

CHAPTER II

REVIEW OF RELATED LITERATURE

This chapter deals with the review of related literature. It is important to elaborate some theories, which are used in this research in order to have an understanding of certain concepts. There were many related theories as the basis of the research.

2.1 Some Pertinent Ideas

2.1.1 The Concept of English Pronunciation

2.1.1.1 Definition of Pronunciation

Pronunciation here includes all those aspects of speech which make for an easily intelligible flow of speech, including segmental articulation, rhythm, intonation and phrasing, and more peripherally even gesture, body language and eye contact. Pronunciation is an essential ingredient of oral.¹

Pronunciation means how we say words. Most people speak the dialect of standard English with an accent that belongs to the part of the country they come from or live in. Learners of British English commonly hear RP (received pronunciation), which is an accent often used on the BBC and other news media and in some course materials for language learners, but it is also common to hear a variety of regional accents of English from across the world.²

According to Harmer, Pronunciation is how to say a word in which it is made up of sounds, stress, and intonation. Sound deals only with sound and can be

¹Ursula Nowicki, “*Teaching Pronunciation a Handbook for Teacher and Trainers, program manager, English Language and Literacy*” (TAFE NSW: Access Division, 2001), p. 6.

²Cambridge Dictionary <https://dictionary.cambridge.org/dictionary/english/pronunciation> (online) (Accessed on: 10th May 2019)

meaningless, but if we put some sound together in certain order, that will hear a meaning about something.³

According to Kristina and Diah, pronunciation is the act or manner of pronouncing words; utterance of speech. In other words, it can also be said that it is a way of speaking a word, especially a way that is accepted or generally understood.⁴

Based on the explanation above, the researcher concludes pronunciation is the way to produce the sounds of speech.

2.1.1.2 Pronunciation Factors

There are some pronunciation factors that commonly encountered in speaking English performance. As the teacher, we need to be aware what degree they determine the acquisition of target-language phonology. So, these are:

1. Aptitude, Attitude, And Motivation

Are some learners inherently more capable of acquiring a good pronunciation than others? Skehan's overview of Carroll's research on language aptitude is useful here. According to Carroll, there are four traits that constitute language aptitude:

- a. Phonemic coding ability: the capacity to discriminate and code foreign sounds such that they can be recalled.
- b. Grammatical sensitivity: the ability to analyze language and figure out rules.

³Jeremy Harmer, *The Practice of English Language* (New Edition; London and New York Longman, 1991), p. 33.

⁴Kristina and Diah in Dyah Indri Fitri Handayani, "Teaching English Pronunciation Using Film." Jurnal of English and Education, Vol.5 No.2. 195 (October 2017), (Accessed on: 10 May 2019)

- c. Inductive language-learning ability: the capacity to pick up language through exposure.
- d. Memory: the amount of rote learning activity needed to internalize something (a new sound, a lexical item, a grammatical rule, the pronunciation of spelling of a word, etc.)

Our main concern here is the first trait, although the memory trait is also relevant. Some learners are in fact fairly balanced in these four traits, whereas others have very strong patterns of strength and weakness. Learners weak in phonemic coding ability would therefore have much more difficulty achieving a readily intelligible pronunciation than those with high aptitude in this domain. Teachers (and pronunciation syllabuses) need to be sensitive to such learner differences and not expect all learners to achieve the same level of success in the same amount of time.⁵

Snow and Shapira, on the other hand, discount the importance of aptitude, pointing out that we all have demonstrated language learning ability via acquisition of our native language. One argument against assigning the determining role to aptitude. According to these researchers, is the fact that low-ability learners (as measured by language aptitude tests) are in fact often able to attain fluency in a second language while some high-ability learners are not.⁶

As should be evident by now, the network of factors influencing an individual's acquisition of second language phonology is a tremendously

⁵Skehan, *Individual Difference in Second Language Learning* in Marianne Celce-Murcia, *Teaching Pronunciation a Course and Reference Guide* (Cambridge University: Cambridge University Press, 2010), p. 20.

⁶Snow and Shapira, *an Introduction to Second Language Acquisition Research* in Marianne Celce-Murcia, "Teaching Pronunciation a Course and Reference Guide" p. 20.

complicated one. Indeed, as Stevick suggests, we need to go beyond language aptitude and educational or cultural experience to see how individuals and their personalities affect the learning process. Of help in understanding learners' attitudes toward the target language and their motivation (or lack thereof) to acquire a second language is research that examines the effect of personality and the acculturation process on language acquisition.⁷

Guiora notes that personality or in his words, language ego is at the very core of the language-learning process, especially where the skill of pronunciation is concerned. "speaking a foreign language entails the radical operation of learning and manipulating a new grammar, syntax, and vocabulary and the extreme limits of proficiency, modifying one of the basic modes of identification by the self and others. The way we sound". Pointing out the often dramatic discrepancy between certain individuals' attainment in pronunciation versus their attainment in other skill areas, Guiora postulates that accent or pronunciation, is a unique feature of language performance-one that can provide "the key to extent to which the individual is psychologically capable of stepping into a new system of communication".⁸

Following in Guiora's footsteps is Schuman's work on the role that acculturation plays in the process of language acquisition. Schuman, echoes Guiora's hypothesis that ego permeability (i.e the extent to which the ego can be flexible and adapt) and personality factors are at the heart of second-language acquisition. Schuman further states that in adult, the development of firm ego boundaries. Along with individuals' attitudinal and motivational orientations, can

⁷Stevick, *Memory, Meaning & Method: Some Psychological Perspective on Language Learning* in Marianne Celce-Murcia "Teaching Pronunciation a Course and Reference Guide", p. 20.

⁸Guiora, *Empathy and Second Language Learning* in Marianne Celce-Murcia, "Teaching Pronunciation a Course and Reference Guide ", p. 20.

place constraints on the cognitive process of language learning. Given such constraints adults might well be hindered from attaining their biologically determined capabilities.

Schumans' acculturation model, delineates the role that social and effective variables may play in language acquisition. Two types of determining factors are: (1) those concerned with the language learning of group of people or sociocultural variables (e.g social dominance patterns size of the cultures). And (2) factors concerned with individual differences or affective variable (e.g., ego permeability, personality type of motivation, degree of cultural shock). Schuman notes that sociocultural variables do not prohibit successful second-language learning.

In applying this model, Schuman differentiates between two types of successful acculturation. In the first, the learner demonstrates integrative motivation—that is, a desire to be socially integrated in the culture, in the second type of acculturation, the learner demonstrates the same openness to the target culture but additionally regards target-language speakers as his reference group. This second type of motivation appears to be akin to that described by Graham(1985) as assimilative motivation and implies a desire on the part of the learner to become an indistinguishable member of the target speech community. Accordingly, one can hypothesize that this second type of learner would willingly embrace the target culture and would therefore be more apt to acquire target like pronunciation in the second language.

Instrumental motivation in which an individual learns a second language to attain a certain goal, for instance a job promotion does not contribute to successful

acculturation, according to Schuman. Lukmani argue that the intensity of motivation is often as the type of motivation.⁹

2. Age

The apparent inability second-language learners to attain nativelike proficiency in pronunciation has often intrigued linguists and nonlinguists alike. Scovel terms his lack of adult facility in acquiring second-language pronunciation the “joseph conrad phenomenon” after the famous polish-born author who, despite achieving brilliant control of the lexis, syntax, and morphology of English as displayed in his literary works, was unable to reach anywhere near the same levels of perfection in his acquisition of english phonology.¹⁰ (conrad’s speech. In fact, remained partly unintelligible to english speaker throughout his life.) subscribing to the philosophy “you can’t teach an old dog new tricks, many would claim along with scovel that adults are unable to achieve perfect or target like pronunciation in a second language. This view goes hand-in-hand with the generally held perfect or near-perfect pronunciation with relative ease. However, research now indicates early childhood exposure to the L2 does not necessarily guarantee acquisition of native like pronunciation since one also must consider other factors such as the amount of L1 use, the amount and quality of L2 input, and opportunity for authentic L2 output (see Flege).¹¹

⁹Schumann, Affective Factor and the Problem of In Second Language Acquisition in in Marianne Celce-Murcia, “*Teaching Pronunciation a Course and Reference Guide*”, p. 21.

¹⁰Scovel, The Critical Second Language in Marianne Celce-Murcia, “*Teaching Pronunciation a Course and Reference Guide*”, p. 16.

¹¹Flege, Second Language Speech Learning Theory, Findings, and Problem in Marianne Celce-Murcia, “*Teaching Pronunciation a Course and Reference Guide*”, p. 16.

3. Exposure To The Target Language

According to Asher and Krashen, among other, learners acquire language primarily from the input they receive, and they should receive large amounts of comprehensible input before they are required to speak. If this is true. Learners' exposure to the target language will be critical factor in determining their success. In EFL settings, especially those where students have little opportunity to surround themselves with native input in the target language, a greater burden will fall on the teacher to provide an adequate model of the target language and to ascertain that students have opportunities outside of class (e.g. in language laboratories or learning centers) to experience samples of authentic oral discourse of native speakers; similarly, it will fall to teachers to encourage out of class conversational use of the target language. However, even in ESL settings. Where the learners are surrounded by the english-speaking world, many learners live in linguistic "island" with relatively little exposure to native speakers of the target language in their homes and even in their worksites. Again. In such cases, the teacher should try to maximize students' exposure to the target language and to encourage them to expand their own domains of linguistic competence. Stressing the importance of language exposure in the process of acquiring all aspects of langauge. Pronunciation, vocabulary, grammar, and discourse.¹²

2.1.1.3 Pronunciation Features

Phonemes are units of sound which can be analyzed. It is also known as segments. On the other hand, suprasegmental features are features of speech which are generally applied to groups of segments, or phonemes. In English,

¹²Asher and Krashen in Marianne Celce-Murcia, *Teaching Pronunciation a Course and Reference Guide* (Cambridge University: Cambridge University Press, 2010), p. 18.

intonation and stress are the important features of suprasegmentals. According to Ramelan, “when a speaker produces an utterance, it can be distinguished into segmental and suprasegmental features.” He states that “segmental features, or just segmentals refer to sound units arranged in a sequential order.” He gave the example, when we say “good heavens”. It has nine segmental features; /gud-hɛvənz/. Meanwhile, Ramelan also explains that “suprasegmental features, or just suprasegmentals refer to such features as stress, pitch, intonation, and other features that always accompany the production of segmental.¹³

The classification of phonems:

1. Vowels

A vowel is a sound that is made with the mouth and throat not closing at any point. Kelly says, “Vowels are all voiced, and may be single (like [e], as in jet) or a combination, involving a movement from one vowel to another (like [eɪ], as in late). Such combination is known as diphthongs”¹⁴.

Table 2.1 Vowels Sounds

No	The sounds	Example	Producing
1	/ə/	Word: a-go, open captain. Sentence: the early bird	Open your mouth very slightly; your lips should be about 1/8 inch (3mm) apart; relax your lips, make

¹³Deliana Simarmata and Hilman Pardede. *Error Analysis of Students' Pronunciation in Pronouncing English Vowels and Consonant* (The Episteme Journal of Linguistic and Literature) Vol. 4 No. 3-5, 2018 p. 9.

¹⁴Kelly in Eka Puspa Cahyani, Noor Eka Chandra, Dini Noor Arini. *Students' pronunciation of English Sounds, Long Vowels and Diphthongs* (Journal of Universitas Lambung Mangkurat. Vol. 1, 2018), p. 67.

		gets the worm	a short sound with your voice.
2	/ɪ/	Word: if, in, symbol, busy, miss. Sentence: Miss smith is thin.	Lower your jaw slightly. The lips are relaxed and are about $\frac{1}{4}$ inch (6mm) apart and pushed outward to make an open circle.
3	/u/	Word: could, push. Sentence: look in the cookbook for a good pudding	Keeping the jaw slightly open. The lips are $\frac{1}{4}$ inch (6 mm) apart and pushed outward to make an open circle
4	/iy/	Word: be, key, fear, police, people. Sentence: Jeannie, do you see the bees?.	Set your lips $\frac{3}{8}$ inch (1 cm) apart. Widden your lips into a big smile.
5	/uw/	Word: two, Tuesday, flew, new. Sentence: the news is too glommy.	Keep your mouth slightly open and the lips $\frac{3}{8}$ inch apart. The lips are tense, and pushed forward into a small circle
6	/iuw/	Word: use, beauty, music, you, cute. Sentence: this is universal truth.	The lips are $\frac{3}{8}$ inch a part, begin with the lips spread into a big smile, then push them forward into a circle.
7	/A/	Word: flood, love, blood, son. Sentence: Buffy cut up	Keep the mouth slightly open, with lips about $\frac{3}{8}$ inch a part

		the shrubs	
8	/E/	Word: egg, said, says, many, step. Sentence: let's rent a tent.	Lower your jaw slightly, the lips are tense and spread outward in a half-smile, about $\frac{1}{2}$ inch (1.3 cm) apart.
9	/ow/	Word: over, slow, shoulder. Window. Sentence: Oh no, don't go!	Lips about $\frac{1}{2}$ inch apart. Round them into a circle. Begin the sound, then move your lips into a smaller circle.
10	/oiy/	Word: boy, coin, noisy, toy, poise. Sentence: Roy's toys are noisy.	The lips set about $\frac{1}{2}$ inc. Begin in a circle. The sound ends with the lips in wide smile, and $\frac{3}{8}$ inch apart.
11	/eə/	Word: ran, fast, pass, laugh, craft. Sentence: they are cramming for their exams over there.	Keep your jaw halfway open. The lips are $\frac{1}{2}$ inch apart. Tense your lips, from a wide, downward smile. Begin the sound then move your lips close together into // position.
12	/ey/	Word: ate, face, cafe, pray, day, eight. Sentence: the rain in the spain stay manly in the plain.	Begin with your lips in the first position of //, about $\frac{1}{2}$ inch apart and with a wide, downward smile. Then, slowly widen them into upward smile, forming /iy/
13	/ɔ/	Word: off, on, auto,	Drop your jaw until the lips are $\frac{5}{8}$

		broad, all, call. Sentence: draw water from the faucet.	inch apart. Tense your lips and round them forward halfway.
14	/æ/	Word: back, cat, tap, bag, plaid. Sentence: have a snack, Jack.	Keep your lips 5/8 inch (1.5 cm) apart from half-smile, with tense lips.
15	/æow/	Word: how, house. Sentence: are we allowed to speak aloud?	Begin with // by setting your lips are 5/8 inch apart and then, glide into /ow/, forming a circle with your lips.
16	/a/	Word: father, wand. Sentence: Roz is fond of dolss.	Drop your jaw until the lips are about 1/4 inch (2 cm) apart. But relaxed.
17	/aiy/	Word: I, ice, bike, pie, guy, buy. Sentence: Try my pie, Ira!	Begin sounding the /a/, with the lips about 3/4 inch apart. Then move your lips to the /iy/ position. Forming big smile.

2. Consonants

According to Burns, a consonant is a sound that is made with the air stopping once or more during the vocalization. That means that at some point, the sound is stopped by your teeth, tongue, lips, or constriction of the vocal cords. Consonant sounds can be voiced (a part of the mouth is closed and the air behind it is released

suddenly –for example, v as in van, b as in bun) –or unvoiced (air is pushed through a narrow part of the mouth –for example, f as in fan, th as in thin).¹⁵

Table 2.2 Consonant Sounds

No.	The Sounds	Words	How to make
1	/p/	Pay, pit, pat, pot, play, simple, hospital, apple.	Put your lips together firmly, stop the air completely, then pop the lips open. Do not make a vocal sound at the beginning of word, release with a puff of air.
2	/b/	Bag, cabs, rubber, bet, bush, rabid, back.	Place your lips together firmly. Stop the air completely, and make a voiced sound.
3	/t/	Tame, ten, twelve, cats, act, text	Place the tip of the tongue against the alveolar ridge, stop the air completely, then release the air make the sound with a noisy puff of air.
4	/d/	Taped, washed, picked, day, does	Place the tip of the tongue on the alveolar ridge and make a voiced and make a voiced sound.
5	/k/	Cat, kettle, work, mosque, ask, talk, walk	Bring the back of the tongue to the velum, stop the air completely, then release it with a voiceless sound.

¹⁵Burns in Eka Puspa Cahyani, Noor Eka Chandra, Dini Noor Arini. “Students’ pronunciation of English Sounds, Long Vowels and Diphthongs”. Universitas Lambung Mangkurat. Journal of English Language Teaching and Applied Linguistics. Vol. 1. 2018. p. 68.

6	/g/	Game, egg, bigger, gum, glean, God	Bring the back of the tongue on the velum, stop the air briefly, then release it with a voiced sound.
7	/f/	Fall, half, often, flower	Place the top teeth firmly on the inside of the bottom lips, release the air continuously with no voice.
8	/v/	Vine, five, ever, save.	Place the upper teeth against the inside of the lower lip, and release the air with a voice sound.
9	/ch/	Chase, question, lunch	Place the upper center of the tongue on the palate, stop the air completely, then release it abruptly with a voiceless sound.
10	/j/	Jam, gym, just, soldier	Place the center of the tongue against the palate, stop the air completely, then release it abruptly with a voice sound.
11	/sh/	Sugar, fashion, shoe	Touch the palate with the side of the tongue and release the air slowly through the passage way formed down the center of tongue. Do not stop the air flow. Do not make a sound with your voice.
12	/zh/	Azure, vision, persian, Asia	Touch your palate with the sides of your tongue and release the air

			slowly through the passage away formed down the center of the tongue. Do not stop the air. Make a sound with your voice.
13	/s/	Say, kiss, fast, face	Place the center of your tongue against the palate and release their slowly, but do not stop the air, and do not make a sound with your voice.
14	/z/	Zero, easy, lazy, cheese	Place the center of the tongue against the palate, release the air slowly, without stopping make a sound with your voice.
15	/l/	Will, love, film, place	Curl your tongue up, put the under side of the tongue firmly on the back of your top teeth and make a sound with your voice.
16	/r/	Ride, cry, green, mirror	Keep the tongue back, do not let your tongue touch inside your mouth, round your lips and push them forward, make a voiced sound.
17	/m/	Maybe, name, game	Press your lips together and make a voiced, humming sound, release the air through your nose.
18	/n/	Name, know, money	Place your tongue against your palate and hold it there, make a voiced

			sound and release the air through your nose.
19	/ng/	Long, strong, singing, going	Bring the back of your tongue up against the vowel, close the air off completely and release it through the nose.
20	/ð/	Think, nothing, thing	Hold the tip of your tongue between your top and bottom teeth, force the air out with a voiceless sound.
21	/ð/	They, the clothes, together	Hold the tip of your tongue between your top and bottom teeth, release the air with a voiced sound.
22	/h/	Hay, who, he, have, hotel	Keep your tongue free and force air from the throat with a voiced sound.
23	/w/	Way, where, one, once	Relax your tongue, then round your lips and press them back against the front of your teeth. Make a sound as you release your lips.
24	/y/	Yellow, year, yet, you	Spread your tongue flat and toward the back of your mouth, do not let your tongue touch the palate. Next, make a wide smile with your lips and bring your tongue forward with a voiced sound. ¹⁶

¹⁶ Jean Yates, *Pronounce it perfectly in English* (Barrons Educational Series, Inc), p. 1-131.

3. Stress

Stress in the word and sentence play an important role in the overall phonetic quality of the speech. It is to a great extent responsible for carrying meaning, and abnormal stress placement will render otherwise good speech completely unintelligible.

Stress refers to the degree of force or loudness. It indicate the importance of a syllable (a part of a word), and the importance of certain words in phrases and sentence.¹⁷ Stress is one of the three aspects of rhythm in English pronunciation, stress, linking and intonation work together to create the rhythm of a fluent speaker. Stress is the degree of force with which a syllable is pronounced; in English stressed syllables are louder than unstressed syllables.¹⁸ Each stressed syllable, in a word in isolation, also has a change in the pitch, or the level of the speaker's voice, and the vowel in that syllable lengthened. Correct stress is the key to speaking English fluently with good pronunciation and to understand spoken English. Stress can fall on the first, middle, or the last syllable of words. Stress knows which syllable of a word to say louder and longer than the others.¹⁹ Each syllable in a word has a degree of emphasis, called stress. There are three stress levels, primary (I), secondary (I), and unstressed (-).²⁰

¹⁷Gertrude F. Orion, *Pronouncing American English: Sounds, Stress and Intonation* (United States of America; Heinle and Heinle publisher, 1988), p. 19.

¹⁸Charles W. Kreidler, *The Pronunciation of English* (USA: Blackwell Publishing, 2004), p. 307.

¹⁹Peter Ladefoged. A Course In Phonetics. (Los Angeles: University of California 1975). p. 104.

²⁰Jean Yates, *Pronounce It Perfectly in English*. 12841, (United States of America; Barron's Educational Series, Inc, 1995), p. 98.

Primary stress, a word with two vowel sounds has two syllables. One syllable has primary stress. Say it a little louder and longer than the other. In the example that follows, these syllable are represented in the extra bold letters.

Primary stress on first syllable	Primary stress on second syllable
Sol-dier	Con-fused
Cli-mate	Ex-cite
Danc-es	Sur-prised

The sound /iy/, /o/, /iuw/, and /I/ often keep their normal pronunciation in unstressed syllables. The following is the example:

Stress on the first syllable	Stress on second syllable
/iy/	
Ar-my	Re-peat
Ba-by	De-duct
ci-ty	Be-gin
/ow/	
Ar-row	o-bey
El-bow	o-mit
Fol-low	o-kay
/iuw/	
Ar-gue	u-nique
Neph-ew	
Val-ue	
/I/	
Build-ing	in-stead
Den-tist	in-sist

Mu-sic

im-mune

Secondary stress, some two –syllable words have primary stress on the first syllable and secondary stress on the second syllable. Say the first syllable strongly. Emphasize the second syllable a little less. The following are example:

Ac- cent

In- come

Ath- letic

In- sect

Fe- male

Trans- fer

Unstressed, there are many unstressed syllable in English. They have a short, soft vowel sound and may be difficult to hear at first. The following are the example:

(-) (-) (-)

(I) (-) (/) (-)

For-tu-nate-ly

Dic-tion-a-ry

Ser-i-ous-ly

El-e-va-tor

Intonation

Intonation refers to the various tones the voice. By using different tones, the speaker gives meaning and expression to the words he says. The tone may be low high (pitch), they may be rising or falling.²¹ In studying intonation, the learners study how pitch of voice rises and falls and how speaker use this pitch variation to convey linguistic meaning. The intonation describes how to voice rise and falls in speech. Elements of a good accent. Often we hear someone speaking with perfect grammar.

Rising-falling intonation is normally used to at the end of simple statements of fact (declarative sentences), commands, and questions that begin with an

²¹Gertrude F. Orion, *Pronouncing American English: Sounds, Stress and Intonation* (United States of America: Heinle and Heinle publisher, 1988), p. 19.

interrogative word. While the rising intonation is normally used to at the end of question which do not begin with an interrogative word or yes no questions.²²

2.1.2 A1 SpeechTRON to teach pronunciation

2.1.2.1 The role of A1 SpeechTRON as CALL (Computer-Assisted Language Learning) in teaching and learning process

During the development of technology from the early 1980s, computer-assisted language learning (CALL) has now become a very important learning device. CALL activities are now used to promote learner autonomy and to encourage involvement with the target language both inside and outside of the classroom. Thus, this has been defined as “the search for and study of applications on the computer in language learning and teaching” and is now used routinely in a variety of instructional situations. As a result, teachers are required to possess CALL expertise that includes both practical skills and a thorough understanding of information technology (IT) theory.

Jolene Dockstader stated that technology has many purposes in language learning: it can be used to provide more in-depth information on a specific topic, to access authentic target language materials, to gain experience with electronic literacy. Classroom technology uses facilities higher thinking skills and knowledge construction and helps students learn to find, analyze, and synthesize knowledge or material.²³

²²Arsyad Azhar, “*English Phonology An Introduction*” (Ujung Pandang, IAIN Alauddin 1989), p. 5.

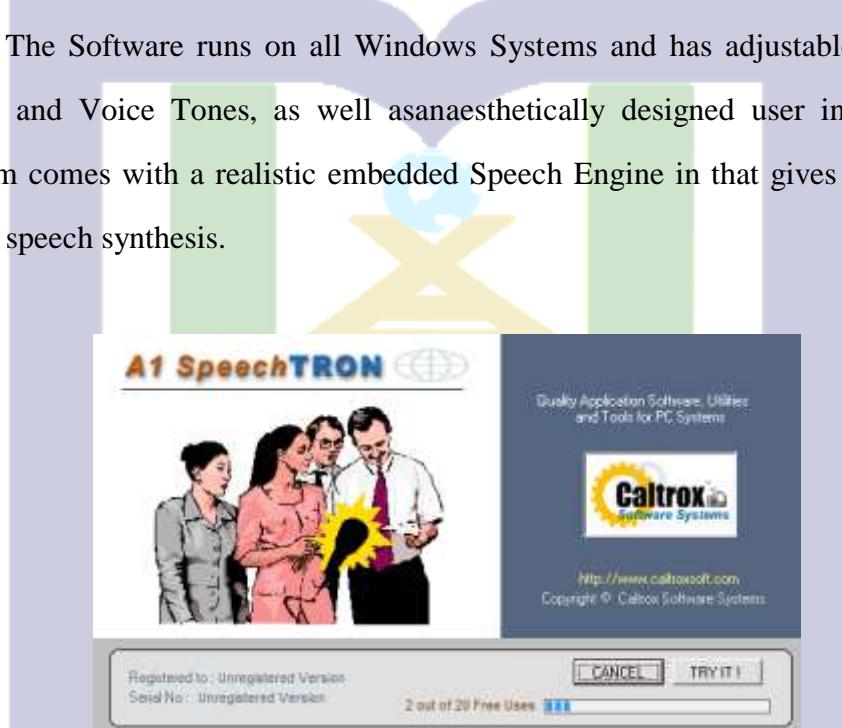
²³Jolene Dockstader, Teachers of the 21st Century Know The What, Why, and How of Technology Integration in Mohammad Noor Zohri, The Effectiveness Of Using A1 Speechtron As a Medium to Teach Pronunciation Of -Ed Ending Regular Verbs in the Narrative Texts (an Experimental Research at the Tenth Graders Of Sma Unggulan Nurul Islami Semarang in the Academic Year of 2011/2012 (Unpublished Thesis Of Education Faculty Walisongo State Institute For Islamic Studies Semarang, 2011), p. 19.

In this case, by using a technology in learning process will give a new learning experience for students in the class and it will be able to gain their confidence during leaning process specially in learning english pronunciation.

2.1.2.2 The procedure and implementation of the software to teach pronunciation

A1 Speech TRON is educational software made by Caltrox Software Systems, developers of quality Application Software, Utilities & Tools for the Personal Computer. The Program can also be used as an Educational tool to learning English pronunciation and Vocabulary building as well.

The Software runs on all Windows Systems and has adjustable Speaking Speeds and Voice Tones, as well as aesthetically designed user interface. The program comes with a realistic embedded Speech Engine in that gives a very high quality speech synthesis.



Picture 2.1 A1 SpeechTRON

1. Interface & Use

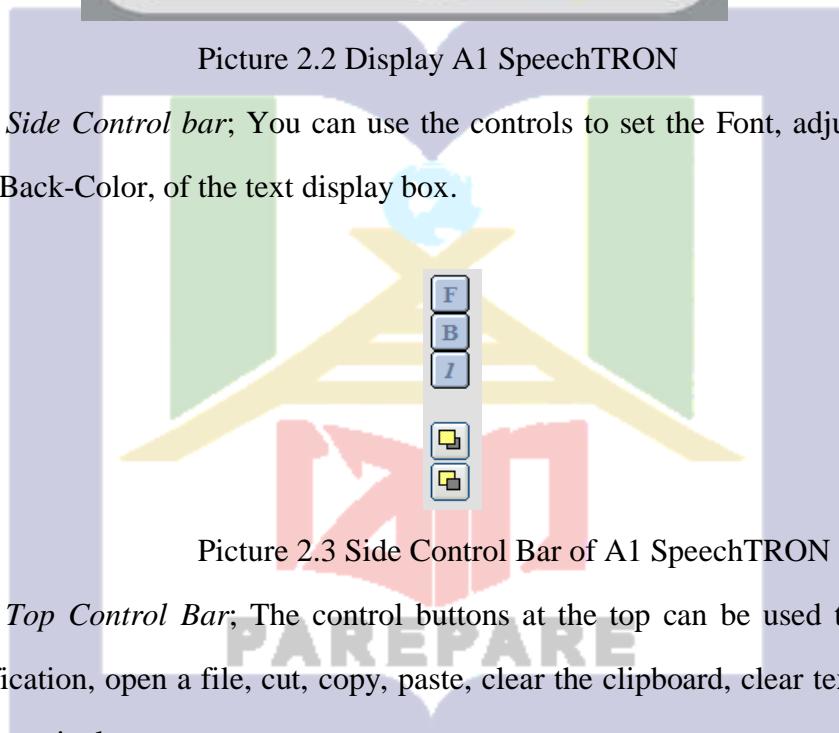
In this case, there are three components that we should to know

Main Text Box; This is where the Text is entered to be read out by the Synthesizer.



Picture 2.2 Display A1 SpeechTRON

Side Control bar; You can use the controls to set the Font, adjust the Fore-Color, Back-Color, of the text display box.



Picture 2.3 Side Control Bar of A1 SpeechTRON

Top Control Bar; The control buttons at the top can be used to adjust the magnification, open a file, cut, copy, paste, clear the clipboard, clear text and select text respectively.



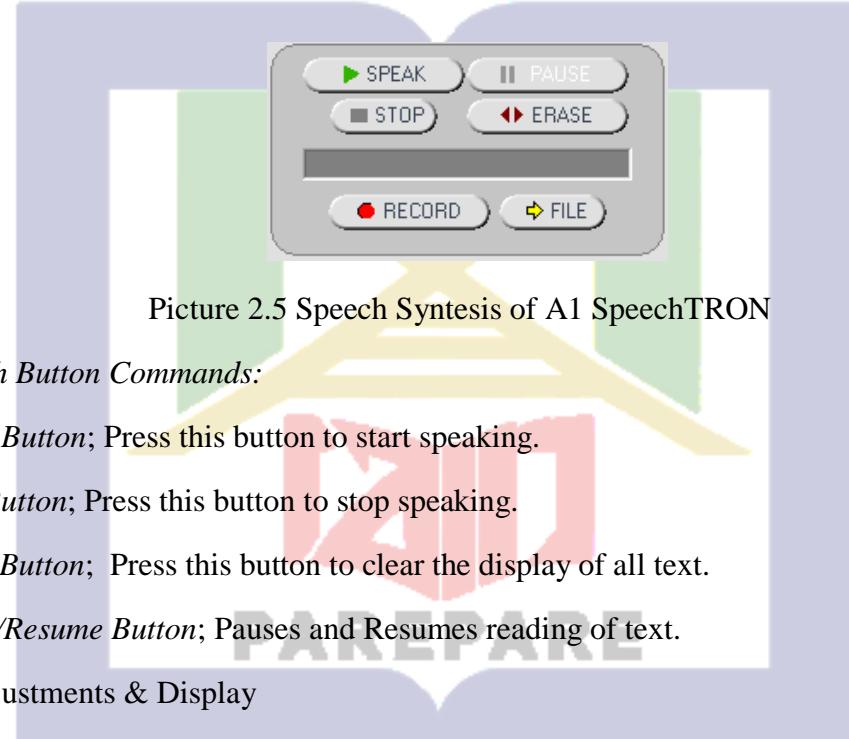
Picture 2.4 Top Control Bar of A1 SpeechTRON

2. Speech Syntesis

In this case there two components that we should to know

Text to Speech Synthesis

Enter text to be converted to speech into the Main Text Box. This can be done by opening a file using the "Open" command button from the Top Control bar Copying and pasting text into the box using the "Copy" and "Paste" buttons on the Top Control bar. You can also use CTRL+C and CTRL+V to paste text into the Main Text Box.



Picture 2.5 Speech Syntesis of A1 SpeechTRON

Speech Button Commands:

Speak Button; Press this button to start speaking.

Stop Button; Press this button to stop speaking.

Erase Button; Press this button to clear the display of all text.

Pause/Resume Button; Pauses and Resumes reading of text.

3. Adjustments & Display

Setting Speed and Voice Tone

Use the following sliders to adjust the Speech output:

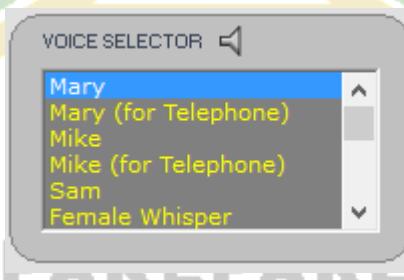


Picture 2.6 Adjustment of A1 SpeechTRON

ADJUST SPEAKING SPEED; You can set the speaking speed of the synthesizer from SLOW-MEDIUM-FAST by using this slider.

ADJUST VOICE TONE; Modify the Tone of the speaking voice from LOW, MEDIUM to HIGH pitch using this slider.

Note: Some settings may be incompatible with certain voices. In this case adjust the settings till you get the speech output.



Picture 2.7 Voice Selector of A1 SpeechTRON

Selecting A Voice

The Voice engines installed on your PC and available are shown in the list box above. Use this to select the voice that you want to use.

Visual Display Window



Picture 2.8 Visual Display Window of A1 SpeechTRON

Shows the sound output of the Speech synthesizer via a graphic display. The current Speed and Tone settings are shown as well as the status of the synthesizer.

Recording Speech

In this part, there are three components that we should to know. The speech synthesis output can be recorded to a .wav file.



Picture 2.9 Recording Speech of A1 SpeechTRON

Enter a Filename and Path for the .wav file by using the "FILE" button above and click "RECORD" to start the recording. The "STOP" button can be used to stop the recording at any time or else the recording will stop automatically when all the text in the Main Text Box has been recorded to the .wav file.²⁴

²⁴[www.Caltroxsoft.com/introduction -to-A1-SpeechTRON \(Online\) \(Accessed on may, 20th, 2019\)](http://www.Caltroxsoft.com/introduction -to-A1-SpeechTRON (Online) (Accessed on may, 20th, 2019))

2.2 Previous Related Research Findings

The researcher describes some previous researches which are relevant to this research.

Firstly, Mohammad Noor Zuhri, in his research entitled “The effectiveness of using A1 Speech Tron as A medium to teach pronunciation of-ed Ending Regular Verbs in the Narrative Texts, (An Experimental Research at the tenth graders of SMA Unggulan Nurul IslamSemarang in the Academic Yearof 2011/2012)”. Based on the research findings that A1 speechTRON program is effectitve in improving pronunciation it was found that the pre-test average of the experimental group was 57.50and control group was 58.92. While, the post-test average of the experimental group was 68.75 and control group was 61.75. The obtained t-test was 1.905, whereas the t-table was 1.717 for a = 5%. The t-test score was higher than the t-table ($1.905 > 1.717$). It means that H_a was accepted while H_0 was rejected. In conclusion, A1 SpeechTRON was an effective medium to teach students pronunciation of –ed ending regular verbs in the narrative texts in SMA Unggulan Nurul Islami Semarang.²⁵

Secondly, Su Tseng Lee, in his research entitled “Teaching Pronunciation of English Using Computer Assisted Learning Software: An Action Research Study in an Institute of Technology in Taiwan” based on the research finding showed that the students preferred the program with explicit correction feedback and repetition no other function, as well as the facility for self-paced and self-directed learning. The key finding of the study was that in Taiwan, when used alongside traditional

²⁵Mohammad Noor Zohri, The Effectiveness of Using A1 Speechtron As a Medium to Teach Pronunciation of –Ed Ending Regular Verbs in the Narrative Texts (An Experimental Research At The Tenth Graders of Sma Unggulan Nurul Islami Semarang in the Academic Year of 2011/2012 (Unpublished Thesis Of Education Faculty Walisongo State Institute For Islamic Studies Semarang, 2011), p. 38.

classroom teaching. CALL is a tool which has the potential to address some of the issues English pronunciation teacher face, such as low students, motivation and low English pronunciation proficiency. A number of recommendations are made for the effective use of CALL. Students gave several detailed suggestions in regard to the computer software function which could help them to learn more effectively, and teacher also addresses some issues which need to be considered when using CALL computer software to assist students' learning.²⁶

Thirdly, Erno Sumantri, in his research entitled "Improving students pronunciation by using English songs (an Experimental Study at the tenth grade of SMK Cyber Media)". Based on the research findings that it was found the value of t_0 is 5.89. the degree freedom (df) is 38 obtained from $(N_1 + N_2) - 2 = (20 + 20) - 2$. In her research, she used the degree of significance of 5% and 1%. In the table of significance of 5% and 1% the values of degree of significance are 2.02 and 2.71, comparing to with each value of degree of significance. The result is $2.02 < 5.89 > 2.71$. since t_0 score in the table is higher than t_t score obtained from the results of calculating, the alternative hypothesis (H_a) is accepted and the null hypothesis (H_0) is rejected.²⁷

By finding some related research, the researcher concludes that using media in teaching pronunciation is effective and able to improve students' pronunciation itself. Even in the third previous research finding uses a different media but it is still able to improve students' pronunciation. The first previous research finding uses a

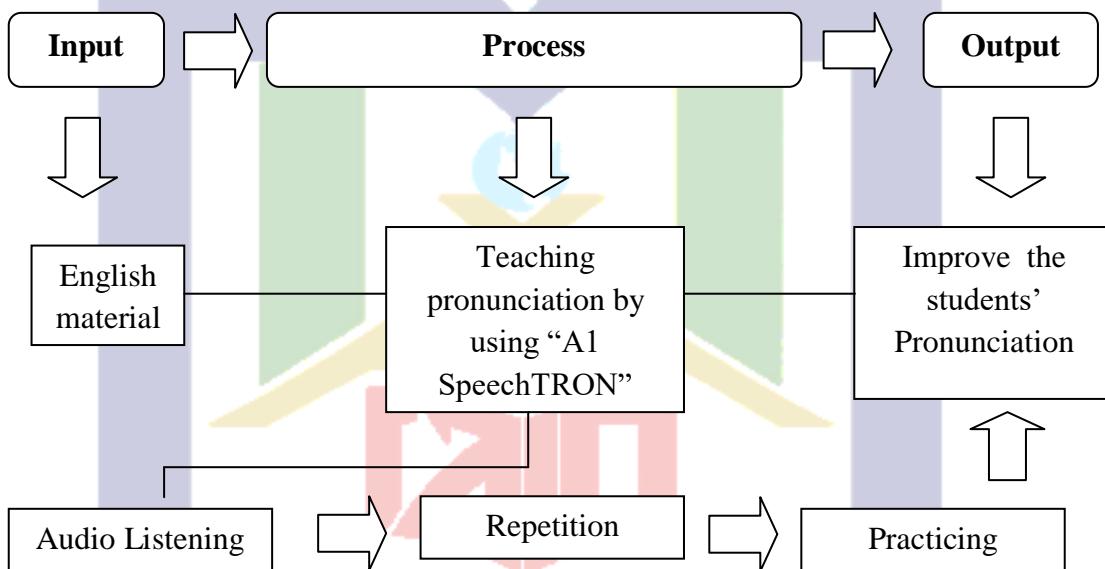
²⁶Su Tseng Lee, Teaching Pronunciation of English Using Computer Assisted Learning Software: an Action Research Study in an Institute of Technology in Taiwan, (Unpublished Thesis of Australian Catholic University, 2008), p. 158.

²⁷Erno Sumantri, Improving students pronunciation by using English songs an Experimental Study at the tenth grade of SMK Cyber Media, (Unpublished Skripsi of Syarif Hidayatullah State Islamic University Jakarta, 2011), p. 34.

media program called A1 speechTRON which it is the same medium with the researcher and it is effective in improving students' pronunciation. A1 speechTRON was inspired by computer-assisted language learning (CALL) which the second previous research finding uses as media computer in teaching pronunciation that help students to learn more effectively of English pronunciation.

2.3 Conceptual Framework

The conceptual framework of this research is presented as following diagram:



Picture 2.10 Conceptual Framework of A1 SpeechTRON

In the diagram above, there are three elements, namely:

1. Input refers to the English material that researcher will use on the classroom.
2. Process refers to the teaching and learning pronunciation through media A1 speechTRON", Include researcher will give pre-test after that give treatment and the last give post-test.
3. Output refers to the pronunciation mastery.

2.4 Hypothesis of the Research

Based on theoretical framework, the research formulated the hypothesis , namely:

1. Null Hypothesis (H0) = There is no significant improvement of the students' pronunciation by using "A1 SpeechTRON" at the second year of students' vocational high school 3 parepare.
2. Alternative hypothesis (H1) = There is significant improvement of the students' pronunciation by using "A1 SpeechTRON" at the second year of students' vocational high school 3 parepare.

2.5 Operational Definition of Variable and Variable of the Research

1. Operational definition of variable is practical and technical about variable and sub variable that can be used measured and looked for the data. Definition operational of skripsi become a foundation to develop research instrument, instrument that used in collecting the data. It means that developing research instrument with test. This test will apply in pre-test and post-test.
2. There are two variables in the research namely independent variable and dependent variable:
 - a. Independent variable is the use "A1 SpeechTRON" Program application for teaching pronunciation at the second year students' of vocational high school 3 parepare.
 - b. Dependent variable is teaching pronunciation, the way to help the students' in good pronunciation of English which consisted into two parts. it is segmental and suprasegmental. In the segmental. In this case, the researcher focuses only on vowel sounds.