such expressions that there are differences in the language use between men and women in the Gurage culture. Men seldom use selfcursing expressions compared to women. To use self-cursing expressions by a man is assumed to make the man 'womanish' and 'powerless'. On the contrary, women's use of self-cursing expression is considered as being down to earth
and polite. Such differences in linguistic power between men and women are common in other socio-cultural groups cross-linguistically (Coates, 1993: 84). The expressions of self-cursing used as greeting show how women in the Gurage culture are selfless in welcoming and saying farewell to guests or relatives.

In Norwegian there are no such codified rules for men and women's use of polite routine formulas, and they will not be counted as cursing at all. For encouragement and admiration there are no fixed formulas, but the speech act of downgrading oneself to upgrade the other, was in the past also customary for women in Norway. Formulas for condolences and congratulations are used in the same way by both women and men, but to show intimacy, women often avoid the standard formulas and rephrase them in a personalised way. This is of course also allowed for men, but many men would feel this to be a female style; hence, they prefer to avoid it. As far as we know, the use of such formulas by different genders and other relevant social factors has not been systematically investigated in Norwegian. The standard expression for greetings is god dag, morn or hei, and for goodbye is adja, morna or ha det (bra). The phrase for condolences is kondolerer, but has long time been out of use by most people, and is still seen as a very formal way to show compassion. More personalised phrases are jeg foler med deg (I am so sorry for you), det var så trist å høre (this was a very sad message). Such rephrased and personalised condolences are more often used by women.

## vi) Self-cursing to persuade

Self-cursing is also used to build trust rather than to harm someone else. Such a cursing may be used by children and adults of both genders, to convince or persuade the addressee about the truthfulness of an issue under discussion. A few examples of such persuasive self-cursing are given below:

$$
\begin{array}{llc}
\text { a. } & \text { timirt-əna } & \text { e-glət'-ni }  \tag{21}\\
\text { lesson-Poss } & \text { NEG-reveal- BENF } \\
\text { 'let my lesson not be revealed' }
\end{array}
$$

b. adij-əna t-imut
mother-poss 3SF-die
'let my mother die'

In (21a) the speaker is cursing himself/herself to persuade the interlocutor by
saying: 'if what I am telling you is not true, or if I am making lies with regard to what I said, let God not make my lesson clear or let me be stupid by the power of God'. Similarly, in (21b) the same meaning is assumed: 'if I am deceiving you or making a lie, let my mother die to my adversity'. Persuasive self-cursing is more like an oath, except that it is not performed officially in the presence of witnesses, which is the case for an oath.

Self-cursing in the Gurage culture is also used in the form of oaths: to promise that what has been agreed upon between the addresser and the addressee will be kept or fulfilled. This promise is also a sort of persuasion about actions that have not yet happened, but may happen in the future. An example of such self-cursing is given in (22):

| bə-hədak-ə | afja-na | jə-hd-e |
| :--- | :--- | :---: |
| cond-betray-2SM | health-poss | 3Sm-betray-1so |
| 'If I betrayed you, let my health be betrayed' |  |  |

Here in the self-cursing delivered as an oath, the speaker assures his interlocutor that he will not betray the addressee; she/he is affirming with words that 'I promise you that I will respect my own words'. She/he adds, 'If I betray you, let God betray my health or make me sick'. Since deviation from the promise is believed culturally to cause ailment to the person who gave the oath, it is an assurance that the speaker will keep his/her words.

This kind of self-cursing in Gurage is equivalent to Norwegian self-cursing, which often is formed as a pledge to the devil or to other bad powers, as an oath: Det er faen i meg helt sikkert! (May the devil take me if I lie!)

Historically such direct cursing was only used by men - women had to euphemise their oaths also, like Søren brodere meg! (Søren may embroider me!) (Søren as the nickname for Satan)

Both these oaths have an implicit premise for the promise: 'if this is not true/good/going to happen'. Children are normally not allowed to say such curses, but just to express the nick name of Satan would be accepted ${ }^{3}$.

## [2.2] Cursing Others

We shall split the cursing of others into two groups: individual cursing, when a person curses another person or a group, and group cursing, when a group

[^40]curses an individual or a group.
I) Individual cursing

An individual may curse another individual or a group directly in the presence of the person, or in his or her absence. When the cursing is in face-to-face communication, it may turn into insults or into a physical attack of the interlocutors. Due to this, individual cursing is usually made in the absence of the addressee(s) in Gurage, assuming that a supernatural power would listen to the curse and adversely affect the cursed person. The curse is, thus, associated with spirits possessed by people, different deities, gods, etc., which have power over creatures, including human beings. The spirit or deities can, by their power, cause varieties of evils or provide mercy if they are asked for it by the right person, according to the popular belief. The most common cursing spirits possessing deities include: boza 'thunderbolt', dəmuwamuwit 'female deity of fertility' and ank'it 'deity of justice.' A few examples of cursing expressions addressed to individuals are given below:
(23) bozə jərəd-ib-hə
thunderbolt down-MALF- 2SM
'Let a thunderbolt hit you'
In the Gurage culture, the thunderbolt was worshipped and an annual feast was held to pacify the spirit of thunderbolt, since otherwise it might cause harm to the community. Since there was no scientific knowledge or understanding of thunderbolts, the people used to consider thunder as a spirit with emotions of anger that had to be pacified, and this spirit also had a mind to consider human requests and offer mercy.

The cursing in the power of the thunderbolt in (23) is an expression of the same assumption, whereby the curser is wishing the cursed to be hit and possibly die by the thunderbolt's power. A similar instance is cursing with dəmuwamuwit, which can usually cause an ailment and may lead to death. The example in (24) shows such a curse:
(24) dəmuwamuwit tì-t'ibt'-ihə

Demuwamuwit 3SF-catch-2SM
'Let Demuwamuwit catch you'
In the same way that you catch 'cold' and suffer from it, Demuwamuit can 'catch you' and cause you an ailment. So, a person cursing another person with this spirit is wishing the person to be caught and inflicted by Demuwamuit's
spirit, so that s/he gets sick and may die.
The third type of spirit often used by married people is ank'it. Ank'it is a spirit of justice which works for married couples. If a partner violates the different rights and responsibilities of the other, for instance, by marrying another person before divorcing the existing partner, s/he may be cursed with Ank'it as in (25):

| ank'it ta-fərəz | ji-badir | ank'it | jə-t'iwt'-in |  |
| :--- | :--- | :--- | :--- | :--- |
| Ankit | from-horse | 3SM-advance | Ankit | 2s-catch- 3SM |
| 'Ank'it advances a horse's speed, let the Ank'it catch him' |  |  |  |  |

Here in (25) the justice spirit is compared to the speed of a horse. The meaning is that the justice spirit will very soon bring the right justice to the victim, provided the ank'it is asked the right question if the curser's right really has been violated ${ }^{4}$. It is worth noting that the curse is only performed if the elders in the community could not bring justice to the victim, or the person who was supposed to have violated the rule has denied that s/he did so.

In Norwegian alter-cursing, the most prominent power is the Christian God: Herregud, så slem du er! (Lord, how wicked you are!), but also the wicked powers and their localisation are often used.) Gi faen! (lit. give the devil = stop this, for Hell's sake) or Dra til helvete! (Go to hell). But even some memorials of preChristian religion can be found in formulas like Det var da et heidundrende leven! (This was a damned/thundering noise), with reference to the ancient god Tor with the hammer who caused the thunderbolt. The standard curse in modern Finnish is perkele, which also has a reference to the god of thunder. Another power is nøkken, the water spirit, which is referred to in curses like Det var da som bare nøkken! (This problem must be a spell by the water spirit!) Altercursing may also be related to sexual functions: Din kødd! (You prick!), or faecal functions: Din dritt! (you shit!).
II) Group cursing

Group cursing is only performed by elder males in Gurage, so gender, age, and social position in the community are important in this regard. Two forms of group cursing are recognized in the Gurage culture, namely:
i) Cursing which begins as individual but ends with group cursing (e.g. jarafibudze)
ii) Cursing in group throughout (e.g. awat $\int^{\prime}$ at $f^{\prime}$ inə )
[4] The gender of both Thunderbolt \& Ankit is masculine, but Demuwamuit is feminine

Cursing in some situations, as in jarofibutye, can be done by an individual, but later a number of individuals gather to curse, in a group, the arəfi an 'evil eyed person'. In Gurage, people believe that persons who are nicknamed derogatorily arəfi 'evil eyed', can harm individuals or a whole society. They can cause a child or animal to get sick, just by their spirit. By looking at an animal or a person, they can make a farmer's harvest less fruitful.

Though such evil eyed people are identified by the community, nobody takes them into court or harms them physically, since it is believed that they often possess the spirit without their own will. However, they can be cursed, so that their power can be weakened and hence cannot cause harm to animate beings and inanimate things. The cursing takes place early in the morning, between 5-6 a.m. Every individual goes out of his house cursing the evil-eyed person with high audible voice. The cursing goes as following:
a. j -arefi budz-e
of- areshi take-3sm
'Let it be taken from an Areshi'
b.

| en-əta | j-awut' ${ }^{\text {e }}$ |
| :--- | :--- |
| eye-poss | 3s-taken.out |

'Let his eyes be taken out'
c. tika-ta ja-budze
child-poss 3s-taken
'Let his child be taken'
The curses in (26) seek to remove the power of the evil eyed, his eyes are taken out so that he may not be able to see the people or the things that he harms, or his child is taken (dead) so that the evil eyed person may feel pain. As a result, he may not harm the children in the community.

Those who are cursing an evil eyed person meet each other as they curse him, and begin to curse the evil eye in groups travelling across the village so that everybody can also listen to the curse while being at home. And the listeners at home also curse, at least by an approving 'Amen!' All the people who are cursing the evil eyed across the street gather and sit together in a place where a group cursing begins. After a while, one person curses the arofi and his belongings, and others approve saying amen 'let it be'. All the elderly male cursers together intone: $\quad$........, as a sign of crying', assuming that their cry would be heard by a super power and thereby weaken the power of the arafi.

Another group cursing takes place in awatf'at 'ins 'investigation'. This is done when someone or a group has stolen a property, killed a person or animal,
burnt someone's hut, but it is not known who he or she is. In such a case, the inhabitants of the village are ordered to inform on the person who did the evil act, or the person himself is urged to confess his act. If either the unsolicited doer or his relatives do not admit to the truth of the case in a predefined time, usually between two weeks, the elders will then determine that the person and/or all his tribes will be cursed in public, as a means of both detection and punishment if not discovered. The elders announce to the community that the person, who did the undesired act, will be cursed if the person does not report to the elders what he or she has done to the community or to an individual.

Because the people of every tribe fear that the curse will harm them and their descendants, they strive to find out who did the evil act. They try to persuade any of their relatives who might have done it to confess, by promising that they will pay the fine for him to avoid the curse. Due to such a group effort, this kind of cursing happens only rarely. If, however, a clue to the perpetrator is not found, the unknown evil doer is cursed. The cursing may affect the individual, his relatives, and in some cases the cursers themselves if they have made an unjust curse.

Which curses an evil doer may be subjected to, must be agreed upon among the elders before it is done. Elders have to grade the curse according to the level of the evil act performed, similar to an assessment of sentence by the justice in Nordic culture. For instance, it must be decided whether the curse should be performed against the evil doer alone, or against his tribe as well. If his tribe has to be cursed, it should also be agreed upon as to how many lines of descents should be affected. After agreement as to the type of curse is reached, one more week is usually given to the community to consider how serious the issue is, before they subject the cursee to the actual curse on the cursing day. Most often, the people do inform on the evil doer before the cursing day and then negotiations begin. However, in very unfortunate circumstances the cursing does take place.

A thief who has stolen something, and, a murderer who has killed someone, will not be cursed in the same way. The vocabulary of cursing in Gurage for these two types of acts are completely different. During group cursing, one of the elders guides the cursing and the others follow. Some examples of group cursing include the following:

$$
\begin{array}{llc}
\text { a } & \text { jə-zəna-n } & \text { e-rma }  \tag{27}\\
& \text { GEN-sow-3SM } & \text { NEG-grow } \\
& \text { 'Let what he sows never grow' }
\end{array}
$$


'Let the same evil, as he did to other, happen to him and his seven lines of descendants'

Such curses are believed to have adverse effects, and as the curses include the relatives of the cursed, they will also be affected by whatever unfortunate circumstances: sickness, death, being poor, being struck by a thunderbolt, etc. are associated with the curse that was made. Due to these adverse effects, the relatives of evil doer may become upset and less loyal to the perpetrator. As a result, after the cursing has taken place, they may expose the identity of the evil doer. In such instances, the person and his relatives have to pay not only compensation to the victim, but also for a cleansing ceremony in order to re-purify the cursed. The cleansing is undertaken by another person called Wag, who has the power of cleansing the evil, depending on whether he has been told the whole truth regarding the evil done by the individual or a group. The Wag also asks if other similar evil might have been done by their forefathers, which might not have been cleansed. The cleansing ceremony entails a ritual and some kind of payment to the victims, as well as to the ceremony performer. The ceremony seems to have some equivalence to the Christian absolution or remission of sins.

Since group cursing sooner or later causes fear, and because people do not want any evil to happen to themselves, their relatives or descendants, they usually refrain from doing evil, and if they do it, they feel compelled to confess and ask for mercy from the community. Thus, group cursing was used to maintain social order in the Gurage community for many generations. Though this process has become generally obsolete nowadays, a number of rural communities still perform it. The people believe that a curse will bring harm and a blessing success to individuals or a group.

The group cursing in Gurage seems to have much in common with what was called bann in traditional Nordic culture, which also has given the etymology of the Norwegian word for cursing, banning (Lindeman \& Bjorvand, 2000:128). Wyss (1984:17) also counts ban or excommunication as what he describes as ritualised cursing. It is not practised in modern Norway, but in ancient times it was a way to exclude an unwanted person from social society where he or she had shown unwanted behaviour.
[3] SUMMARY
[3.1] Cursing vocabulary in Gurage and Norwegian Cursing
Cursing in both Gurage and Norwegian culture is part of the general language used in several types of discourse. Although if taken literally, cursing is said to be the use of bad words to harm, downgrade, humiliate or cause pain to others or oneself, their use in Gurage in practice shows that they may not necessarily express bad things or cause pain to the addressee.

Our study showed that in Gurage, cursing, particularly self-cursing by women, is used as a means of expressing positive speech acts such as encouragement, admiration, congratulation, politeness, farewell, condolence and persuasion. Self-cursing, besides the expression of regret, can express all sorts of emotive, desiderative, imperative or declarative acts.

The findings for Gurage in this article are in accordance with Baye (2013) and Tesfaye (2012) with regard to conceptual convergence of cursing expressions among most Ethiopian languages.

The study showed that the main cursing vocabulary in the Gurage culture are words like afor 'soil', implying death, and spirits, such as dəmuwamuwit, ank'it and boza. The most common fear-causing agents and the various functions of cursing expressions in Gurage are summarised thematically below:

| Genre | Addressee | Functions | Insult/curse agents | What is insulted |
| :---: | :---: | :---: | :---: | :---: |
| cursing | self | Regret, encouragement, admiration, condolence, congratulation, politeness, persuasion, promise | Soil (death) <br> Death spirit <br> (zilel) <br> Disability | Body parts: leg, hands, eyes, teeth, sex organ; genetic line: tribe, race; property: animals, plants, etc. |
|  | others | Exorcise evil, detect evil doers, impose fear | Spirit: Demuwamuit, Bozhe, Ank'it | Whole body, soul, descendants |

TABLE 1: Various functions of cursing expressions in Gurage.

Structurally, cursing expressions mainly assume the jussive mood. Socially, expressions of curse are gender sensitive. There is cursing of women and men.

For instance, women do curse themselves but men generally do not. In a group cursing only men, often the elders, take part, but not women. Semantically, the cursing expressions are often metaphorical extensions, and are pragmatic in that they are context sensitive, which can be interpreted based on sociocultural contexts and social relationships between the interlocutors.

Similarly, Norwegian cursing vocabulary might be summarised as shown below:

Genre \begin{tabular}{ccccc}

Addressee \& Functions \& | Insult/curse |
| :---: |
| agents | \& What is cursed <br>

\hline cursing \& self and <br>

others \& \begin{tabular}{c}
persuasion, rein- <br>
forcement of truth <br>
value, promise, emo- <br>
tional release like sur- <br>
prise, disappointment, <br>
anger

 \& 

Devil, Hell, God, <br>
Christ and his <br>
mother, Heaven, <br>
thunder, water <br>
spirit, sexual activ- <br>
ity, sex organs, <br>
faeces

 \& 

Often a person-
\end{tabular} \& <br>

\& \& \&
\end{tabular}

TABLE 2: Norwegian cursing vocabulary.

## [3.2] Similarities and Differences between Gurage and Norwegian Cursing

The aim of this article was to map similarities and differences between Gurage and Norwegian cursing. We assumed that language and culture in Ethiopia, in the middle of the African continent, is quite different from language and culture in the Nordic countries, since these cultures probably have had no direct influence on each other. But in spite of this, we found that there are several similarities in the pragmatics of cursing, and also some interesting differences. We shall therefore try to make a comparison of the cursing formulas and their functions in these two societies.

The Nordic countries are counted as the area where Scandinavian languages are used as mutually understandable language variants in the North West area of Europe: Norway, Sweden and Denmark, with a few references to Finland. Across the Scandinavian language area there are more or less the same cursing vocabulary and pragmatic rules for use. The cursing traditions in the area are relatively well documented, and can serve as a contrast to the less documented cursing traditions in the Gurage area.

It seems that the understanding of cursing is broader in Gurage than in Norwegian culture, which might explain some of the differences between the two cultures' cursing practice. Our definition of cursing is the use of language by a speaker to cause fear by the very power of the language used (cf. section 1.6). According to Fjeld (2002:153), cursing is also breaking a linguistic taboo in general, and it also requires a belief in supernatural powers to execute the bad wishes expressed in the taboo.

This means that greetings and other linguistic politeness also refer to supernatural powers. In Gurage this still implies explicit and active knowledge by the users, as in fact was also the case in Norway in ancient times. Most greetings and polite routine formulas refer to God and his power (as is still seen in the French adieu and the German Grüss Gott!)

This is supported by the Norwegian heritage word for cursing, which, according to Lindeman \& Bjorvand (2000:57) has an etymology that indicates a link between cursing - banning - and praying - be en bønn. This etymological relation indicates that these two speech acts, to say a prayer or to say an imprecation, might have been two sides of the same action: calling upon witchcraft for the good or the bad by means of breaking a linguistic taboo, cf. Wyss (1984:17), who calls a curse a negative blessing.

On the other hand, it seems that Gurage cursing still has this general function of regulating the society, for good and for bad. This is made very clear in explaining the functions of the group cursing, where the elder men in the society decide upon punishment for bad deeds and other unacceptable behaviour. However, in the Mediaeval Period, the same kind of group cursing took place in Norway, when a person did a crime or something unacceptable, he could be excommunicated or banned (bannlyst) which meant to be excluded from the church, and consequently from the entire social society. Such punishment was a very strong way of regulating people's behaviour, and was extremely important during the Catholic Church-era in Norway, from the advent of Christianity in 1030 until the Reformation in 1537. Such banning is, however, not the earliest known cursing in the Nordic culture, since wherever there are linguistic traces, cursing formulas are mentioned. Cursing formulas are found dating back to pre-Christian times, on runestones (e.g. Björketorp in Sweden, 6th Century), or in Egil's saga (dated back to 1240 AD ). All of them involve words, written or said, that have some kind of magic power (Fjeld 2014:203).

The pragmatic functions of excommunication were in ancient times to punish the breakers of social rules and laws, in order to regulate society, all in accordance with the functions presented in the Gurage language. The punish-
ment was either related to the religion or a wish for the cursed person to catch a bad illness. Since the knowledge of diseases was poor, an explanation for catching them had to be found outside of the individual itself, in unknown or supernatural powers. Hence, sickness was seen as a kind of witchcraft, or explained as a punishment for the sick person's sins or breach of taboos.

Several of the cursing expressions in Norwegian are incomprehensible or at the best obscure to modern users, but they are still in frequent use. Some are nowadays seen as non-taboos, like pytt pytt! The formula refers to the pond of fire burning with brimstone in purgatory, which means it had a cursing function before its change in form, and its modern meaning is 'don't bother' or 'never mind!'. The formula is often completed by the contracted phrase which means 'he said', sa'n (often assimilated to one word, pyttsann). In this way the curse is made into a citation, which makes it less dangerous to utter, since the person cited was to blame, not the one who uttered the formula. In this case, the citation refers to the Bible and the words of God (the Book of Revelation $20: 10$ ). Generally the Bible and especially the second commandment has been the most important source for Norwegian cursing up until modern times. The other source was the evil powers, e.g. the devil, the thunder god (Tor with the hammer), the trolls or other supernatural powers as the water sprite.

Since the Medieval Period, references to breaking the rules in the Christian religion has been the most frequent type of cursing, especially naming God in vain.

A special type of cursing was breaking taboos related to certain words to avoid bad luck. Fishery was an important source of income for many Norwegians living at its long coast line. A person in a fishing boat was prohibited from mentioning many words, such as the priest or livestock animals. Fishermen had to use nicknames like lang rompe ('long tail') for the cow and kvit kraje ('white collar') for the priest in order to have fishing luck. If you did not, you would have to leave the boat, since you also spoiled the luck for the other fishermen (Grimstad 2011:10). Such belief in the supernatural power of certain words has been active up until late the late 19th century.

Most cursing in modern time in Norway is still related to Christianity, in the form of appeals to the good or the bad powers presented in the Bible. But in the last few years, words for sexual activity and faecal matter are becoming more frequent in cursing formulas, probably because of influences from AmericanEnglish culture. Another reason might be the general profanation of the modern society. To break a commandment from a religion that you do not believe in has little or no power, apart from the social condemnation, which the curs-
ing person is obviously trying to challenge.
In our time, cursing is now more to be counted as a result of individual reactions, as expressions of pain, anger or helplessness, functioning as a kind of psychological safety valve or relief.

Both in Gurage and Norway, there are two main directions of cursing, the self-cursing and the cursing of other, called ego-cursing and alter-cursing (cf. Fjeld 2002), respectively. Nordic cursing formulas like Det er faen i meg helt sikkert ('damn me if this is not true'), (lit. The devil may take me if this is not true), or Må lynet slå meg om jeg gjør deg urett! ('May the thunder bolt strike me if I do injustice') are examples of typical ego cursing, and Din forbannede idiot! ('You damned idiot!') or Faen ta deg! (May the devil take you!) of alter cursing.

We can see from our comparison that the conceptions behind the formulas have several common features and references, such as the forces of nature (thunderbolt, sex organs), the good and bad powers (the gods, the devils and everything related to them), and the belief in some kind of witchcraft passing through words.

The main difference between Gurage and Norwegian cursing is that Gurage has special rules for male and female cursing. In the Norwegian tradition, women were not allowed to curse at all, and men should also not harm women by cursing in their presence (Fjeld 2002:163). As late as 1922, the Danish linguist Otto Jespersen wrote that it is unnatural for women to curse. And already in 1911 he wrote that cursing was about to disappear from the language as a consequence of increasing cultural education and its neutralising social effect (Jespersen 1911:40). In practice, however, cursing is now more frequently used than ever in modern Norwegian society, and there is no or little difference between the cursing formulas used by men and women. It seems that most well known cursing formulas are de-tabooised, since they are frequently seen in newspaper articles and heard in television and radio (Fjeld 2014:206).

According to Wyss (1984:17) a curse is the opposite of a blessing. However, if the desire is to curse someone else, in Gurage a bad wish against oneself may mean a good wish towards other persons. In Gurage, the cursing also may be undertaken by an individual or group of people whose language is said to be more powerful, and who is recognised by the community to perform the cursing.

It seems that in the Gurage language, cursing still functions as a common system for general regulation of a society, and other pragmatic functions. In Nordic languages, cursing in modern times has the function of identity construction and also a psychological function to convey your role, or the role you
want to convey, within society. The group alter cursing in Gurage was important in the Nordic countries until the Mediaeval Period, but is no longer operative cursing.

We have, in this article, made some comparisons between the Gurage and Norwegian cursing. An in-depth study of cursing expressions from a comparative perspective in different languages can enable one to establish crosslinguistic typology and draw conclusion as to how people from different cultures and philosophies of life use such linguistic expressions in their everyday lives.

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[^0]:    [1] Note that some of the regional states, such as the Southern Nations, Nationalities and Peoples Regional (SNNPR) state, include close to 56 ethnic groups, yet ethno-linguistic arrangements are only in place at Zonal and Wereda levels.
    [2] The number of speakers mentioned in this introduction is directly taken from the results of the 2007 population census conducted by the Central Statistics Agency (CSA) published in 2008. Newer figures

[^1]:    may differ, as it has been almost a decade since this survey.
    [3] Notice that Ethiopian names consist of the personal name followed by the names of the father and grandfather. Following Ethiopian tradition we have chosen to use the personal names in the references in the text, and to use the personal name as the head word in the list of references. Non-Ethiopian names have surnames as the head word.
    [4] In this volume, Sidaamu Afoo and Hadiyyisa are used as names of the languages in line with the names used by the native speakers.
    [5] It should be pointed out that some Cushitic languages that got a writing system in the 1990's, such as Awngi and Kebena, are written with the Ethiopic script.

[^2]:    [4] The use of [ $\check{\text { s }}$ ] and [ $\check{c}]$ was at one time a marker of political partisanship. Partisans of the Ethiopian People's Revolutionary Party (EPRP) used [č] in the word [innaččənnifallən!], whereas partisans of the All Ethiopian Socialist Movement (AESM) used [̌̌] instead of [č] in the same word, thus [innaššənnifallən!], both meaning 'We Will Win!', an example of politically sensitive language use.

[^3]:    [6] A reviewer questioned why [irm ${ }^{\mathrm{y}}$ ] cannot be taken as a phonemic representation for the SW variety. The fact is that both [ $\mathrm{irm}^{\mathrm{y}} \mathrm{e}$ ] and [idme] are used in the same SW variety, with the latter more widespread. The former is restricted to rural areas, and it is plausible to derive it from the more widespread form, /idme/, as it is less costly and leads to greater generalization.

[^4]:    [7] Substitution of [ n ] by [d] or [t] is also reported about the same word in the Mənz area of North Shewa, which is immediately south - adjacent to SW with which it forms a chain.

[^5]:    [8] A reviewer commented that dəftər 'notebook' is Arabic, originally a loan from Greek, and what seems to be taking place in the standard variety of Amharic is a sound change $/ \mathrm{f} />/ \mathrm{b} /$. This is true but (1) the change is not only $/ \mathrm{f} / \mathrm{>} / \mathrm{b} /$; it is also $/ \mathrm{a} / \mathrm{>} / \partial / ;(2)$ if we take the Arabic loan as a base, one can account for the change of $/ \mathrm{f} / \mathrm{>} / \mathrm{b} /$ in a synchronic or diachronic voicing rule applying to $/ \mathrm{f} /$ and resulting in [ $\beta$ ] in the SV, and with no such a rule applying to (/f/) in SW variety. The rule, whether synchronic or diachronic, is post-vocalic voicing. There are examples of loan words where a similar process takes place. One such example is the English loan word/polis/in which/p/ is weakened to the continuant [f] or becomes voiced, [b], in the SW variety, thus leading to either [folis] or [bolis], both due to the vowel following /p/ in /polis/

[^6]:    [10] The evidence for the presence of $/ \mathrm{h} /$ in such root initial position comes from the corresponding noun /hassab/ 'thought' and /hisab/ 'bill', in which /h/ appears. In the same way, /y/ and /w/ delete leaving their features on the sound adjacent to them.
    [11] [assib] follows the pattern of verbs known as type ' $B$ '. These are verbs that geminate their medial root consonant in both the perfective and imperfectve aspects, and insert the epenthetic vowel in the position preceding the last root consonant (Cowley, 1969). [issab] also follows the same pattern of type B verbs in geminating the medial root consonant, but it differs in inserting the epenthetic vowel in the position immediately after the deleted initial laryngeal consonant $/ \mathrm{h} /$. In this respect, the verb behaves partly like type A verbs, which shows the aspectual vowel, /a/ in this position. But such verbs do not geminate the medial root consonant in the imperative/imperfective, unlike [issab], which does geminate its medial root consonant, perhaps in compensation for the lost initial laryngeal consonant.

[^7]:    [12] A reviewer commented that the [w] in such forms could be epenthesis in the forms of the SW variety. The suggestion implies the deletion of the stem-final glide /y/ in t'ohay 'sun' and samay 'sky' and the production of bound stems to which the morpheme vowel /-u/ is suffixed. This results in the forms $/ t$ 'əha- $u$ / and /səma-u/, into which is inserted /w/to break up the impermissible sequencing of the two vowels. I see no motivation for the deletion of the stem-final glide /y/ in the first place and the production of bound stems. Secondly, the definite suffix /-u/ is only attached to words such as nouns and adjectives, and not to bound stems.

[^8]:    [1] Although I believe there is a need for further investigation on the phonemic status of $\beta$, I include it in the phonemic chart of consonants.
    [2] The lateral 1 is very rare in Inor.

[^9]:    [4] For $\mathrm{m}^{\mathrm{w}}>\tilde{\mathrm{w}}$, see [5.3].
    [5] The Gə`əz data are taken from Leslau (1991), while the data for Ezha and Chaha are from my own knowledge of the languages.

[^10]:    [1] This article is a modified version of a chapter on tone in my Ph.D. thesis which was submitted to the Department of Linguistics, Addis Ababa University in 2015. Only some data have been added in $\S 5.1$ of this paper.

[^11]:    [2] The Bambasi-Diddessa Mao data are taken from Baye (2006) and Girma (2010). The Ganza data are from my own field note and Smolders (2015).

[^12]:    [3] One might query whether the direction of the derivation is the other way around. In this study, I consider verbs as bases and their nominal counterparts as derivatives of the verbs, because it is possible to add grammatical morphmes to verb roots without adding any tonal element. But it is impossible to add nominal grammatical morphemes to the roots unless we add the root final derivational tones. In other words, before they take nominal grammatical morphemes, they have to be changed to nouns through insertion of a polar tone.

[^13]:    
    H L ${ }^{\text { }} \mathrm{H}$
    'The money'

[^14]:    [2] The categorisation of the tense/aspect categories provided in this study for affirmative sentences still needs further investigation.

[^15]:    [3] The markedness of the third person verb form should be studied further in all verbal paradigms occurring in the language.

[^16]:    [1] These comparative studies include: Tsuge (1996), Fleming (1974, 1976), Bender (2000, 2003), and Moges (2005, 2007, 2015a). Tsuge (1996) presented a preliminary reconstruction of the consonant phonemes of Aroid languages. Fleming $(1974,1988)$ gives the first reconstruction of the consonant phonemes, while Moges (2005) was a description of Hamar pronominals from a historical-comparative perspective and compares the Hamar pronominal system with the rest of Aroid languages. The studies made by Moges (2007) and (2015a) on the historical-comparative Aroid present the reconstructions of the vowel and consonant systems of Aroid languages respectively. These historical-comparative studies have contributed to our understanding of the genetic relationships within the Aroid group and beyond.
    [2] A mutual intelligibility test among the Hamar, Benna, Beshada and Kara groups coupled with a lexicostatistics comparison made to determine the level of intelligibility and dialectal variation between these

[^17]:    groups shows that while Hamar and Beshada are linguistically identical with $100 \%$ lexical similarity, Hamar and Benna are found to be dialects of the same language with some $5 \%$ lexical variations between them (Moges, 2015b).

[^18]:    [3] "Maz" is the name of an age-set group that consists of unmarried young people.
    [4] Sonority scale or sonority hierarchy as given by Durand (1990:210) refers to energy relative to effort. A sonorous sound is one with high output relative to the articulatory effort required to produce it, and sounds can therefore be ranked according to their degree of sonority.

[^19]:    [1] Beside Sabaic, the South Arabian script was used for writing Minaic, Qatabānic and Headramitic - all four are Ancient South Semitic varieties natively spoken in southwest Arabia (Stein 2011:1042; Müller 1994).
    [2] For a historical overview, cf. Phillipson (2009:265; 2011:260-262). Linguistic peculiarities of PseudoSabaic are described in Müller (2007:157) and Drewes (1980).
    [3] The origin of the Ethiopic script is still the subject of controversy (cf. Frantsouzoff 2010:580-581). Azeb (2010:179) mentions three main hypotheses: (i) an original Ethiopian invention, (ii) a gradual transformation of the South Arabian script, or (iii) an independent parallel development of South Arabian and Ethiopic scripts from a common South Semitic script. Only scholars following the Afrocentric dogma (e.g. Ayele 1997) argue for (i), while (ii) or (iii) are commonly found in the literature (e.g. Irvine 1978; Hammerschmidt 1994:317; Daniels 1997:19; Salomon 2000:94; Weninger 2011b:1125).

[^20]:    [4] A once proposed Greek origin for the Ethiopic vowel diacritics is implausible (Dillmann 1857:20 fn. 1).
    [5] Cf. Weninger (2011b:1126) for various hypotheses on the origin of the vowel diacritics.
    [6] Regarding the relationship between the Kharosțthī and Brāhmī scripts, cf. Rogers (2005:chap. 11). For the direction of influence from Brāhmī (or Kharosṭhī) to Ethiopic, cf. Rogers (2005:208); Daniels (1997:24).

[^21]:    7] The grapheme order in Northwest Semitic scripts is completely different from the South Arabian and Ethiopic scripts (Daniels 1997:33).
    [8] The assumption that graphemes with a similar shape are clustered in the Ethiopic script (e.g. Frantsouzoff 2010:582) only accounts for some instances of variation. Honeyman (1952:137-140) and Naveh (2005:51), by contrast, assume that the grapheme order in the Ethiopic script may follow an ancient South Arabian tradition.

[^22]:    [9] Gragg (1997:177) describes ä as "low central front [vowel], higher and more forward than /a/ ...; approximates IPA [æ]" (cf. also Ullendorff 1955:161-165 for a similar view). In Amharic, the vowel $\ddot{a}$ is more centralised, i.e. [e] (Devens 1983), or [3] (Derib 2011). Except $\chi$ (i.e. spirantised k, cf. [4.3]), the vowel $\ddot{a}$ is pronounced as [a] in the environment of the so-called gutturals $h, \hbar, x,\}, \int$ (cf. Podolsky 1991:16).
    [10] In a few cases, word-initial consonant clusters in Gə`əz are dissolved by the prothetic vowel $\partial$, which is
     ing /gzil/ (cf. Gragg 1997:178). The grapheme series based on the syllabograph $\hbar\langle$ ใä $) \sim[2 a]$ is also used to represent word-initial vowels in loanwords from Greek or Latin (cf. Weninger 2005:469-471, 481).

[^23]:    [12] Other script types also occur but are less common, e.g. Akkadian and Eblaite are written in a logosyllabic cuneiform or Maltese in a Roman script.
    [13] According to Daniels (1996:4), previous names for this script type include neosyllabary, pseudoalphabet, or semisyllabary.

[^24]:    [16] The labialised velars marked by ${ }^{\text {a }}$ in table 5 have four additional syllabographs for the vowels $a, i, e, \partial$ (cf. table 4).

[^25]:    [17] According to other scholars, certain syllabographs had already merged in late Aksumite inscriptions (cf., e.g. Bulakh 2014:178).
    [18] This principle was also applied for adapting the Ethiopic script to write various Ethiopian languages after 1991 (cf. especially Meheretu 2006:Chap. 4).

[^26]:    ［19］In Sahle Selassie（1964），the hook was replaced by a horizontal stroke．

[^27]:    [20] For an overview of early research on Ethiosemitic in Europe, cf. Meyer (2011a:1179).

[^28]:    [21] Cf. Hornus (2006:27-64) and Gupta (1994:174-179) for the history of printing in the Ethiopic script.

[^29]:    [24] Cf., for instance, the arguments for using Qubee in Tilahun (1993). Voogt (2014) - in his survey of African scripts developed in the $19^{\text {th }}$ century and later - observes that alphasyllabic scripts are most frequently utilised before World War II, whereas since the 1950s the alphabetic writing has dominated.

[^30]:    [1] The phonetic and phonemic representations of some Amharic vowels are debatable or at least not clear; see (Derib 2011) for a detailed explanation.

[^31]:    [1] Personal communication with Ato Samuel Handamo, Addis Ababa University, Department of Linguistics and Philology.

[^32]:    digraphs (though using the voiceless glottal fricative /h/ as a diacritic unlike the glottal plosive /'/ in the present study) has been suggested by Yri. Similarly, the reduction of shsh to ssh in the present study has also been recommended by Yri for Sidaama but as sysy to ssy (considering sy for sh) (2004: 51).

[^33]:    [4] There could in theory be the name am-sab-o ('who hated mother') but this does not occur, possibly for one of two reasons. Either mothers are not considered as important as fathers or else, hating mothers is unthinkable.

[^34]:    [2] The book was authored by Tadele Tuffa and published in February under the title "Madola malana Dogala"

[^35]:    1] In this article, Sidaama examples are given in phonemic notation following IPA, except that a digraph indicates a long vowel or consonant, according to the Sidaama tradition for indicating length. The phonemic rendering of Sidaama applied here is sometimes different from the one used by other investigators, as it is based on my longstanding phonological analysis, published in Yri $(1990,2004)$ and in numerous later publications.

[^36]:    [2] The reading texts in the grammar are taken from Kachara (2002 and 2003), used with permission from the leader of the literacy project of the Mekane Yesus Church that published the books, Mr. Peter Lanting. They are authored by Kachara Bansa and contain stories from the rural culture of Sidaama. The grammatical explanations both in Sidaama and English are written by the author of this article, who also translated the Sidaama texts into English. (Yaicob Wayu helped with the translation of deesallo in Text 1.) The translation of the texts is a general one, not necessarily in perfect English, but sufficient to convey the semantic contents of the sentences. Morphological glossing is not provided because the aim of the paper is not linguistic analysis.

[^37]:    [3] The explanations and the examples adhere to the standard orthography as a matter of course.
    [4] Both Amharic (through Go'əz) and traditional Sidaama structure the conventional concept of 'sentence' as 'the resting point of the speech/matter'. In other words, the pause between sentences is metonymically extended to represent the material that precedes the pause. In Sidaama this is a translation loan from Amharic.

[^38]:    [1] Professor Yri's contribution is mainly in relation to the Sidaama examples and their translation and analysis.

[^39]:    [2] The abbreviations used in this article are: POSS=Possessive; BENF= Benefactive; COND= Conditional; CONV = Converb. COP= Copula; F= Feminine; FOC= Focus; GEN= Genitive; M= Masculine; MALF= Malefactive; NEG=Negative; O= Object; PASS= Passive; PL= Plural; PST= Past; S=singular; VOC = Vocative.

[^40]:    [3] In a famous Norwegian children's play, Kardemomme by, by Thorbjørn Egner, goods have been stolen from a shop, and a chief constable says: Neimen Sørensen! (But Sørensen!) with stress on the first part of the family name, which was as much as one would curse in this context in the 1950s. Today the euphemised form Søren would also pass in a children's theater play.

