# CHAPTER 2 LITERATURE REVIEW

## 2.1 Vocabulary Mastery

The first thing to master in learning English is mastering the vocabulary. When we are familiar with some English words, like their use, meaning, spelling, and pronunciation, it will help us learn English more easily if we keep learning and improving it. Unlike if we do not know the English words, even the basics like subjects, names of things, etc. It will make us feel that English is hard. Therefore, we have to learn the basic part of the language, which is vocabulary. Vocabulary is the set of words that are used and understood by people to construct sentences (Wibowo, 2020). It is the expression of the feelings, ideas, and opinions of someone (Dakhi & Fitria, 2019). In addition, vocabulary mastery is the ability to understand what other people are talking about (Alqahtani, 2015). Mastering vocabulary is very essential for a beginner who wants to learn a language. Students with plenty of vocabulary will learn other language skills easier (Puspita, 2017). Without vocabulary, learning the English language is nearly impossible (Ali & Anwar, 2021). Further, vocabulary mastery is regarded as a crucial thing for second language learners because when their vocabulary is limited, it will hinder communication (Algahtani, 2015). It can be concluded that mastering vocabulary is very important, and it is the basic skill that must be taught to help students master English.

## **2.1.1 Types of Vocabulary**

Dakhi and Fitria (2019) stated the types of vocabulary as follows:

## 1) Receptive vocabulary

Receptive vocabulary is the list of words that are obtained through reading and listening.

## 2) Productive vocabulary

Productive vocabulary is the list of words that are used to produce messages, such as speaking and writing.

## 3) Active vocabulary

Active vocabulary is a list of words that are commonly used and totally understood by people.

## 4) Passive vocabulary

Passive vocabulary is a list of words that are not really understood by people.

## 2.1.2 Approaches to Teaching Vocabulary

Dakhi and Fitria (2019) pointed out the approaches to teaching vocabulary. They are explicit and implicit. Implicit vocabulary teaching is when the learners unconsciously and indirectly learn the vocabulary. Meanwhile, explicit vocabulary teaching is when the learners consciously learn the vocabulary. Thus, the use of Duolingo is categorized as an explicit teaching vocabulary.

## 2.1.3 Principle in Teaching Vocabulary

The researcher used these six teaching vocabulary principles as an outline to create the lesson plans for the treatment. According to Nation (2005), cited in Dakhi and Fitria (2019), there are six principles in teaching vocabulary:

1) Keep teaching simple and clear without complicated explanations.

2) Relating present teaching to past knowledge

3) Use oral and written presentations.

4) Give most attention to words that are already known.

5) Tell the learners to note words.

6) Not bringing unknown related words such as synonyms and opposites.

## 2.1.4 Aspects of Knowing Words

According to Nation (2000), there are some aspects of knowing words as follows:

| Written | Being familiar with the written form of the words. |
|---------|--|
| Spoken  | Being able to pronounce the words.                 |
| Meaning | Knowing the meaning of the words.                  |
| Use     | Being able to use the words correctly in the       |
|         | sentence.  |

 Table 2. 1 Aspects of Knowing Words

However, the researcher only used written, meaning and use aspects. The researcher did not use the spoken aspect because of the limited time of the research and the exercise from Duolingo, which did not provide much pronunciation.

## **2.2 MALL**

MALL is mobile-assisted language learning. The use of MALL was popular around 2000 because of the use of hand phones, computers, and laptops as devices to learn languages. It is also called distance learning, as we can learn through it anywhere and anytime. In addition, many scholars recommend the utilization of MALL as a learning media to assist the students to learn easily, comfortably, and collaboratively (Butarbutar et al., 2021). Using mobile applications as learning media can improve students' motivation to learn English (Irawan, Wilson, & Sutrisna, 2020). By using MALL, the students can access any language learning materials and also communicate with teachers and friends whenever and wherever (Al-Johali, 2019). There are several advantages of MALL, according to Miangah (2019). It can be used not only in school but also at home. Many activities for language learning are delivered through mobile devices, such as internet access, audio, video, etc., they can be used for collaborative learning, and the implementation of MALL can be used to teach and learn vocabulary, listening, reading, grammar, and pronunciation. Meanwhile, there are also

disadvantages of MALL, according to Miangah (2019), for instance, the small screen and difficulty if it is used to read, and the limitation of data storage and mobile phones are not designed for educational purposes. Meanwhile, nowadays, many schools permit students to bring their phones as a tool or media besides books. Many teachers also use MALL in their teaching activities, and one of the MALLs that can be used is Duolingo.

#### 2.3 Duolingo

Duolingo is a free application for language learning that was created by Luis Von Ahn and Severin Hacker. It provides 23 languages (Kusumadewi & Widyastuti, 2018). It can be accessed on the web or on smartphones as an application (Aulia, Wahjuningsih, & Andayani, 2020). In Duolingo, the users should choose the language that they want to learn. Then, the users will face the placement test to determine their language level. After that, they can practice Duolingo anytime and anywhere they want. They will get points, bonuses, and streaks if they practice and complete one lesson every day. If they stop practicing just one day, they will lose their streak (Mitchell et al., 2021). Further, the use of Duolingo can make teaching and learning activities more effective (Irawan, Wilson, & Sutrisno, 2020). Duolingo can have a good effect on students' achievement (Rachels et al., 2017). According to Ajisoko (2020), there are several advantages to Duolingo. For instance, Duolingo is easy to use, helps to understand and remember vocabulary, and can eliminate boredom. In addition, there are also disadvantages to Duolingo, as stated by Mulva and Refnaldi (2016). As the voice in the listening section is computerized, it does not provide the real voice like a native, the users cannot interact with any native speakers, and Duolingo does not provide grammar explanations. Furthermore, Ali (2021) pointed out the use of Duolingo:

1) The user will be asked about the language that she or he wants to learn.

2) The user will face the test to evaluate their basic knowledge and ability.

Then, the users are given a series of exercises with various question types. The questions are varied, such as translating Bahasa to English or vice versa, matching the words, listening, pronouncing, and arranging the words. When the users give the wrong answer, it will provide feedback.

## 2.3.1 Features on Duolingo

1) Exercise

Duolingo provides many exercises that have different topics per unit. It also provides some types of exercises or tests, for instance, vocabulary, grammar, pronunciation, speaking, and listening. This feature is used a lot by the researcher during the treatment. The exercises were arranging the words to become sentences, translating, and matching the words with their meaning.

| Terjemahk | an kalimat ini                       |
|-----------|--------------------------------------|
| -         | You have to<br>enter your<br>number. |
|           |                                      |
|           |                                      |
|           |                                      |
| Anda      | harus nomor                          |
|           | harus nemor<br>asukkan anda          |

Figure 2. 1 Exercise on Duolingo

2) League

There are 10 leagues in Duolingo, namely Bronze, Silver, Gold, Sapphire, Ruby, Emerald, Amethyst, Pearl, Obsidian, and Diamond. The more frequently you play Duolingo and gain points, the more you can reach the position at the top of the league and become number one. Each league has its boundaries. If you are under the boundary, you will be kicked and go to the previous league.



Figure 2. 2 Leagues

3) Achievements

Duolingo gives the user some challenges. When the user finishes it, they will get the achievements.



Figure 2. 3 Achievements

4) Mission

There are daily missions that must be completed.



Figure 2. 4 Missions

5) Streak

Streak shows how long you have played Duolingo since the first day. Once you do not play Duolingo for a day, you will lose the streak.



Figure 2. 5 Streak

## 6) Diamond

Diamonds can be used for buying several things in Duolingo for instance hearts, time boosters, etc.

| ×     | Toko 🕥 14                             |
|-------|---------------------------------------|
| Power | r-up                                  |
| 6     | Penambah Waktu                        |
|       | Tambahkan waktu ekstra                |
| -     | den taklukkan tantangen               |
|       | berwaktul                             |
|       | 450                                   |
| Hati  |                                       |
| -     | Hati Tak Terbatas                     |
| ~     | Tidak pernah kehabisan                |
|       | hati dengan Super!                    |
|       | COBA GRATIS                           |
|       | Isi Ulang Hati                        |
| 1000  |                                       |
|       | Dapatkan hati penuh aga               |
| 9     | kamu tidak takut                      |
| ۹     | kamu tidak takut<br>membuat kesalahan |
| 9     | kamu tidak takut                      |

Figure 2. 6 Diamond

# 7) Heart

The user will only have five hearts each day. Whenever you get the wrong answer, it will reduce one heart and so on. When the user does not have any hearts, there are three ways to refill your hearts. The first one is to use the diamonds to buy hearts, the second is to buy the Duolingo Pro, it will give you infinite hearts and many advantages and the last choice is you can do the special exercise and Duolingo will give you one heart each time you pass the exercise.

|              |   | 7 🎯 5   |
|--------------|---|---|
|              |   | 1467  |
|              |   |   |
| Hatimu n     | nasih pen                               | uh  |
| Ayo ter      | us belajar!                             |   |
| ISI ULANG HA | ті                                      | 350   |
| HATI TAK TER | BATAS                                   | - 27  |
| LATIHAN UNT  | UK DAPATK                               | AN HATI   |
|              | Ayo ter<br>ISI ULANG HA<br>HATI TAK TER | Hatimu masih pen<br>Ayo terus belajari<br>ISI ULANO HATI<br>HATI TAK TERBATAS |

Figure 2. 7 Heart

# 8) Story

Duolingo provides an exercise in the story version. The user will listen to the story then answer the questions there.



Figure 2. 8 Exercise in story form

9) Badge

Duolingo provides different badges and monthly missions. If you complete it, you will obtain the badge.



Figure 2. 9 Badges

# 2.3.2 Teaching Vocabulary using Duolingo

From the teaching principles by Nation (2005) and aspects in knowing words by Nation (2000) explained above, the researcher proposes the teaching vocabulary using Duolingo as follows:

- 1) Introduce the topic
- 2) Give a simple dialogue on the board
- 3) Ask the students to identify and read the dialogue
- 4) Give the students more explanations of the topic
- 5) Ask the students to play Duolingo
- 6) Ask the students to write down unfamiliar words
- 7) Ask the students to find the meaning
- 8) Give the students the explanation how to create sentence
- 9) Ask the students to practice creating dialogue

## 2.4 Study of Relevant Research

There are several researches which are investigating the influence or the effect of using Duolingo in teaching and learning activity towards the students' vocabulary mastery. Aulia, Wahjuningsih, and Andayani (2020) conducted research to examine the effect of Duolingo on students' vocabulary mastery at Jember Junior High School. The result shows that there is a significant difference between the students who taught using Duolingo and who did not. It means that Duolingo has an effect on their vocabulary mastery. Another research was conducted by Ajisoko (2020). He used Duolingo to explore its influence towards the Borneo University of Tarakan students. He used one group pre-test and post-test and gave them questionnaires. The result of the test shows that there is significant improvement between the pre-test and post-test scores. Further, from the questionnaires, the students mostly agree if Duolingo helps them in learning vocabulary. In addition, they mostly disagree if Duolingo is boring and less useful.

Another research conducted by Ambara (2020) showed that the use of Duolingo improves the students' vocabulary mastery at SMAN 2 Karangan. He also points out that Duolingo can be used whether indoor or outdoor, everywhere and anywhere as long as the users have a good connection. In addition, Duolingo also helps the students to memorize the vocabulary well. Moreover, Fatah (2019) investigated the effect of using Duolingo at SMP Islam Taman Quraniyah Jakarta Selatan. He stated that there is an effect by using Duolingo in developing the students' vocabulary mastery. Based on the study of relevant research above, it can be concluded that mostly Duolingo influences the junior, senior high school and college students' vocabulary mastery. It helps them to improve their posttest scores higher than the pretest and helps them to memorize vocabulary. Therefore, the researcher was interested in investigating Duolingo in teaching and learning activity to teach English vocabulary at one of the MTs in Majalengka because there was no research about it at that school and the students were not taught using Duolingo before.

## 2.5 Research Hypothesis

The alternative hypothesis (Ha) is "There is an influence of using Duolingo towards Junior High School students' vocabulary mastery" meanwhile, the null hypothesis (Ho) is "There is no influence of using Duolingo towards Junior High School students' vocabulary mastery".