WORD ACCENT IN ENGLISH (RP) AND YEMENI ENGLISH (YE): A PRACTICAL STUDY

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1. Introduction

It is a linguistic fact that Arabic and English are dissimilar as regard to word accent. The idea of having strong and weak forms has not been discussed in the literature of Arabic phonetics and phonology. In Arabic, all syllables are given the same level of prominence. Thus, Arab students usually encounter potential difficulties when they pronounce English words. This paper investigates the difficulties that the Arab students encounter when they pronounce English words.

Before exploring these difficulties, a brief discussion on the word structure and syllable structure might be useful as a preliminary understanding of word stress in Yemeni Arabic (henceforth YA).

2. YA Word Structure

2.1. Preliminaries

One of the characteristics of the YA is that nearly all words, no matter how long and complicated (or how short and apparently simple) they are, can be theoretically reduced to 'roots and patterns'. The roots consist of three 'radical' consonants. For example, /mutakillimu:na/ is reduced to KLM (root); /mu/ + /ta/ are prefixes and /u:/ + /na/ are suffixes.

From a root such as KTB, it is possible to derive a number of words with different meanings.

(1)	KTB	⇒	root
	/kataba/	⇒	wrote
	/yaktubu/	⇒	writes (he)
	/taktubu/	⇒	writes (she)
	/maktu:b/	⇒	written
	/maktab/	⇒	office
	/maktaba/	⇒	library
	/maka:tib/	⇒	offices
	/kutub/	⇒	books etc. etc.

Short vowels are not usually represented in writing in YA. They are taken for granted and the reader has to supply them naturally while reading.

Thus, special training for the learner is essential from the outset. Long vowels are provided in script. Consonants are predominant in YA and they have a heavy influence on the neighbouring vowels.

Early Arab grammarians called the vowels the sickness-causing sounds (ħuru:f al-ʕilla), and thus vowels have been given much attention by the Arab grammarians. The disease that these sounds cause has not yet been cured.

Consequently, the phonological structure of YA is regarded as consisting of the general units of consonants (C) and vowels (V). Vowels, as stated above, do not appear in the alphabet list as they are considered merely as bridges between consonants.

The structure of the word is characterized not only by the number of syllables in it but also by the nature of those syllables. The nature of the syllable includes consideration of whether the syllable is closed (-C final) or open (-V final) and whether the syllable is heavy or light in quantity. Heavy quantity syllables include those which are -C final, and those with a long vowel unit (V:). Light quantity syllables are those with a short vowel unit (V). The sign ⁀ over CC where indicates that the consonant articulation is homorganic. Absence of this sign on CC means that the consonant articulation is non-homorganic.

Before examining the structure of the syllable patterns in YA, the following principles should be considered:

1) Every word starts with a consonant
2) Intervocalic single consonants in a word belong to the following vowel.
3) With an intervocalic consonant cluster of two consonants, the first is in the syllable with the preceding vowel, the second is in the syllable with the following vowel.
4) Long vowels can be followed by a geminated consonant in a word as /tˤa:mmah/.

The following are particular limitations:

1) No two vowels occur side by side.
2) All consonants, with no exception, can occur initially, medially, finally or before or after any vowel. (See table 2.5).
3) No cluster of three consonants occurs word-initially, word-finally or word medially.
4) No cluster of two consonants occurs word initially.
5) The following sounds can be grouped as homorganic: [θ ð] and [ðˤ]. [t, tˤ], [s, sˤ, z], if preceded by [n].

2.2 The Structure of words in YA. (Monomorphemic)

The structure of monomorphemic words in YA can be stated in terms of the following patterns:

1) Monosyllabic:

Structure	Examples	Gloss
CV:	/la:/	no
	/ma:/	water
CVC	/daʃ/	leave
	/sˤah/	silent
	/bal/	but
CV:C	/ba:b/	door
	/qa:l/	said
	/ka:s/	cup
CVCC	/nahr/	river
	/baʁl/	mule
	/bajt/	house
	/lajl/	evening
	/baql/	radish

2) Disyllabic: (with medial single consonant)

CV CV	/mono/	who
	/sama/	sky
	/dala/	slow
	/ʃala/	on
	/qala/	fry (past)
CV CVC	/qalam/	pen
	/balad/	town
	/sanad/	master
	/nakad/	misfortune
	/baqar/	cows
CV:CV	/ma:ʃi/	walker
	/da:ri/	know
	/ba:li/	old
	/nu:ri/	a name
	/qu:mi/	rise (command)
	/si:ri/	ladder
	/tˤi:ri/	fly' (fem. sing.)
Structure	Examples	Gloss
CV: CVC	/ba:ʔit/	sleeping
	/sa:rih/	leaving
	/la:kin/	but

	/sˤa:ʔim/	fasting
	/ma:kiθ/	staying
	/ga:lis/	sitting down
	/ra:qid/	sleeping
	/ba:kir/	tomorrow
CVCV:	/sama:/	sky
	/bala:/	calamity
CVCV:C	/rabi:ʕ/	spring
	/sami:r/	a name
	/dali:l/	guide
	/χali:l/	friend
	/qima:r/	gambling
	/ħima:r/	donkey
CV:CV:C	/qa:ru:n/	a name
	/ba:lu:n/	balloon
	/tˤa:lu:t/	a name
	/qa:mu:s/	dictionary
	/fa:nu:s/	lamp

3) Disyllabic (with medial double consonant)

CVC CV	/χabba/	hide (past)
	/baqqa/	left
	/samma/	gave a name
CV:C CVC	/tˤa:mmah/	catastrophe
	/sa:mmah/	poisonous
	/ma:ssah/	desperate

4) With medial homorganic nasal plus plosives

CVN PV	/ʔanta/	you (male)
	/ʃantˤa/	bag
	/mandi/	fried meat
CV NPV:C	/manqu:l/	taken out
	/manbu:ð/	abandoned
	/minda:d/	kitchen

5) With medial consonant cluster

Structure	Examples	Gloss
CVCCVC	/bardah/	cold
	/saktah/	silent
	/saqtˤah/	fall

	/bukrah/	tomorrow
	/saħrah/	dawn
	/baldah/	town
	/qarjah/	village

6) Trisyllabic

CV CV CVC	/qala:lah/	a name
	/saka:rah/	drunk people
	/biqa:lah/	grocery
	/suma:rah/	a name
	/sˤaħa:ri/	deserts
CV NPV CVC	/mantˤiqah/	area
	/manqabah/	credit
CVC CV CVC	/madrasah/	school
	/maqlamah/	nail cutter
	/mamsaħah/	eraser
CVC CV CVC	/bulla:aʕah/	drain
	makka:rah/	deceiver (fem.)
	/ʕassˤa:rah/	blinder
CVCCV:CV	/rawħa:ni/	spiritual
	/ʕalwa:ni/	a name
CV CV: CVC	/bala:bil /	nightingales
	/maza:riʕ/	farms
	/maq:abir/	graves
CVCV:CV:C	/saka:ki:n/	knives
	/mala:ji:n/	millions

It is very difficult to find a tetrasyllabic monomorphemic word in YA. It is apparent in the gloss above that most of the words are plurals, but this does not mean that they are not monomorphemic. In YA the system of the broken plurals allows us to form plural by reduction or breaking the singular into fragments to form the plural. In that case, the plural is considered as one unit and thus can be considered as monomorphemic.

3. Syllable Structure

3.1. Syllable structure in YA

Attempts to define the syllable by the investigation of acoustic records of utterances have been unsuccessful, and instrumental phoneticians have denied the reality of the syllable. They do so

> because they cannot delimit the syllables on their records...this is somewhat the same kind of reasoning as would lead one to deny the existence of two adjacent hills because one cannot satisfactorily determine how much of the intervening valley belongs to one and how much to the other. (Heffner, R-M.S. 1960:73)

The segmental phonemes of the YA are conveniently derived into syllabic and non-syllabic entities. The three short vowels and their long counterparts always form the syllable nucleus. All consonants, including the two sonorant /j/ and /w/, always represent the marginal phonemes in the syllable structure. There are five types of syllable in YA:

1) CV short-open, a consonant followed by a short vowel, such as:

(3)

/ka.ta.ba/	wrote
/ʃa. li.ma/	knew
/qa.ta.la/	killed

2) CVC short-closed, a consonant followed by a short vowel, followed by an unvowelled (zero vowel) consonant:

/kun.tum/	you were
/mus.kir/	intoxicating
/mum.kin/	possible
/mus.lim/	Muslim

3) CV long, a consonant followed by a long vowel

/qa:lu:/	they said
/ma:lu:/	they leaned
/sa:li:/	comfortable

4) CV: C

/ba:b/	door
/qa:l/	said
/ma:l/	money

5) CVCC

/nahr/	river
/baʁl/	mule
/baql/	radish

Hence, YA has the following five syllable patterns:

1) CV
2) CVC
3) CV:
4) CV: C
5) CVCC or CVCc

The first four patterns occur initially, medially and finally. The most common of these is CV and the least common is CV: C. The fifth pattern CVCC occurs finally, medially, or in isolation.

3.2 Comparison of Syllabic Structure of YA and English

The syllabic structures of YA and English, though basically quite similar, differ in some ways. In both languages, the syllables are marked out by the relative prominence of the peaks. We can consider the syllabic systems of the two languages as syllable systems of the peak type. That is to say that there are as many syllables as there are peaks of prominence in these languages.

In both YA and English, the syllable systems have syllable onsets and codas more or less of similar types, but differing in their structures.

Syllables with peaks only do not exist in YA, but they do in English. We may classify the syllable structure of both YA and English as follows:

	English	**YA**
	C0-3 V- C0-4	C1 VC0-2
1.	V (zero onset and zero coda) e.g., a (article)	(does not exist)
2.	VC (with zero onset) e.g., out, in, end, awful, ooze	No syllable starts with V
3.	CV (with zero coda) e.g., tea, sea	CV (with zero coda) e.g. la 'no', ma 'water'
4.	CVC (with onset and coda) e.g., pin, sun, man	CVC (with onset and coda) e.g. bar 'desert', sir 'bur', secret 'wheat'

In YA the non-zero onsets and codas syllable allows only one consonant in the onset and two successive consonants in the coda maximally, in contrast with English in which non-zero onsets include from one to three successive consonants and non-zero codas from one to four consonants. This area is of major difficulty for the Yemeni learners.

It should be noted that both languages have clusters, i.e., intervocalic consonants and consonant sequences in a micro-segment. English is said to have final consonants cluster of one to four consonants. YA differs in this respect; it has final cluster of one to two consonants only. Across word boundary where a word ends in four consonants coda and a following word begins with three consonant onsets, a combination of seven consonants, though rare, can be possible in English, e.g., *The texts stretched over the theme.* In YA, across word boundaries, a maximum of three consonants sequence can be possible. Contrastively, the English consonants sequence will be difficult for Yemeni learners and particularly those, which are not

similar to the final combinations of YA.

4. Word Accent

4.1 English word accent

Stress is an elusive feature. It is hard to find a single mechanism to which the production of stress can be attributed. From the speaker's point of view, stress means greater effort in the stressed syllable, strongly stressed syllable is one "that the speaker consciously utters with greater effort than other neighbouring syllables in the word or sentence". (Jones, 1976: 134-35). Bloomfield (1933: 111) indicates that from the listener's point of view stressed syllables are louder than unstressed syllables.

Word accent is one of the most important features of spoken English. If a syllable is uttered with higher pitch and greater effort than the other adjacent syllables, the syllable is said to be accented. "The syllable or syllables of a word which stand out from the remainder are said to be accented, to receive the accent". (Gimson, 1992: 223).

In other words, the accented syllable of a word is the syllable, which is relatively more prominent than its neighbours. However, Jones (1989) distinguished between stress and prominence. According to Jones, the prominence of a syllable is its general degree of distinctness, this being the combined effort of the timbre, length, stress, and (if voiced) intonation of the syllabic sound. The term "stress" refers only to the degree of force of utterance; it is independent of length and intonation, although it may be combined with these. Prominence is a perceptual quality that may be decreased or increased by means of any of the sound attributes (length, stress, pitch, timbre); stress is an articulatory gesture (Lehiste, 1970).

In English, the accent of words is fixed, in the sense that the main accent always falls on a particular syllable of any given word. It is also free, in the sense that the main accent is not tied to any particular position in the chain of syllables constituting a word.

Gimson listed four factors which may play a part in rendering a sound or syllable prominent. They are: stress, pitch change, sound quality and quantity (Gimson, 1992: 223). Among the factors, pitch variation is rendered to be the most commonly used and efficient cue in communicating prominence for the listener. Length variation is also a strong contributory factor both as regards the association of vowel quantity with accentuation and also as a feature of prominence in its own right (Gimson, 1992:223). Stress is the weakest as regard to communicating prominence. In *antique*, for example, the second syllable is accented and the first is weak. In *understand*, the third syllable is accented and the second one is unstressed. Accent in English carries particular distinctive phonetic features. Accent is a

characteristic feature of the phonological structure of English word and thus is indicated by a sign ['] in pronouncing dictionaries.

Catford (1977: 84) considers initiator power as the organic-aerodynamic phonetic correlate of stress. Experimental observations have proved that the stressed syllable is pronounced with higher initiatory power than the unstressed syllable. The more strongly stressed a syllable is, the greater the initiator power.

Chomsky and Halle (1968), as quoted by Ladefoged, claim that it is easy to detect at least five degrees of stress in English.

Larry M. Hyman, (1975) states that stress within a word is part of the underlying phonological form. He does not favour any rules of stress assignment and argues that in languages with predictable stress, prominence is attributed to grammatical and phonological factors (Hyman, 1975: 205).

In English as well as in Arabic the stressed syllables tend to occur at regular intervals of time. This phenomenon has a considerable effect on the duration of sounds and syllable in connected speech. It also affects the perception of the stressed syllables in speech. This phenomenon is known as rhythm and is caused by isochronous stress pulses. Thus, English and YA have stress -timed rhythm.

In English, accent is a significant feature due to the following factors:

(1) It is an essential part of the phonological structure of the word; words become unrecognizable if the accent is wrongly placed.
(2) The rhythm of an utterance depends to a greater degree upon the succession of stressed syllables, as English is a language with stress-timed rhythm.
(3) The choice of the vowel depends on where the stress is placed in respect of structural words. If a syllable is stressed, it is generally the strong vowel that is used and in unstressed syllables, it is mostly a weak vowel that is used.
(4) Stress is said to be contrastive in English - i.e., it makes for a difference in grammatical meaning and function in some words. There are a number of disyllabic words in English in which the accentual pattern depends upon whether the word is used as a 'noun' or adjective or as a verb. The accent is on the first syllable if the word is a noun or adjective and on the second if it is a verb. Some examples are:

Noun/adjective	Verb
'conduct	con'duct
'digest	di'gest
'present	pre'sent
'record	re'cord
'subject	sub'ject

4.2 YA word accent

In YA accent is more flexible and less significant than it is in English. In other words, the stress is predictable and there is no 'fixed' syllable for accent in the same sense as for in English word. The phonetic contrast between an accented and an unaccented syllable of an Arabic word is quite narrow compared to the wide range of contrast in English. Furthermore, accent is not contrastive in YA as it is in some English words where different location of the accent distinguishes the grammatical status of that word.

Accent in YA functions at the phonetic level. It refers to the relative prominence of a syllable or syllables of a word. Certain syllables stand out from their neighbours by virtue of their quantity, quality or their potentiality to initiate a change in pitch level or pitch direction. This prominence is phonetic and thus can be kinesthetically felt by the speaker or editorially recognized by the listener or both. A syllable with long vowels stands out from others. For instance, in /qa:ma/ 'stood up', the first syllable is accented.

Stress in YA normally recedes from the end of the word towards the beginning in search of a long or a short open syllable, e.g.,

(4)		
	[mutakali'mu:n]	talkers
	[kali'ma:t]	words
	[ri'ga:l]	men
	[sa'la:m]	peace
	[tˤa'bi:b]	doctor
	[qu'lu:b]	hearts
	[fu'lu:s]	money

The syllable containing a long vowel is accented. If there is no heavy weight, the first syllable is primarily accented.

(5)		
	['maʃa]	walked
	['saʕa]	went
	['ʁada]	lunch
	['baqa]	stayed
	['ʕaʃa]	dinner
	['dara]	knew

When two long vowels co-exist in one word the last is accented, e.g.,

(6)		
	[sala:'ma:t]	peace
	[qa:'nu:n]	law
	[muʕa:ma'la:t]	works
	[muqa:ba'la:t]	interviews

[mula:ħa'ðˤa:t] notes

If there is no long vowel, the syllable contains (a) a double consonant, (b) consonants cluster or (c) homorganic nasal has no impact in determining the accent. The first consonant belongs to the first syllable and the second belongs to the second one, and the first syllable is accented.

(7) (a)	['ballaʁ]	informed
	['sˤallaḥ]	repaired
	['sallaɱ]	surrendered
	['mattaʕ]	enjoyed
(b)	['malʕab]	playground
	['maqbar]	grave
	['naqfiz]	jumped (we)
(c)	['munðir]	a name
	['mandi]	fried meat

Length in YA is phonemic. Examples of contrast between long and short vowels are appended below:

(8)	/qa:lab/	pattern
	/qalab/	changed
	/ʕa:r/	shame
	/ʕar/	a challenge word
	/qu:m/	stand up
	/qum/	a name
	/ba:r/	obedient
	/bar/	desert

In disyllabic words the first syllable is always prominent. However, it is also possible to stress the second syllable to indicate different associations of meaning such as emphasis.

CV CVC (First, second)

(9)	/baqar/	cows
	/samak/	fish (Plural)
	/maraq/	soup
	/galas/	sat down
	/katab/	wrote
	/qalam/	pen

CV CV (first, second)

	/baqa/	stayed

/sama/	sky
/zana/	committed adultery
/quda/	stick

In trisyllabic words CVCVCV, the first syllable is stressed primarily. If the prominence is given to the second or the third syllable, they will sound unacceptable and odd.

CVCVCV (first, second, but not the third)

(10)

/baqara/	cow
/samaka/	fish (singular)
/wazaʁa/	lizard

From the foregoing discussion, the absence of fixed word stress in YA explains why medieval Arab grammarians, so meticulous in noting other facts of pronunciation, made no mention of stress. This neglect is because YA has no noticeable stress.

Some Oriental scholars such as Wright (1859) and Janssen (1972), preoccupied with the description of the English language, described Arabic as having stress patterns. This view is opposed by other eminent scholars such as Birkeland (1954) and Garbell (1958). To quote Birkeland, (1954: 13):

> What must be denied ... is not the existence of stress per se.... What must be denied is a pattern demanding consonant stress on the same syllable of the same word with all speakers; in other words, what is denied is the pattern of fixed word stress.

Another eminent scholar, who denied the existence of fixed stress in Arabic, is Cantineau. In his *Cours de phonetique arabe,* he expresses his position as follows:

> En arabe ... on ne voit pas qu'un accent du mot ait joué un rôle distinctif quelconque, d 'où le silence des grammairiens arábes, (1961:120).
> [Stress is not distinctive and was not mentioned by
> the grammarians for this reason].

Elizabeth Welden (1977) states that CV: C and CVCC syllables occur only in pausâl forms. However, this does not hold correct. CV: C and CVCC can occur in pausal forms or otherwise. For example:

(11)

ʕa:lim	CV:CVC	scholar
χabba:z	CVCCV:C	baker

occur in monomorphemic words. She also made some statements about the Arabic word stress but again, these statements are contradictory and false. Let us consider the statements mentioned by her:

Statement I:	Stress does not fall on the last syllable, whether it is heavy or light.
Statement II:	Stress falls on the last heavy syllable in a word
Statement III:	If a heavy syllable does not occur, stress falls on the first syllable of a word.

Statement I does not hold sound because the heavy syllable is always stressed, particularly at the end. This statement also contradicts the second statement. If we eliminate her statement number I, then her observations are sound.

Thus difference in stress is immaterial to the Arabic speakers and hence it is a major area of difficulty for Yemeni learners when learning English as described in 3.5. below.

4.3 Comparison of stress of English and YA

English is one of those languages that are strongly stressed and in which stress-contrast affects meaning. In other words, English has relatively strong stress, which is phonemic. In contrast with English, YA has relatively weak stress, which is predictable in terms of the syllabic structure of the word. Hence, the stress in YA is non-phonemic in contrast with that in English.

The stress in both languages can be studied on two levels: the word level and the sentence level. All words in English and YA, when cited in isolation, have one primary stressed syllable. But in a sentence, not all the words are stressed. It will be better therefore, to study and compare the stress in English and YA first as word stress and then as a sentence stress.

4.3.1. Word stress

The word stress in both English and YA may be defined as the relative degree of force used in pronouncing the different syllables of a word of more than one syllable. Monosyllabic words may be considered as without word-stress. Three degrees of word stress are usually recognized in English and are named by different authorities as

(i) Primary, main, strong, or principal stress;
(ii) Secondary, medium, half strong stress; and
(iii) Tertiary, weak stress or unstressed.

The word stress in YA can be considered to occur in two degrees only, primary and secondary. Moreover, weak stress is not attested in YA. In YA as well as in English, instead of three, we will accept, for the convenience of discussion here, only two degrees of stress. These will be marked as:

/ˈ/ Primary stress
/ˌ/ Secondary

As it has been already noted, stress in English is phonemic, and it influences the quantity of vowels. Most English words of two syllables have one primary stress, but there are a few words of two syllables with both syllables being stress-potential. For instance, the nouns *increase* and *insult* are stressed on the first syllable and the verbs *increase* and *insult* are stressed on the second syllable; but words like *fifteen* and *prepaid* can have primary stress on either syllable, depending on the sentence rhythm. Words of three or more syllables usually have one primary stress, or one primary and one secondary stress. We may say, therefore, that words in English have only one primary stress and can have up to two secondary stresses. To quote Daniel Jones (1989: 248):

> Generally speaking there are no rules determining which syllable or syllables of polysyllabic English words bear the main stress. The foreign student is obliged to learn the stress of each word individually.

Some people do not agree with Daniel Jones; and have tried to give some rules regarding word stress in English. Though it may not be possible to give a complete set of rules to cover the whole area, it is possible to give some rules regarding word stress in English.

In his "The Ground-Work of English Stress", Roger Kingdon (1958: xii) says:

> It might be possible to throw a little light on the incidence of words stress and to formulate some rules that would be of use to foreign learners.

The idea of stress is not a familiar one to the Arabic philologists. Although the Arab philologists have been meticulous in discussing each part of the Arabic phonology and grammar, of course in a traditional way, for more than a thousand of years, they have made no mention of the idea of stress, which entails that stress has no value in the intelligibility of the Arabic language. Since we are taking English as a model of contrast, we should compare the stress of the YA with that of English.

Contrary to English, YA has a non-phonemic, predictable word stress. The YA word stress is not confined to any particular position in the word. It

falls on the initial syllable, medial syllable and in some words on the final syllable also. It is possible therefore to conclude that:

1. Since the stress in English is phonemic, it will have to be taught like the segmental phonemes of English.
2. Though some general rules regarding stress can be given, it will always be better to teach the stress of each and every word separately along with their phonemes.
3. The stress in YA can be made use of in many ways, but mainly it will help us in predicting the difficulties and the mistakes of YA speakers in learning the English stress system. That is to say, the description of the YA stress system will provide a scientific base for the test-framing.

As already noted above stress in YA is not phonemic and is predictable in terms of the syllabic structures of the word. As a rule, stress falls on the syllable with a long vowel in the word. If there are two long syllables in a particular word then it falls on the last long syllable. Those syllables can be considered long if they have a long vowel (i.e. /i:, a:, u:/) and among those, those syllable which have long vowels followed by semi vowels such as /ta:jif/ "a name", /qa:jim/ "standing up", are considered longer. Similarly, if a long vowel is preceded by geminate such as /nawwa:m/, "sleeping too much", or followed by a geminate which is preceded by a long vowel such as /tˤa:mmah/ "catastrophe", that is also considered extra long. Some rules regarding the stressing of YA are given below:

1. Monosyllabic words are considered as without word stress.
2. Words of more than three syllables are not frequent in YA

The following notes are the rules governing the single stress of two or three syllable words:

1. The first syllable is stressed if both the syllables have short vowels and the second syllable is an open one: e.g.,

(12)	['ʕala]	on
	['ʔila]	to
	['qara]	read
	['ʁara]	glue
	['ʃara]	buy (past)
	['bala]	pain
	['mara]	woman

2. The first syllable is stressed if it has a close syllable e.g.,

(13)	['ʕasal]	honey
	['basʕal]	onions
	['batʕal]	hero
	['malak]	angel

3. The second syllable is stressed if a word ends in a consonant cluster, e.g.,

(14)	[tˤa'laʕt]	went up
	[ma'sakt]	caught
	[ba'laʁt]	reached
	[qa'talt]	killed
	[ka'sart]	broke

4. A syllable with a long vowel receives a primary stress.

(15)	[ʕum'ma:l]	workers
	['fa:ðˤi]	empty
	['na:jim]	sleeping
	['ma:liħ]	salty
	[ma'li:ħ]	beautiful

5. If the word has two syllables with long vowels, the last is generally stressed.

(16)	[sala:'ma:t]	peaceful
	[ʕala:'ma:t]	marks
	[muqa:ba'la:t]	interviews

5. Word Study in YE

The practical part of this paper is to describe the Yemeni English (YE) used by Yemeni speakers and to envisage the degree of influence of the source language on their production of the target language. Specimens of English spoken by educated Yemeni speakers were recorded. By 'educated', we mean that the speakers were all graduates. The speakers were chosen at random, which means no pre-conceived notions about the proficiency of the speakers in English were borne in mind. Twenty speakers were recorded. The professions of the speakers vary from teaching at a university level to working on Ph.D. or MA dissertations on English, management, computer science, etc. Many of the speakers have had previous training in phonetics. They were 17 males and 3 females and their age ranges from 25 to 45. All the speakers belong to the Taiz province where the Taizzi dialect is spoken.

5.1 Data collection and the choice of speakers

A record of each speaker's particulars was kept on the form reproduced below:

Recordings of Spoken English:
Serial Number:
Date:
Place:
Tape number:
Speed:
Playing time:
Name of the speaker:
Age:
Sex:
Mother Tongue:
Other Languages known:
Place of Birth:
Place where he/she has lived more than a year
Medium of instruction:
(a) in School
(b) in college
Qualification:
Has he/she had any special training in phonetics or spoken English?
Occupation:
Recording done by:
Comments:

5.2 The text

The text used for all recorded specimens comprises a list of fifty words. These fifty words are reproduced below:

1.	idea	26.	profile
2.	certify	27	invoice
3.	arrive	28.	export (noun)
4.	economic	29.	export (verb)
5.	rhythm	30.	reconsider
6.	decision	31.	understand
7.	reply	32.	personnel
8.	information	33.	telephone
9.	cigarette	34.	encounter
10.	yesterday	35.	uncertain
11.	important	36.	remarkable
12.	button	37.	photography
13.	identify	38.	unimportant
14.	impossible	39.	participate
15.	unfortunate	40.	helicopter
16.	photographic	41.	affiliation

17.	appetizing	42.	objectivity
18.	misrepresent	43.	degree
19.	interdependence	44.	convertibility
20.	rehabilitate	45.	indistinguishable
21.	inferiority	46.	custodian
22.	meteorological	47.	examination
23.	autobiographic	48.	unreliability
24.	antique	49.	photograph
25.	invent	50.	enthusiastically

The words were listed randomly. The primary objective behind the word list of the section was to observe the word accentual patterns of the Yemeni speakers and so words of various accentual patterns in English were included in the list. The patterns are shown below:

1. Words with prefixes re-, im-, in-, un-, mis-, en-
   e.g., reconsider, important, indistinguishable, uncertain, misrepresent, encounter etc.
2. Words with suffixes –fy, -ic, -sion, -tion, -ette, -ant, -ible, -able, -ence, -ate, -ical, -ain, -ity, -ian, ically.
   e.g., certify, economic, decision, information, cigarette, important, impossible, remarkable, interdependence, rehabilitate, meteorological, uncertain, custodian, enthusiastically, etc.
3. A pair of words differentiated in stress in RP on the basis of the grammatical function (noun/verb) also was included.

5.3 Recording

The speakers were recorded in quiet surroundings. The tape-recorder that was used for recording all the twenty speakers was a Philips Automatic Recorder, Model: RR 571.

Each speaker was provided with a copy of the text a few minutes before he/she was recorded. They were asked to go through the text carefully and to read out the text quite naturally. The speakers were asked to mention their names before reading out the text. They were specially requested to pause a little after each word or sentence. After each recording was over, it was played back and checked that the recording was properly done. Depending on the convenience of the speakers, the recording was done in different sittings, but all within a span of three days, the researcher personally recording all speakers.

5.4 Analysis of recordings

The discussion on word-accent in YE relates to:

i) the difference accentual patterns used by the Yemeni speakers of English,

ii) the deviations of their accentual patterns from those of RP, and
iii) the extent of interference from the source language, YA.

The various accentual patterns of the fifty words given above are reproduced below as uttered by the speakers. The syllable accented in each word is marked before and on top of the syllable. Only the primary accent is noted and the secondary accent, if any, ignored. The accent was decided by auditory impressions. The majority pattern of accentuation with regard to each word is indicated.

	Accentual pattern of the word	No. of speakers using this pattern	percentage (the total number of speakers
	1	2	3
1.	'idea	15	75%
	i'dea	5	25%
2.	'certify	2	10%
	certi'fy	18	90%
3.	'arrive	7	35%
	ar'rive	13	65%
4.	'economic	1	5%
	e'conomic	15	75%
	eco'nomic	4	20%
5.	'rhythm	19	95%
	rhy'thm	1	5%
6.	'decision	6	30%
	de'cision	12	60%
	deci'sion	2	10%
7.	'reply	1	5%
	re'ply	19	95%
8.	'information	3	15%
	in'formation	1	5%
	infor'mation	16	80%
9.	'cigarette	19	95%
	ciga'rette	1	5%
10.	'yesterday	10	50%
	yester'day	10	50%
11.	'important	3	15%
	im'portant	15	75%
	impor'tant	2	10%
12.	'button	15	75%
	but'ton	5	25%
13.	i'dentify	4	20%
	identi'fy	16	80%

	Accentual pattern of the word	No. of speakers using this pattern	percentage (the total number of speakers

	1	2	3
14.	'impossible	7	35%
	im'possible	13	65%
15.	'unfortunate	4	20%
	un'fortunate	11	55%
	unfortu'nate	5	25%
16.	'photographic	6	30%
	pho'tographic	5	25%
	photo'graphic	9	45%
17.	'appetizing	4	20%
	appe'tizing	16	80%
18.	'misrepresent	5	25%
	mis'represent	2	10%
	misrepre'sent	13	65%
19.	'interdependence	8	40%
	interde'pendence	12	60%
20.	'rehabilitate	1	5%
	reha'bilitate	1	5%
	rehabili'tate	18	90%
21.	'inferiority	7	35%
	in'feriority	3	15%
	inferi'ority	10	50%
22.	meteoro'logical	18	90%
	meteorologi'cal	2	10%
23	'autobiographic	5	25%
	auto'biographic	4	20%
	autobio'graphic	11	55%
24.	'antique	8	40%
	an'tique	12	60%
25.	'invent	10	50%
	in'vent	10	50%
26.	'profile	1	5%
	pro'file	19	90%

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	Accentual pattern of the word	No. of speakers using this pattern	percentage (the total number of speakers
	1	2	3
27.	'invoice	8	40%
	in'voice	12	60%
28.	'export (noun)	4	20%
	ex'port (noun)	16	80%
29.	'export (verb)	13	65%
	ex'port (verb)	7	35%
30.	'reconsider	7	35%
	re'consider	8	40%
	recon'sider	5	25%

31.	'understand	3	15%
	under'stand	17	85%
32.	'personnel	14	70%
	per'sonnel	1	5%
	person'nel	5	25%
33.	'telephone	11	55%
	tele'phone	9	45%
34	'encounter	3	15%
	en'counter	17	85%
35.	'uncertain	7	35%
	un'certain	6	30%
	uncer'tain	7	35%
36.	'remarkable	1	5%
	re'markable	19	90%
37.	pho'tography	12	60%
	photo'graphy	8	40%
38.	'unimportant	6	30%
	un'important	1	5%
	unim'portant	13	65%
39.	par'ticipate	2	10%
	partici'pate	18	90%
40.	'helicopter	10	50%
	heli'copter	10	50%

Accentual pattern of the word		No. of speakers using this pattern	percentage (the total number of speakers
	1	2	3
41.	'affiliation	4	20%
	affili'ation	16	80%
42.	'objectivity	2	10%
	ob'jectivity	4	20%
	objec'tivity	14	70%
43.	'degree	10	50%
	de'gree	10	50%
44.	'convertibility	6	30%
	con'vertibility	2	10%
	conver'tibility	7	35%
	converti'bility	5	25%
45.	'indistinguishable	2	10%
	in'distinguishable	1	5%
	indi'stinguishable	7	35%
	indisti'nguishable	10	50%
46.	'custodian	12	60%
	cu'stodian	7	35%
	custo'dian	1	10%
47.	'examination	6	30%
	e'xamination	2	10%
	exami'nation	2	60%
48.	'unreliability	8	40%
	unre'liability	8	40%

	unrelia'bility	4	20%
49.	'photograph	9	45%
	pho'tograph	2	10%
	photo'graph	9	45%
50.	'enthusiastically	6	30%
	en'thusiastically	6	30%
	enthu'siastically	3	15%
	enthusi'astically	5	25%

5.5 Findings and Recommendations

Looking at the data above, it is difficult to find a pattern in the way the Yemeni speakers stress the English words. The twenty Yemeni speakers recorded have scored an overall general average of 52% in conformity to the RP, which is a low average. However, we can arrive at some general remarks based on the speakers' production.

(1) Whenever the speakers encountered a heavy syllable, they tend to stress it (heavy syllables include long vowels and diphthongs). For instance, in the word *profile*, the speakers shorten the first vowel and placed the stress on the second syllable wrongly by the 99% percentage. This is attributable to the fact that this word includes a diphthong on the second syllable, which was stressed by the speakers.
(2) With regard to contrastive stress, the speakers get the verb more correctly than the noun.
(3)The speakers tend to accent the suffix 'fy' of words such as 'certify' and 'identify', where the degree of conformity to RP is below 20%.
(4) There is a tendency to stress the last syllable of words ending in *–ate.*
(5) There is a general conformity to RP in stressing words ending in –tion.
(6) The words containing double consonants in data are *arrive* and *button* were pronounced correctly by the majority of the speakers. However, the researcher observes that most of the Yemeni speakers tend to geminate the English words that contain double consonants such as *collide, collect, collapse, corruption, correct* etc., and consequently place the stress wrongly on the first syllable of such words.
(7) Other divergences observed by most of the speakers are the words ending with 'ic', as in 'photographic', words ending with 'ette' as in 'cigarette'. The degree of conformity to RP in 'ic', 'ette' and 'ate' patterns are 21%, 5% and 22% respectively.
(8) There is no consistency in the speakers' patterns of stress. This may be due to the influence of YA. In YA whichever syllable one stresses, there is no great change in meaning, because stress operates at the phonetic level.

Based on the majority pattern, the words which conform to RP are listed

below:

1.	arrive	2.	rhythm
3.	decision	4.	reply
5.	information	6.	important
7.	button	8.	impossible
9.	unfortunate	10.	photographic
11.	appetizing	12.	misrepresent
13.	interdependence	14.	inferiority
15.	meteorological	16.	autobiographic
17.	antique	18.	understand
19.	telephone	20.	encounter
21.	remarkable	22.	photography
23.	unimportant	24.	objectivity
25.	degree	26.	examination

The following words were stressed differently from RP by the majority of speakers:

1.	idea	2.	certify
3.	economic	4.	cigarette
5.	yesterday	6.	identify
7.	rehabilitate	8.	invent
9.	profile	10.	invoice
11.	export (n)	12.	export (v)
13.	reconsider	14.	personnel
15.	uncertain	16.	participate
17.	helicopter	18.	affiliation
19.	convertibility	20.	indistinguishable
21.	custodian	22.	unreliability
23.	photograph	24.	enthusiastically

1. Whenever the speakers encounter a heavy syllable, they tend to stress it; (heavy syllables include long vowels and diphthongs).
2. Influenced by gemination in YA the speakers tend to geminate the English words that have double consonants in spelling and thus stress the syllable which includes the gemination.
3. With regard to contrastive stress, the speakers get the verb more correctly than the noun, (ex: *export*).
4. Generally, most of the errors are attributable to the pull of the mother tongue, inappropriate teaching and the orthography.
5. The speakers tend to accent the suffix 'fy' of words such as certify and identify, where the degree of conformity to RP is below 20%. Other divergences observed by most of the speakers are the words ending with 'ic', as in photographic, words ending with 'ette' as in cigarette, and words ending with 'ate' as in participate. The degree of conformity to RP in 'ic', 'ette' and 'ate' patterns are 21%, 10% and 22% respectively.
6. There is no consistency in the speakers' patterns of stress.
7. The Yemeni speakers of English have some problems in the area of

rhythm, particularly unnecessary pauses, and inappropriate linking.

8. Structural words are generally not weakened (ex: I've ≠ I have, I'm ≠ I am).
9. When introducing words to the learners for the first time, word accent should be taught side by side from the outset. Great effort should be made to change the students' attitudes towards word accent. In other words, the students should be aware of the fact that they are not free to place the accent on any syllable they want.

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