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MINISTRY OF HIGHER EDUCATION AND SCIENTIFIC
RESEARCH**

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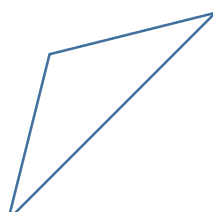
**SECOND -YEAR (LMD) STUDENTS
ARTICULATORY PHONETICS**

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The Course Aim and Description in Brief

This course book introduces second-year L.M.D students to phonetics. It is a follow-up to the one that is already available for first-year students. Its aim is two-fold: it consolidates the lessons taken in class and then provides the learners with an ample opportunity to immerse themselves in the subject matter, as almost every lesson is followed by a series of exercises. Equally, to avoid redundancy i.e., superfluous repetition or overlapping of the first year and second year lessons, the author has seen it fitting to devote a substantial part of the work to phonology, including the aspects of connected speech.



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Introduction

The effective use of a given language is by no means limited to the use of morphemes, words, phrases, and sentences. The knowledge of the sound system of a language, and how its sounds combine to convey comprehensible units is equally essential. Then, the failure to articulate the speech sounds of a target language correctly may hinder communication significantly. Hence the importance of phonetics which has always been part of language study. Learning phonetics is rewarding, for it, among others, enables the learner to better understand and speak the target language.

This present workbook, which is designed for Second-Year L. M. D graduate students, does not pretend to be exhaustive. It is, in fact, a compendium whose aim is to provide second-year learners with basic knowledge of phonetics. Therefore, throughout the workbook, the lessons are illustrated with diagrams, charts, and figures along with a series of exercises whose aims are twofold: to give the learners practice in what they have learnt throughout the lesson and consolidate those notions. To achieve such purposes, the author has seen to it that gradation in the lessons and the exercises is observed. The workbook is divided into five broad sections.

Section one is devoted not only to the notion of phonemes, being the building blocks of words but also to the study of the sequences of phonemes and their distribution within utterances. Because such a study cannot be achieved without the knowledge of syllables, attention was drawn to the latter in the following section.

Section two aims at familiarizing the learners with the notion of syllable and its types, for the author has it fitting and proper to introduce such a notion in the second-year course book, as the learners will be introduced to study stress, its value in working out the meaning of an utterance and the prediction of stress within a word.

Section three is closely connected the section two since section two has been designed to pave the way for this section. It is rather practical as it includes a battery of exercises whose ultimate aim is to immerse the learner in the language.

Sections four, five and six are interrelated as they focus on the aspects of connected speech, rhythm, and intonation. They present the learner with the English native speakers' speech habits i.e., how they daily articulate words and sentences; when and where they pause; how sounds are elided or assimilated to ease communication.

Section seven invites the learner to the notion of intonation and its value in daily interaction, and the way it conveys meaning. It intends to familiarize the learner with tone units, the type of tones, onset syllables and tonic ones, commonly known as nuclei. It also aims at building the learner's awareness of how the melody of pitch changes in connected speech.

The final section introduces the learner to sentence stress. Its purpose is to acquaint him/her with the stress-timed feature of the English language which differs significantly from syllable-timed languages such as French, Italian, Spanish, Brazilian, and Portuguese, which tend to give syllables approximately equal prominence and generally a lack reduced vowels. The fact that English is a stress-timed language rather than a syllable-timed one gives it a particular rhythm.

What is special about this course book though, is that it includes some examinations, and the correction of some has been provided. The purpose of such exams is to give the learner some idea about the activities s/he may have to grapple with during the academic

I. Describing English Sounds

The phoneme is the smallest unit of speech which allows one to make a distinction between a word from another, as in the element *p* in “tap,” which separates that word from “tab.”

1.Describing English Consonants

Consonants are described and classified in terms of their voice, along with their place, manner, and intensity of articulation.

1.1.Voicing

Voiced sounds are produced with the vocal folds vibrating, opening and closing rapidly producing voice. For voiceless (also unvoiced) sounds, the vocal folds do not vibrate as they are apart, allowing air to escape through them freely.

<u>Voiceless</u>	<u>Voiced</u>
/ p /	/ b /
/ t /	/ d /
/ k /	/ g /
/ f /	/ v /
/ θ /	/ ð /
/ s /	/ z /
/ ʃ /	/ ʒ /
/ tʃ /	/ dʒ /
/ h /	/ m /
	/ n /
	/ ŋ /
	/ l /
	/ r /
	/ w /
	/ j /

Table 1: voiced and voiceless consonant phonemes.

1.2.Place of Articulation

An important feature for the description of consonants is the exact place where

the airstream is obstructed or constricted. The production of consonants is the result of the movement of an active articulator towards a passive articulator, causing complete or partial closure in the vocal tract. An example of complete closure is the articulation of the speech sound [p], ensuing the articulation of the lower lip with the upper lip, thus producing the obstruction of airstream. A case in point of partial closure is the articulation of the sound [f], resulting from the movement of the lower lip towards the upper teeth.



Illustrated below are the places of articulation.

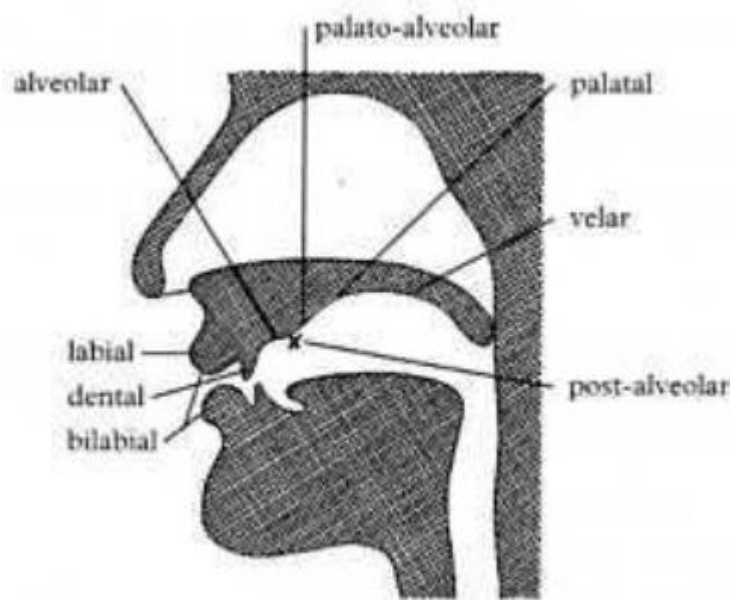
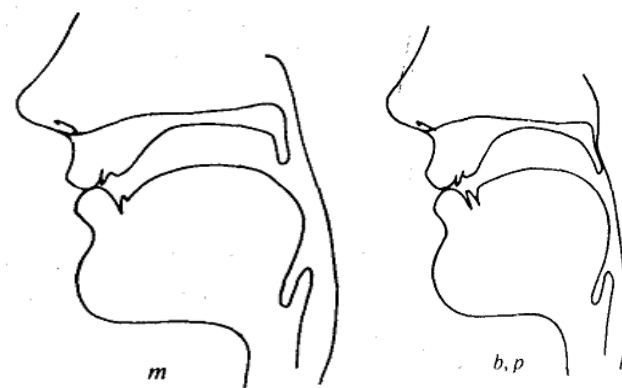


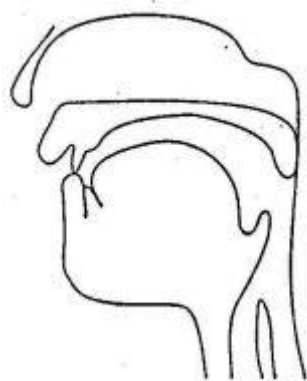
Figure 1: Major Articulatory Areas

When airflow obstruction occurs at the level of the lips, then such a place articulation is called 'bilabial'. An instance of that is the articulation of [p, b, m]



Position of lips and velum for [m] (lips together, velum down) and[p, b]
(lips together velum up)

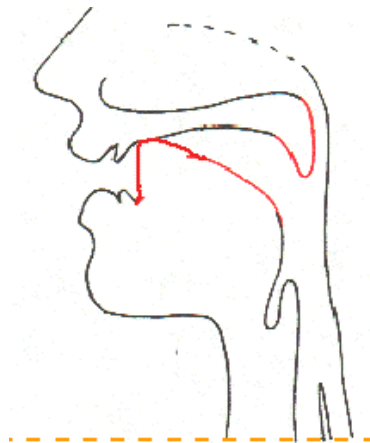
➤ **Labiodental:** the lower lip articulates with the upper teeth, e.g. [f,v]



➤ **Dental:** The tongue tip and rims articulate with the upper teeth, e.g. [θ, ð], as
in *think* and *then*.



- **Alveolar:** either the blade, or tip and blade, of the tongue articulates with the alveolar ridge, e.g. [t,d,l,n,s,z]

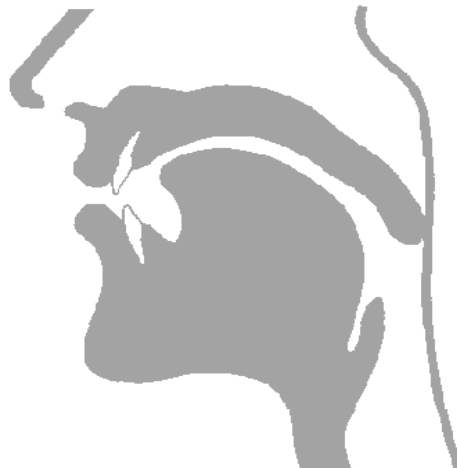


Alveolar

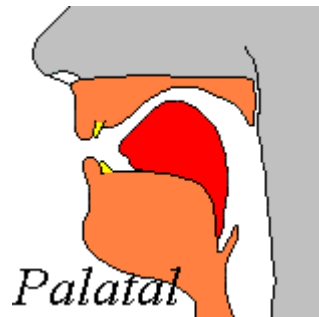
d, t, s, z, n

- **Palato-alveolar:** either the blade, or the tip and blade, of the tongue articulates with the alveolar ridge; at the same time, there is a raising of the front of tongue towards the hard palate, e.g. [ʃ, tʃ, dʒ] as in *ship, measure, cheap, Jeans*.

Consider the following diagram

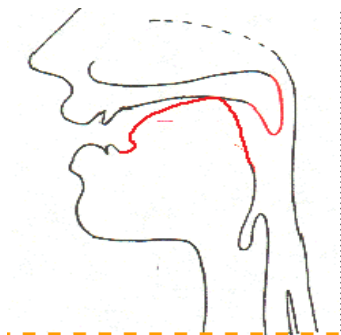


- **Palatal:** the front of the tongue articulates with the hard palate, e.g. [j] or as in *yellow* /ˈjɛl.əʊ/



Palatal Closure

- **Velar:** the back of the tongue articulates with the soft palate, e.g. [k, g, ŋ], as in *sing*.



Velar

g, k, ŋ

- **Glottal:** an obstruction, or a narrowing causing friction but not vibration, between the vocal cords, e.g. English [h] as in *ham*.

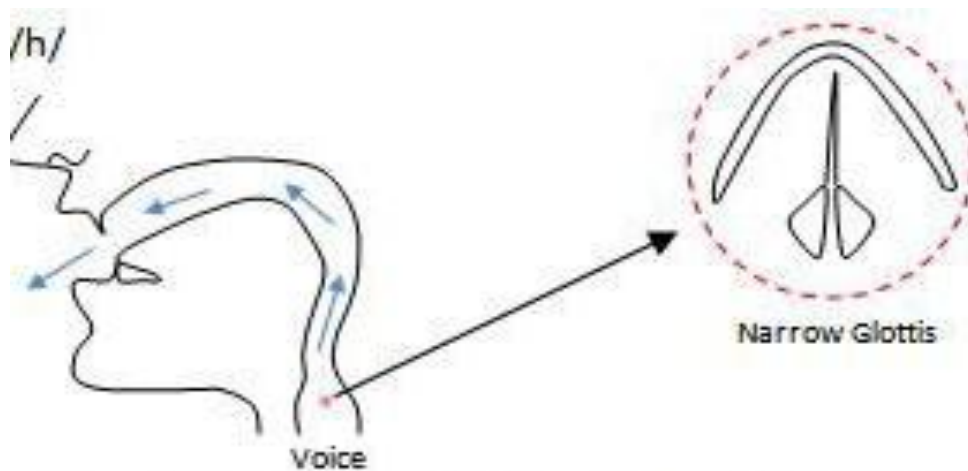


Figure 2: Glottal /Fricative

1.3. Manner of Articulation

Manner of articulation refers to the degree of closure of the speech organs and the type of constriction.

- **Plosive/stop refers to** temporary complete closure at some area in the vocal tract, causing an obstruction to the flow of air and accumulation of pressure. Occlusion occurs at two levels: either at the level of the glottis, hence, the phrase glottal stop[ʔ] to describe the resulting speech sound.

It can occur at the level of the lips , when both lips are brought together. Consonants of this type are [p, b]

- A **Fricative also called a spirant** sound is characterized by an audible friction produced by forcing the breath through a constricted or partially obstructed passage in the vocal tract. Fricative sounds are:

[f, v, ʃ, ʒ, θ, ð, h]

- **Affricate/affricative** describes a speech sound comprising occlusion, plosion, and friction, as either of the digraphs /tʃ/ and:

/ dʒ / as in the words: chair /tʃeə / and George /dʒɔ:dʒ/.

- **Lateral consonants are** characterized by a frictionless speech sound pronounced with only a partial obstruction of the breath stream as the lateral consonants l in 'leopard' /'lep.əd /
- **An approximant** is the result of an articulation in which one articulator is close to another, but not sufficiently so to form a stop or a fricative.

Sounds characterized by such an articulation are found in /r /, /w/, /i/ as in the following words: ram , wallet, yard

/ ræm / , / \wɒlɪt /, / jɑ:d /

1.4. Intensity of Articulation

The distinctive feature of speech sounds as such does not only dwell in their phonation, i.e., whether they are voiced or voiceless, but also in the muscular effort exerted in the articulation of such speech sounds. So, unlike the production of voiced sounds, that of the unvoiced ones require more energy to be expended. Because of the presence of force in the articulation, voiceless speech sounds are called fortis, whereas, voiced speech sounds are called 'lenis'.

Recapitulation

What should be retained is that for the description of a consonant phoneme, four elements must be considered:

- ✓ Voicing
- ✓ Place of articulation
- ✓ Manner of articulation
- ✓ Intensity of Articulation

Example:

- / t / is voiceless, alveolar, stop, fortis.
- / b / is voiced ,bilabial, stop, lenis.
- / l/ is voiced ,alveolar, lateral, lenis.
- /tʃ/ is voiceless palato-alveolar, affricate, fortis.

Here is a brief description of some relevant feature of English consonants.

MANNER	PLACE									
	bilabial	labio-dental	dental	alveolar	post-alveolar	palato-alveolar	palatal	velar	labio-velar	glottal
plosive	p			t				k		
	b			d				g		
fricative		f	θ	s		ʃ				h
		v	ð	z		ʒ				
affricate						tʃ				
						dʒ				
lateral				l						
nasal	m			n				ŋ		
approximant					r		j		w	

Table 2 *Articulatory classification of the English consonants*

Exercise 1

- ✎ A. Decide if the final consonants in column A are voiced or voiceless.
- ✎ B. Decide if the initial consonants in column B are voiced or voiceless.

A	voiced / voiceless.	B	Voiced/voiceless.
Washed		barber	
travelled		knob	
coats		gauge	
gloves		thorough	
tomb		meet	
gauge		contrast	
car		balloon	
dig		house	
cane		knowing	
both		chemistry	

Sneeze		philology	
Halifax		judge	
dreams		writer	
seat		vase	
dropped		Sean	
exchange		George	
Bathe		bring	
cough		knob	
shrimp		knee	
lease		thorough	
miming		pain	
wrote		cling	

Exercise 2

 Describe the following Consonants

/ p / -

/ k / -

/ m / -

/ l / -

/ t / -

/ g / -

/ s / -

/ z / -

/ f / -

/ w / -

/ j / -

Exercise 3

✎ Choose the appropriate description which best fits the initial consonant.

Jump	a) fricative	b) nasal	c) approximant	d) affricate
Bear	a) fricative	b) nasal	c) bilabial	d) affricate
Cow	a) fricative	b) nasal	c) glottal	d) plosive
Gaol	a) affricate	b) lateral	c) glottal	d) nasal
Dart	a) fricative	b) alveolar	c) approximant	d) affricate
wallet	a) affricate	b) approximant	c) glottal	d) nasal
tablet	a) Stop	b) bilabial	c) glottal	d) fricative

Exercise 4

✎ Choose the appropriate description which best fits the final consonant.

give	a) velar	b) glottal	c) approximant	d) affricate
mad	a) affricate	b) stop	c) bilabial	d) fricative
load	a) fricative	b) nasal	c) glottal	d) plosive
dig	a) bilabial	b) lateral	c) nasal	d) plosive
make	a) fricative	b) alveolar	c) approximant	d) velar
low	a) affricate	b) approximant	c) glottal	d) nasal
parting	a) stop	b) nasal	c) glottal	d) fricative
lame	a) fricative	b) palate- alveolar	c) lateral	d) bilabial
tin	a) fricative	b) nasal	c) palatal	d) affricate
mob	a) bilabial	b) approximant	c) nasal	d) stop
ball	a) bilabial	b) lateral	c) nasal	d) plosive

Exercise 5

1. ✂ **Circle the words that begin with a bilabial consonant:**
take had bar mom let poor dime
2. ✂ **Circle the words that begin with a velar consonant:**
theatre card tin gaol gymnastics goal Kirk
3. ✂ **Circle the words that begin with an alveolar consonant:**
sail zip nip lip sip tip dip check
4. ✂ **Circle the words that begin with a labiodental consonant:**
fat cat that mat chat vat crime
5. ✂ **Circle the words that begin with a palato-alveolar consonant:**
sigh pain shy tie thigh thy lie sake
6. ✂ **Circle the words that end with a bilabial consonant**
think brave half calm beard mob tear

Exercise 6

- ✂ **Write the symbol that corresponds to each of the following phonetic descriptions, then give an English word that contains that sound. Number one is done for you.**

1. A voiced bilabial stop / b / bear

What about the following?

- A voiced velar nasal
- A voiced interdental fricative
- A voiceless post-alveolar affricate
- A voiced alveolar stop
- A voiceless glottal fricative

- .A voiced palato-alveolar affricate
- A voiceless labio-dental fricative.
- A voiced labiodental fricative
- A voiceless alveolar fricative
- A voiced palatal affricate
- A voiceless bilabial stop
- A voiceless dental fricative

Exercise 7: Answer the following questions.

- 1) What voiced consonant has the same place of articulation as /b / and the same manner of articulation as / ŋ /?
- 2) What voiceless consonant has the same place of articulation as /s / and the same manner of articulation as/ p /?
- 3) voiced consonant has the same manner of articulation as /v/and the same place of articulation as/ d/?
- 4) What voiceless consonant has the same manner of articulation as /θ/and the same place of articulation as/ ʔ /?
- 5) What voiced consonant has the same manner of articulation as /tʃ/and the same place of articulation as/ ʒ

Exercise 8: Do the following pairs of consonants have the same or different place of articulation?

- 1) [s] : [l]
- 2) [b] : [f]
- 3) [m] : [n]
- 4) [k] : [ŋ]
- 5) [v] : [ð] [p] : [g]

Exercise 9**Activity 1: Transcribe the following**

1. Peter
2. know
3. tongue
4. pneumonia
5. Arkansas
6. Thames
7. Where do you think Kirk is going?

Activity 2: Give the VPM of the following English phonemes

/p /			
/ k /			
/ l /			
/ w/			
/ ŋ /			

Activity 3: Look at the following English consonant phonemes and choose the appropriate description which best fits the **initial consonant**.

Jump	a) fricative	b) nasal	c) approximant	d) affricate
zoo	a) fricative	b) nasal	c) lateral	d) affricate
gnome	a) fricative	b) nasal	c) glottal	d) lateral
goal	a) velar	b) nasal	c) glottal	d) lateral
rice	a) velar	b) nasal	c) glottal	d) post-alveolar
colour	a) fricative	b) affricate	c) bilabial	d) velar
meet	a) labio-dental	b) nasal	c) approximant	d) fricative
gaol	a) affricate	b) lateral	c) glottal	d) nasal

2.Describing English Vowels

- 1.The vowel, as opposed to a consonant, is any letter of the alphabet which represents a vowel as, in English, *a, e, i, o, u*, and sometimes *w* and *y*.
- 2.In phonetics, it is a segment whose articulation involves no significant obstruction of the airstream, such as [a], [i] or [u]. Strictly speaking, a glide such as [j] or [w] may also be regarded as a (brief) vowel in this sense.
2. In phonology, it is a segment which forms the nucleus of a syllable.

2.1. Characteristics of English Vowels

The realization of vowels differs from that of consonants in that vowels are produced without any obstruction or friction of airstream in the vocal tract. In other words, vowels are sonorant whereas, consonants are obstruent. Additionally, all vowels are voiced, i.e., with vocal cords vibrating. Yet a distinction must be made between pure vowels (also monophthongs) and diphthongs. Whereas diphthongs are glides, i.e., they entail a movement from a vowel to another like the /aɪ/ in <my>, pure vowels consist of one vowel only.

2.2. Pure Vowels and their Types

Pure vowels are of two types: tense and lax vowels. Tense vowels are those which necessitate more muscular energy for their articulation. These are commonly known as long vowels as in the words: tea, who, fur, core, heart. Lax vowels are, on the other hand, articulated with relatively relaxed tongue muscles as in the words: fit, foot, egg, pot, hut, bag.

Listed below are tense and lax vowels

tense vowels:	i:, u:, ɜ:, ɔ:, ɑ:
lax vowels:	ɪ, ʊ, e, ɒ, ʌ, æ

Now that the vowel-consonant distinction in English is clear-cut, what makes a given vowel different from another? What makes /i/ different from /æ/? What makes /ɒ/ different from /u:/?

2.3. Production of English Vowels

When standing in front of a mirror and successively producing vowels such as [a: ɔ:, u:, i:], different tongue positions, along with lips shapes can be noticed. These differences in tongue positions and lips shapes among others, distinguish a given vowel from another. Thus, in order to describe a vowel three elements must be considered:

- Tongue height , i.e. how high the tongue is from the palate.

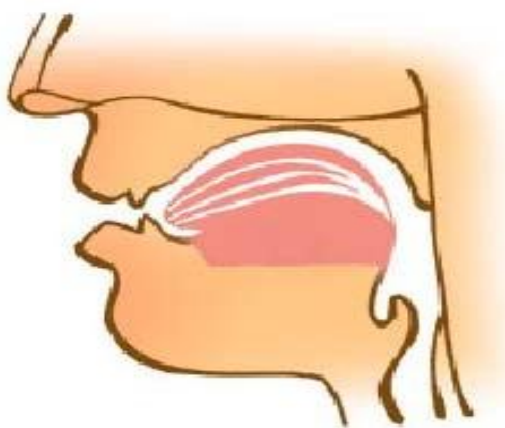
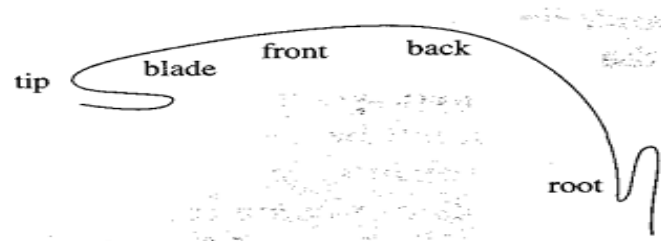


Figure 3: Different Tongue Heights

- The part of the tongue that is elevated, i.e. the front, the centre, or the back.



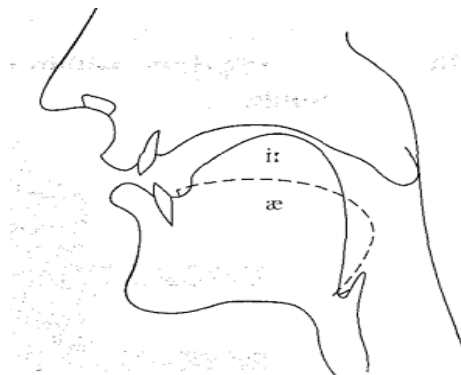
The shape of lips, i.e., rounded, unrounded, or neutral.

Lips Shapes



Vowel Lip Postures: adapted from Jeremy Harmer

Consider the articulation of /i:/ and /æ/ shown in the following figure.



Tongue positions for i: and æ

So, a first description of /i:/ is that it is a front, close/high vowel¹

As can be noticed, in the realization of the sound /i:/, in comparison of that of /æ/, the front of the tongue is closer to the palate. So, a full description of /i:/ is that it is a front, close, tense, unrounded vowel.

2.4. Cardinal Vowels

For the description, comparison, and classification of vowels in the world's languages as well as distinction between them, phoneticians have agreed to plot them in a quadrilateral that was conceived by the British phonetician Daniel Jones. That is a 'standard reference system' established from articulatory and auditory observations.

The quadrilateral shows not only some of these vowels, known as the 'cardinal vowels', but also the part of the tongue that is elevated towards the palate: Such part of tongue elevation can be frontal, central, or back. A further feature of Daniel Jones's reference system displays the positions to which the tongue is elevated: close, close- mid, open-mid, open. Illustrated below are some of the cardinal vowels.

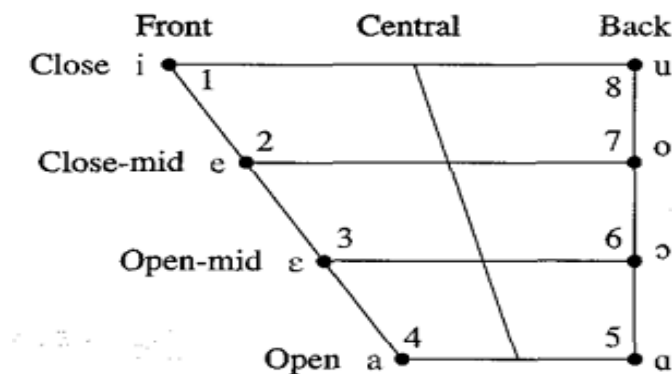


Figure 4: Cardinal vowels diagram

¹Front : a vowel is described as a front one because of the front the tongue that is involved;close: because it is close to the palate (roof of the mouth)

The cardinal vowels diagram stands for a reference chart to which phoneticians resort to describe the speech sounds of languages. For example, the tongue height of the English phoneme /ɔ:/ is between cardinal vowel number 6 [ɔ] and number 7 [O]

English pure vowels are the short and long vowels. These are plotted in the following diagram.

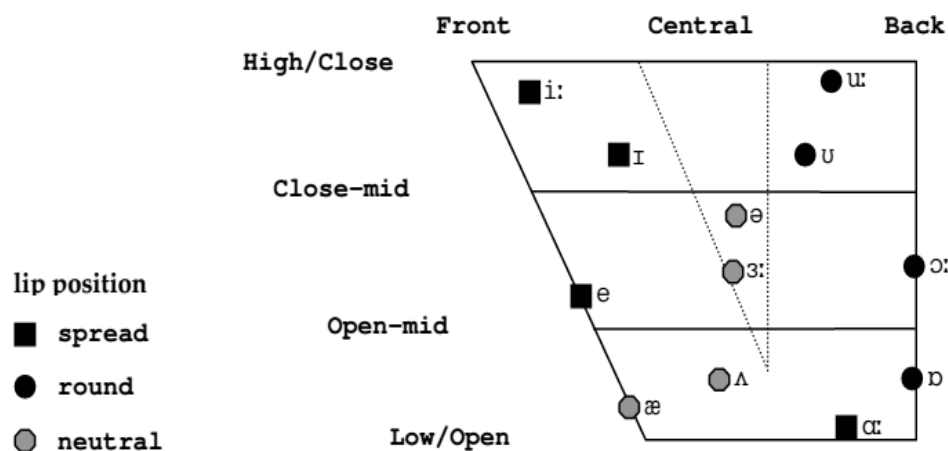


Figure 5: Description of English Vowels

Compared with cardinal vowel number (1) [i], the English vowel /ɪ/ is more open and closer to the centre, even though both vowels are high front ones. By the same token cardinal vowel number (4) [a] is more open than the English vowel /æ/ though both vowels are front low vowels.

Recapitulation

In order to describe a vowel, 4 elements must be considered:

- The tongue height
- The part of the tongue which elevated toward the palate
- The shape of lips
- The nature of the vowel : tense or lax

Exercises

✎ Exercise 1. Write down the phonetic symbols representing the following descriptions, and illustrate each of the sounds with two English words. Number 1 is done for you.

1. A high front tense unrounded vowel / i: / as in feet tea
2. A low back lax unrounded vowel
3. A mid front tense unrounded vowel
4. A mid front lax unrounded vowel
5. A high back lax rounded vowel
6. A low back lax rounded vowel
7. A high front tense rounded vowel

✎ Exercise 2. Do the following pairs of vowels have the same or different quality or tenseness?

a) move – look	h) play – mate
b) lock – hot	i) plait – bag
c) feed – lit	j) bore – cook
d) luck – hut	k) low – plough
e) lift – heal	l) fun – fan
f) food – hood	m) clue – do
g) tell – hail	n) lot – put

- ✎ Exercise 3. Transcribe the following words and circle the one(s) that contain(s) a vowel that fits the description on the left.

Low	small	bat	car	flee	pet
Front	river	song	fell	hot	trap
Back	loom	left	trip	mud	cord
High	shore	shop	bank	fall	loose
Rounded	meet	coarse	such	group	hat

Exercise 4:

- ✎ Circle each sound in the following words which matches the description given

1. A front vowel

egg mat tick farm dig

2. A back vowel

tar car loose tool pit nit

3. A central vowel

Kirk heat hit pool bed

4. An Unrounded Vowel

bean caught bin far tar whom

5. A Rounded Vowel

knit knee lose loom Chart cat

6. A Tense Vowel

bar bit beat boot learn feel

7. A Lax Vowel

beat bit nourish kill clerk tick cart would noon

8. A Low Tense Vowel

cart bell ring fill hot heart can mid

9. A High Front Vowel

lot leave door camp deer knit fork tell

10. A Low Back Vowel

heart teens cough pit hot him art

11. A Low Front Vowel

clerk full hat mate part fix deal

12. A high Front Lax Unrounded Vowel

kill maths put leave pit live fool pill

13. A High Back Tense Rounded Vowel

feel meet do still four cell fruit

2.5.English Phonemes and Allophones

The Phoneme is the smallest segment in the phonological structure of a language. Almost all theories of phonology assert that language allows its dissection into pieces of sound units called phonemes which are abstract units whose number varies from one language to another irrespective of the letters, or graphemes the phonemes represent. English, for example, has 44 phonemes, but 26 letters; French, on the other hand, has 37 phonemes and 26 letters. Phonemes can be into groups according to their place, manner, and force of articulation. For example, we can categorize the speech units into fricatives, and stops:

/f, t,g,p,b,ʔ,s/

fricatives	stops
/f/,/v/	/p/,/b/, /g/,/ʔ/

Likewise, we can group the same phonemes in terms of force of articulation (i.e., whether they are fortis or lenis)

lenis	fortis
/b/,/v/,/g/,/ʔ/	/p/,/f /s/

The rationale behind the existence of a phoneme is contingent on our ability to replace such a phoneme with another to get new words. For example, from the following words where every time a phoneme is replaced, a new word is created.

Example: pin, kin, tin, fin. Hence the existence of 4 phonemes, respectively:/p/, /k/, /f/

Connected with the notion of a phoneme is that of allophones which refer to the different realizations of the same phoneme depending on the phonetic environment in which the phoneme appears. For example, the phoneme/r/ in the word “rye” and that in “try” are not identical, though they seem similar. The

phoneme/r/ in " rye" is voiced non-fricative, whereas that in try is voiceless and fricative. Similarly, there is a difference in the realization of the Phoneme /p/ in pear and spear. The former is a voiced aspirated stop like the latter is a devoiced unaspirated phoneme. There follows that the phonetic transcription of the words pear and spear are respectively, [p], [p^h]. What is essential to realize though is the [p] and [p^h] are not two distinct phonemes, but rather two different allophones of the phone /p/, or two allophonic variations that are in complementary distribution.

Two sub-disciplines of linguistics deal with the single sound units, called segments. Whereas Phonetics describes, analyses and determines which organs and muscles operate to articulate these segments, phonology, on the hand, is concerned with phonemic analysis and inventory., phonologists tell how the phonemes of a particular language differ from those of other languages, and how they pattern to make comprehensible utterances. Moreover, thanks to phonology practice, the well-read person of the English language has a feeling that the word "spid "is possible in English though, it does not exist in English, thus constituting an accidental gap in the English lexicon.

However, we know for sure that "fpan" is not possible in English for the simple reason that no English word starts (or ends) with the initial cluster [fp]. Therefore, phonotactics constraints alone are empowered to determine the existence of units of language in English. Phonologists go beyond the single phonemic segment to centre their concern on suprasegmental phonology, viz, stress, rhythm and intonation.

A grapheme is a minimal unit of a writing system. It is a written symbol that represents a sound (phoneme). This can be a single letter or could be a sequence of letters, such as ai, sh, igh, tch etc. So when a child says the sound /t/ this is a phoneme, but when they write the letter 't' this is a grapheme. The Grapheme is usually put between angle brackets as shown here: <t >, <p>.

II. Narrow Transcription versus Broad Transcription

Narrow transcription is the one that entails more information about a given speech sound than broad transcription. It uses marks or symbols that modify the sound quality such as diacritics.³ Consider the phoneme /p/ in the words: pin and spin. Though both words contain the sound /p/, phonetically, these two phonemes are different in that the /p/ in pin is accompanied with a [h] sound, and it is, then, called aspirated / p / and thus symbolized. [ph.] unlike the / p / in ‘spin’ which is unaspirated. To differentiate between both types of transcription, square brackets [] are used to indicate the narrow transcription, but slashes / / for broad or phonemic transcription. Throughout this workbook, phonemic transcription is used.

³ A mark, such as an accent, used with a letter to show how it is to be pronounced. The narrow transcription of the word “water” in American English is [wəːtə], using a flap(also tap) <

III. English Syllables

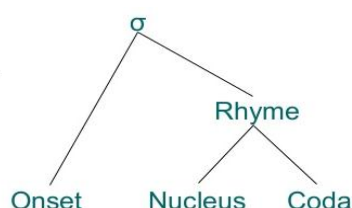
Introduction

As aforementioned, the number of syllables in a word is not dependent on the number of phonemes it contains. An instance of this is the word “bed” is made up of three phonemes /b/ /e/ /d/, but it has only one syllable as it has only one vowel sound /e/ along with two consonants /b/ and /d/. So, what precisely is a syllable? And how can the learner safely identify one?

A syllable is a central unit in phonology, but not always straightforward. Our ignorance of phonetics of linguistics does not usually entail our cognizance of the number of syllables in a word. the words ‘mat ‘ and ' park' contain one syllable, and the words 'yellow' and party both contain two syllables; similarly, the words important and the word descendant have 3 syllables in each. Taking those words as examples, we may conclude that the number of syllables is dependent on the number of vowels in a word. This conclusion is, however, elusive. In the word 'Tottenham' /'tɒtənəm/, there are 3 vowels, but the British would not pronounce it /'tɒtənəm/. Similarly some native speakers consider the word 'police' as monosyllabic /pə'li:s/; others consider it as disyllabic /pli:s /. The same holds true for the words. medicine, library, and collapse to name a few. Therefore, differences in judgement usually reflect genuine differences. These differences are commonplace in British and American English. Take for instance the pronunciation of the word ‘temporarily’; while almost all Americans read it out with five syllables, the Britons read it out with three syllables only.

1. English Syllable Structure

Words can be monosyllabic, or polysyllabic. The syllable consists of one or more phonemes. The vowel in a syllable is the nucleus, which may be preceded by one or more phonemes, called the onset. The phonemes that follow the nucleus are called the coda. The nucleus, together with the coda, is called the rhyme (also rime). the Greek letter sigma σ is used to represent the syllable structure of the phonological unit.



2. Syllable Weight

The weight of a syllable is contingent on the structure of its rhyme. if the latter comprises a long vowel, a diphthong, or a triphthong followed by no consonant or a consonant cluster, then the syllable is heavy. As opposed to the heavy syllable, the light one has a weak cluster,(i.e., only one consonant, or no consonant in its rhyme.) Let's consider the following words:

peter (v), produce (v), conveyor, enter

peter / 'pi:tər /

The first syllable in the verb to peter is heavy, for it contains a long vowel.

produce / prə'dju:s/

The second syllable, as opposed to the first one, is heavy because it contains a long vowel.

divine / də'vaɪn / , or
/ d'ɪvaɪn /

Unlike the first syllable, the second syllable contains a diphthong. So, it is heavy.

master /'mɑ:stər /

The first syllable is heavy because it contains a long vowel. The second syllable is a light one.

conveyor /kən'veɪə/ The second syllable is heavy because it contains a triphthong.

➤ **Exercise:** read the following words, and identify the heavy syllable.

Cuba	...
avoid	...
dining	...
weapon	...
measure	...
morning	...
function	...
common	
produce	
Conundrum	

3. Consonant cluster

Two or more consonants together are called a consonant cluster. It is a sequence of consonants at the margin of a syllable. The following are examples of consonant cluster

stra w	/strɔ:/	CCCV
stra nds	/strændz/	CCCVCC C
glim psed	/glimpst/	CCVCCC C

What is essential to realize though is that no word in English begins with more than three consonants. By the same token, no word ends with more than four consonants as shown in the table above and below.

Syllable Structure for Rhotic accent	Example	transcription	Nber of segments
V	a	eɪ	1
CV	law	lɔ:	2
VC	aught	ɔ:t	2
CVC	far	fɑ:r	3
CCV	ski	ski:	3
VCC	apt	æpt	3
CVCC	tart	ta:t US ta:rt	3
CCVC	star	sta:r US sta:r	4
CCCV	screw	skru:	4
VCCC	amps	æmps	4
CCVCC	stink	stiŋk	5
CVCCC	burst	bɜ:rst	5
CCCVC	splash	splæʃ	5
CCCVCC	sprint	sprint	6
CCVCCC	prints	sprints	6
CVCCC	bursts	bɜ:rsts	6
CCCVCCCC	<i>Strengths</i>	streŋkθs	7

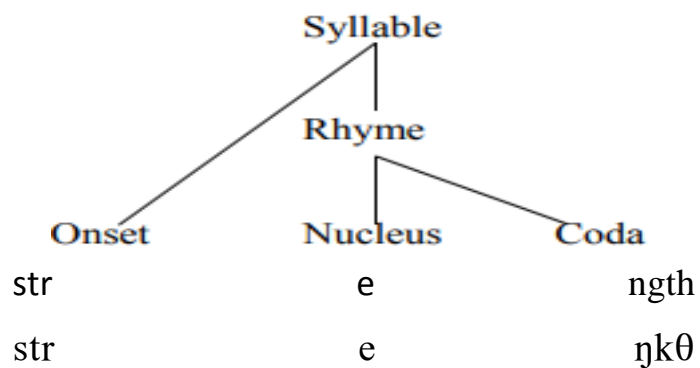
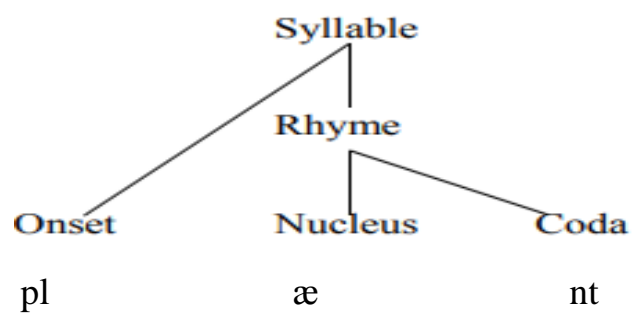
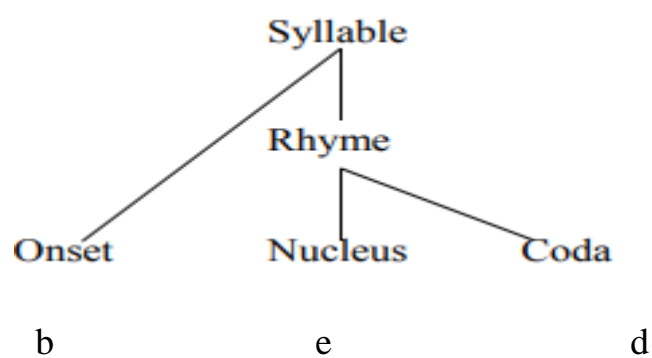
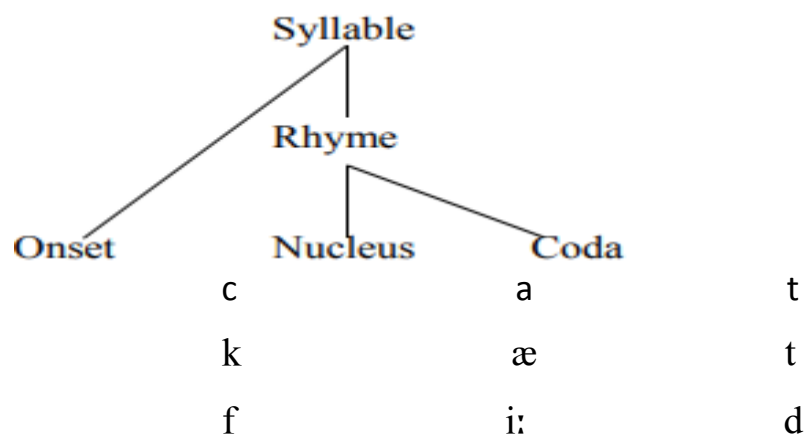
Table 5 : English Consonant Cluster

4. The Minimum Syllable

The minimum syllable is the one that is mentioned per se (i.e., preceded and followed by silence) such as, 'or' ɔ: 'a' eɪ, 'are' ɑ:

Let's consider the following phonological units and see how they can be structured.

cat bed plant strength



✎ Exercise: *consider the following words and draw a syllable structure for each one.*

crime back strike splints

Syllabic consonants such the /n/ in button, /m / in rhythm, and the /l/ in settle are also nuclei.

5. 'Silent' Syllables

In connected speech, some words in English may lose a vowel, particularly the shwa /ə /. As a result of such a phonological process, the syllable loses its quality and then is said fast.

An example of this is the word 'family /'fæm(ə)li/; where, as it can be noticed, the second syllable is rendered silent.

✎ Exercise: *Read the following sentences and then decide which part of the underlined word is not pronounced. Put a bracket () around the part that is not pronounced. The first one has been done as an example.*

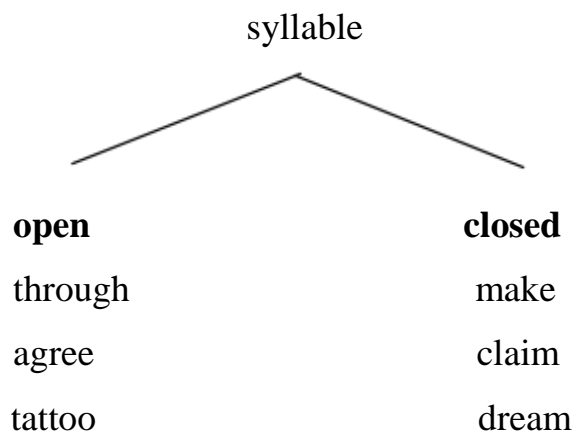
- 1) This is an int(e)resting book.
- 2) He visits her every day.
- 3) This book is different to that one.
- 4) Where does your family live?
- 5) I've eaten too much chocolate!
- 6) What kind of business is it?
- 7) I've seen that movie several times.
- 9) This is a good reference book.
- 10) They work at the same place, but in a separate building
- 14) The average family watches too much television

13) What was the temperature today?

12) He works in a small factory.

6. Open syllables and closed syllables

An open syllable ends in a vowel. A closed syllable, on the other hand, ends in a consonant, or a consonant cluster.



IV. Stress Prediction

Introduction

Stress is the extra force that the speaker uses when pronouncing a word or syllable. For example, in the articulation of the word in the 'mechanic', there is more muscular energy in the second to the last syllable (penultimate). The first and the last syllables are unstressed. To mark the stressed syllable, Phoneticians use a vertical line high up just before the stressed syllable.

For example :

/ 'ɔ:təm /	/ kə'nʌndrəm /
/bækə'lɔ:riət /	/'ɔ:təməʊbi:l /

Notwithstanding the extensive research in the area of stress, the latter remains elusive. Nevertheless, phoneticians managed to elaborate some rules, which on the

other hand, are not free from exceptions. These exceptions are usually due to borrowed words.

As for which syllable attracts stress, if stress placement in disyllabic words does not usually seem to pose any problem, that of trisyllabic ones and beyond is a bit more complicated, for the latter make exceptions to the rules that apply to two-syllable words, in addition to the fact that there are either several exceptions, or they require other rules to apply.

Of the characteristics of the stressed syllable, when compared to the unstressed one is that it is:

- louder
- longer
- high-pitched (compared to the surrounding ones)
- different in terms of quality

1. Stress prediction in Disyllabic Simple Words

Introduction

Four parameters are crucial for stress placement:

1) word morphology (i.e., whether the word is simple or complex). Unlike the simple word, the complex word contains affixes.

Example of complex words:

- unhappy
- loneliness
- ungentlemanliness

2) Grammatical category: is the word a verb, adverb, an adjective, or a noun?

3) The number of syllables that the word contains.

4) The phonological structure of a word (i.e., is the syllable heavy or not?)

The heavy syllable is the one that contains a long vowel, a diphthong, a triphthong, or, or at least two syllables coming after a short vowel.

Example:

Simple word	Transcription
produce	/ prə'dju:s/
divine	/dɪ'vaɪn/
Ireland	/ 'aɪələnd /
predict	/prɪ'dɪkt/

1.1. Disyllabic Verbs

Let's consider the following two-syllable words. Does the stress fall on the final syllable or the penultimate? (i.e., the syllable that is next to the last)

apply, involve, demand, deceive, attract, assist, enter, open, envy, govern.

1	apply	ə'plai
2	involve	ɪn'vɒlv
3	demand	dɪ'mɑ:nd
4	deceive	dɪ'si:v
5	attract	ə'trækt
6	assist	ə'sɪst
7	enter	'entə
8	open	'əʊpən
9	envy	'envi
10	govern	'gʌvən
11	follow	'fɒləʊ

As aforementioned, the verbs above are all disyllabic. 1 through 6, the stress is placed on the second syllable because the latter contains a long vowel as in the case of: /ə 'plai/, / dɪ'ma:nd / , / dɪ'si:v / , or a short vowel plus a diphthong as in the case of in'vɒlv, /ə'trækt/, and / ə'sɪst/. As can be seen in the table above, a syllable containing a shwa/ə /, or diphthong / əʊ / is not usually stressed, even though there are some special cases that we will deal with later.

Equally, as can be seen in the table, it is that heavy syllable that attracts stress (i.e., a syllable that contains a long vowel, a diphthong, and a short vowel plus a consonants cluster)

Exercise: transcribe the following verbs, and then indicate which syllable carries the main stress.

<u>Verb</u>	<u>Transcription</u>
answer	
practise	
barter	
defeat	
happen	
embark	
hammer	
increase	
pəʊlə ^r	
suspect	
punish	

panic
worship
bolster
shoulder
conjure
better
improve
ignore

1.2. Disyllabic adjectives

As far as disyllabic adjectives are concerned, the rule that applies for disyllabic verbs applies for them (i.e., the heavy syllable is the one that attracts stress; the light one, however, is unstressed). An exception must be mentioned here: though the second syllable of adjective “bovine” contains a diphthong, it does not attract stress. [ˈbəʊvaɪn]

Example:

- | | | |
|----|---------|-------------|
| 1 | major | [ˈmeɪdʒə] |
| 2 | crappy | [ˈkræpi] |
| 3 | divine | [dɪˈvaɪn] |
| 4 | happy | [ˈhæpi] |
| 5 | alive | [əˈlaɪv] |
| 6 | angry | [ˈæŋɡri] |
| 7 | broken | [ˈfiːbl] |
| 8 | stupid | [ˈstjuːpɪd] |
| 10 | correct | [kəˈrekt] |

✎ **Exercise:** transcribe the following verbs, and then indicate which syllable carries the main stress.

- 1 solid
- 2 rainy
- 3 early
- 4 mental
- 5 inside
- 6 content
- 7 arctic
- 8 obtuse

1.3. Disyllabic Adverbs and Prepositions

Here, the rule that applies to verbs and adjectives is applied to prepositions and adverbs. (i.e., the syllable that attracts stress must be heavy, except for the adjective “actually” [’æktʃʊəlɪ], and the preposition “below” [bɪ’ləʊ].

- 1 about [ə’baʊt]
- 2 behind [bɪ’haɪnd]
- 3 beneath [bɪ’niːθ]
- 4 after [’ɑːftə]
- 5 later [’leɪtə]
- 6 nearly [’niːəli]
- 7 forward [fɔːwəd]
- 8 between [bɪ’twiːn]
- 9 before [bɪ’fɔːr]
- 10 broadly [’brɔːdli]

- | | | |
|----|---------|----------------|
| 11 | usually | [' ju:ʒʊəlɪ] |
| 12 | rapidly | [' ræpɪdlɪ] |
| 13 | around | [ə ' raʊnd] |
| 14 | before | [bɪ ' fɔ:ɹ] |

1.4. Disyllabic Nouns

When it comes to disyllabic nouns, the rule that applies for two-syllable verbs and adjectives does not fully apply for two-syllable nouns. For stress to fall on the second syllable of a noun, it must contain a long vowel, a diphthong, or a triphthong. A short vowel plus a consonant cluster rule is not permissible herein except for the following nouns: colleague / 'kɒli:g/ , mobile / ['məʊbaɪl], and violin[,vaɪə'li:n].

Some a word had two stress patterns. An instance of this is the noun decade:

/ 'dekeɪd, dek'eɪd, dɪ'keɪd/

- | | | |
|---|---------|--------------|
| 1 | tiger | ['taɪgəɹ] |
| 2 | money | ['mʌni] |
| 3 | socket | ['sɒkɪt] |
| 4 | guitar | [gɪ 'tɑ:ɹ] |
| 5 | senses | [sen /sɪz] |
| 6 | finger | ['fɪŋgəɹ] |
| 7 | public | ['pʌblɪk] |
| 8 | machine | [mə 'ʃi:n] |

9	police	[pə'li:s]
10	garden	['gɑ:dən]
11	aspect	['æspekt]
12	product	['prɒdʌkt]

Let's consider the following two-syllable nouns and see which syllable attracts stress.

✎Exercise: *transcribe the following nouns, and then indicate which syllable carries the main stress.*

- 1 bamboo
- 2 symbol
- 3 winter
- 4 island
- 5 Europe
- 6 patient
- 7 tattoo
- 8 climate
- 9 Chinese
- 10 response
- 11 section
- 12 cartoon
- 13 mother
- 14 sister
- 15 father

1.5.Syllable Heteronyms

Some words, called *heteronyms*, have a single spelling, but two different pronunciations. Several 2-syllable words are stressed on the first syllable when the word is being used as a noun or adjective and stressed on the second syllable when it is being used as a verb.

Heteronyms are words that have two distinct pronunciations, even though they have the same spelling. An example of these are the following:

Nouns/Adjectives		Verbs	
export	['ekspɔ:t]	export	[ɪk'spɔ:t]
import	['impɔ:t]	import	[ɪm'pɔ:t]
present	['prezənt]	present	[prɪ'zent]
increase	['ɪŋkri:s]	increase	[ɪŋ'kri:s]
contrast	['kɒntrɑ:st]	contrast	[kən'trɑ:st]
contract	['kɒntrækt]	contract	[kən'trækt]
desert	['dezət]	desert	[dɪ'zɜ:t]
digest	['daɪdʒest]	digest	[daɪ'dʒest]
escort	['eskɔ:t]	escort	[ɪs'kɔ:t]
discount	['dɪskaʊnt]	discount	[dɪs'kaʊnt]
convict	['kɒnvɪkt]	convict	[kən'vɪkt]
accent	['æksənt]	accent	[æk'sent]
combine	['kɒmbaɪn]	combine	[kəm'baɪn]

2. Stress Prediction for Trisyllabic words and beyond.

Introduction: Let's consider the three-syllable word 'elicit' [ɪlɪsɪt]

ɪ	is called the antepenultimate syllable
lɪ	is called the penultimate syllable
sɪt	is called the final syllable

2.1. Polysyllabic verbs

For a trisyllabic verb to be stressed, its final syllable must contain either a long vowel or a diphthong. If, on the other hand, it contains a short plus one consonant, it will not be stressed. The penultimate will carry stress.

Let's consider the following trisyllabic verbs

deliver	[dɪ'lɪvə ^r]
imagine	[ɪ'mædʒɪn]
contradict	[,kɒntrə'dɪkt]
abandon	[ə'bændən]
determine	[dɪ'tɜ:mɪn]
encounter	[ɪn'kaʊntə ^r]
interrupt	[,ɪntə'rʌpt]
establish	[ɪs'tæblɪʃ]
introduce	[,ɪntrə'dju:s]
imprison	[ɪm'prɪzn]
inhabit	[ɪn'hæbɪt]

Special cases: The following list is neither exhaustive nor all-inclusive. Other rules will follow.

- hibernate ['haɪbəneɪt]
- activate ['æktɪveɪt]
- satisfy ['sætɪsfaɪ]
- scrutinize ['skru:tɪnaɪz]
- separate ['sepəreɪt]

Rule: As you may have noticed, verbs ending in -ate, or -ize receive stress in their antepenultimate. This rule includes verbs containing more than three syllables. As in the case of words 6 through 11.

1	vaporize	['veɪpəraɪz]
2	navigate	['nævɪgeɪt]
3	cultivate	['kʌltɪveɪt]
4	capitulate	[kə'pɪtjʊleɪt]
5	criticize	['krɪtɪsaɪz]
6	materialize	[mə'tɪəriəlaɪz]
7	politicize	[pə'lɪtɪsaɪz]
8	eliminate	[ɪ'lɪmɪneɪt]
9	articulate	[ɑ:'tɪkjʊleɪt]
10	evacuate	[ɪ'vækjʊeɪt]
11	familiarize	[fə'mɪliəraɪz]

Note that the addition of prefixes and the suffix -ly to make adverbs do not usually affect stress placement as in the following:

['ɪtəreɪt]	[rɪ:'ɪtəreɪt]
kə'pɪtjʊleɪt]	[,rɪ:kə'pɪtjʊleɪt]
['kɒlənaɪz]	[dɪ:'kɒlə,naɪz]
['mɒdəreɪt]	['mɒdəreɪtɪ]
['deɪndʒrəs]	['deɪndʒrəsɪ]
[ə'lɑ:mɪŋ]	[ə'lɑ:mɪŋɪ]
['ækjərət]	['ækjərətɪ]

Exercise: read the following verbs, and then indicate the syllable that carries the main stress. You might follow the following pattern:

1: for the stressed syllable **0:** for the unstressed syllable(s)

You do not have to transcribe the words.

Number one is done for you.

- | | | |
|----|------------|--------------|
| 1 | diminish | di mi nish |
| | | 0 1 0 |
| 2 | resurrect | |
| 3 | interrupt | |
| 4 | assemble | |
| 5 | desist | |
| 6 | supersede | |
| 7 | referee | |
| 8 | operate | |
| 9 | vandalize | |
| 10 | academize | |
| 11 | moderate | |
| 12 | prioritize | |
| 12 | regularly | |

Rule:, polysyllabic verbs ending in ‘-ify’ usually receive stress on the syllable that precedes the ‘-ify’ ending.

Example:

- | | | |
|---|---------|--------------|
| 1 | clarify | ['petrɪfaɪ] |
| 2 | crucify | ['kruːsɪfaɪ] |
| 3 | dignify | ['dɪɡnɪfaɪ] |
| 4 | modify | ['mɒdɪfaɪ] |
| 5 | specify | ['spesɪfaɪ] |
| 6 | petrify | ['petrɪfaɪ] |

7	magnify	[ˈmæɡnɪfaɪ]
8	exemplify	[ɪɡˈzemplɪfaɪ]
9	electrify	[ɪˈlektɪfaɪ]
10	intensify	[ɪnˈtensɪfaɪ]

2.2. Polysyllabic Nouns

Here, the rule goes as follows: If the last syllable will not carry stress if it contains a short vowel or diphthong [əʊ], then, the stress will shift to the penultimate syllable if it contains a long vowel, a diphthong, or a consonant cluster. Unless these latter conditions are satisfied, the antepenultimate receives the stress.

Example

divorcee	[dɪˌvɔːˈsiː]
attraction	[əˈtrækʃən]
tomato	[təˈmɑːtəʊ] , [təˈmeɪtəʊ]
assumption	[əˈsʌmpʃən]
potato	[pəˈteɪtəʊ]
attendance	[əˈtendəns]
architect	[ˈɑːkɪtekt]
applicant	[ˈæplɪkənt]
assessment	[əˈsesmənt]
assurance	[əˈʃʊərəns]
argument	[ˈɑːɡjʊmənt]

*Exceptions. The following list is not exhaustive

attitude	[ˈætɪtjuːd]	holocaust	[ˈhɒləkɔːst]
intellect	[ˈɪntələkt]	stalactite	[ˈstæləktait]

2.3. Polysyllabic Adjectives

The rule that applies to polysyllabic nouns will apply to polysyllabic adjectives. That is, for the final syllable to be stressed, it must contain a long vowel or a diphthong. If the last syllable contains a short vowel or diphthong [əʊ], the stress will shift to the penultimate syllable if it contains a long vowel, a diphthong, or a consonant cluster. Unless these latter conditions are satisfied, the antepenultimate receives the stress.

Example

potential	[pəʊ'tenʃəl]
enormous	[ɪ'nɔ:məs]
dangerous	['deɪndʒərəs] , ['deɪndʒərəs]
important	[ɪm'pɔ:tənt]
indolent	['ɪndələnt]
relative	['relatɪv]
demanding	[dɪ'mɑ:ndɪŋ]
beautiful	['bju:tɪfəl]
abnormal	[æb'nɔ:məl]
positive	['pɒzɪtɪv]
negative	['negətɪv]
opportune	['ɒpətju:n]

***Exceptions:** The following list is not exhaustive, and the following rules are here to complement those aforementioned.

Rule: adjectives ending in -ate have their antepenultimate stressed.

Example:

elaborate [ɪ'læbəreɪt] appropriate [ə'prəʊpriət]

graduate	[grædʒuət]
animate	['ænɪmət]
adequate	['ædɪkwət]
fortunate	['fɔ:tʃənət]
accurate	['ækjərət]
delicate	['delɪkət]
separate	['sepərət] ['seprət]
compassionate	[kəm'pæʃənət]

***Now notice the pronunciation of -ate in adjectives and verbs.**

<u>Adjectives</u>	<u>Verbs</u>
[ə'prəʊpriət]	[ə'prəʊpriɪt]
['fedərət]	['fedəreɪt]
['sepərət]	['sepəreɪt]
[lɪ'dʒɪtɪmət]	[lɪ'dʒɪtɪmeɪt]
[ɑ:'tɪkjʊlət]	[ɑ:'tɪkjʊleɪt]
['ænɪmət]	['ænɪmeɪt]
[grædʒuət]	[grædʒueɪt]
[ɪ'læbəərət]	[ɪ'læbəreɪt]
['ɪmbrɪkət]	['ɪmbrɪkeɪt]
['ænɪmɪt]	['ænɪmeɪt]
['grædʒuɪt]	['grædʒueɪt]
[sə'bo:dɪnət]	[sə'bo:dɪneɪt]

Rule: Polysyllabic adjectives that end in -ious, -uous, -eous, -ic, -ical, -ian, -ible, -ial, or -ive (except for those ending in -tive) usually receive stress on the syllable prior to these endings.

librarian	[laɪ'breəriən]
furious	['fjʊəriəs]
decisive	[dɪ'saɪsɪv]
biblical	['bɪblɪkəl]
feasible	['fiːzəbl]
religious	[rɪ'lɪdʒəs]
arduous	['ɑːdʒʊəs]
comprehensible	[ˌkɒmpri'hensəbl]
erroneous	[ɪ'rəʊniəs]
secretarial	[ˌsekrə'teəriəl]
arduous	['ɑːdʒʊəs]
bounteous	['baʊntiəs]
avaricious	[ˌævə'riʃəs]
admissible	[əd'mɪsəbl]
economic	[ˌiːkə'nɒmɪk]
economical	[ˌiːkə'nɒmɪkəl, ˌekə'nɒmɪkəl]
acrimonious	[ˌækri'məʊniəs]
conspicuous	[kən'spɪkjʊəs]
advantageous	[ˌædvən'teɪdʒəs]
excessive	[ɪk'sesɪv]
instantaneous	[ˌɪnstən'teɪniəs]
rampageous	[ræm'peɪdʒəs]
technological	[ˌteknə'lɒdʒɪkəl]

instantaneous	[,ɪnstən'teɪniəs]
conscientious	[,kɒnʃɪ'enʃəs]
simultaneous	[,sɪməl'teɪniəs]
diabolic	[,daɪə'bɒlɪk]
diabolical	[,daɪə'bɒlɪkəl]

Exceptions: Arabic, lunatic and rhetoric (i.e, though these words end in -ic, their penultimate is not stressed.

Their stress pattern is: 1 0 0

Exercise: read the following adjectives, and then indicate the syllable that carries the main stress. You might follow the following pattern.

Remember

1: for the stressed syllable

0: for the unstressed syllable (s)

You do not have to transcribe the words. Numbers 1 and 2 are done for you.

1	industrious	0	1	0	0
2	episodic	0	0	1	0
3	grammarian	...			
4	incongruous	...			
5	contagious	...			
6	competitive				
7	promiscuous	...			
8	adaptive	...			
9	magic	...			

- | | | |
|----|-----------------|-----|
| 10 | magical | ... |
| 11 | exhaustive | ... |
| 12 | cynical | ... |
| 13 | adaptive | ... |
| 14 | compressible | |
| 15 | contemporaneous | |
| 16 | consanguineous | ... |

Rule: polysyllabic adjectives and beyond, those ending in –able, -al, and –ous usually take stress on their antepenultimate syllables.

Example:

dangerous	[deɪndʒərəs]	anonymous	[ə'nɒnɪməs]
capable	['keɪpəbəl]	national	['næʃənəl]
calamitous	[kə'læmɪtəs]	covetous	['kʌvɪtəs]
prosperous	['prɒspərəs]	acephalous	[ə'sefələs]
indomitable	[ɪn'dɒmɪtəbəl]	palpable	['pælpəbəl]
ridiculous	[rɪ'dɪkjʊləs]	autonomous	[ɔ:'tɒnəməs]
adulterous	[ə'dʌltərəs]	allochthonous	[ə'lɒkθənəs]
notable	['nəʊtəbəl]	rational	['ræʃənəl]
platitudinous	[ˌplætɪ'tjuːdɪnəs]	autochthonous	[ɔ:'tɒkθənəs]

***Notice that the addition of affixes does not affect stress placement.**

Example

rational	['ræʃənəl]	irrational	[ɪ'ræʃənəl]
notable	['nəʊtəbəl]	notably	['nəʊtəblɪ]
dangerous	[deɪndʒərəs]	dangerously	['deɪndʒərəslɪ]
autonomous	[ɔ:'tɒnəməs]	autonomously	[ɔ:'tɒnəməsli]
responsible	[rɪ'spɒnsəbəl]	irresponsibly	[ˌɪrɪs'pɒnsəblɪ]

Rule: nouns that end in -ity, -ety, -al, -ion, -ence, -ance, -acy, and -ian usually take stress on the syllable prior to these endings.

Take the following examples:

ability	[ə'bɪlɪtɪ], [ə'bɪlətɪ]	importance	[ɪm'pɔ:təns]
operation	[,ɒpə'reɪʃən]	insistence	[ɪn'sɪstəns]
phonetician	[,fəʊnɪ'tɪʃən]	democracy	[dɪ'mɒkrəsi]
society	[sə'saɪətɪ]	responsibility	[rɪ'spɒnsə'bɪlɪtɪ]
experience	[ɪk'spɪəriəns]	variety	[və'reɪətɪ]

3. Stress Prediction in Compound Words

3.1. Compound nouns

Compound nouns are usually receiving stress on the **first** word.

honeymoon ['hʌnɪmu:n]

saucepan ['sɔ:spən]

3.2. Compound verbs

Compound verbs are stressed on the **second** word in the compound.

outsmart [aʊt' smɑ:t]

overdue [ɪəʊvə' dju:]

3.3. Compound adjectives

In compound adjectives, the stress is on the second part of the compound.

bad-**tempered**

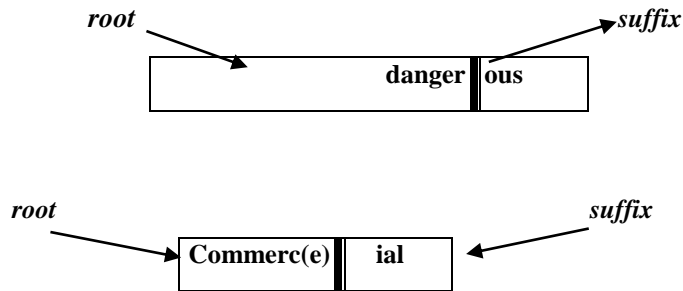
old-**fashioned**

3.4. Hyphenated compound words

- Hyphenated compound words often have short words in the middle. Some of these receive stress on the first part of the compound such as: **mother-in-law**.

3.5. Suffixes and word stress

A. Some words are made up of a *root* and a *suffix*:



In some words with suffixes, the stress stays on the same syllable as in the root. Compare:

'danger and: 'dangerous

In other words, the suffix changes the stressed syllable. Compare:

'commerce and: com'mercial

B Suffixes which don't usually change the stress pattern in the root word include *-able*, *-age*, *-al*, *-er*, *-ful*, *-less*, *-ness*, *-ous* and *-fy*. For example

'comfort - 'comfortable	'amplify - 'amplifier	'foolish - 'foolishness
per 'cent - per 'centage	re'gret- re'gretful	di'saster - di'sastrous
e'lectric - e'lectrical	re'gard - re'gardless	'beauty - 'beautify

Exceptions with *-able* and *-al* include:

ad'mire - 'admirable pre'fer - 'preferable 'medicine - me'dicinal
'agriculture - agri'cultural

Note that before the suffixes *-ions*, *-ulous*, *-orous* and *-eous* main stress usually comes in the syllable before the suffix:

'industry - in'dustrious 'mystery- my'sterious
'miracle - mi'raculous 'carnivore - car'nivorous
ad'vantage - advan'tageous 'outrage - out'rageous

C Some suffixes themselves usually have the main stress. These include *-ee*, *-eer*, *-ese* and *-ette*.

For example: absen'tee ,refu'gee ,engi'neer .mountai'neer Japan'ese
.Nepal'ese ,cigar'ette di'skette

Exceptions include: 'omelette, 'etiquette, em'ployee (although less commonly we use .employ'ee).

Note: Some people say 'cigarette.

Words with these suffixes can often *have stress shift* (see Unit 10):

She's japanESE. but: She's a JAPanese JOURnalist.

He's a refuGEE. but: We saw photos of REFugee CHILdren.

Pronunciation of words and phrases

Exercise 1

Complete the sentences with pairs of words from B opposite. You should also mark the stress.

EXAMPLE The herb is used for **medicinal** purposes, although it isn't usually thought of as a **medicine**.

1. The journey was a; in fact, the whole vacation was.....
2. The decision was an..... - quite..... . I was appalled.
- 3.....of his mistakes, the president continues to be held in high.....
4. Workers in the steel..... are generally skilled and
5. The Democrats' lead is now eight..... points, and has risen three..... in the last week.
6. Her disappearance was never explained, and her whereabouts remain a.....until today.
7. The region is mainly..... land and most people here still work in.....

Exercise2

This speaker is talking about the difficulty of getting cars repaired. Focus on the words ending with the suffixes *-able* and *-al* (in bold). Listen and tick (/) the words which follow the rule given in B -that is, they have the same stress pattern as their root.

You hear about the poor quality of car repairs so often nowadays. You just can't find dependable (/) mechanics, and the problem seems to be universal (/). For example, the other day I was having problems starting my car, so I took it to a reputable () garage. At least I'd heard it was quite reliable (). The people there seemed quite professional (), and they said it looked like just a minor mechanical () problem. They said it would cost about €100, which seemed quite acceptable(). But when I picked it up, they'd badly scratched the paintwork. They apologised, and said it was accidental () and offered to re-spray it, but whether they'll do a good job is debatable ().

Exercise 3: Here are some extracts from a radio news programme. Underline the syllable in each word in bold that you think is likely to be made prominent.

Remember, some of the words in bold are likely to have *stress shift*.

EXAMPLE: an aircraft that crashed three years ago in the Andes has been found by mountaineers.

- 1 A report on the problem of **absentee** landlords is to be published today.
- 2 Five thousand **volunteer** helpers are to be recruited for the next Olympic Games.
- 3 Mandarin and **Cantonese** are the most widely spoken languages in China.
- 4 The government is considering a ban on **roulette**.
- 5 There has been an outbreak of cholera among **Sudanese** villagers.

V. Aspects of Connected Speech

Introduction

Sequence of words uttered per se, such as those in mechanical speech, would be understood effortlessly. However, the resulting speech sounds unnatural, for English native speakers do not talk like that, i.e., their speech is connected. Connected speech, as the phrase suggests, enfolds linking sounds together, deleting others, and combining other sounds to form a distinct sound for the sake of making the articulation of speech sounds simpler.

1. Assimilation

Introduction

The term assimilation refers to a phonological process by which a sound is influenced by a neighbouring one, which process results in the disappearance of a sound, or becomes identical with or similar to a neighbouring sound as in [ə'pɑ:pmənt] *instead of* [ə'pɑ:tmənt]

1.1. Types of Assimilation

There are three types of assimilation: regressive, progressive and coalescent.

Regressive assimilation takes place when one sound (B) affects a preceding sound (A) (A←B).

Conversely, progressive assimilation occurs when a sound (A) affects the following sound (B) (A→B).

Progressive assimilation is the result of the mutual influence of two neighbouring sounds to produce a different sound (A↔B).

1.1.1. Regressive Assimilation (A←B).

Rule 1 : the phonemes /t/, /d/, /n/ are usually transformed into bilabials.

1. Put that **bike** there. (/ t / assimilates to /p/
2. Look at that **map**! (/ t / assimilates to /p/
3. I can't stand that **bad** behaviour. (/ t / assimilates to /p/ and (/ t / assimilates to /b/
4. The university is seven **en** minutes from here. (/ n / assimilates to /m/

Rule 2: the phonemes /n/ is transformed into /ŋ/ before /k, or /g/

1. He's been given all authority. /n/ assimilate to /ŋ / before /g/
2. We have shown care and concern for others. /n/ assimilate to /ŋ / before /k/

Rule 3: /s/ assimilated to /ʃ / before /ʃ /, and /z/ assimilated to /ʒ / before /ʃ/

1. This shop sells sweets.
2. Leaves shed usually.

1.1.2. Progressive Assimilation (A→B).

Rule: the phonemes /t/ is transformed into /k/ before /k, or /g/

1. That **car** is not expensive. / t/ assimilates to /k/
2. Don't let **go** is a title of a song. / t/ assimilates to /g/
3. She has asked a **broad** question. /d/ assimilates to /g/
4. He's a **bad** guy. /d/ assimilates to /g/

1.1.3. Coalescent Assimilation (A↔B).

1. We met last **year**. (/ t/ and /j/ coalesce to form a / tʃ / sound.
2. Where **did** you spend last summer holidays? (/d / and /j/ coalesce to form a / dʒ /sound.

✎ **Exercise:** Read the following sentences carefully and then identify the type of assimilation.

1. What's a pilot boat?
2. It was a ground-breaking ceremony.

3. did you see Mohamed yesterday?
4. Where's my sports bag?
5. The man gains acceptance among the political elite.
6. The boys show their ability to draw lovely pictures.

2. Elision

The term elision denotes the disappearance, or removal of a speech sound, which can be a consonant, or a vowel. In fact, what makes the utterance hard to articulate is the sequence of a cluster of phonemes. As mentioned earlier, the reason behind the alteration of speech sounds is to make their articulation simpler. Therefore, to surmount such a difficulty, phonologists resort to elision.

Rule 1: the phonemes /t / and /d / are elided (i.e., omitted) when they occur in a consonant cluster.

- 1) We met him the next day.
- 2) When we reached Portland, we stopped for dinner.
- 3) She derived satisfaction from hard work.

Rule 2: The shwa(ə) can be elided when they occur in unstressed syllables. The same holds true for / ə / in “of” before consonants

Your idea sounds interesting. /'Intrəstɪŋ /

1. He has been robbed of his money. /əv /
2. Put your camera here. / kæmrə /
3. A chocolate that tastes like soap / 'tʃɔ:klət/
4. I'll see you tonight. / t'nait /
5. It's a question of collective responsibility. /'kwɛʃən/ /k'lektɪv/
6. I'm strange to this part of the job./ streɪnʒ/
7. The doctor will see you next week. /neks /

✎ Exercise: Read the following sentences carefully and then tell which phonemes are likely to be elided.

1. The two cars collided with an ear-splitting crash.
2. The police are looking for the murderer.
3. The child had a terrific time last night.
4. The postman is not delivering the mail tomorrow.

3. R-Liaison

Liaison means linking words together to ease articulation. In British English (RP) or non-rhotic accent, the ending /r / is not pronounced. However, that ending /r/ is usually pronounced, when the following words start with a vowel.

Example:

1. He lives in the country, **far away** from the city. /,fɑ:rə'wei/
2. Nobody was **near enough** to help. /niəri'nʌf /
3. Her **father always** calls her Princess Fatima. /'fɑ:ðərɔ:lweiz/

4. Intrusive / r /

Native speakers usually utter a / r / sound when two vowels meet.

- 1) Law-r-and order is capital in the region.
- 2) I saw-r-a a film today,
- 3) Susan -and Amelia-r- are inviting me tonight.
- 4) The media-r- are-r- endlessly talking about the war.
- 5) That man I saw -r-over there
- 6) Laura - r- is absent today.

5. Juncture

Juncture is a phonological phenomenon. It is usually the case that some bonds between morphemes are tighter than others, producing different effects.

1. Night rate *and* night rate
2. I scream *and* ice cream
3. under a rest *and* under arrest
4. real eyes *and* realize
5. send the maid *and* send them aid

6. Contraction

A further aspect of connected speech is contraction, which denotes the shortening of a word or phrase through the omission of one or more letters. As aforementioned, contraction is made in casual speech, not in academic writing, so as the interlocutors save time, and ultimately get the gist of the matter.

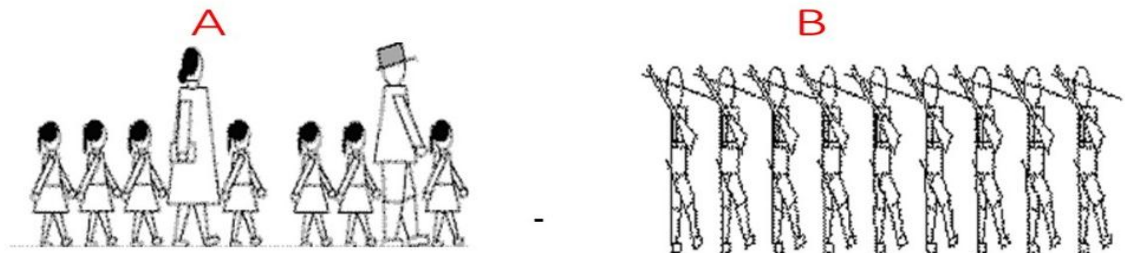
Some of the contraction words are the following.

Word/phrase	contraction
I am	I'm
he is	he's
she has	she's
I have	I've
it had	it'd
we will	we'll
they have	they've
could not	couldn't
would not	wouldn't
could have	could've
might have	might've
shall not	shan't
where is	where's
must not	mustn't
who is	who's
she should have	she'd 've

VI. Rhythm

*Consider the following pictures and answer the questions:

- 1) Which picture represents the English speech rhythm?
- 2) What makes you say so?



Question: Which picture represents English speech rhythm?

1. Isochronicity

Isochronicity is a stress-timing feature, (i.e. stress occurs at regular intervals within connected speech. Isochronicity is achieved, by making unstressed syllables shorter, and causing vowels to lose their pure quality, for example, α : /will be reduced to a shwa $/ə/$, and others to $/ɪ/$ or $/ʊ/$.

An example of this is the weak forms of "you": $/jʊ/$, or $/jə/$.

*Arabic, English, and Russian are all stress-timed.

2. Thought groups

A thought group is a short phrase centered around a main idea. The main idea is the one word in a thought group that is emphasized clearly. All the other words in a thought group are de-emphasized and spoken much faster and strung together.

Activity 1: How would you read the following sentences?

- (A) The teacher said, "That student is lazy."
- (B) "The teacher," said that student, "is lazy."

3. Pausing Within Thought Groups

We pause..

1. before punctuation marks (, . ; : ? !)
- 2 before conjunctions (and, or, but, which, that, since...)
3. between grammatical units such as phrases, clauses, and sentences.

QQ. Why Pause?

Answer:

We pause to make ourselves well-understood and give the interlocutor time to digest/ process the message to be conveyed.

Compare the pronunciation of the following two sentences.

- “Why would you go to school when you could work and earn money?”

Versus

- “Why would you go to school / when you could work / and earn money?”

✂ Exercise: read the following sentences and identify thought groups. Number one is done for you.

1. //“Excuse me. /Where is the bathroom?”//

What about the following?

2. “Now that I see it, I think I prefer it in red.”
3. “She hasn’t told me, but I think she’ll get married soon.”
4. “She’s pregnant! And due in October!”
5. “I got a new puppy, but now I need to train her!”
6. “Though Steve Jobs is irreplaceable I think Apple can succeed without him.
“Whenever I hear that tune, it makes me think of dad.
7. I really should go to bed earlier, I suppose.

8. I'll try to get more sleep tonight.'

✎ Exercise: Read the following paragraph and identify thought groups.

Once upon a time, there was a beautiful princess who lived in a big castle with her father the king and her mother the queen. Even though she had everything she asked for she was not very happy

✎ Exercise How would you read the following paragraph?

The Elephant in the Room.

The elephant in the room is a problem or controversial issue that is too big to ignore, but that people avoid talking about because it is embarrassing or could cause conflict.

VII. Intonation

Introduction

The term intonation entails some ambiguity when it comes to its definition. In its basic denotation, it refers to the variation in the pitch of the speaker's voice during speech used to convey or alter meaning. Oxford Dictionary defines it as the rise and the fall of the voice in speaking, especially as this affects the meaning of what is being said. Thus, meaning is momentous in intonation. Then, what blocks conversational exchange is the use of incorrect intonation patterns because the LA speaker unknowingly superimposes his/her native's intonation pattern on that of the target language. Equally, the listener can make allowances for lexical or syntactic errors as long as they do not constitute global errors. Hence, the learner has to observe the target language intonation rules.

1. Utterance

First and foremost, it is crucial to define some terms that are connected to intonation. One of these terms is an utterance which is the speech unit that starts and ends with a pause.

2. Tone Units

An utterance comprises one or more speech units in which the voice quality changes as we speak. These speech units are called tone units (also called tone groups or intonation units).

For example, in the following long sentence, there are 4 tone units

//as A couple of months ago/, while I was looking for my keys, / I found my purse, / which I had mislaid long ago.//

3. Onset Syllables and Tonic Syllables.

At the core of an utterance are syllables which are of two: onset syllables and tonic ones. The onset syllable, usually at the beginning of an utterance, set the pitch in motion. The tonic syllable (also called the nucleus) is the last stressed syllable of a content word within the utterance. Content words are verbs, adverbs, adjectives, and nouns

Let's consider the following utterance and identify the onset syllable(OS) and tonic syllable(TS).

1 **Mary** has a **lamb**.

Ma is the onset syllable **lamb** is the tonic syllable

Peter likes **cho**colate. 'Pe' is the onset syllable, whereas 'cho' is the tonic syllable

✎ Exercise: What about the following? Use your dictionary to find the placement of stress.

1. Susan is happy.
2. Jones is going to the cinema.
3. Her brother is a skilful mechanic.
4. Communication with Paul is impossible.

Now let's consider each of the following utterances and identify the nucleus, ie; (i.e., the last stressed syllable)

Example 1: //Mary wears a pinafore//

N

Example 2: //Peter isn't a mechanic//; //he doesn't repair cars//

N

N

✎ Exercise: read each of the following utterances and underline the nucleus.

1. Kate is a teacher
2. I haven't seen Kate for ages.
3. Davis paints houses; he is a good painter
4. A couple of months ago, while I was looking for my keys, found my purse

*As indicated above, the placement of the tonic syllable (also called the nucleus) is not fixed. It can be anywhere within the tone unit depending on the following factors:

- to signal new information as opposed to information already before ('given' information);
- to indicate contrast with something that has been said before;
- to highlight a specific word.

Consider the following examples.

A: Did you say you wanted to see the dentist? (This is the context sentence)

B: I said I wanted to see an ophthalmologist. (the underlined syllable is the nucleus.)

A: I thought you didn't like hers. (This is the context sentence)

B: I don't want yours. (Yours is the nucleus because it is opposed to hers)

✎ Exercise: read the following utterance and underline the nucleus.

1) I'd like a book to read.

2) She is a pretty woman

3) **A:** You said you are angry.

B: I said Sara is angry.

4) **A:** I believe you are wrong.

B: you are wrong.

4.English Tones

In phonetics and phonology, the term tone refers to the movement or level of the pitch of a speaker's voice.

4.1.Information Questions with who, what where, when, etc.

Falling tone when the question is asked for the first time.

Examples: where do you live?

How are you?

4.2.Statements (Falling tone)

Examples: He is a police constable; he likes his job.

4.3.Question Tags expecting confirmation. (falling tone)

: It's cold today, isn't it? Mohamed is your best friend, isn't he?

4.4.Question Tags showing less certainty (Rising tone)

Examples: It's cold today, isn't it?

You didn't like my cooking, did you?

4.5. Question expecting a yes/no answer

Examples: do you want to see the doctor?

Did you find it easy to come here?

4.6. Lists of Items (rising, rising, rising, and finally falling)

Example: I have a pen, a sharpener, a pair of scissors, and a rubber.

✎ Exercise 1: Read the following utterances, identify the tonic syllable, and then the tone in each of the following utterances.

1. // the students understood the lesson//
2. //he will leave in winter//
3. // she lives in Paris //
4. // where is Sarah going//
5. //look at the window //
6. // are you coming tonight //
7. // where does Susan work //

✎ Exercise 2: Read each of the following tone units and identify the tone.

- 1) /What is your name? /
- 2) /Show me your passport. /
- 3) /Do you have a luggage ticket? /
- 4) /Will you please turn the radio off? /
- 5) /What's your father's job?/ (asked for the second time)
- 6) /He's got a car, a flat, a hotel, and a factory. /

Consider the following utterances, and notice the placement of the nucleus.

A : Did you say you didn't like ours ? (context sentence)

B: We don't **want** yours

A: I thought you didn't want hers. (context sentence)

B: I don't want **yours**.

✎ Exercise 3: Read each of the following tone units and underline the nucleus

A: Is it true she doesn't want ours? (context sentence)

B: We don't want yours.

A: Do you want ours? (context sentence)

B: we don't want yours.

A: / Is it true that Susan has had an accident? /

B: / Her sister has. / (nucleus)

A: / Did you say you wanted to see the dentist? /

B: / I said I wanted to see you. / (nucleus)

A: / Is it true she doesn't want ours? / (context sentence)

B: / We don't want yours. /

A: / Do you want ours? / (context sentence)

B: / we don't want yours. /

Open the bedroom door. (context sentence)

A: / Did you say open the bedroom window? / (context sentence)

B: / No, I said open the bedroom door /

A: / Did you say open the kitchen door? / (context sentence)

B: / No, I said open the bedroom door. /

A: / Did you say close the bedroom door? / (context sentence)

B: / No, I said open the bedroom door ./

VIII. Introducing Sentence Stress

Introduction

To deal with sentences stress, as opposed of word stress, the learner has to distinguish between to types of words/ content words and function ones:

1.Content Words

➤ **Content words include:**

- **(Most) principle verbs** (e.g. open, show)
- **Nouns** (e.g. kitchen, Mohamed)
- **Adjectives** (e.g. happy, comfortable)
- **Adverbs** (e.g. always, practically)

2.Functions Words

➤ **Function words, on the other hand, include:(also called grammatical words)**

- **Determiners** (e.g. the, a, some, a few)
- **Auxiliary verbs** (e.g. don't, am, can, were)
- **Prepositions** (e.g. before, next to, opposite)
- **Conjunctions** (e.g. but, while, as)
- **Pronouns** (e.g. they, she, us)

Some of these function words have a weak form and a strong form. The weak form is the usual pronunciation, but the strong form is used when the word is:

- prominent i.e., it stands out from the adjoining syllables
- said per se (on its own)
- at the end of the sentence

Word	Strong form	Weak From
can	/kæn/	/kən/
from	/frɒm/	/frəm/
the	/ði/	/ðə/
but	/bʌt/	/bət/
that	/ðæt/	/ðət/
does	/dʌz/	/dəz/

him	/him/	/im/
would	/wʊd/	/wəd/ and /d/
to	/tu:/	/tə /
her	/hə:/	/hə/ and /hə:/
he	/hi:/	hi/ or /i/

3.Strong forms and Weak Forms

Here is a list of some function words:

Here is a more detailed list:

	Example with strong form	Example with weak form
The following have weak forms with /ə/: the, a, an,. and, but, that, than, your, them, us, at, for, from, of. to, as, there, can, could, shall, should, would, must, do, does, am, are, was, were, some	I can /kæn/ come after all. who's it for / fɔ:/?	I can /kən/ swim. This is for/fə/ you.
she, he, we, you are pronounced with reduced vowels in their weak forms: /ʃi/, /hi/, /wi/? ju or /jə/	A: who did it? B: you /ju:/	Are you (ju/ or /jə/) tired ?
his, her, he, him, her, has, had are often pronounced without /h/ in their weak forms (except at the beginning of a sentence)	he / hi: was there, but she / ʃi: / wasn't.	was he/ hi/ or /i/ there ?

Practice

Tell him to go → strong forms /him/ /tu:/

weak form: /təl əm tə ɡəʊ/

I would like some fish and chips strong forms → /aɪ wʊd laɪk sʌm fɪʃ ænd tʃɪps/

weak forms → /ə wəd laɪk səm fɪʃ ən tʃɪps/

As you can see, the grammatical words "him" and "to" are **unstressed** and have a weak form when pronounced inside a sentence. Additionally, native speakers don't use strong forms in (connected) fast speech, because it sounds unnatural.

- Of the characteristics of fast speech is that weak forms of function words can be hard nonnative speakers to perceive. Therefore, regular practice is recommended. Compare:

1) **slow speech:** when are taking him to see her?

fast speech: when /əju/ taking /ɪmtə/ see /ə/

2) **slow speech:** there are some over there.

fast speech /ðerəsəm / over there.

Exercise: write the following words in their correct column according to their stress pattern. Number 1 is done for you.

happy divide tonight afternoon advantage Morocco
holiday

0 ₀	o0	0 ₀₀	0 ₀₀	0 ₀₀
<i>happy</i>				

Now, compare word stress and sentence stress.

O ₀₀		oO ₀		ooO	
Word	Sentence	Word	Sentence	Word	Sentence
Wonderful	answer me	tomato	I think so	Japanese	Who are these?

- We notice that although some words and sentences have different structure in terms of the number of syllables, they have the same stress pattern.

Exercise 1: Read the following sentences aloud, paying attention to the . prominent syllables are in capital letters. Focus in particular on copying the non - prominent forms of the function words.

- 1) Do they LIKE each other?
- 2) I SAW somebody at the WINdow.
- 3) There was a LETter from his BROther.
- 4) There should be some MORE in the BOX.
- 5) We were GOing to see her PArents .
- 6) she doesn't LOOK as OLD as me.
- 7) WHEN do you get the reSULTS of your TESTS ?
- 8) I was at HOME from EIGHT o'CLOCK.

Exercise 2: Do you think the words in **bold** will have their weak (write W) or strong form (S) in these dialogues?

Example a A: That ice-cream looks nice. B: Do you want **some**? S

b A: I'm really thirsty. B: There's **some** orange juice in the kitchen. W

I. a A: Do you think I should apologise ? B: Yes, I'm sure that **would** help.

b A: Did you get 1 00% on the test? B: No, I spelt '**would**' wrong.

2. a A: I was in Slovenia last weekend. B: What **were** you doing there ?

b A: Why weren't you and Amy at the party? B: But we **were**.

3. a A: What have you got there ? B: It's a present **from** Alex.

b A: Is this a card for Simon's birthday ? B: No, it's **from** Simon.

4. a A: Why did you mark it wrong ? B: You wrote '**your**' instead of 'you'.

b A: We are off to Scotland again in the summer. B: Are you going with **your** sister?

5. a A: Can I borrow your screwdriver? B: What do you want it **for**?

b A: Did the phone ring ? B: Yes, it was **for** David.

Key to exercise 1 p.10

Exercise 1

- ✎ A. Decide if the final consonants in column A are voiced or voiceless.
- ✎ B. Decide if the initial consonants in column B are voiced or voiceless.

A	voiced / voiceless.	B	Voiced/voiceless.
Washed	voiceless	barber	voiced
travelled	voiced	knob	voiced
coats	voiceless	gauge	voiced
gloves	voiced	thorough	voiceless
tomb	voiced	meet	voiced
gauge	voiced	contrast	voiceless
pat	voiceless	balloon	voiced
dig	voiced	house	voiceless
cane	voiced	knowing	voiced
both	voiceless	chemistry	voiceless
sneeze	voiced	philology	voiceless
Halifax	voiceless	judge	voiced
dreams	voiced	writer	voiced
seat	voiceless	vase	voiced
dropped	voiceless	Sean	voiceless
exchange	voiced	George	voiced
bathe	voiced	bring	voiced
cough	voiceless	knob	voiced
shrimp	voiceless	knee	voiced
lease	voiceless	thorough	voiceless
miming	voiced	pain	voiceless
wrote	voiceless	cling	voiceless

✎ **Exercise:** read the following words, and identify the heavy syllable.

Cuba	<u>C</u> uba
avoid	a <u>void</u>
dining	<u>d</u> ining
weapon	<u>w</u> eapon
measure	<u>m</u> easure
morning	<u>m</u> orning
function	<u>f</u> unction
common	<u>c</u> ommon
produce(v)	pro <u>duce</u>
conundrum	co <u>nundrum</u>

~~First Exam for first Year English Degree in Phonetics~~

Correction

Name:	Group:
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Activity 1: Define the following phonetic terms:

- **Phonation:** It is a technical term that refers to the vibration of the vocal folds.
- **Resonation:** The term refers to the air movement within the vocal tract, causing the speech sound to resound in some cavities called resonance chambers. These are: the nose, the mouth, and the pharynx.
- **Articulation:** In phonetics, the term articulation denotes the physiological movements involved in modifying the airflow to produce the various types of speech sounds, using the speech organs in the vocal tract above the larynx.

Activity 2: Transcribe the following

- 1) Peter [pi:tə]
- 2) know [nəʊ]
- 3) tongue [tʌŋ]
- 4) pneumonia [nju: 'məʊniə]
- 5) Arkansas ['ɑ:kənsɔ:]
- 6) Thames [təmz]
- 7) Where do you think Kirk is going?
[weə du: θɪŋk kɜ:k ɪz 'gəʊɪŋ?]

Activity 3: Give the VPM of the following English phonemes

Phoneme	Voice	Place of Articulation	Manner of Articulation
/ p /	unvoiced	bilabial	plosive(stop)
/ k /	unvoiced	velar	plosive(stop)
/ l /	voiced	alveolar	lateral
/ w /	voiced	labio-velar	approximant
/ ŋ /	voiced	velar	nasal

Activity 4: Look at the following English consonant phonemes and choose the appropriate description which best fits the initial consonant.

Jump	a) fricative b) nasal c) approximant d) affricate X
zoo	X a) fricative b) nasal c) lateral d) affricate
gnome	a) fricative b) nasal X c) glottal d) lateral
gaol	X a) affricate b) lateral c) glottal d) nasal

First Semester Exam

1. For each of the following words, write the phonetic symbol for each consonant that occurs in medial position.

Sunny/ /	age/ /	singer/ /	locking/ /	lopping / /
----------	--------	-----------	------------	-------------

2. Describe the following phonemes

/ɪ/	
/p /	
/θ/	
/u:/	
/dʒ/	
/ʒ:/	

3. Transcribe the following words

Write the spelling of the transcribed words

book / /	/ həʊp /
pie / /	/ pɑ:kɪŋ /
work / /	/ 'dɑ:bi /
farming / /	/ 'ti:tʃə /
singer / /	/ 'pɑ:spɔ:t /

4. Define the following terms:

Phonetics ,phonology, pragmatics

1. Phonetics is

2. Phonology is....

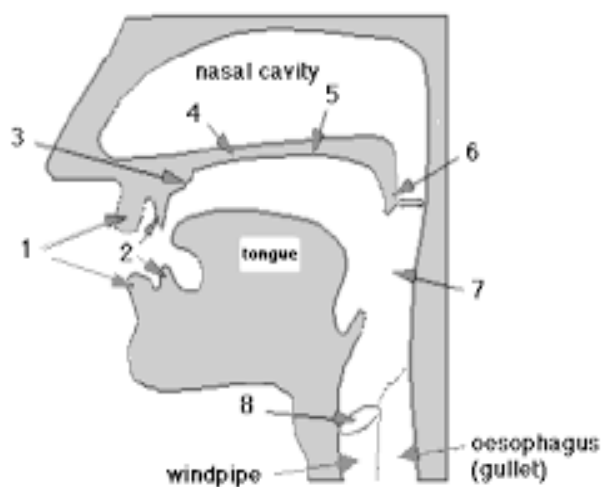
3. Pragmatics is....

Name:

Group:

First Semester Exam

1) Label the following speech organ diagram.



- 1) lips
 2)...
 3)....
 6)....
 8).....

2) Transcribe the following words

3) Write the spelling of the transcribed word

put		/ˈɒnsləʊt /	
first		/ˈsɪːzə /	
heart		/maʊθ /	
fake		/ˈpæliətɪv /	
soya		/pæləˈstɪniən/	

4) Choose the appropriate description which best fits the initial consonant phonemes.

China	a) velar	b) nasal	c) approximant	d) affricate
calamity	a) velar	b) nasal	c) alveolar	d) affricate
Pharaoh	a) nasal	b) fricative	c) glottal	d) lateral
hard	a) affricate	b) lateral	c) glottal	d) nasal

Name:

Mark: /20

Second Phonetics Exam for first Year English Degree

Correction

A. Answer the following questions briefly.

1. What is a heavy syllable?

1.If the latter comprises a long vowel, a diphthong, or a triphthong followed by no consonant or a consonant cluster, then the syllable is heavy.

2. What does “IPA” stand for?

2. It stands for International phonetic alphabet

3. Define the following phonetic terms:

- Coda: it is the segment of a syllable following the nucleus, as the “d”-sound in “good.”
- Onset : It is the segment of a syllable preceding the nucleus, as the “gr” in “great”.
- Penultimate syllable: It is the syllable that is next to the last one.
- Antepenultimate syllable: It is then third from the end

B. Indicate the number of syllables in the following words.

	1	2	3	4	5
important			X		
conundrum			X		
smashed	X				
suitcases			X		

C. Transcribe the following words and then indicate which syllable carries the main stress.

garlic	balloon	autumn	biometric	lunatic
[ˈgɑːlɪk]	[bəˈluːn]	[ˈɔːtəm]	[ˌbaɪəˈmetrɪk]	[ˈluːnətɪk]
ploughed	reprehensible	cartesian	paradigm	
[plaud]	[ˌreprɪˈhensɪbl]	[kɑːˈtiːziən]	[ˈpærədɑɪm] /	

C. Read the transcription and write the word.

/ deɪlaɪt /	daylight	/ 'kaʊntəsɪŋk /	countersink
/ ˌflʌktʃu'eɪʃən /	fluctuation	/ əˌbɔːtɪ'feɪʃjənt /	abortifacient
/ wɜːm /	worm	/ ˌeɪbiːsiː'deəriən /	abecedarian
/ prəˌnʌntsi'eɪʃən /	Pronunciation	/ ˌpæstʃəraɪ'zeɪʃən /	pasteurization

D. Put a cross next to the words that begin with a velar consonant.

got (x) cat (x) chat chaos(x) nice know gander (x)
gender

E. Put a cross next to the words in which the medial consonant is voiced.

tracking tagging(x) stopper stomach(x) robber(x) runner(x) ether(x)
either(x)

*****Correction of the Exam**

Tahri Mohamed University (Bechar)
Faculty of Letters and Languages

Academic Year: 2008/2009
Department of English

Name:

Mark:

First Resit Exam for first Year English Degree in Phonetics

Activity 1. Read the following statements and tick the right ones.

Statement	T	F
1. Phonetics is a branch of linguistics.	✓	
2. The abbreviation "R.P." stands for "Received Pronunciation."	✓	
3. English has two affricate phonemes.	✓	
4. A glottal stop is made by the closing of the nasal cavity.		✓
5. The word "comprehensible" is a monosyllabic word.		✓
6. A plosive is formed by the complete obstruction of the vocal tract by the articulators.	✓	

Activity 2 Transcribe the following words.

1. Money ['mʌni]
2. product ['prɒdʌkt]
3. balloon [bə'lu:n]
4. about [ə'baʊt]
5. occurrences [ə'kʌrənsɪz]
6. disappointment [ˌdɪsə'pɔɪntmənt]

Activity 3 Write the following words in the table according to their stress pattern:

carnivorous courageous glamorous herbivorous
humorous incredulous insectivorous miraculous
outrageous simultaneous tremulous

Ooo	oOo	oOoo	ooOoo	ooOo
glamorous humorous tremulous	courageous outrageous	carnivorous herbivorous incredulous miraculous	insectivorous	simultaneous

Activity 4: Are the following statements True or false?

Statement	T	F
1.The initial sound in /fish/ is a fricative.	✓	
2.The last sound in /rock/ is a plosive.	✓	
3.The initial sound in /church/ is a fricative.	✓	
4.The last sound in /bath/ is a voiceless affricate.		✓
5.The initial sound in /short/ is a voiceless nasal.		✓
6.The mid consonant in the word 'tracking' is a velar sound.	✓	

EXAM

Tahri Mohamed University (Bechar)
Faculty of Letters and Languages

Academic Year: 2009/2010
Department of English

Name:	Mark: /20
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Second Phonetics Exam for first Year English Degree

Activity 1: Answer the following questions briefly.

1. What is a heavy syllable?

1.

2. What does "IPA" stand for?

2.

3. Define the following phonetic terms:

• Coda :

• Onset :

• Penultimate syllable:

• Antepenultimate syllable:

Activity 2: Indicate the number of syllables in the following words.

		1	2	3	4	5
important						
conundrum						
smashed						
suitcases						

Activity 3: Transcribe the following words and then indicate which syllable carries the main stress.

garlic	balloon	autumn	biometric	lunatic
...
ploughed	reprehensible	cartesian	paradigm	
...

Activity 4: Read the transcription and write the word.

/ deɪlaɪt /		/ 'kaʊntəsɪŋk /	
/ ,flʌktʃu'eɪʃən /		/ ə,bɔ:tɪ'feɪʃɪənt /	
/ wɜ:m /		/ ,eɪbɪ:sɪ'deəriən /	
/ prə,nʌnt.sɪ'eɪʃən /		/ ,pæstʃərəɪ'zeɪʃən /	

Activity 5: Circle the words that begin with a velar consonant.

got cat chat chaos nice know gander gender gnat

Activity 6: Circle the words in which the medial consonant is voiced.

tracking tagging stopper stomach robber runner ether either

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2011/2012
 Time Limit: 1.30'

Name :

Group:

The First Phonetics Exam for First Year Students(LMD)**①** Define the following terms.

Phonetics

Phonology

② Transcribe the following words.

thing	
balloon	
parking	
tongue	
tower	

③ Draw a vowel quadrilateral and indicate on it the glides for the English diphthongs.

1) au

2) eə

3) ɔɪ

4) əʊ

5) aɪ

④ For each of the following words, write down the phonetic symbol for every consonant that occurs in final position.

1. rich

2. keen

3. rough

4. climb

5. column

⑤ Circle each sound in the following words that matches the description given.1) A Tense Vowel

park

blue

cat

her

pink

2) A High Back Vowel

has do pull tit pit good

3) An Unrounded Vowel

too loot bean clue

4) A Mid Back Tense Rounded Vowel

bit neat team black tore

5) A Low Back Tense Neutrally Open Vowel

dark port caught north pill

EXAM

Tahri Mohamed University (Bechar)

Academic Year: 2021-2022

Faculty of Letters and Languages

Time Limit: 1.00'

Department of English

Module: Phonetics

Name:

Group:

Second Semester Exam

1. For each of the following words, write down the phonetic symbol for every consonant that occurs in final position .

crime	
wash	
dive	
morning	
autumn	

2. Consider the following table and match each place in column A with its corresponding articulation in column B. Number one is done for you.

	A		B
1	palatal	A	tongue tip contacts teeth
2	labio-dental	B	upper and lower lip in contact
3	velar	C	tongue contacts alveolar ridge
4	glottal	D	back of tongue contacts soft palate
5	bilabial	E	lower lip contacts upper teeth
6	dental	F	front of tongue contacts hard palate
7	alveolar	G	restricting or narrowing of airflow through glottis

1	2	3	4	5	6	7
F						

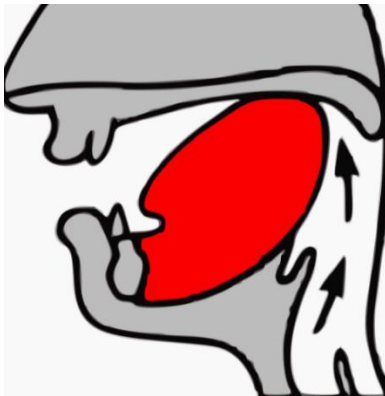
3. Transcribe the following words  Write the spelling of the transcribed words

car			/ 'teɪbəl /	
keen			/ fləʊə /	
world			/ kɑ:d /	
low			/ mə'ʃi:n /	
making			/ 'fæktəri /	

4. Answer the following questions

- a) What voiced consonant has the same place of articulation as /t/, and the same manner of articulation as /h/
- b) What voiceless consonant has the same manner of articulation as /ʒ/, and the same place of articulation as /v/

5. Consider the following diagram and write one of the phonemes that are articulated.



Answer : / /

EXAM*****CORRECTION**

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2021-2022
 Time Limit: 1.00'

Module: Phonetics

Correction of Second Semester Exam

Name	Group:
------	--------

1. Write each of the following words in its correct column according to its stress pattern.(5points)

chaotic / satisfactory / advantageous / comfortable / carnivorous

oo0oo	o0oo	o0o	oo0o	0ooo
satisfactory	carnivorous	chaotic	advantageous	comfortable

2) Read each of the following utterances and decide on the tone associated with each of them.(2pts)

// ↓ Where does Jane live//

// ↗ Where did you put it // (asked for the second time)

3) Read the following tone units and underline the nucleus.(4points)

1. / I can't stand that noisy child. / (nucleus) (1pt.)

2. A: / Is it true that Susan has had an accident? /
 B: / Her sister has. / (nucleus)(2pts)

3. A: / Did you say you wanted to see the dentist? /
 B: / I said I wanted to see you. / (nucleus)(1pt.)

4) Consider the following words and represent each of them in pitch according to the assignment provided. (4pts)

beautiful (falling)
 H _____
 M _____
 L _____

danger (rising)
 H _____
 M _____
 L _____

neither (rising)
 H _____
 M _____
 L _____

diving (falling)
 H _____
 M _____
 L _____

5) Consider each of the following words and identify the stress pattern of each of them.(5pts)

00	000	o0o	o0o	000 000
language	crucify	Germanic	devotion	Nepalese industry

EXAM

Tahri Mohamed University (Bechar)
Faculty of Letters and Languages

Academic Year: 2009/2010
Department of English

Module: Phonetics

Name:

Group:

Second Semester Make-up Exam

1) Circle the word which contains a back vowel

put heart calm foot

2) Circle the word which contains a front vowel

at cat feel tooth

3) Read the following statements and tick the right ones.

Statement	T	F
1) In every syllable there is a vowel called "peak."		
2) Diphthongs are also called glides.		
3) Word morphology is important for stress prediction.		
4) Intonation refers to the way the voice goes up and down in pitch.		
5) In English, rising tones are always associated with wh- questions .		

4) Transcribe the following words and put in stress at the proper places.

barter	/	/
follow	/	/
mechanic	/	/
direct	/	/

5) Read the following words and underline the stressed syllable

LOGICAL

PROBABILITY

ISOLATE

CREATIVE

ENORMOUS

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2019/2020
 Time Limit: 1.00'

Module: Phonetics

Second Semester Exam

Name	Mark: /20
------	-----------

A. Read the following utterances and then identify the meaning of each.

1. //David says// Sarah is absent//
2. //David //says Sarah //is absent. //

Answer:

B. Read the following sentences and identify the thought groups

1. Can you give me a lift, Ted?
2. "He hasn't told me, but I think he'll get married soon."
3. "Though Steve Jobs is irreplaceable I think Apple can succeed without him."
4. Last summer we went to Rome, Barcelona, Madrid, and Geneva.

C. Answer the following questions

1. Why do we pause when we speak a language?

Answer:

2. In what way does the English language differ from Japanese in terms of syllable-timing?

Answer:

3. What is isochronicity?

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2019-2020
 Time Limit: 1.30'

Module: Phonetics

First Semester Exam

Name:

Group:

I. Write the following words/phrases in their correct column according to their stress pattern.

tomorrow / carnivorous /satisfactory / advantageous / comfortable

ooOo	Oooo	oOo	ooOoo	oOoo

II. transcribe the following words and mark the stress.

Word	Transcription
follow	/ /
whenever	/ /
tomato	/ /
abecedarian	/ /

III Transcribe the words that may have weak forms.

- Where does he live?
- Tell him to call me later?
- Would you care for a cup of tea?

IV. Identify the stress pattern of the following sentences.

1. Listen to me	2. Can't you speak, slowly	3. A glass of water, please	5. Give me a hand, Ted	4. Don't open the door

V. Underline the syllable in each word in bold that you think is likely to be made prominent.

1. A report on the problem of **absentee** landlords is to be published today.
2. The first **volunteer** was upset

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2018/2019
 Time Limit: 1.30'

Module: Phonetics

Second Semester Resit Exam

Name	Mark: 20
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A.Fill in the gaps with one word so that the paragraphs make sense.

In English, the amount ofit takes to say something does noton the number of syllables because it is a language.
 In Japanese,, the more syllables we add to an, the more time it takes to such an utterance i.e., each syllable is given anamount of focus , which feature makes Japanese a syllable-timed language.

B. Identify the tone of each utterance.

// Does Robert speak Portuguese? //
 // Where does Ted live? //

C. Read the following sentences and pinpoint the thought groups

- 1) “She’s pregnant! And due in October!”
- 2) “I got a new puppy, but now I need to train her!”

D. Define the following phonetic terms

- 1) A thought group
- 2) isochronicity

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Academic Year: 2015-2016
 Time Limit: 1.30'

Module: Phonetics (Ang.24)

Name	Group

1) Are the following statements true or false?

Statement	T	F
1) The Shwa in / ə'baʊt/ is a minimum syllable.		
2) The word 'faculty' is disyllabic.		
3) The phonological structure of a word is important for stress prediction.		
4) Stress never falls on syllables containing suffixes.		
5) Function words are likely to be stressed.		
6) The phoneme /l/ in play is a devoiced .		

2) Write the following words in the table according to their stress pattern:

miraculous	Taiwanese	lunatic	courageous	Chinese	industrious
o0	o0o	oo0	o0oo	0oo	0oo

3) Underline the syllable in each word in bold that you think is likely to be made prominent.

3. A report on the problem of **absentee** landlords is to be published today.

4. The first **volunteer** was upset.

5. Mandarin is a **Chinese** language..

6. That man is **Napalese**.

4) Identify the tonic syllable in the following utterances

1) // the students understood the lesson//

2) //he will leave in winter//

EXAM

Tahri Mohamed University (Bechar)
Faculty of Letters and Languages

Academic Year: 2014/2015
Department of English

Module: Phonetics

Name:

***CORRECTION

Group:

Second Semester Exam

Exercise 1: Read the following statements and tick the right ones.

Statement	T	F
1) A minimum syllable has neither onset nor coda.	✓	
2) All triphthongs end with a schwa.	✓	
3) Grammatical category is important for stress prediction.	✓	
4) The main movements of pitch, within a tone unit, are called tonic syllables.	✓	
5) In English, falling tones are always associated with wh- questions.		✓
6) The abbreviation "RP" stands for "rare phonology."		✓

Exercise 2: Transcribe the following words and put in stress at the proper places.

apply	/ə'plai /
writer	/'raɪtə /
yellow	/'jeləʊ /
Chinese	/'jeləʊ /

Exercise 3: Read the following words and underline the stressed syllable.

Impossibility diabolical irrigate sensitive coterminous abecedarian

Exercise 4: Circle each sound in the following words which matches the description given.

- A front vowel

loot heed cool pet hot dog hut her sat fur

- A central vowel

err body pin tin about tar fat fur

EXAM

Tahri Mohamed University (Bechar)
 Faculty of Letters and Languages
 Department of English

Module: Phonetics

Academic Year: 2018/2019
 Time Limit: 1.30'

First Semester Resit**I. What is the stress pattern of each of the following words?**

credibility	dangerous	reprehensible	pattern	Arabic

II. Turn the following phonetic scripts into words.

1) kən jə si: ɪm ?	
2) ə ju gəʊɪŋ tə tɔ:k tə ɪm t'naɪt?	
3) 'sʌmwaɪn əz fə'gɒt ðər bu:k hɪə .	

III. Identify the stress pattern of the following phrases or sentences.

1. A second time	2. You speak fast	3. A glass of water, please	5. Give me a hand, Paul	4. Don't open the window

IV. Underline the syllable in each word in bold that you think is likely to be made prominent.

7. A report on the problem of **Chinese** boys is to be published today.

8. The first **volunteer** was upset

- VI** a) Decide which aspect of connected speech is relevant to each of the following transcribed phrases/sentences
 b) Turn each transcribed sentence into words

1) / ðækʒ:l ɪz ɪ'tæliən /	a) Aspect
	b) Phrase/Sentence

2) /'brɪtɪʃ'lɪtrətʃər /	a)Aspect
	b)Phrase/Sentence

3) "that stuff"/ and ""that's tough!" <u> </u>	a Aspect
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4))/ ðə 'mi:diərər tɔ:kɪŋə'baʊt ðə dɪ'zɑ:stər /	a)Aspect
	b)Phrase/Sentence

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