# **CHAPTER 2**

# LITERATURE REVIEW

This chapter provides the knowledge of the research topic obtained from the relevant literature. It presents the information related to the research to build understanding about the study, such as speaking skills, learning media, YouTube as a learning medium, and perception. This chapter is used as the supporting theory in the research findings.

#### **2.1 Theoretical Framework**

## 2.1.1 Virtual Environment

### **2.1.1.1 Definition Virtual Environment**

Virtual environment is a useful research tool for simulating real-life environmental features because it allows researchers to immerse the participants in hypothetical contexts and study their responses to controlled environmental manipulations that would otherwise be difficult to examine in real-life settings (Parsons et al., 2007; Poelman et al., 2017).

According to Waterlander et al., (2017) our surrounding physical environment can influence behavior. Researchers can identify appropriate interventions (e.g., providing the movement to encourage physical activity) and thus inform the development of more effective informational and environmental interventions to improve desirable behavior by understanding how environments affect behaviors on a micro-behavioral (i.e., unconscious) level. Additionally, the development of virtual reality is done to accommodate users with special needs and disabilities so they may have open communication with other people in general (Chuah, 2018). Due to its innovative integration of a social space within an interactive playful environment, virtual environment is referred to as social environments of interest (Kowert, 2014).

### **2.1.1.2 Oral Communication in Virtual Environment**

Virtual environment could be the one of the mediums for EFL students to learn more about oral communication in English, several strategies could develop the oral communication through virtual environment, according to Nakatani (2006), the strategies that could be implemented in VRChat social-affective strategies involves learners' affective factors in social contexts, accuracy-oriented strategies is concerned with a desire to speak English accurately, nonverbal strategies while speaking, eye contact, gestures, and facial expressions are used to provide cues and assist the listener in guessing the intended messages. Scanning strategies focused on certain parts of speech, such as the subject and verb, the interrogative, and the first part of the speaker's utterance, which frequently contains essential information.

## 2.1.2 VRChat as Learning Medium for Communicating

The use of virtual reality as an educational tool opens up possibilities for delivering genuine learning processes, ensuring that students gain effective and efficient lessons. The role of VR into learning media has been put into practice, extending beyond the realm of education (Jense & Konradsen, 2017). This could lead to the advantages as the learning medium for EFL students, to perceive more experiences in oral communication learning.

The advantages of VRChat can also be played with or without the required equipment, though it is recommended that players use VR headsets so that the game's primary goal, which is to serve as a means of inter-nation communication, can be achieved. The gameplay is the first-person perspective, the users can talk, listen, and interact with each other on the server and there is no time limit, so the students could interact in the virtual environment with real-time.

This application helps learners to learn the variety and the cultural diversity of interactions with people around the world. It might help create the confidence in using the language from learning, and play to improve the students' motivation to learn new things (Jense & Konradsen, 2017). However, students should know the terms and conditions of the VRChat application to use it as a tool to develop oral communication skills. There are so many benefits from the use of VRChat. The first benefit of VRChat is, easy to access it is designed to become

social media that owns the virtual environment with real-time interaction with the people on the servers. Environments, activities, and even virtual characters may all be designed to seem the same to every user (Parsons et al., 2007).

### 2.1.3 Perception

#### **2.1.3.1 Definition of Perception**

Everybody sees perception differently, according to Goldstein (2009), the process by which people interpret and make sense of sensory data from their surroundings to create an internal representation of the world around them is referred to as perception. However, according to Rivai (2002), different people have diverse perspectives on the same issue due to a variety of circumstances. First, individual factors include expectations, attitudes, reasons or wholeness, interests or experiences, and individual's expectations. Second, elements present in the target or object, such as novelty, motion, sound, size of the background, and proximity. Third, the environment in which the perception is made, including the time, place of employment, and social setting. Thus, it follows that experiences, needs, attitudes, motivation, interests, objects, place circumstances, and social settings all have an impact on perception.

#### 2.1.3.2 EFL Students' Perception

Students' perception is the way that students perceive, comprehend, and make meaning of various elements of their educational experiences is referred to as their perception. This covers their opinions and attitudes toward things like instructional strategies, course material, the learning environment, and the standard of education (Hannafin & Land, 1997). Students' perceptions of the usefulness of VRChat for oral communication learning significantly affect their acceptance and utilization of this technology. According to the Technology Acceptance Model (TAM) developed by Fred Davis (1989), perceived usefulness is the degree to which a person believes that using a particular system would enhance their job performance. For EFL students, VRChat can offer practical benefits such as improved pronunciation, fluency, and real-time interaction with native speakers. Students who perceive these advantages are more likely to embrace VRChat as a valuable tool for their language learning.

According to Venkatesh (2000), perceived ease of use (PEOU) is defined as the degree to which a person believes that using a particular system would be free of effort. Students' perceptions of the ease of use of VRChat also play a crucial role in their acceptance and continuous use of the platform. In the context of TAM, perceived ease of use is the degree to which a person believes that using a system would be free of effort. If students find VRChat to be user-friendly and straightforward, they are more likely to integrate it into their learning routine. Initial training sessions and technical support can help mitigate any usability issues, making students more comfortable with the technology.

Someone's perception can be affected by several factors. According to Jumroh and Syamsudin (2019), perception is influenced by personal and structural factor, personal factors compromise experiences, learning process, motivation, needs, include psychological object knowledge, and structural factors comprise the environment of social conditions, applicable laws, and values in society.

# 2.1.3.3 Obtaining Student's Perceptions Using Technology Acceptance Model Theory

Building EFL Students' Oral Communication Skills Through VRChat could be obtained using TAM theory. A recognized theoretical framework in the fields of information systems and technology management is the technology acceptance model. TAM, which was created by Fred Davis in the late 1980s, aims to describe and anticipate how people would react to and use new information systems or technology. It is predicated on the idea that the main factors influencing technology adoption and utilization are perceived usefulness and ease of use (Davis, 1989). According to TAM, two main factors influence technology acceptance, perceived usefulness (PU) and perceived ease of use (PEOU). These factors determine the users' attitudes toward using the technology, which in turn affect their intention to use it and actual usage behaviour.

One of the fundamental determinants of the TAM model is perceived usefulness, which serves as the primary construct in both the original and modified TAM models (Alsabawy, Cater-Steel, & Soar, 2016). Davis (1989) defined Perceived Usefulness as "the degree to which a person believes that using a particular system would enhance his or her job performance". It is appropriate to develop research tools to find out how students perceive the usage of technology in classrooms (Khee et al., 2014). By applying TAM, learners can effectively implement VRChat for enhancing oral communication skills, ensuring the technology is perceived as both useful and easy to use, thus increasing its adoption and effectiveness.

Scherer et al. (2015) used the factors mentioned earlier and validated their validity to assess and model perceptions on the utility of ICT in the context of teaching and learning. These ideas are afterwards modified to create questionnaire questions that ask students about their impressions of the use of VRChat as a learning medium to enhance their oral communication skills.

#### 2.2 Study of the Relevant Research

There is much research about the utilization of VRChat as a learning medium for learning English. The study conducted by Cahyadi, Wardhana, & Ansori (2020) conducted a study to analyze the VRChat game as the learning medium to enhance the students' skills to communicate orally in society in this era, 5.0. It refers to the elements of technology that focused on people with simple, efficient, and expanding innovation. The 4 participants in their research taking the FLSP (Foreign Language for Specific Purposes), with the result of this study shows the improvement of the participants in speaking accuracy and fluency.

Another research related to communication learning in VRChat is conducted by Nugroho's study (2018) about the role players' identity in VRChat game, the author explored the activity and behavior of the role players in the virtual world. The study shows the participants' variety of experiences in English learning as a role-player in VRChat, the experiences that couldn't be implemented in reallife situations is one of the reasons why the participant joined the community and play the VRChat.

The study conducted by Jehma & Akaraphattanawong (2023) according to their findings, the use of VRChat for language learning, particularly for English as a Foreign Language (EFL) students, has shown promising results. With the help of VRChat, users may practice their communication skills in a dynamic and immersive virtual environment while interacting with native speakers. VRChat can greatly improve listening comprehension in English by providing interactive English content and fostering conversations with native speakers, which improves listening exam scores.

The studies above have several differences, such as the research context, the theory used, the research participants, and method of the research. Moreover, the in-depth investigation in VRChat as the learning medium for oral communication skills is very limited. Therefore, the researcher conducted this study to investigate the perceptions of EFL students in VRChat online community, toward the use of VRChat to build their communication skills learning using the different research participants, methodology and theories.