

## **CHAPTER II**

### **REVIEW OF LITERATURE**

#### **2.1. Perceptions**

##### **2.1.1 Students' Perception**

Students are the main and the most important resources in the teaching and learning process. Students can learn from teachers, while teachers cannot teach without students. All of the learning process always begins with perception. West et. al. (2023) states that perception is the process whereby sensory stimulation is translated into organized experience. That experience, or perception, is the joint product of the stimulation and of the process itself. From the statement in the previous sentence, we can conclude that the notion of perception is how to process the sensory system of humans to capture the experiences they have made. As all conceptual knowledge is based upon or derived from this primary form of awareness, the study of perception has always had a unique significance for philosophy and science. Supported by Driver (2001), student's perception towards class interaction and satisfaction may be a first step upon exploring the role and weighting of different types of

interaction with a view to student outcomes such as satisfaction and performance. Perception can make it possible to take sensory information and make it into something meaningful.

Based on the opinions of these experts, it can be concluded that perception is a process of observation which is essentially complex in receiving and interpreting environmental information using the five senses. Perception is more complex than the process of sensing. The process of sensing is only the first step in the process of perception. Sensing gives a real picture of an object, whereas perception is able to understand more than a picture of a real object. So, if someone has felt an object using his five senses, it means that he knows, understands and is aware of that object. In the process of perception, the individual will indeed choose whether the stimulus is useful or not available, and determines what should be done (behavior). Thus, student perception is a process in which students interpret and provide feedback/responses and impressions of stimuli or stimuli, including responses and impressions of teaching methods in Biology subjects. This response can be in the form of opinions, actions, or even rejection of a stimulus. Students' perceptions of teaching methods or assignments will influence the attitudes and behavior of these students. If students have a positive perception then their attitude and behavior towards the task they carry out is grateful, and vice versa.

### **2.1.2 Process of Perception**

Bimo Walgito (2010: 102) states that the perceptual process consists of the presence of an object that creates a stimulus, then a natural process or physical process occurs where the stimulus hits the senses, then the stimulus received by the senses is passed on by sensory nerves to the brain or what is called a physiological process, and the next is the psychological process or the process of interpretation in the nerves of the brain. The sense organs respond to a stimulus and then it is interpreted by the brain so that the individual understands what is meant by the sense organs, this is what is called perception.

Human sensing has a close relationship with perception. Sensing is the initial stage of the formation of a perception. Stimulus or stimuli that affect perception come from within and outside the individual. Stimuli that come from within include feelings, background and cultural factors as well as the life experiences of each individual. This is what causes the perception of each individual to be something different. The process of perception can be described as follows:

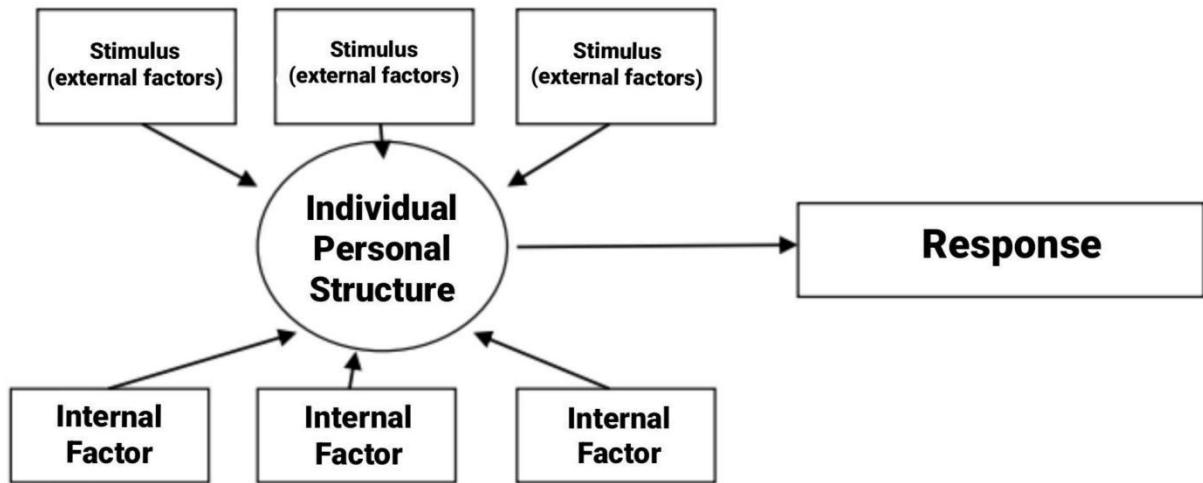


Figure 1. Process of Perception Walgito Bimo (2010: 103)

Therefore, it can be concluded that perception is the process of stimuli receiving from someone through sensory receptors and producing it to become a meaningful thing either an idea or picture of something. Furthermore, according to Harnad (1987), there are two aspects of perception, the first aspect is cognitive. This aspect emphasizes on understanding and making sense of things. It includes reasoning, arguments, logic and perception. Cognitive aspects can be examined by seeing the results of how emotion, experience, and intelligence contribute to the understanding and responses. Meanwhile, the second aspect is the psychology aspect. In addition, Handini (2014) says that those aspects have a role in determining and affecting someone's perception.

### **2.1.3 Factor Affecting Students' Perception**

Everyone may have a different perception, that's because there are factors that can influence them internally and externally. Factors that play a role in perception are: 1) The object is perceived, objects cause stimuli that affect the senses or receptors. Stimulus can come from outside the perceiving individual, but can also come from within the individual concerned directly on the receiving nerve which functions as a receptor. But most of the stimulus comes from outside the individual. 2) Sense, sense organs, nerves, and the central nervous system. Sensory organs or receptors are tools for receiving stimuli. In addition, there must also be sensory nerves as a tool for channeling stimuli received by receptors to the center of the nervous system, namely the brain as the center of consciousness. As a tool to hold a response requires motor nerves. 3) Caution, to realize or hold a perception requires attention, which is the first step in preparation for holding a perception. Attention is the concentration or concentration of all individual activities aimed at something or a group of objects (Bimo Walgito, 2010: 101).

Meanwhile, according to Siagian, Sondang P (2012: 101-105), the factors that influence differences in perception selection between one person and another are as follows:

1. The person concerned, in this case the influential person, is the individual characteristics which include attitudes, interests, experiences and expectations.
2. The target of perception, which becomes the target of perception, can be people, objects, events where the nature of the target perception can affect the perception of those who see it. Other things that affect one's perception are movement, sound, size, behavior and others from the target perception.
3. Situation factors, in this case the perception review must be contextual, meaning that it is necessary in the situation where the perception appears.

Almost the same opinion was expressed by Yusi (2016) Students' Perception of Teacher's Bilingual Language Use In An English Classroom; This study reveals that,

1. Students show their positive perceptions to the use of bilingual language done by the teacher as language instruction in their English classroom
2. There are six benefits of teacher's bilingual language use for students in learning English; making them easy to understand what the teacher explained in English lesson, feel comfortable during the class, easy to understand new vocabularies in English, help them to

do exercises, help them to ask and answer something during the class, and help them to read something in English correctly.

From some of the opinions of these experts it can be concluded that differences in perception are influenced by internal factors from a person and external factors that are around that person. Factor Internal comes from within the individual concerned, including:

1. Attitude, is an assessment process carried out by a person against an object. According to Sarlito W. Sarwono (2009 : 83), attitudes are formed by three components, namely cognitive, affective, and behavior. This opinion is the same as that expressed by David O. Sears (1985 : 183) regarding the three components of attitude, namely:

- a) Cognitive consists of all the cognitions that a person has about the object of a particular attitude - facts, knowledge, and beliefs about that object.
- b) Affective, consisting of all one's feelings or emotions towards objects, especially judgments.
- c) Behavior, consisting of a person's readiness to react or a tendency to act towards objects.

Attitudes can be known through knowledge, beliefs, feelings, and behavioral tendencies of a person towards the attitude object. So, we can

measure the depth of a person's attitude towards an object through knowledge, feelings, and the way he treats the object. These three components of attitude give rise to certain nuances that can explain differences in people's attitudes towards the same attitude object.

1. Interest, according to Sardiman (1996 : 89), interest is defined as a situation that occurs when a person sees the characteristics or temporary meaning of a situation related to his own desires or needs.
2. Motivation, according to Sardiman (1996 : 89) in motivational learning activities can be interpreted as the overall driving force within students that generates learning activities, which guarantees the continuity of learning activities and which gives direction to learning activities, so that the goals desired by these subjects can be achieved.

What people perceive toward something depends on their expectation of the situation that they experience. External factors can affect peoples' perception and it can determine what people perceive to do. In addition to internal factors, differences in perceptions are also influenced by external factors that come from outside the individual, including objects of perception, objects that can be perceived very much, namely everything that is around humans. Man himself can be an object of perception. Perceptual objects can be divided into non-human objects and



human objects (Bimo Walgito, 2010: 108). In relation to the recitation method, of course, internal factors within the student and external factors will determine the student's perception that will appear towards the recitation method.

## **2.2. Immersion Class**

According to Izzak Arif (2009) in his research entitled “Bilingualism in the Perspective of Indonesian Language Development” revealed, in the perspective of developing the Indonesian language, bilingualism education in Indonesian society is very beneficial because at least the status and position of Indonesian as the national language is increasing. In addition, the use of different languages (such as Indonesian and English) together can be a powerful tool for learning, such as the bilingualism method as an action performed by bilinguals to access different linguistic features or various modes which are referred to as autonomous languages, to maximize communicative potential (García Ofelia, 2009) *Multilingualism and Translanguaging in the 21st Century*.

### **2.2.1 Teaching Approaches in an Immersion Class**

As shown in the definition of immersion learning, immersion teachers are not just teaching language but also teaching other academic

subjects, they have several extra issues to consider. In any immersion program, language and its partner subjects are equally important, and the most successful approaches balance them evenly. One of the teaching methods used in immersion class is code switching, a good natural way of being bilingual for students. Code switching is defined as a skill of the bilingual speaker code switching is a term in linguistics referring to using more than one language or variety in conversation. Like Ansar Fithrah Auliya (2017) said in her study, sometimes the bilingual speakers getting problem when they having a conversation with another bilingual, so they switches their language from code to another in the construction of sentence to make the interlocutor understand, sometimes they do it with the same language background and it may do so many times. Otherwise, in Qian Xiaofang (2009) study indicates that codes involved in code switching are not necessarily those of standard languages and expands the term to subsume switching between languages dialects, styles and registers

Another popular teaching method in immersion class is Content and Language Integrated Learning (CLIL), which can be an alternative in teaching students at an immersion school. CLIL is a teaching approach in which an additional language is used for the teaching and learning of subjects with a dual focus on language and content (Heras Arantxa and Lasagabaster David, 2014). According to some studies, CLIL is not an elitist approach to language learning, it functions in all learning contexts

and with all learners. For example, in Coyle Do (2005) study, shows that consider CLIL to be appropriate ‘for a broad range of learners, not only those from privileged or otherwise elite backgrounds’ as compared with the past when ‘learning content through an additional language was either limited to very specific social groups, or forced upon school populations from whom the language of instruction was a foreign language’. Besides, CENOZ J., GENESEE F., AND GORTER D. (2013) also reveals that, as well as being internally ambiguous, the term CLIL is not clearly defined when compared with other approaches that integrate content and language teaching for L2 learning. Therefore, studies in the use of CLIL’s focus on content in comparison with immersion is the main difference between the two approaches ‘What was that form of CLIL focused more on the content, rather than on the language. This would be the single most distinctive difference between such forms of CLIL and immersion.

### **2.2.2 Studies of Immersion Class in Indonesia**

Many studies have addressed the efficacy of immersion class in helping students improve their competence in subject knowledge and language. A study by Williams Fortune Tara (2012), for example, indicates how immersion classes can be researched on language immersion education has heralded benefits such as academic achievement, language and literacy development in two or more languages, and cognitive skills.

This study is supported by research by May Stephen (2004) showing that the benefits of minority language immersion programmes are confirmed when we consider that much of the research supporting the cognitive advantages of bilingualism and also through that, will foster the cognitive benefits of bilingualism and lead to wider educational success for bilingual students. Nevertheless, Fortune Tara William (2012) also has a different result such as, research finds students whose first language is not English become more bilingual in balance and develop higher levels of bilingualism and biliteracy when compared to English proficient students or their peers who participate in other educational programs.

The studies on immersion classes in Indonesia have explored the impact of bilingual education on students' language proficiency, cognitive abilities, and academic performance. Research findings suggest that immersion programs, where students are taught in both their native language and a target language (such as English), can lead to improved cognitive flexibility and problem-solving skills (Lee et al., 2021). Moreover, García and Sylvan (2020) emphasize the importance of inclusive language policies in such programs to support students' linguistic diversity and foster positive learning outcomes. Educators and policymakers can benefit from integrating the insights from these studies into the design and implementation of immersion classes in Indonesia to create a more effective and inclusive language education environment.

### **2.2.3 Teaching Process in Immersion Class**

The teaching process in an immersion class involves the comprehensive use of the target language as the primary medium of instruction. Students are fully immersed in the language, using it for all aspects of their learning, including academic subjects and daily interactions. Immersion classes aim to create an authentic language learning environment, replicating the natural language acquisition process. Teachers facilitate learning through context-rich activities, visual aids, and real-life experiences to enhance students' language comprehension and communicative skills. Research has shown that immersion programs can lead to enhanced language proficiency, cognitive benefits, and cultural awareness. Effective implementation involves well-trained teachers, appropriate curricula, and supportive language-rich environments to ensure students' successful language development and academic achievement. According to research by S. Agrawal (2020) definition immersion learning refers to any education approach that teaches by placing a student directly in an environment of phenomenon experienced by an individual when they are in a state of deep mental involvement in which their cognitive processes (with or without sensory stimulation) cause a shift in their attentional state such that one may experience disassociation from the awareness of the

physical world, and the most common use of immersion learning is in teaching foreign languages.

According to Fitrianti (2019), the early stage of developing bilingual children is basically monolingual. An important concern is whether the two languages of a bilingual child develop independently or are interdependent. In this regard, interdependent development will be a consequence of the systematic influence of one language on the development of another, resulting in a pattern or level of development that is different from that expected in monolingual children. These theoretical and practical concerns have led to studies comparing the development of bilingual children to monolingual children who acquire the same language.

## **2.3. Previous Studies**

### **2.3.1 Students' Perception**

There are several formulations that provide an understanding of perception. In the Big Indonesian Dictionary (2007: 1167) the word perception means direct response (acceptance) to something. Meanwhile from Muhammad (2016) study, the meaning from a point of view is a conceptual framework, a set of presuppositions, a set of values, and a set

of concepts that influence a person's perception in a way that influences a person's actions in a given scenario. Based on the opinions of these experts, it can be concluded that perception is a complex process of observation in receiving and interpreting information in the surrounding environment using the five senses.

In the process of perception the individual will make a selection whether the stimulus is useful or not for him, and determine what is best to do (behavior). Thus, student perception is a process in which students interpret and provide responses / responses and impressions of stimuli or stimuli, including responses and impressions of recitation methods in biology subjects. This response can be in the form of opinions, actions, or even in the form of rejection of a stimulus. Students' perceptions of recitation or assignment methods will influence the attitudes and behavior of these students. If students have positive perceptions, their attitudes and behavior towards the assignments they receive will be good, and vice versa. This study aims to find out the perception of students toward the use of two languages of instruction (Indonesian and English) by the teacher in a Biology classroom and find out its benefits for students in learning both languages. This study employed a qualitative approach as a basic framework of study with a case study method. Based on the students' perceptions of using two languages in learning Biology, it becomes evident that language plays a pivotal role in shaping their experiences and

preferences. Some students favor English for its potential academic advantages, while others find comfort and confidence in their native language, Indonesian. Additionally, exploring related studies in the field can offer valuable insights. Recent research by Lee et al. (2021) investigated the effects of bilingual education on cognitive flexibility and found positive associations between bilingualism and cognitive benefits. Furthermore, a study by García and Sylvan (2020) examined language policies in education and highlighted the importance of creating inclusive language environments that embrace students' linguistic diversity for improved learning outcomes. Integrating findings from such studies can inform educators in designing language-inclusive curricula that support students' cognitive development and enhance their learning experiences.