Homogeneity and heterogeneity in lexical stress placement among Ugandan speakers of English as an L2: a view from usage-based perspective

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Abstract

The study delineates divergences that set apart the Ugandan accent from RP with respect to primary lexical stress placement, as well as divergences that evince variability among Ugandans. For example, differences from RP were (almost) homogenously observed in the words *effect, cassava, agreement, arrest, alarm*, with stress placed on the first syllable of all these nouns, while inter-speaker variability was substantially observed in words such as *bursar, further,* with some speakers placing stress on both syllables of the words, while others had the stress on the first syllable only. Analogy and underlying substrate influence account for the divergences, with substrate influence considered along the lines of what Wells (1982) refers to as 'lexical distribution.

Key words: stress; Ugandan accent; homogeneity; interspeaker variability; English.

1. Introduction

One of the important elements of the sound system of a language is prosody. For the English language, stress is a key prosodic element. Katamba (1989: 221) defines stress as: "… a matter of greater auditory prominence." As such, a stressed syllable becomes more salient than the rest of the elements in the same word. This means that stressed syllables are pronounced with a higher pitch and longer duration than their non-stressed counterparts and that they may be somewhat louder than unstressed syllables. The main phonetic ingredients for determining stress are *pitch, length* and *loudness* (Katamba, 1989; Collins & Mees, 2013). Two main types of stress are recognized, namely: *primary stress,* which has the highest degree of prominence carried by all lexical words including monosyllabic lexical words; *secondary stress* is the

second strongest type of prominence and can be identified in selected simple or (morphologically) complex words with at least three syllables, while other syllables are treated as unstressed syllables.

The English language gained its status as an official language in Uganda shortly after the country was declared a British protectorate in 1900; it was thus used in the administration of the protectorate. English has since then been used as a medium of instruction and, thus, is associated with higher education, social status and prestige (Isingoma, 2013; Isingoma & Meierkord, 2016, 2022). It is also used in the judicial system, and immensely dominates written media production. As Uganda is a heterogeneous nation with different cultural units, there are many languages in the country. The country is said to have 65 indigenous ethnic groups and 41 active languages (Namyalo et al., 2016). Furthermore, it is noted that some of these languages are similar in syntax and lexical expressions especially those that fall under related ethnic groups. The notable ethnic groups in Uganda are the Bantu speakers, who are concentrated around the central, southern and the western regions and speak languages such as Luganda, Runyankole and Rutooro (Namyalo et al., 2016). On the other hand, the Nilotic group, which includes the Acholi and the Lango, lives in the north, whereas the Karamojong and the Iteso are in the northeast; one of the smallest language families is the Central Sudanic group, which occupies the northwest part of the country (Uganda Bureau of Statistics, 2016). Due to contact phenomena with the above languages and other second language acquisition processes, the way English is spoken in Uganda has been affected, leading to some differences between British English and what has been termed Ugandan English (Fisher, 2000; Nassenstein, 2016; Meierkord, 2016, Isingoma & Meierkord, 2022). Note that most of the indigenous languages in Uganda are tonal, i.e., where syllables in a word have contrastive pitch specifications, except for Rutooro, which is a stress language (cf. Kaji, 2009).

The pronunciation of English in Uganda has often been measured against Standard British English based on Received Pronunciation (RP) (e.g. Fisher, 2000; Nassenstein, 2016; Meierkord, 2016; Adokorach & Isingoma, 2020). While research into Ugandan English has gained momentum in the last two decades, it is only the four works above that have dealt with or made mention of its phonological features. Specifically, Fisher (2000) simply provides a list of words that are pronounced differently by Ugandans. In a similar vein, Nassenstein (2016) also hints at the pronunciation of English by Ugandans in his paper, which looks at different aspects of Ugandan English at all the major linguistic levels of analysis. Meierkord (2016), on the other hand, expatiates on how Ugandans pronounce English diphthongs. Recently, Adokorach and Isingoma (2020) have provided an elaborate account on the pronunciation of English by Ugandans and have posited that while there are

some phonological features that cut across, there is indeed more than one homogeneous accent among Ugandans due to substrate influence from the different ethnolinguistic groups. However, none of the above studies has looked at primary lexical stress placement, save for Fisher (2000), who simply mentions three words in which Ugandans place primary stress differently from RP. This study, therefore, examines the patterns of stress placement among Ugandan speakers of English, taking into account how those patterns homogeneously differ from RP across the country as well as how inter-speaker variability observable among the four ethnolinguistic groups considered in the study allows for the manifestation of heterogeneous features in stress placement among Ugandans. The four ethnolinguistic groups considered are L1 speakers of Acholi, Lango, Luganda and Rutooro. Note that the first two languages are Nilotic languages, while the last two are Bantu languages. The two language subphyla are the major language sub-families out of the four that exist in Uganda (Namyalo et al., 2016).

2. An overview of primary lexical stress placement in L2 Englishes

Tiffen (1974: 235) reports that, compared to RP, stress in Nigerian English moves away from the first syllable onto the syllable that follows in words such as *in'teresting, u'sually, in'terval, nor'mally,* among other stress shift patterns (see also Atechi, 2004: 41). For Cameroon English, Simo-Bobda (1994: 266ff.) notes that stress moves away from the first to the succeeding syllables as in *bar'rier, sam'my, cu'rative, main'tenance, ten'tative*; it moves away from the second or third syllable to the succeeding syllable as in *attri'bute, embar'rass, collabo'rate, adminis'trative,* and lastly it moves away from one or two syllables backward as in *'extent, 'unlike, 'suspend, Eu'ropean, 'expertise, 'Cameroonians* (see also Atechi, 2004: 41).

In a similar vein, it has been pointed out that speakers of Ghanaian English are said to have a common way of stressing simple and complex words (Lomotey, 2018). Lomotey (2018) observes that Ghanaians apply what is called 'forward stress shift' to the initial syllable of some multi-syllabic words. This means that Ghanaians have a tendency of placing stress on a "syllable later than it would normally be in the case of the native speaker" (p.50). Examples include words such as *appreciate* and *consolidate*, which are said to be pronounced as *appreci'ate* and *consoli'date*, as opposed to the RP pronunciation *a'ppreciate* and *con'solidate*, respectively. Lomotey (2018: 50) also states that Ghanaian speakers of English are also seen to apply what can be referred to as 'backward stress shift' in, e.g. *performance*, realized with stress on the first syllable in Ghanaian English as opposed to the second syllable in RP.

With respect to Ugandan English, only Fisher (2000) has hitherto made mention of primary stress placement in the variety. He reports that the words *committee*, *component* and *comment* are pronounced as *commi'ttee*, *'component*, and *co'mment* in Ugandan English (p.61). This looks like what takes place in West African Englishes (cf. Tiffen, 1974; Simo-Bobda, 1994, Atechi, 2004; Lomotey, 2018), where it has been reported that there are cases of forward and backward stress shift. However, as is clear, Fisher (2000) limits himself to those three words, something that calls for further investigation as to which other words are stressed differently in the country. Moreover, such seemingly impressionistic observations need to be backed up with empirical evidence, an approach that this study has adopted.

So far, we have referred to works that have dealt with features of stress placement that are shared by all speakers of a given L2 variety of English. We should note, however, there is interspeaker variability in a given variety as well. For example, Berowa and Dita (2021: 101) report on the fact that Filipino speakers of English display primary stress doublets in their pronunciation of English. The authors report that it is not uncommon in Philippine English for speakers to produce two pronunciations of, for example, the following words, where both pronunciations are deviations from RP:

RP	Philippine English I	Philippine English II
u'tensil	*'utensil*	*uten'sil*
co'mmittee	*'committee*	*commi'ttee*

As can be seen, for example, while the word *utensil* is pronounced with primary stress on the second syllable in RP, some Filipinos place it on the first syllable, while others place it on the third syllable. Similar observations have been made as regards Ghanaian English, where Lomotey (2018: 46) states that "speakers have different ways of stressing syllables in three-syllable words. For example, the same word may receive stress on the first, the second, or the third syllable", e.g. *'consider, con'sider* and *consi'der*, with one of the pronunciations being RP (*con'sider*).

From the above, we may deduce that distinctive primary lexical stress placement is a feature of L2 varieties of English spoken across the globe. It is also clear that L2 speakers of English display both homogeneity and heterogeneity across their varieties. However, it seems clear that the words where these deviations manifest themselves are not necessarily the same. For example, the word *consider* is pronounced in the Ugandan accent in the same way as it is pronounced in RP in relation to stress placement. In addition, as we will see, there are instances where two instantiations of primary stress manifest themselves in Ugandan English. While this is in line with the observation made by Wells (1982) to the effect that African Englishes use greater syllable force, thereby exhibiting a syllable-timed accent, some sylla-

bles are substantially more accented than others in a word. The current study will shed more light on these particularities.

3. Methodology

Eighty (80) participants were involved in the study, with each L1 (i.e. Acholi, Lango, Luganda and Rutooro) having 20 participants (see Buchstaller & Khattab 2013: 84; Schleef & Meyerhoff, 2010: 9 for assertions on the use of as few as five participants per group in order "to make statistically sound generalizations"). In other words, 20 participants per L1 is a good sample that will allow us to provide a picture of what takes place in each ethnolinguistic group. All the participants were acrolectal speakers of English, i.e. having attained at least 13 years of English education (cf. Greenbaum & Nelson, 1996). These were selected randomly provided their L1s were among the four above and provided that they had attained at least 13 years of English education in order to qualify as acrolectal speakers of English. This category of speakers is considered to be advanced with stable linguistic behavior (cf. Greenbaum & Nelson, 1996), as opposed to speakers who display features of learner English.

Participants were asked to read aloud selected English words: there were words in isolation as well as words in sentences (see Hung, 2000; Adokorach & Isingoma, 2020; Schröder et al., 2021 on the use of word lists). Note that it was necessary to have sentences in order to capture variable stress patterns triggered by word class pairs (e.g. the distinction between *import* as a verb and as a noun). When such words appear in a sentence, the distinction becomes evident, for example: *I will import the device* vs. *The Government has banned the import of alcohol.* In the first sentence, stress falls on the second syllable (*im'port*), while, in the second sentence, it falls on the first syllable (*'import*). If the word *import* had been used in isolation, it would have been difficult to tell where the stress falls. The choice of the words was premised on mainly anecdotal observations on divergences from RP that we had noticed in everyday discourse among Ugandans. We kept on noting down words where there were such divergences in our ethnographic notebooks. Thus, these observations needed to be empirically confirmed, thereby necessitating us to undertake this study.

The recorded data was first subjected to auditory perception. We then compared the Ugandan pronunciation with RP using resources from the audio provisions in entries of the Oxford Advanced Learner's Dictionary-Online. We then established the frequency counts of pronunciation that diverged from RP, as well as frequency counts where there was interspeaker variability along ethnolinguistic lines. We then converted these frequencies into percentages. Ratings of at least 50% were taken to show characteristic

features that are idiosyncratic to the Ugandan accent, or to a given ethnolinguistic group accent, in situations where there was interspeaker variability (see also Buregeya 2006) for a similar treatment with respect to determining thresholds). We also compared the mean of the Ugandan accent with RP using a one-sample t-test, where data was entered into the SPSS software for automated computation, so as to test whether the mean value of the divergences found in the Ugandan accent of English differs significantly from RP as a reference accent.

For data that needed further acoustic analysis, a computer software package for phonetic speech analysis called PRAAT was used. The PRAAT analysis program was introduced by Paul Boersma and David Weenink at the Institute of Phonetic Sciences of the University of Amsterdam (cf. Boersma & Weenink, 2006). It is used to analyze speech and other sounds. PRAAT provides for acoustic analyses of lexical stress using three main parameters, namely pitch, length (duration) and intensity (loudness) (cf. Roach, 2009). The fourth element, i.e. quality (full/non-reduced vowel quality vs. reduced vowel quality), which may also be considered as a parameter of prominence, is said not to be very important (Roach, 2009). Hence, this study does not consider it. In the current study, individual syllables are measured in order to get the duration (in seconds) of each syllable within the targeted word, its intensity, which is measured with values in decibels (dB), and its pitch, which is measured in hertz (Hz).[1]

4. Results and discussion

As described in Section 3, two sets of words were subjected to reading by our respondents, namely twenty-eight (28) words in isolation and ten (10) words found in sentences (i.e., word class pairs, which involve words that share the same spelling but belong to different word classes based on different primary stress patterns). The results for twenty (20) of the words in isolation are shown in the figure below; these will be followed by the ten (10) words found in sentences, while the remaining eight (8) words out of the twenty-eight (28) words read in isolation will be presented later, where interspeaker variability is analyzed.

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[1] There are other units that can be used to measure pitch, e.g. semitones, mel, etc. (cf. Gut, 2013; Styler, 2022). Styler (2022: 19) states that one can use a unit of one's choice to measure pitch using PRAAT. Following Edmunds (2009: 58), we chose *hertz* for the current purpose of the study.
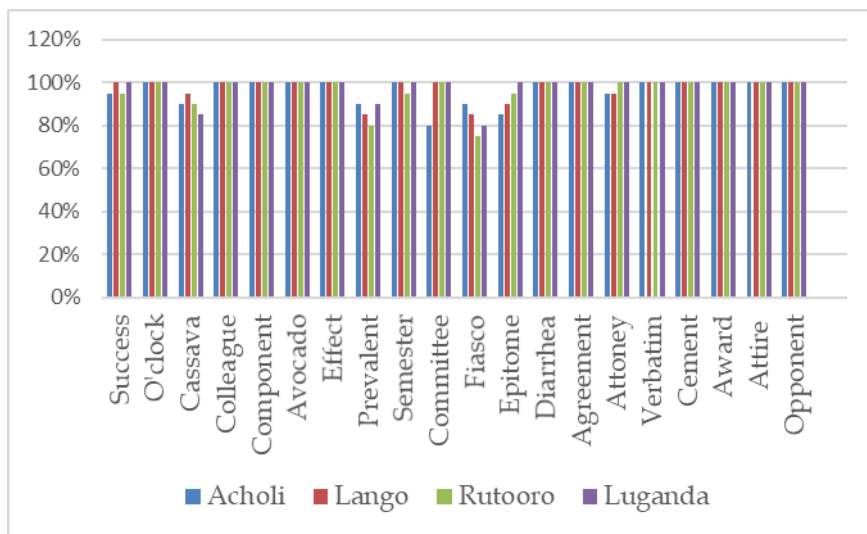
Figure 1: Occurrences of stress patterns among Ugandan speakers of English

As displayed in Figure 1, all the respondents from each of the language groups obtained proportions of deviations from RP above 75%. Thus, despite having the four ethnolinguistic groups, the analysis here does not concern the variability between speaker groups, as it is not substantial. Nevertheless, the presentation in Figure 1 still involves the four different ethnolinguistic groups in order to show that these deviations are not restricted to a given ethnolinguistic group; rather, they cut across all of them. Remarkably, words such as *o'clock, colleague, diarrhea, component, effect, avocado, verbatim, cement, attire, opponent* uniformly got the highest score (100%) of deviations, while the rest ranged from 100% to 75% for given speaker groups. Using a one-sample t-test, we found out that the deviations were statistically significant: p = 0.000. This means that the divergences between RP and Ugandan speakers of English are substantial enough as far as the words under consideration in the study are concerned. The fact that some words did not attain 100% of deviations indicates that there was some level of convergence with RP. Such words are *success, cassava, prevalent, semester, committee, fiasco, epitome* and *attorney*. This modicum of sporadic convergence with RP involving the above words could be attributed to the fact that individual participants might have been exposed to RP stress placement on such words from various sources such as soccer (especially Premier League), the BBC or movies.[2] We should remember that there is also exposure to exonormative teaching

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[2] We are also aware that there are more commonalities between varieties of English than there are differences (cf. Atechi, 2004). This study, however, is not concerned with commonalities per se.

models based on British English (cf. Meierkord & Isingoma, 2022; Isingoma & Meierkord, 2022), even though this is usually hardly achieved, especially with regard to pronunciation. However, some teachers of English are able to do this and insist on exonormative orientation (see, e.g. Isingoma & Meierkord, 2022 on the role of exonormativity in Ugandan English).

Table 1 below shows how Ugandans pronounce the words in Figure 1 above. Note that the transcription for the Ugandan accent used here follows the sound patterns as provided by Nassenstein (2016) and Adokorach and Isingoma (2020).[3]

Table 1: Patterns of stress placement among Ugandan speakers of English

Word	Ugandan Accent	RP
success	/ˈsakses/	/səkˈses/
o'clock	/ˈoklok/	/əˈklɒk/
cassava	/ˈkasava/	/kəˈsɑːvə/
colleague	/koˈliːg/	/ˈkɒliːg/
component	/ˈkomponent/	/kəmˈpəʊnənt/
avocado	/ˈovakedo/	/avəˈkɑːdəʊ/
effect	/ˈɪfekt/	/ɪˈfekt/
prevalent	/prɪˈvalent/	/ˈprevələnt/
semester	/ˈsemesta/	/sɪˈmestə/
committee	/komɪˈti/	/kəˈmɪti/
fiasco	/ˈfɪasko/	/frˈaskəʊ/
epitome	/ˈepɪtom/	/ɪˈpɪtəmi/
diarrhea	/daɪˈorɪa/	/daɪəˈrɪə/
agreement	/ˈagrɪment/	/əˈgriːmənt/
attorney	/ˈatoni/	/əˈtɜːni/
verbatim	/ˈvabatɪm/	/vɜːˈbeɪtɪm/
cement	/ˈsement/	/sɪˈment/
award	/ˈawad/	/əˈwɔːd/
attire	/ˈataɪa/	/əˈtaɪə/
opponent	/ˈoponent/	/əˈpəʊnənt/

As can be observed in Table 1, there is a clear shift of primary stress, from where it is supposed to be in RP, to a different syllable. For example, while *success* has its primary stress on the second syllable in RP, it has its stress on the first syllable among (most) Ugandans. At the same time, whereas *effect* requires stress on the second syllable in RP, all the Ugandan speakers of

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[3] The transcription for RP in this study follows current developments in the variety, where /æ/ has been replaced by /a/ (cf. Adokorach & Isingoma, 2020, following Upton, 2004 and Ježek, 2012).

English in the study realized it on the first syllable. Generally, the tendency observable among Ugandans is the backward stress shift (as in both *success* and *effect*), with the majority of the words, which are nouns, having the stress placed on the first syllable save for *diarrhea,* whose stress is back-shifted to the second syllable. However, two nouns have forward-shifted stress (*colleague, committee*); the other word with forward-shifted stress is an adjective (i.e. *prevalent*), while the adjective/adverb/noun *verbatim* has back-shifted stress. Ugandans, thus, display patterns of stress placement deviations that have been observed in Ghanaian, Nigerian and Cameroon Englishes as regards back-shifting and forward-shifting of stress (Lomotey, 2018; Tiffen, 1974; Simo-Bobda, 1994; Atechi, 2004), although, for Ugandans, there seems to be some level of systematicity involving nouns, which, in the main, have back-shifted stress. In addition, the words involved are not exactly the same as those involved in West African Englishes (see Section 2). Crucially, our findings support Fisher's (2000) revelations about stress placement on the words *committee* and *component*, where we found out exactly the same patterns as those indicated by Fisher (2000).

To clearly visualize how the stress patterns differ between Ugandan speakers and RP speakers, let us consider an example of the pronunciation of the word *agreement* using acoustic features provided by the PRAAT acoustic analyzer (see spectrograms in Appendix 1):

Table 2: Acoustics for *agreement* /ˈagrɪmənt/ by a Ugandan speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
a- /ˈa/	212	0.236	64. 8dB
-gree- /grɪ/	179	0.188	61.7 dB
-ment /ment/	154	0.462	62.9 dB

Table 3: Acoustics for *agreement*/əˈgriːmənt/ by an RP speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
a- /ə/	215	0.161	54.1 dB
-gree- /ˈgriː/	243	0.219	70.2 dB
-ment /mənt/	169	0.392	50.6 dB

While the word *agreement* receives stress on the second syllable, /griː/, for the RP speaker, it receives stress on the first syllable, /a/, for the Ugandan speaker. It should be noted that for both speakers, the stressed syllable has a rise in pitch (243 Hz for the RP speaker and 212 for the Ugandan

speaker) and it is also louder than the unstressed syllables. It should further be noted that the last syllable, /mənt/ (RP) or /ment/ (Ugandan), is longer in duration than its stressed counterpart. This is due to the fact that the syllable has more segments (four) compared to the syllable with /a/ (Ugandan accent), which has only one segment and the syllable with /griː/, which has three segments.

As mentioned earlier on, some words in RP make a distinction between word pairs to distinguish between their word classes, e.g. *import* (verb) and *import* (noun), with the noun having stress on the first syllable and the verb having stress on the second syllable. For Ugandans, however, there is a tendency of generalizing this rule to also include word class pairs that do not allow that distinction based on varied stress placement to distinguish say a noun from a verb. Thus, while the words *contract, escort, insult, object, produce, protest, record, subject, conduct, convict, permit* and *rebel* allow that distinction (Roach, 2009: 110), the following words, for example, do not allow the distinction in RP: *attempt, mistake, benefit, arrest, comment, implement, challenge, disguise, respect* and *alarm* (cf. OED).[4] However, in the Ugandan accent, these words allow that distinction, as evidenced by the overwhelming behavior of our participants, shown in Figure 2 below:
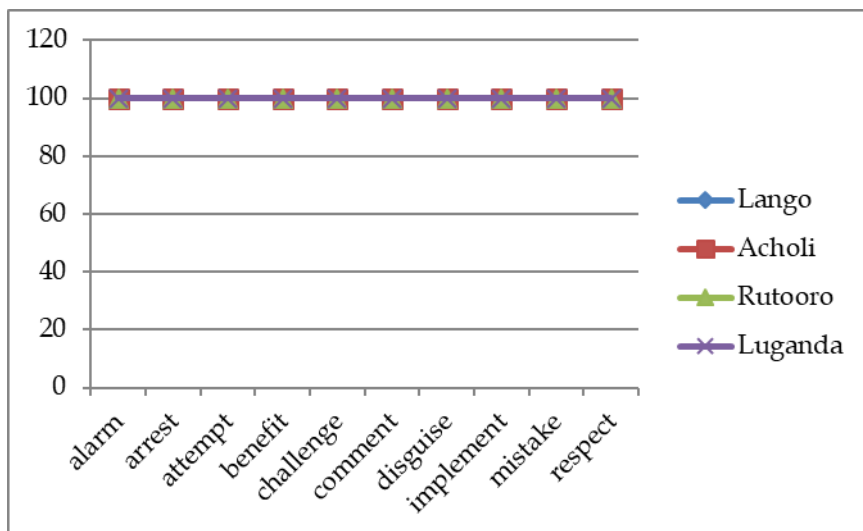

Figure 2: Ugandan pronunciation of words with a distinction in stress placement in word class pairs, contra RP

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[4] In Figure 2 and Table 4 below, we have only considered word classes where there are differences between the Ugandan accent and RP; for example, for *attempt*, what we have is the noun, while, for *comment*, we have the verb.

As Figure 2 shows, all the speaker groups and all the particpants had a uniform way of pronouncing the above words. Here, we are looking at how Ugandans pronounced these words, i.e. distinguishing nouns from verbs, yet in RP no such distinction exists as far as these words are concerned. Table 4 below shows the realization of stress placement involving the words in Figure 2:

Table 4: Ugandan pronunciation of words with a distinction in stress placement in word class pairs, contra RP

Word	Ugandan Accent	RP
alarm (n.)	/ˈalam/	/əˈlɑːm/
arrest (n.)	/ˈarest/	/əˈrest/
attempt (n.)	/ˈatempt/	/əˈtempt/
benefit (v.)	/beneˈfɪt/	/ˈbenɪfɪt/
challenge (v.)	/tʃaˈlendʒ/	/ˈtʃalɪndʒ/
comment (v.)	/koˈment/	/ˈkɒment/
disguise (n.)	/ˈdɪsgaɪz/	/dɪsˈgaɪz/
implement (v)	/ɪmplɪˈment/	/ˈɪmplɪment/
mistake (n.)	/ˈmɪstek/	/mɪsˈteɪk/
respect (n.)	/ˈrespekt/	/rɪˈspekt/

While in RP *alarm, arrest, attempt, disguise, mistake* and *respect* are pronounced in the same way whether they are nouns or verbs, Ugandans make a disctinction. Namely, they place the stress on the first syllable when these words are nouns and on the second syllable when they are verbs. For RP, whether nouns or verbs, the stress is placed on the second syllable. In a similar vein, Ugandans place stress on the last syllable for the verbs *benefit, comment, challenge* and *implement*, while they maintain stress on the first syllable of these words when used as nouns. In RP, stress is placed on the first syllable irrespective of whether the words are nouns or verbs. This linguistic behavior clearly mirrors the (legitimate) distinction involving word class pairs such as *import* (verb) and *import* (noun), which have distinct stress placement that shows the different word classes involved. This is clearly ascribable to analogy (cf. Blevins & Blevins, 2009). It is evident that (over)generalization, on which analogy usually hinges, is at work here. Since *import* (noun) and *import* (verb) are distinguished on the basis of stress placement, this is extended to other words such as *arrest* (noun) vs. *arrest* (verb) by Ugandan speakers of English. Analogy has been said to characterize most L2 varieties of English (Atechi, 2004), although it is also found in L1 varieties of English (cf. Amarorwot & Isingoma, 2021; Isingoma, 2018; Blevins & Blevins, 2009).

In order for us to clearly see how Ugandan speakers of English pronounce pairs of the words under consideration here differently from RP, we subjected some of the words to an acoustic analysis using PRAAT. Below is the acoustic analysis of the word *disguise* as a noun and as a verb, comparing the Ugandan pronunciation with RP (see spectrograms in Appendix 2):

Table 5: Acoustics for *disguise*/dɪsˈɡaɪz/ (verb) by an RP speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
dis- /dɪs/	131	0.255	72.9 dB
-guise /ˈɡaɪz/	136	0.666	75.1 dB

Table 6: Acoustics for *disguise*/dɪsˈɡaɪz/ (verb) by a Ugandan speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
dis- /dɪs /	200	0.269	59.9 dB
-guise /ˈɡaɪz /	221	0.533	71.7 dB

In both Table 5 and Table 6, the stressed syllable /ɡaɪz/ has a higher pitch than its unstressed counterpart (136 Hz vs. 131 Hz for the RP speaker and 221Hz vs. 200 Hz for the Ugandan speaker). As with length or duration, the stressed syllable is longer in duration than the unstressed syllable for both the RP speaker (0.666 vs. 0.255) and the Ugandan speaker of English(0.533 vs. 0.269). With regard to intensity, the stressed syllable is louder than the unstressed syllable, i.e. 75.1 dB vs. 72.9 dB for the RP speaker and 71.7 dB vs. 59.9 dB for the Ugandan speaker. Note that despite the fact that the pitch for both RP and the Ugandan speakers shows a distinction between the stressed and unstressed syllables, the overall values for the Ugandan speaker are higher (i.e. 200 and 221Hz vs. 113 and 136 Hz for RP). This could be associated with the fact that African Englishes have been said to use greater syllable force, thereby triggering high values for every syllable in a word (cf. Wells, 1982: 642), although, as we have seen, the sharp differences between the stressed and the unstressed syllable are not affected. In addition, Gut (2013) states that what matters in situations where one compares syllables across different speakers is, first of all, the comparison between syllables in a single word produced by one speaker, because every person speaks with a specific loudness and pitch height. Thus, the acoustics need not have the same values across speakers, provided the stressed syllable (as a whole) per speaker has considerably higher values than the unstressed syllable. Thus, essentially, there are no differences between RP and the Ugandan accent in terms of which syllable receives primary stress for the

verb *disguise.* However, differences between RP and the Ugandan accent arise when the word *disguise* is used as a noun. For the RP speaker, stress still remains on the second syllable, while for the Ugandan speaker, stress is back-shifted to the first syllable. This can be seen in Table 7 below (see spectrogram in Appendix 3):

Table 7: Acoustics for *disguise*/ˈdɪsgaɪz/ (noun) by a Ugandan speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
dis- /ˈdɪs/	441	0.283	71.5 dB
-guise /gaɪz/	176	0.524	70.8 dB

As is evident, the stressed syllable for the Ugandan speaker for *disguise* (noun), i.e. /ˈdɪs/**,** is higher in pitch (441 Hz vs. 176 Hz) and louder (71.5 dB vs. 70.8 dB) than the unstressed syllable. However, as with duration, the Ugandan accent stressed syllable is shorter in duration than its unstressed counterpart, which should not be the case under normal circumstances. Crucially, this is due to the fact that the unstressed syllable contains a diphthong: a tense vowel with two vowel qualities, which, when compared to the monophthong /ɪ/ in the stressed syllable, takes a longer duration in its articulation. In fact, /ɪ/ is not only a monophthong, but it is also a lax (short) vowel, while all diphthongs are tense (long) vowels. On the other hand, the RP pronunciation for the noun *disguise* will present similar values to those of the verb shown in Table 5 above, as there is no difference in stress placement between the verb and the noun in RP.

We might have observed in Figure 1 above a few cases of variability among the four ethnolinguistic groups, but these are not systematic enough, nor are they substantial. There are, however, eight (8) words in our sample words (i.e. *bursar, further, failure, comfortable, calcium, many, design* and *registrar*), where sharp variations were observed along ethnolinguistic lines, as shown in Figure 3 below. The figure shows the number of speakers (in percentages) per ethnolinguistic group who pronounced the words with particularities.
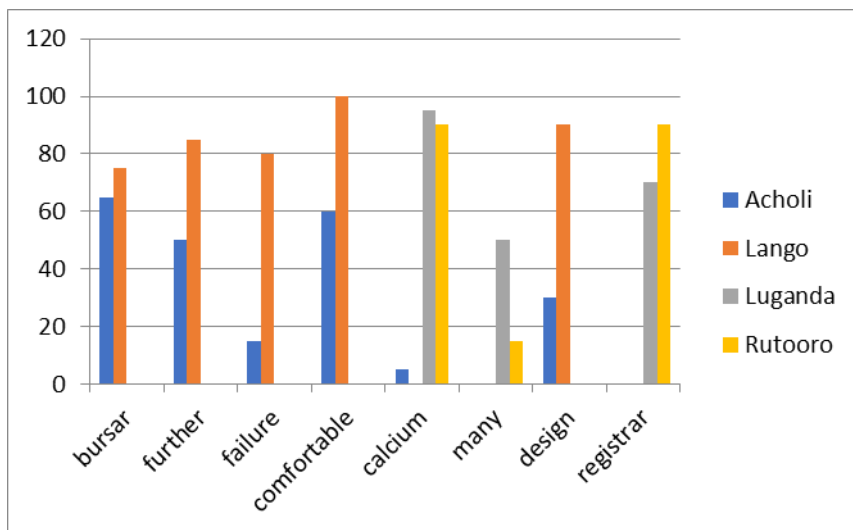
Figure 3: Interspeaker variability in the patterns of primary stress placement

As can be seen in Figure 3 above, the majority of the Lango and the Acholi speakers got high and average proportions for the words *bursar* (Lango=75% and Acholi=65%), *further* (Lango=85% and Acholi=50%) and *comfortable* (Lango 100% and Acholi 60%), while the Rutooro and Luganda speakers had 00%. This implies that this feature occurs among the Lango and the Acholi speakers, as opposed to the Luganda and Rutooro speakers, i.e. the Nilotic group vs. the Bantu group. Adokorach and Isingoma (2020) point to some variability in the realization of English segments by these speaker groups. In the current study, the following stress patterns were revealed:

	Lango and Acholi	**Rutooro and Luganda**
bursar	/ˈbaˈsa/	/ˈbaːsa/
further	/ˈfaˈða/	/ˈfaːða/
failure	/ˈfeˈlɪa/	/ˈfelɪa/
comfortable	/ˈkomˈfatebol/	/ˈkamfatebo/

Observably, while the Acholi and the Lango speakers assigned primary stress to both syllables for the word *bursar, further,* and *failure*, the Rutooro and Luganda speakers assigned it to the first syllable of the same words (just as is the case in RP). As for the word *comfortable,* stress was assigned to the first and second syllables among the Acholi (60%) and the Lango (100%) speakers, while all the Rutooro and the Luganda speakers assigned it to the first syllable only. In a similar vein, the word *failure* (with both syllables stressed) had a high ranking among the Lango speakers, i.e. 16 (85%), while

the Acholi speakers had 3 (15%) and the Rutooro and Luganda speakers had an incidence of 00(0%). This shows that these features are observed among the Luo (especially among the Lango) speakers of English, while the Bantu (Luganda and Rutooro) speakers of English pronounce the words in a similar way to how they are pronounced in RP. Another word which showed features of stress placement particular to the Luo speakers is *design*, with 90% of the Lango and 30% of the Acholi speakers of English pronouncing it as /ˈdɪzaɪn/ (i.e. with back-shifted stress), while all the Bantu (Luganda and Rutooro) speakers pronounced it as /dɪˈzaɪn/ (i.e. as it is pronounced in RP). Note that whether one of the two instances of stress in the words *bursar, failure, further* and, especially, *comfortable* (since it is polysyllabic) should be regarded as secondary stress is tangential for the current purpose of the study. What matters here is that the distinctive patterns shown here not only set apart the Ugandan accent from RP (since in RP these words have only one level of prominence, i.e. they do not have secondary stress at all), but also, above all, they provide insights into interspeaker variability among Ugandans.

On the other hand, the word *calcium* had 18 Rutooro speakers (90%) and 19 Luganda speakers (95%) stressing it idiosyncratically, while the Lango had 00% and the Acholi speakers had an incidence of 01, i.e. (5%), implying that this feature is common among the Bantu speakers of English. Notably, the Bantu speakers placed stress on the second syllable of the word *calcium* /kaˈlɪʃam/, with a vowel insertion (and other segmental changes), while all the Lango and an overwhelming majority of Acholi speakers placed it on the first syllable of the word, i.e. /ˈkalʃɪam/, just as is the case in RP in terms of stress placement (although there are segmental variations, i.e. in RP it is /ˈkalsɪəm/). Similarly, the word *many* was pronounced as /ˈmeˈne/ by the Luganda speakers with an incidence of 10 speakers (50%) and 03 Rutooro speakers (15%), whereas the Lango and Acholi speakers of English pronounced it as /ˈmeni/, akin to how it is realized in RP. This tells us that the tendency of stressing the two syllables of the word *many* is prominent among the Bantu speakers, but more particularly among the Luganda speakers. Since only a few Rutooro speakers pronounced the word *many* with the two syllables stressed, it might simply be a result of interactions across Englishes in the sense of Meierkord (2012), whereby members of a given ethnolinguistic group adopt particularities in the use of English from another ethnolinguistic group (see also Meierkord, 2016; Meierkord & Isingoma, 2022).

Relatedly, the word *registrar* had the highest proportions of distinctiveness among the Bantu, i.e. Rutooro (90%) and the Luganda (70%) speakers, while no such distinctiveness was registered among the Luo (Acholi and Lango). We should note the Bantu speakers pronounced it as /reˈdʒestra/,

placing stress on the second syllable, while the Luo speakers pronounced it as /redʒɪs'trɑ:/, placing stress on the last syllable. While RP has two ways of placing stress on this word, i.e. /redʒɪs'trɑ:/ and /'redʒɪstrɑ:/ (OED), the Luo speakers only used the first version. Since the Bantu pronounced the word as /re'dʒestra/ and the Luo as /redʒɪs'trɑ:/, that means that the RP version /'redʒɪstrɑ:/ was absent among all the speaker groups, even though the Luo had the alternate RP version /redʒɪs'trɑ:/ (save for the segmental difference, i.e. while RP has /ɑ:/ in the last syllable, the Luo pronunciation has /a:/).

Let us now look at the acoustic values for one of the words, i.e. *bursar,* in order for us to visually appreciate the differences between the Ugandan Luo and Bantu speakers of English. We will also add the acoustics for RP as a reference point. The acoustics are presented in the following tables (see spectrograms in Appendix 4).

Table 8: Acoustics for *bursar* /'ba:'sa/ by a Luo (Acholi) speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
bur- /'ba:/	203	0.426	73.9 dB
-sar /'sa/	200	0.424	73.9 dB

Table 9: Acoustics for *bursar* /'ba:sa/ by a Bantu (Rutooro) speaker of English

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
bur- /'ba:/	204	0.316	77.6 dB
-sar /sa/	163	0.227	59.6 dB

Table 10: Acoustics for *bursar* /'bɜ:sə/ by an RP speaker

Syllables	Pitch(Hz)	Length/Duration (in seconds)	Intensity
bur- /'bɜ:/	206	0.335	76.7 dB
-sar /sə/	146	0.297	72.4 dB

Read together, Table 8, Table 9 and Table 10 indicate that the patterns displayed by the RP speaker and those of the Bantu (Rutooro) speaker of English are similar with respect to the fact that only one syllable is stressed, i.e. the first syllable given its considerably higher pitch than the unstressed syllable. Namely, the pitch is 206 Hz (RP) and 204 Hz (Rutooro/Bantu speaker), respectively, for the stressed syllable, while the unstressed syllable

has 146 Hz (RP) and 163 Hz (Rutooro/Bantu speaker), respectively. On the other hand, for the Luo (Acholi) speaker of English, the pitches for both syllables are significantly high, i.e. 203 Hz for the first syllable and 200 Hz for the second syllable. These pitch values are clearly very close to each other. Other acoustic values, i.e. duration and intensity follow the above patterns, even though we realize that the duration for the first syllable is slightly longer than that of the second syllable, despite the fact that both syllables are stressed; this is explainable by the fact that the first syllable has a tense (long) vowel, while the second syllable has a lax (short) vowel.

Prima facie, one could attribute the above particularities to substrate influence. We are aware that English is a stress-timed language (Wells, 1982), where only one syllable in a word receives acoustic prominence (even though polysyllabic words with secondary stress receive two levels of prominence – but, of course, the degree of loudness is different for the two types of stress). Contrastively, Luganda, Acholi and Lango are syllable-timed languages, where all the syllables in a word receive some degree of prominence, as they are tonal languages. However, unlike Luganda, Acholi and Lango, Rutooro is a non-tonal language (cf. Ndoleriire & Oriikiriza, 1996; Kaji, 2009). As tonal languages, Luganda, Lango and Acholi may allow a sequence of two or more high tones to follow each other, among other configurations. For example, the Acholi and Lango word *poto* /póró/ 'garden' (Oyaro, 2020: 84; Noonan, 1992) and the Luganda word *mátééká* (Kawalya et al., 2014: 96) have this kind of tonal sequence. Given that fact, one could assume that the Luganda, Acholi and Lango speakers could have transferred aspects of what takes place in their mother tongues to the pronunciation of some English words (e.g. *bursar* for Lango and Acholi and *many* for Luganda), where every syllable is given prominence. However, substrate influence may not be adequate enough to explain this phenomenon, since only a few words are pronounced with this kind of stress placement, moreover without a justification as to why, for example, the Luganda speakers, and not the Lango speakers, stress the two syllables in *many*, but not in *bursar* – where the Lango speakers stress the two syllables and the Luganda speakers do not.

Relatedly, given that Rutooro speakers did not show this kind of behavior prominently (save for three occurrences in the pronunciation of *many*), one could also assume that this is caused by the fact that Rutooro is a non-tonal language and thus displays a property where there is (marked) prominence on only one syllable, akin to what takes place in English. In Rutooro, acoustic prominence usually occurs on the penultimate syllable (Kaji, 2009), as is the case in Welsh and Polish (Collins & Mess, 2013: 131). Thus, this seems to resonate well with the Rutooro speakers' pronunciation of the words *calcium* and *registrar*, where primary stress falls on the penultimate

syllable (even though for *calcium* Rutooro speakers use epenthesis, which makes the word have three syllables). In fact, Jubilado (2016) shows that since Philippine languages also have penultimate stress, this makes Filipino speakers of English place primary stress on penultimate syllables in polysyllabic words (see also Berowa & Dita, 2021). However, we cannot assume that L1 Rutooro speakers cannot show other particularities in the pronunciation of English words, since the two languages differ substantially on how acoustic prominence is realized in words: as already indicated, for Rutooro, prominence falls on the penultimate syllable, while, for English, there are various patterns, e.g. stress falls on the first, second and third syllable, respectively, as in the following English words: *teacher, above, chimpanzee.*

Given the reservations expressed above about the inadequacy of substrate influence as a sacrosanct factor behind the particularities observed, we need to look beyond that. In the first place, not all disyllabic words[5] show this kind of stress placement, among Ugandans, as, for example, words such as *better, teacher, rehearse, simple*, etc. are not pronounced with varied stress patterns, i.e. the different ethnolinguistic groups pronounce these words in the same way. At the same time, polysyllabic words such as *government, administration, satisfactory*, etc. are also pronounced without varied stress patterns. Thus, only some words have this kind of variability. However, this does not mean that the variability does not matter, especially when it is consistent and is associated with (a) given ethnolinguistic group(s). For example, we are aware that all the Lango speakers pronounced the word *comfortable* with the first two syllables stressed, as opposed to all the Bantu (Luganda and Rutooro) speakers, who had the stress on the first syllable only. Roach (2005: 109) states that "not all speakers agree on the placement of stress in some words." This observation has also been made by Berowa and Dita (2021) in relation to the English variety spoken in the Philippines. We are aware that, in L1 English, words such as *ice-cream, headquarters* and *quinine*, among others, are pronounced with doublets in RP, i.e. with some people pronouncing, for example, the word *quinine* with stress on the first syllable, while others pronounce it with stress on the second syllable (Roach, 2005, Oxford Advanced Learner's Dictionary). In all such situations, there is no systematicity in terms of a given category of words that allows this kind of pronunciation; for example, similar words orthographically ending in *-ine* such as *pristine, Christine, adenine, feminine, masculine,* etc. do not present such doublets in RP (OED). Moreover, the number of words where such variability occurs among Ugandans seems to be limited. Hence, such scenarios, i.e. what we find in RP and the Ugandan accent of English, can only be aptly explained, for now, by what Wells (1982) has referred to as lexical distribution. In other words, a few words will show this kind of variability without

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[5] Disyllabic words form the majority of the words in Figure 3.

an underlying systematic linguistic explanation behind the variability. While, in our case, we are tempted to attribute the variability to an underlying substrate influence, this is not sufficient as there is no systematicity either. However, the consistency in the pronunciation of such words and the ethnolinguistic distribution involved raise interesting questions that should continue stimulating relevant scholarly debates.

5. Conclusion

This study has shown that there are substantial particularities with respect to how Ugandans place primary lexical stress on English words. The particularities observed in the study lend themselves to the fact that L2 varieties of English are indeed distinct from RP, since English is acquired as a second language. As for the case of Uganda, these particularities are mainly attributable to analogy. Here, we have seen, for example, how the rules governing the pronunciation of some disyllabic word class pairs are extended to a number of other disyllabic word class pairs which do not allow the application of these rules in RP. Besides analogy, one could also look at substrate influence. While substrate influence is indeed widespread in segmental phonology, i.e. it affects how segments are realized in Ugandan English by L2 speakers (see Adokorach & Isingoma, 2020), it also seems to underlyingly affect modulations of voice in terms of stress placement, where tonal modulations could be said to feed into the pronunciation of some English words. For that matter, ethnolinguistic variability is observed among Ugandan speakers of English, though this is not substantially widespread as only some words are affected without very clear systematicity. This calls for further studies to tease out this phenomenon, which, for the present purpose, we can only associate with what Wells (1982) has referred to as lexical distribution.

Further manifestations of structural nativization of English or even endonormative stabilization of English in Uganda are observed from the findings of this study in line with Schneider's (2007) model on the development of varieties of English in postcolonial contexts. Amarorwot and Isingoma (2021) and Isingoma and Meierkord (2022), among others, have shown particularities that set Ugandan English apart in terms of some of its grammatical features, which is one of the ingredients, according to Schneider (2007), that contribute to structural nativization, while phonological variations, both segmental and suprasegmental, also provide further contributions to this dimension. Once such features are not stigmatized in a given country or speech community (crucially Ugandans do not stigmatize their pronunciation of English at all (see Isingoma & Meierkord, 2022), they constitute aspects that lead to endonormative stabilization. Given that the features de-

scribed in this study are deeply entrenched among Ugandans and are locally not stigmatizable, this study has also contributed to the current discourse on the fact that English in Uganda is said to have aspects of endonormative stabilization manifesting themselves, even though it is still placed within the nativization phase (see Isingoma & Meierkord, 2022; Isingoma, 2021).

References

Adokorach, Monica, Bebwa Isingoma (2020). Homogeneity and heterogeneity in the pronunciation of English among Ugandans. *English Today* 148, 18(1): 15–26. https://doi.org/10.1017/s0266078420000152.

Amarorwot, Sarah, Bebwa Isingoma (2021). Structural nativization of English in Uganda: Evidence from number agreement and interrogatives among Acholi speakers of English. *Journal of Studies in the English Language* 16(2): 52–82. https://doi.org/10.46687/yxuv9786.

Atechi, Samuel N. (2004). The intelligibility of native and non-native English Speech: A comparative analysis of Cameroon and American and British English. Unpublished PhD dissertation. Chemnitz: Chemnitz University of Technology.

Berowa, Annie Mae C., Shirley N. Dita (2021). Illustrating the suprasegmental features of Philippine English phonology: A mother tongue-based approach. *The Asian ESP Journal* 17 (4.3): 89–111.

Blevins, James P., Juliette Blevins (2009). Introduction. In Blevins, James P., Julliette Blevins, eds. *Analogy in Grammar: Form and Acquisition*. Oxford: Oxford University Press, 1–12.
https://doi.org/10.1093/acprof:oso/9780199547548.001.0001.

Boersma, Paul, David Weenink (2006). Praat. Doing phonetics by computer (Version 6.2.23), https://www.fon.hum.uva.nl/praat/. (Accessed January 2022).

Buchstaller, Isabelle, Ghada Khattab (2013). Population samples. In Podesva J. Robert, Devyani Sharma, eds. *Research Methods in Linguistics*. Cambridge: Cambridge University Press, 74–95.
https://doi.org/10.1017/cbo9781139013734.006.

Buregeya, Alfred (2006). Grammatical features of Kenyan English and the extent of their acceptability. *English World-Wide* 27(2): 199–216.
https://doi.org/10.1075/eww.27.2.05bur.

Collins, Beverley, Inger M. Mees (2013). *Practical Phonetics & Phonology: A Resource Book for Students*. London: Routledge.
https://doi.org/10.4324/9780203080023.

Edmunds, Paul (2009). ESL speakers' production of English lexical stress: The effect of variation in acoustic correlates on perceived intelligibility and nativeness. PhD thesis: University of New Mexico. Available at: https://digitalrepository.unm.edu/ling_etds/10 (Accessed May 20, 2022).

Fisher, Allestree E. C. (2000). Assessing the state of Ugandan English. *English Today* 16: 57–61. https://doi.org/10.1017/s0266078400011470.

Greenbaum, Sidney, Gerald Nelson (1996). The International Corpus of English (ICE) Project. *World Englishes* 15: 3–15.
https://doi.org/10.1111/j.1467-971x.1996.tb00088.x.

Gut, Urlike (2013). Analysing phonetic and phonological variation on the suprasegmental level. In Krug Manfred, Julia Schlüter, eds. *Research Methods in Language Variation and Change.* Cambridge: Cambridge University Press, 244–259. https://doi.org/10.1017/cbo9780511792519.017.

Hung, Tony T. N. (2000). Towards a phonology of Hong Kong English. *World Englishes* 19(3): 337–356. https://doi.org/10.1111/1467-971x.00183.

Isingoma, Bebwa (2013). Innovative pragmatic codes in Ugandan English: A relevance-theoretic account. *Argumentum* 9: 19–31.

Isingoma, Bebwa (2018). Accounting for variability in the linearization of ditransitive constructions in English among native speakers. *Argumentum* 14: 383–399.

Isingoma, Bebwa (2021). Politeness strategies in Ugandan English: Making requests and responding to thanks. *Brno Studies in English* 47(1): 7–29. https://doi.org/10.5817/bse2021-1-2.

Isingoma, Bebwa, Christiane Meierkord (2016). Ugandan English –challenges to, and food for, current theories. In Meierkord, Christiane, Bebwa Isingoma, Saudah Namyalo, eds. *Ugandan English: Its Sociolinguistics, Structure and Uses in a Globalizing Post-Protectorate.* Amsterdam: Benjamins, 1–18. https://doi.org/10.1075/veaw.g59.01isi.

Isingoma, Bebwa, Christiane Meierkord (2022). Between exonormative traditions and local acceptance: A corpus-linguistic study of modals of obligation and spatial prepositions in spoken Ugandan English. *Open Linguistics* 8: 87–107. https://doi.org/10.1515/opli-2022-0185.

Ježek, Miroslav (2012). The double-edged sword of RP: The contrasting roles of a pronunciation model in both native and non-native environments. *Research in Language* 10(2): 133–142. https://doi.org/10.2478/v10015-011-0037-6.

Jubilado, Rodney C. (2016). Where is the CR? A description of Philippine English in Hawaii. *Philippine ESL Journal* 1: 86–101.

Kaji, Shigeki (2009). Tone and syntax in Rutooro, a toneless Bantu language of Western Uganda. *Language Sciences* 31(2-3): 239–247. https://doi.org/10.1016/j.langsci.2008.12.006.

Katamba, Francis (1989). *An Introduction to Phonology.* London: Longman.

Kawalya, Deo, Gilles-Maurice de Schryver, Koen Bostoen (2018). From conditionality to modality in Luganda (Bantu, JE 15): A synchronic and diachronic corpus analysis of the verbal prefix -andi-. *Journal of Pragmatics* 127: 84–106. https://doi.org/10.1016/j.pragma.2018.01.011.

Lomotey, Charlotte F. (2018). Fluidity and variation in lexical stress placement in Ghanaian English discourse: A case of systematicity in communication in world Englishes. *The Journal of English as an International Language* 13(1): 37–56.

Meierkord, Christiane (2012). *Interactions across Englishes: Linguistic choices in Local and International Contact Situations.* Cambridge: Cambridge University Press. https://doi.org/10.1017/cbo9781139026703.

Meierkord, Christiane (2016). Diphthongs in Ugandan English: Evidence for and against variety status and interactions across Englishes. In Meierkord Christiane, Bebwa Isingoma, Saudah Namyalo, eds. *Ugandan English: Its Sociolinguistics, Structure and Uses in a Globalizing Post-protectorate.* Amsterdam: Benjamins, 121–147.
https://doi.org/10.1075/veaw.g59.06mei.

Meierkord, Christiane, Bebwa Isingoma (2022). Between first language influence, exonormative orientation and migration: Future time expressions in post-protectorate Ugandan English. *English World-Wide* 43(2): 220–248. https://doi.org/10.1075/eww.21014.mei.

Namyalo, Saudah, Bebwa Isingoma, Christiane Meierkord (2016) Towards assessing the space of English in Uganda's linguistic ecology. In Meierkord Christiane, Bebwa Isingoma, Saudah Namyalo, eds. *Ugandan English*: *Its Sociolinguistics, Structure and Uses in a Globalizing Post-protectorate.* Amsterdam: Benjamins, 19–50. https://doi.org/10.1075/veaw.g59.02nam.

Nassenstein, Nico (2016). A preliminary description of Ugandan English, *World Englishes.* 35(3): 396–420. https://doi.org/10.1111/weng.12205.

Ndoleriire, Oswald, Celestin Oriikiriza (1996). Runyakitara language. Course manual. (ms). Makerere University.

Noonan, Michael (1992). *A Grammar of Lango.* Berlin: Mouton de Gruyter. https://doi.org/10.1515/9783110850512.

Oxford Advanced Learner's Dictionary. London. Oxford University Press. https://www.oxfordlearnersdictionaries.com/. (Accessed April 30, 2022).

Oxford English Dictionary (OED). http://www.oed.com/ (Accessed April 15, 2022).

Oyaro, Jennifer (2020). A description of some phonetic and phonological aspects of the Acholi language. MA dissertation. Kampala: Makerere University.

Roach, Peter (2005). *English Phonetics and Phonology: A practical Course.* Cambridge: Cambridge University Press.

Roach, Peter (2009). *English Phonetics and Phonology: A practical Course. Fourth Edition.* Cambridge: Cambridge University Press.

Schleef, Erik, Miriam Meyerhoff (2010). Sociolinguistic methods for data collection and interpretation. In Meyerhoff Miriam, Erik Schleef, eds. *The Routledge Sociolinguistics Reader.* London/New York: Routledge, 1–26.

Schneider, W. Edgar (2007). *Postcolonial English: Varieties around the World*. Cambridge: Cambridge University Press. https://doi.org/10.1017/cbo9780511618901.

Schröder, Anne, Frederic Zähres, Alexander Kautzsch (2021). The phonetics of Namibian English: Investigating vowels as local features in a global context. In Schröder, Anne, ed. *The Dynamics of English in Namibia: Perspectives on an emerging variety.* Amsterdam: Benjamins, 111–133. https://doi.org/10.1075/veaw.g65.06sch.

Simo Bobda, Augustin (1994). *Aspects of Cameroon English Phonology*. Peter Lang, Inc.; European Academic Publishers: Bern.

Simo Bobda, Augustin (2001). East and Southern African English accents. *World Englishes* 20(3): 269–284. https://doi.org/10.1111/1467-971x.00215.

Styler, Will (2022). Using Praat for linguistic research. Available at http://savethe vowels.org/praat. (Accessed June 26, 2022).

Tiffen, Brian W. (1974). The intelligibility of Nigerian English. PhD thesis, University of London.

Uganda Bureau of Statistics (2016). The National Population and Housing Census 2014- Main Report, Kampala Uganda.

Upton, Clive (2004). Received pronunciation. In Schneider, Edgar W., Kate Burridge, Bernd Kortmann, Rajend Mesthrie, Clive Upton, eds. *A Handbook of Varieties of English, Vol. 1: Phonology*. Berlin: Mouton, 217–230.

https://doi.org/10.1515/9783110175325.1.217.

Wells, John C. (1982). *Accents of English: An Introduction. Cambridge*. Cambridge: Cambridge University Press.

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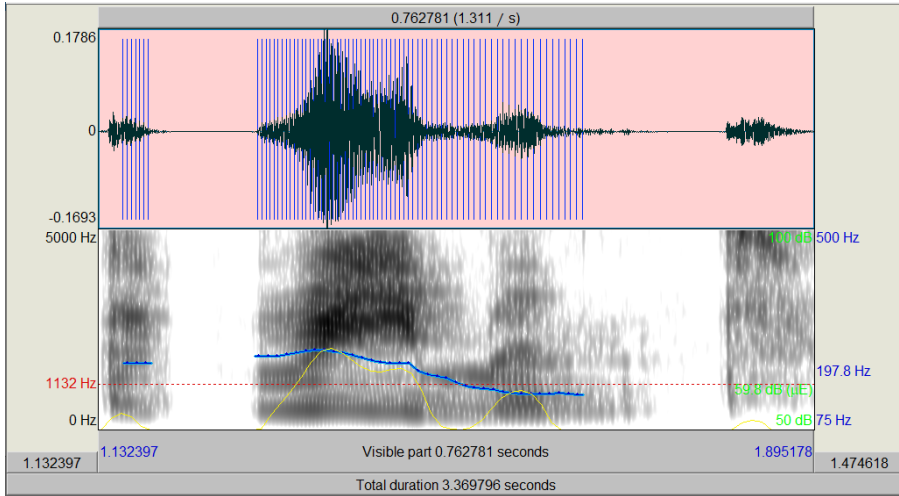
Appendix 1

Figure 4: Spectrogram for agreement / əˈgriːmənt/ by an RP speaker of English
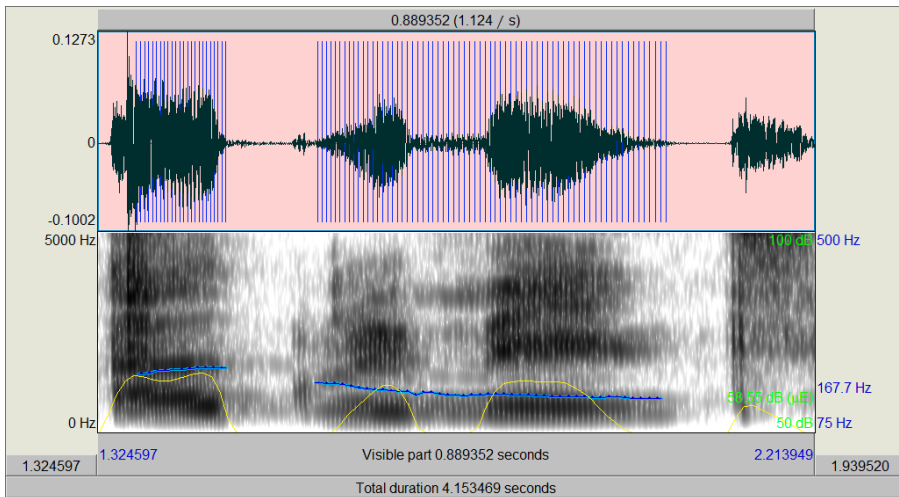
Figure 5: Spectrogram for *agreement* /ˈagrɪment/ by a Ugandan speaker of English

Appendix 2
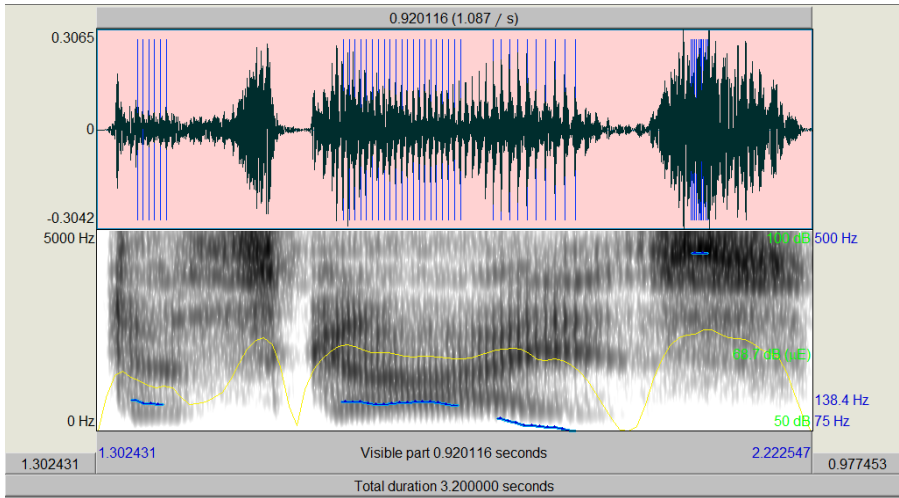
Figure 6: Spectrogram for *disguise* /dɪsˈɡaɪz/ (verb) by an RP speaker of English
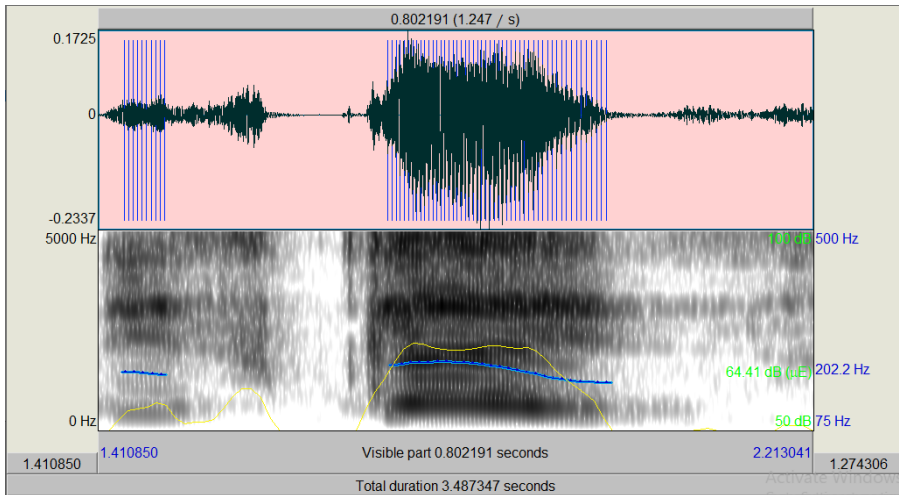
Figure 7: Spectrogram for *disguise*/dɪsˈɡaɪz/ (verb) by a Ugandan speaker of English

Appendix 3
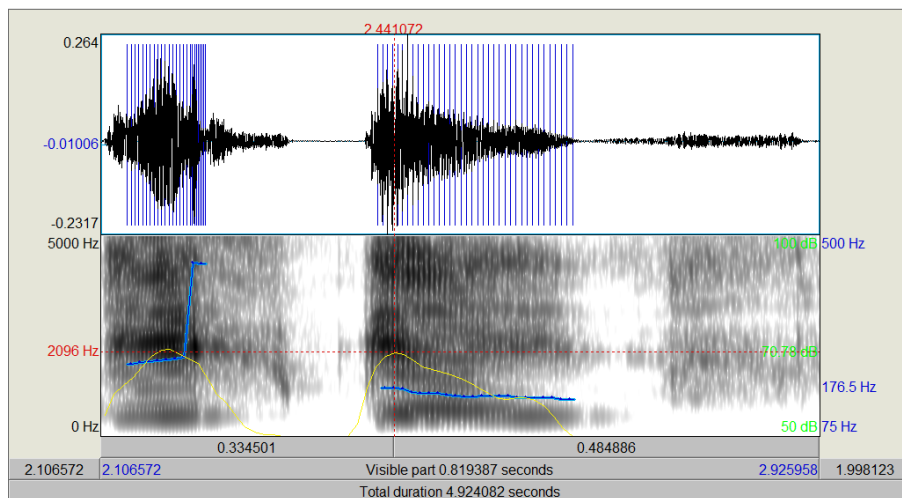

Figure 8: Spectrogram for *disguise* /ˈdɪsgaɪz/ (noun) by a Ugandan speaker of English

Appendix 4
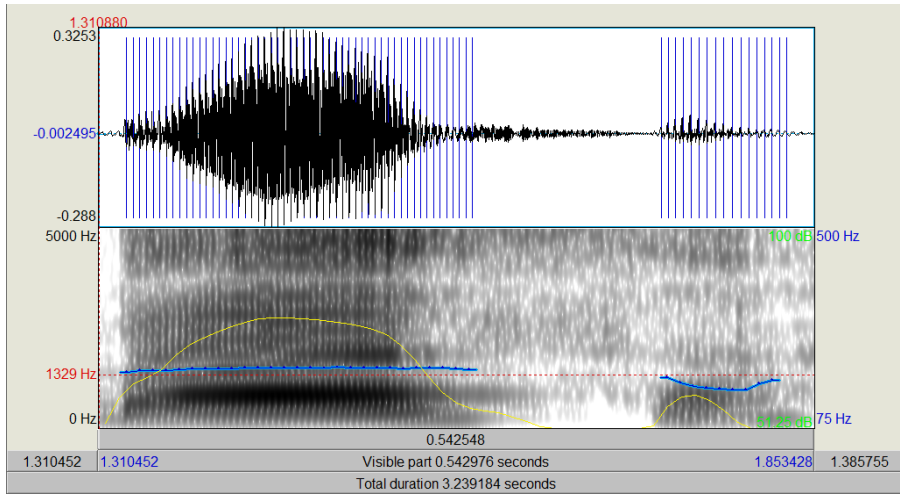
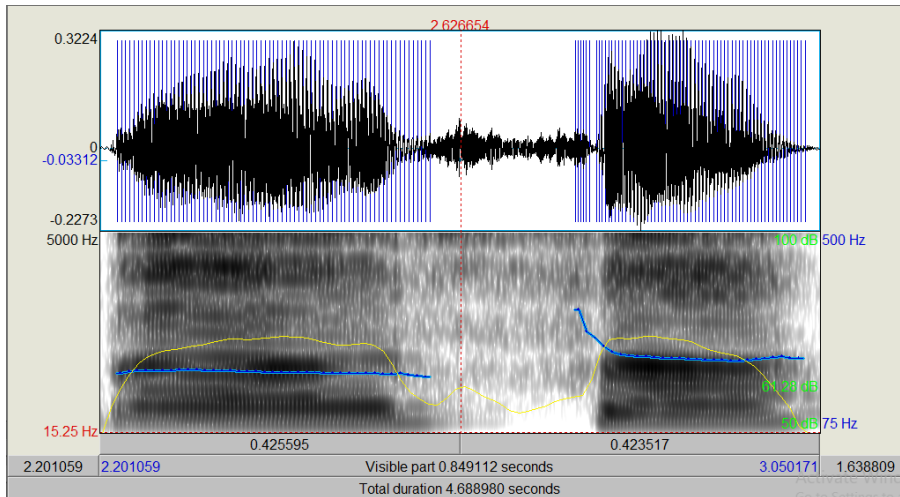Figure 9: Spectrogram for *bursar* /ˈbaːsa/ by a Rutooro (Bantu) speaker of English

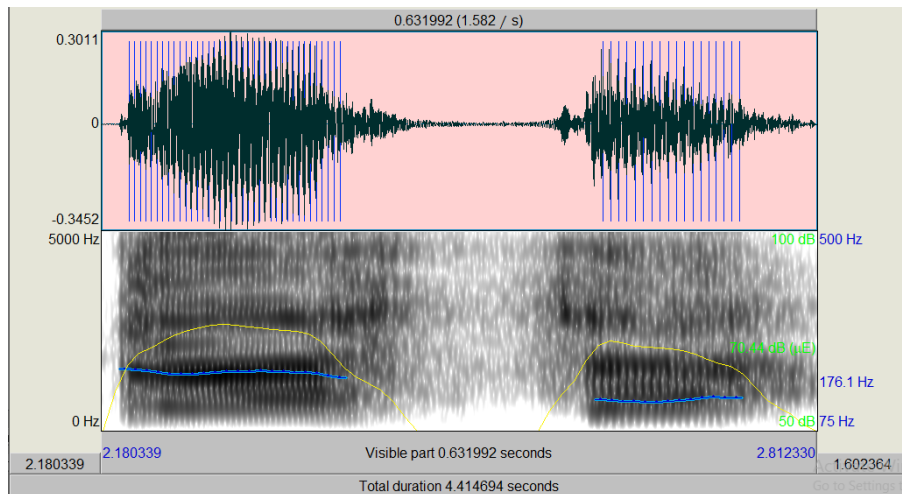Figure 10: Spectrogram for *bursar* /ˈbaːˈsa/ by an Acholi (Luo) speaker of English

Figure 11: Spectrogram for bursar /ˈbɜːsə/ by an RP speaker of English