#### **CHAPTER IV**

# FINDINGS AND DISCUSSION

This chapter presents the findings and discussion. The data of this research was collected during observation, and interviews. In this part, the researcher showed the teacher's strategy and teacher challenges of using higher-order thinking skills to answer the problem statements in the first chapter.

## A. Findings

In this section, the researcher described the findings based on two research questions raised as follows :

# 1. The Teacher's Strategy of Using Higher Order Thinking Skills in Teaching Reading Comprehension

The finding of the first research question will be explained according to five strategies for using HOTS, especially in teaching reading comprehension. In the process of using HOTS, teachers must have several strategies and techniques to support the learning and teaching process. Strategy to develop higher-order thinking skills are determining learning objectives, practice before assessment, teaching through questioning, review, refine, improve, provide assessment and feedback, teachers can use these strategies in teaching reading comprehension. the researcher has carried out four observations of teachers at SMAN 1 Sungai Loban

# a. Teacher A

# 1) Meeting 1

The researcher made the first observation on February 17<sup>th</sup>, 2023 in class XII IPS 2. At the meeting, the teacher delivered material related to News Items. The observation results can be seen in the table below.

Table 4.1 Observation Result of Strategy using HOTS in Teaching Reading Comprehension.

| No | Types of Strategy using HOTS      | Meeting      |   |   |   |
|----|-----------------------------------|--------------|---|---|---|
|    |                                   | 1            | 2 | 3 | 4 |
| 1  | Informing the objectives of       | $\checkmark$ |   |   |   |
|    | learning the material             |              |   |   |   |
| 2  | Behavior targets should be        | $\checkmark$ |   |   |   |
|    | achieved by students              |              |   |   |   |
| 3  | Inform the function, purpose, and | $\checkmark$ |   |   |   |
|    | structure of the material         |              |   |   |   |

Based on the observations, it was found that Teacher A uses Informing learning Objectives which are adjusted to the criteria in the table above. Teacher A uses this strategy at the first meeting to develop students' critical thinking before entering the material to be studied.

Data shown below from Teacher A:

**Teacher A** : "Today, the material that we will study is, News Items, News items are used for us to know the updated information which we can usually see in the news. The news itself has several types, there are websites and newspapers. Therefore, we need to know the function, purpose, and structure of the news so that we can easily recognize the types and information contained in a news". Based on these data, the teacher conveyed information at the beginning of the class to activate their prior knowledge. The teacher allows students to look for vocabulary that they do not understand. In this part, the teacher gaves an analysis activity to the students.

#### a) Analyzing (C4)

**Teacher A**: "Alright, after knowing the purpose of the news item, its purpose, and structure. I ask that you give an outline about the example of a news item with 5W+1H based on your knowledge".

From the data above, the teacher has established learning objectives before the class started as a way to improve students' critical thinking.

# 2) Meeting 2

The researcher made a second observation on February 24<sup>th</sup>, 2023 in class XII IPS 2. At the meeting, the teacher delivered the material with students asked to find differences between the two texts about news items. The observation results can be seen in the table below.

| Reading comprehension |                                   |   |              |   |   |  |  |
|-----------------------|-----------------------------------|---|--------------|---|---|--|--|
| No                    | Types of Strategy using HOTS      |   | Meeting      |   |   |  |  |
|                       |                                   | 1 | 2            | 3 | 4 |  |  |
| 1                     | Reflective dialog in learning     |   | $\checkmark$ |   |   |  |  |
| 2                     | Students have an opportunity to   |   | $\checkmark$ |   |   |  |  |
|                       | practice the information          |   |              |   |   |  |  |
| 3                     | Learning activities should enable |   | $\checkmark$ |   |   |  |  |
|                       | students to engage HOTS to state  |   |              |   |   |  |  |
|                       | their beliefs, formulate          |   |              |   |   |  |  |
|                       | arguments, and think objectively. |   |              |   |   |  |  |

Table 4.2 Observation Result of Strategy Using HOTS in Teaching Reading Comprehension

Based on the observations, it was found that Teacher A used Practice before assessment in teaching reading comprehension which was adjusted to the criteria in the table above. Teacher A performs several techniques in reading comprehension to support the use of the HOTS strategy.

Teachers A use visualization, making predictions, making inferences, and skimming as a technique in practice before assessment. In this technique, the activities according to taxonomy bloom, below :

#### a) Analyzing(C4)

**Teacher A** : "Class, after reading with the skimming technique the text related to covid-19. Try now to analyze two texts based on the structure and information that I have explained earlier and then we try to compare the text, after that, I will choose a few, you will convey this information in front of the class".

Teacher A gave three texts about news items to the students. Then, the students have to made predictions through choose one of the texts to identify by the students. From the activities, students have to determine the outline and identify the structure, function, and information that they have chosen. After that, the students some of the students in the class show the report based on their work.

#### b) Evaluate (C5)

After visualizing and making predictions, teacher A given students exercises to evaluate the contents of texts related to news items by asking students to explain and given students opportunities to have opinions related to the structure, function, and purpose of the news item text. And then, teacher A applies the making inferences technique as a practice before the assessment to provide text, then students evaluate the contents of the text related to the purpose, function, and meaning of the news items that have been provided by the teacher related to Covid 19.

Teacher A: "why do you choose the the text, give your reason based on your work while indentify the structure and language future from the text"!

# 3) Meeting 3

The researcher made the third observation on March 3<sup>rd</sup>, 2023 in class XII IPS 2. At the meeting, teacher A delivered material with students asked to express their opinions and express their understanding of the news item example. The observation result can be seen in the table below.

| No | Types of Strategy using HOTS       | Meeting |   |   |   |
|----|------------------------------------|---------|---|---|---|
|    |                                    | 1       | 2 | 3 | 4 |
| 1  | The teacher gives students         |         |   |   |   |
|    | worksheets                         |         |   |   |   |
| 2  | Give some questions related to the |         |   | ✓ |   |
|    | text with 5W+1H                    |         |   |   |   |
| 3  | The teacher gives pieces of paper  |         |   |   |   |
|    | to each student and Students write |         |   |   |   |
|    | a question in a paper              |         |   |   |   |

Table 4.3 Observation Result of Strategy Using HOTS in Teaching Reading Comprehension

Based on the observations, it was found that Teacher A used teach through questioning in teaching comprehension according to the criteria in the table above. Teacher A uses several techniques in reading comprehension to support the use of the HOTS strategy, namely literal questions.

# a) Evaluate (C5)

Teacher A used literal questions in the activity to made students understand more about the content of the text by doing activities before reading, students predict what the text is about using in front of cover about news item.

Teacher A: What do you think about the virus of Covid-19?

# b) Create (C6)

During reading, the teacher asked students to be text detectives and the teacher grouped the questions into "what", "who", "where", "when" and "how" about news item. Then, after reading students can share the results of understanding the questions that have been given by the teacher.

The question-and-answer process encourages students to ask questions of themselves to increase their understanding, elicit information, clear up confusion, identify problems, identify new information, and more. In this strategy, the teacher can analyze and create students' reading comprehension skills.

# 4) Meeting 4

The researcher made the fourth observation on March 10<sup>th</sup>, 2023 in class XII IPS 2. At the meeting, Teacher A conveyed the material that had been studied and students were asked to present each group. The observation result can be seen in the table below.

| Table 4.4 Observation Result of Strategy Using HOTS | in Teaching |
|---|-------------|
| Reading Comprehension                               |             |

| No | Types of Strategy using HOTS    | Mee          | ting         |   |              |
|----|---------------------------------|--------------|--------------|---|--------------|
|    |                                 | 1            | 2            | 3 | 4            |
| 1  | Review, refine, and improve the | $\checkmark$ | $\checkmark$ | ✓ | $\checkmark$ |
|    | student's understanding         |              |              |   |              |
| 2  | Teachers give a comfortable     |              |              |   | $\checkmark$ |
|    | environment to students         |              |              |   |              |
| 2  | Give feedback to motivate the   |              |              |   | $\checkmark$ |
|    | students                        |              |              |   |              |
| 3  | The teacher gives project-based |              |              |   | $\checkmark$ |
|    | learning as an assessment of    |              |              |   |              |
|    | students                        |              |              |   |              |

Based on the observations, it was found that Teacher A used review, refine and improve students' understanding and provide assessment and feedback in teaching reading comprehension according to the criteria in the table above. Teacher A uses several techniques in reading comprehension to support the use of the HOTS strategy, namely summarizing. based on observation, teacher A after students analyze, and evaluate the contents of the text. They will also be able to create by going through these strategies and techniques from meeting one to meeting four.

Review is the most effective way for the teacher to use to ensure that the material discussed is truly understood by students. Example of teacher dialog, below.

# **Teacher A**: "Today, we have learned about?

After asking these questions students explain based on what they got today. Refine helps students to broaden their knowledge and deepen it, especially when understanding a text. According to observations, the teacher always refines his students at every meeting. An example of teacher dialog is below.

## **Teacher A** : *What is a News item ...?*

Improve understanding is carried out by the teacher by allowing students to make summarize. Based on the level of critical thinking skills in taxonomy bloom, below:

#### a) Creating (C6)

From the review and refine activities, teacher A asks students to make a summary of the story or text that they have learned. After that, the teacher also gives conclusions related to the topics being studied so that students can adjust to their own. This aims to help improve their discussion by ensuring that students fully understand the material

Teacher A:" Please, make a summary about the news item then present the result in front of the class!

Based on observation, giving good feedback so that students are not tense in the learning process, namely by giving rewards, applause, and motivation. To provide an assessment of the results of student performance. Based on interviews with teachers A, don't only see the result. But the teacher thinks that she prioritizes the process as a plus point in learning. In this strategy and technique, the teacher usually gaves project-based learning that attracts responses from each student. This strategy can also improve students' critical thinking skills from the level of analysis to creating.

#### b. Teacher B

# 1) Meeting 1

The researcher made the first observation on February 21<sup>st</sup>, 2023 in class XI MIA 2. At this meeting, the teacher delivered material related to letters. The observation results can be seen in the table below.

| No | Types of Strategy using HOTS      | Meeting      |   |   |   |
|----|-----------------------------------|--------------|---|---|---|
|    |                                   | 1            | 2 | 3 | 4 |
| 1  | Informing the objectives of       | ✓            |   |   |   |
|    | learning the material             |              |   |   |   |
| 2  | Behavior targets should be        | $\checkmark$ |   |   |   |
|    | achieved by students              |              |   |   |   |
| 3  | Inform the function, purpose, and | $\checkmark$ |   |   |   |
|    | structure of the material         |              |   |   |   |

Table 4.5 Observation Result of Strategy using HOTS in Teaching Reading comprehension.

Based on the observations, it was found that Teacher B uses Informing learning Objectives to activate their prior knowledge according to the criteria in the table above. Teacher B also uses this strategy at the first meeting to develop students' critical thinking such as presenting objectives with function, purpose and structure, and language features of the letter. In the initial activity, students were asked by the teacher to understand the information content of a text.

Before the material starts, teacher B conveys the learning objectives by giving some clues related to the material to elevate their thinking. Then, the teacher explains the material related to the letter. The teacher also uses reading comprehension skills so that students can easily understand the meaning of the letter they are writing. The teacher has to determine learning objectives to elevate students' critical thinking before starting the class.

Teacher B: "*Please look at the whiteboard!, can you suggest what the kind and the purpose of this letter? Then, explain the reason!* 

Based on interviews, the teacher uses reading comprehension skills to improve their critical thinking and make students better understand the meaning of a text so they can appreciate the text and also the strategies used by the teacher.

## 2) Meeting 2

The researcher made the first observation on March 2<sup>nd</sup>, 2023 in class XI MIA 2. At this meeting, the teacher delivered material related to letters. The observation results can be seen in the table below.

Table 4.6 Observation Result of Strategy using HOTS in Teaching Reading comprehension

| No | Types of Strategy using HOTS      | Meeting |              |   |   |
|----|-----------------------------------|---------|--------------|---|---|
|    |                                   | 1       | 2            | 3 | 4 |
| 1  | Reflective dialog in learning     |         |              |   |   |
| 2  | Students have an opportunity to   |         | ✓            |   |   |
|    | practice the information          |         |              |   |   |
| 3  | Learning activities should enable |         | $\checkmark$ |   |   |
|    | students to engage HOTS to state  |         |              |   |   |
|    | their beliefs, formulate          |         |              |   |   |
|    | arguments, and think objectively. |         |              |   |   |

Based on the observations, it was found that Teacher B used to practice before the assessment in teaching comprehension which was adjusted to the criteria in the table above. Teacher B performs several techniques in reading comprehension to support the use of the HOTS strategy.

Teacher B uses visualization, making a prediction, and making inferences as a technique in practice before assessment. In this technique, the activities according to taxonomy bloom, below :

# a) Analyzing (C4)

After the analysis activities at the first meeting, Teacher B gives an example of a job application letter. The visualization technique, namely showing not telling, supports the teacher in using the HOTS strategy. The teacher provides pictures and students there can analyze the parts of the letter, types, language structure, and function so that at the end of the material students can make a job application letter correctly. Then, teacher B gaves an example of a letter then students are asked to make predictions by analyzing. In this activity, students can make letters by themselves according to their knowledge.

Teacher B: "Allright, after we know the kinds of this letter is formal letter. So, let's to identify the structure and language future of this letter"!.

#### b) Evaluate (C5)

In evaluating, and involving students where they can explain, assess, rank, and conclude actions about ideas, items, and materials. teachers B give students exercises to evaluate the contents of texts related to news items and letters by asking students to explain and giving students opportunities to have opinions related to the structure, function, and purpose of the news item text. Teacher B also gave material about letters after students carry out the analysis process of the text they have read and students will evaluate a text to making inferences.

Teacher B: "Why do you choose the position of this letter and language future? Is that true"?

#### 3) Meeting 3

The researcher made the third observation on March 8<sup>th</sup>, 2023 in class XI MIA 2. At the meeting, teacher B delivered the material with students asked to express their opinions and express their understanding of the example letter. The observation results can be seen in the table below.

Meeting No Types of Strategy using HOTS 1 2 3 4 Teacher gives student worksheets 1 √ 2 Give some questions related to the text with 5W+1H 3 The teacher gives pieces of paper  $\checkmark$ to each student and Students write a question on a paper

Table 4.7 Observation Result of Strategy using HOTS in TeachingReading comprehension

Based on the observations, it was found that Teacher B uses teach-through questioning in teaching reading comprehension according to the criteria in the table above. Teacher B uses several techniques in reading comprehension to support the use of the HOTS strategy, namely literal questions.

# a) Evaluate (C5)

Students gave opinions and report what the text is about. During reading, the teacher asked students to be text detectives and the teacher gave the questions into "who", "where", and "when" the letter. Then, after reading students can share the results of understanding the questions that have been given by the teacher.

Teacher : "Okey class, after we know the purpose, structure, and language future from later. Let's play a game, think one question related our material today about letter"?

# b) Create (C6)

Teacher B asks questions and students can even write down questions about letters on small pieces of paper and throw them to friends to find out how students understand the process. In this strategy, the teacher creates students' reading comprehension skills. Based on the interview, Teacher B used this technique to make students understand more about the content of the text.

Teacher B: "*After students think one question, please make* and write the qestion on the paper that I have given to you"!

# 4) Meeting 4

The researcher made the fourth observation on April 4 2023 in class XI MIA 2. At the meeting, teacher B conveyed the material about the

letter that had been studied and students were asked to present it in

front of the class.

The observation result can be seen in the table below.

| No | Types of Strategy using HOTS    |   | Meeting |              |              |
|----|---------------------------------|---|---------|--------------|--------------|
|    |                                 | 1 | 2       | 3            | 4            |
| 1  | Review, refine, and improve the |   |         | $\checkmark$ | $\checkmark$ |
|    | students' understanding         |   |         |              |              |
| 2  | Teachers give a comfortable     |   |         |              | $\checkmark$ |
|    | environment to students         |   |         |              |              |
| 2  | Give feedback to motivate the   |   |         |              | $\checkmark$ |
|    | students                        |   |         |              |              |
| 3  | The teacher gives project-based |   |         |              | $\checkmark$ |
|    | learning as an assessment for   |   |         |              |              |
|    | students                        |   |         |              |              |

 Table 4.8 Observation Result of Strategy using HOTS in Teaching

 Reading comprehension

Based on the observations, it was found that Teacher B uses review, refines, and improves students' understanding and provides assessment and feedback in teaching reading comprehension according to the criteria in the table above. Teacher B uses several techniques in reading comprehension to support the use of the HOTS strategy, namely summarizing. based on observation, teacher B after students analyze, and evaluate the contents of the text. They also can create by going through these strategies and techniques.

# a) Creating (C6)

From the review and refine activities, teacher B do the same activities with teacher A and B that ask students to made a summary of the story or text that they have learned. And ask the teacher the question below : Teacher B: "Alright class, after you know all about a letter. So, today, we have learned about ? Do yo know what is letter ?".

After asking these questions students explain based on what they got today. After that, To allow students to make their adjustments, the teacher also provided conclusions on the subjects being studied. Based on the findings of the previous inquiries, the teacher discusses the content with the class to encourage response. The teacher develops the topic with students after going over it with them. Ensuring that the students comprehend the subject matter completely, is intended to enhance their discussion.

Apart from gave some practice to students, Teacher B also gives feedback so that students are not tense in the learning process, namely by giving rewards, applause, and motivation. Same to Teacher A, Teacher B provides an assessment of the results of student performance don't only see the result. But the teacher thinks that they prioritize process as a plus point. the teacher usually gives a project to make a letter. This strategy could also improve students' critical thinking skills from the level of analysis to create.

# c. Teacher C

# 1) Meeting 1

The researcher made her first observation on February 22<sup>nd</sup>, 2023 in class X MIA 4. At the meeting, the teacher explained

material related to the narrative text (Malin Kundang). The observation results can be seen in the table below.

| Reading comprehension. |                                   |              |   |   |   |  |
|------------------------|-----------------------------------|--------------|---|---|---|--|
| No                     | Types of Strategy using HOTS      | Meeting      |   |   |   |  |
|                        |                                   | 1            | 2 | 3 | 4 |  |
| 1                      | Informing the objectives of       | ✓            |   |   |   |  |
|                        | learning the material             |              |   |   |   |  |
| 2                      | Behavior targets should be        | $\checkmark$ |   |   |   |  |
|                        | achieved by students              |              |   |   |   |  |
| 3                      | Inform the function, purpose, and | $\checkmark$ |   |   |   |  |
|                        | structure of the material         |              |   |   |   |  |

Table 4.9 Observation Result of Strategy using HOTS in Teaching Reading comprehension.

Based on the observations, it was found that Teacher C uses Informing learning Objectives to activate their prior knowledge according to the criteria in the table above. Teacher C also uses this strategy at the first meeting to develop students' critical thinking such as presenting objectives with function, purpose, structure and language features of narrative texts. In the initial activity, students were asked by the teacher to understand the information content of a text.

Data shown below from teacher C :

## a) Analyzing (C4)

Teacher C: "Today we will learn about Narrative text. "the teacher displays the learning objectives on the PPT and then the students read each one". Narrative text is a text that tells about ancient times or the past". Teacher C conveys learning objectives by displaying several points on power point. Then the teacher read it before the material is delivered. After that teacher C, gave some vocabulary and questions related to the material to provoke students' knowledge. The teacher displays the story of Malin Kundang and students are invited to analyze each paragraph.

Based on interviews, the teacher uses reading comprehension skills to improve their critical thinking and made students better understand the meaning of a text so they could appreciate the text and also the strategies used by the teacher. The teacher determines learning objectives to elevate students' critical thinking before starting the class.

# 2) Meeting 2

The researcher made her observation on March 01<sup>st</sup>, 2023 in class X MIA 4. At this meeting, the teacher delivered material related to narrative text. The observation result can be seen in the table below.

| Reading completion |  |         |              |   |   |  |  |
|--------------------|--|---------|--------------|---|---|--|--|
| No                 | Types of Strategy using HOTS   | Meeting |              |   |   |  |  |
|                    |  | 1       | 2            | 3 | 4 |  |  |
| 1                  | Reflective dialog in learning  |         | $\checkmark$ |   |   |  |  |
| 2                  | Students have an opportunity to practice about the information   |         | <b>√</b>     |   |   |  |  |
| 3                  | Learning activities should enable<br>students to engage HOTS to state<br>their beliefs, formulate arguments,<br>and think objectively. |         | ~            |   |   |  |  |

Table 4.10 Observation Result of Strategy using HOTS in Teaching Reading comprehension

Based on the observations, it was found that Teacher C used to practice before the assessment in teaching comprehension which was adjusted to the criteria in the table above. Teacher C applies several techniques in reading comprehension to support the use of the HOTS strategy.

Teachers C use making predictions, and scanning as a technique in practice before assessment. In this technique, the activities according to taxonomy bloom, below :

### a) Analyzing (C4)

Teacher C gaves a picture that matches the material, then students guess the story according to the picture by analyzing it through the picture. The teacher develops a strategy by providing some vocabulary related to the story in Malin Kundang at the beginning. Then students analyze and try to relate the meaning of the vocabulary to the story in question.

Teacher C : "Please look at the power point, there are some vocabulary related ? please identify in this story"?

#### b) Evaluate (C5)

Teacher C, provides exercises in the form of narrative text, after analyzing, they are expected to be able to evaluate a reading. Teacher C gives a text about Malin Kundang and the students find words or sentences related to the topic. Then, the teacher displays the story with a picture to brainstorm vocabulary and add more word vocabulary. After that, the teacher asked the students to gave their opinion and report about the topic related to the text.

Teacher C: "After we know the meaning from list of vocabulary before, "What do you think about the meaning of this story"?

# 3) Meeting 3

The researcher made the third observation on March 22, 2023, in class XI MIA 2. At the meeting, teacher C, after delivering the material to the students, was asked to express their opinion and express their understanding of the sample letter. The teacher allows students to draft a text which will be checked by the teacher later. The observation result can be seen in the table below.

Table 4.11 Observation Result of Strategy using HOTS in Teaching Reading comprehension

| No | Types of Strategy using HOTS   | Meeting |   |   |   |
|----|--|---------|---|---|---|
|    |  | 1       | 2 | 3 | 4 |
| 1  | The teacher gives students worksheets  |         |   |   |   |
| 2  | Give some questions related to the text with 5W+1H   |         |   | ~ |   |
| 3  | The teacher gives pieces of paper<br>to each student and Students write<br>a question in a paper |         |   |   |   |

Based on the observations, it was found that Teacher C uses teach through questioning strategy in teaching reading comprehension according to the criteria in the table above. Teacher C uses several techniques in reading comprehension to support the use of the HOTS strategy, namely inferential questions. The activities according to Bloom's Taxonomy below :

# a) Evaluating(C5):

Teacher C asked students to read Malin Kundang story then the teacher gaves several questions such as :

Teacher C: What made Malin Kundang's mother sad and angry?

# b) Creating (C6) :

After analyzing it, students can connect the story that has been presented by the teacher in power point, then students continue the story according to the language structure of the story. Teacher C: *Predict what would happen if ?*, *How did the curse happen ?*,

# 4) Meeting 4

The researcher made the fourth observation on April 5 2023 in class X MIA 4. At this meeting, teacher C focused students on improving the draft that had been prepared in the previous week and then making a project. The observation results can be seen in the table below.

| No | Types of Strategy using HOTS  | Mee | Meeting |   |   |
|----|---|-----|---------|---|---|
|    |   | 1   | 2       | 3 | 4 |
| 1  | Review, refine, and improve the students' understanding                     |     |         |   | ~ |
| 2  | Teachers give a comfortable environment to students                         |     |         |   | ~ |
| 3  | Give feedback to motivate the students                                      |     |         |   | ~ |
| 3  | The teacher gives project-based<br>learning as an assessment to<br>students |     |         |   | • |

Table 4.12 Observation Result of Strategy using HOTS in Teaching Reading comprehension

Based on the observations, it was found that Teacher C uses review, refines, and improves students' understanding then provides assessment and feedback in teaching reading comprehension according to the criteria in the table above. Teacher C also uses several techniques in reading comprehension to support the use of the HOTS strategy, namely summarizing and questioning. based on observation, Teacher C after students analyze, and evaluate the contents of the text. They were able to create by going through these strategies and techniques. Based on the level of critical thinking skills in taxonomy bloom, below:

## a) Creating (C6)

From the review and refine activities, teachers C also ask students to make a summary and a plan or text that they have learned. After that, the teacher also gaves conclusions related to the topics being studied so that students can adjust to their own. Based on the results of the observations above, the teacher reviews the material with students so that students become more active. After reviewing the material, the teacher develops the material with students.

Teacher C: "Allright class, after we know and understand about the story of Malin Kundang. Ma'am will give you project to make a draft story and please create a video based on your draft about your vacation".

Based on observation, teacher C also provides assessments like giving the video project to students made a short story-related narrative text. Then, at the end of the lesson teacher always gives good feedback so that students are not tense in the learning process, namely by giving rewards, applause, and motivation.

# 2. Challenges of Using Higher Order Thinking Skills in Teaching Reading Comprehension

According to the teacher's interviews with researchers from April 3<sup>rd</sup> until 6<sup>th,</sup> 2023, there are some difficulties that teachers face while trying to demonstrate reading comprehension to students. These difficulties can help students with HOTS. Higher-order thinking can be taught, and there is a paradigm (infusion and distinct topic) to help teachers choose the best method for imparting it to students. Here are some teachers' challenges in using HOTS in teaching reading comprehension.

# a. Time

Time is the biggest challenge that teachers feel when teaching HOTS. Based on the results of interviews with English teachers who have taught using HOTS, especially in reading comprehension. Based on the interview below, teachers A, B, & C have difficulty dividing their time to achieve all the strategies that will be implemented according to the lesson plan. Questions are given by researchers to teachers namely.

Researcher: "Are there any challenges usually experience when using strategies in HOTS in teaching reading comprehension?"

Teacher A argues that one meeting can only achieve two to three strategies so it takes three to four meetings to complete one material. she also said that when she was in class, the strategy that was previously planned could change according to the needs of students. Based on the problem above, the teacher solve the problem by dividing the strategy into four meetings so that using the HOTS strategy can be implemented.

Teacher C said that 1x 45 minutes is not enough time to teach HOTS in teaching reading comprehension. According to the teacher, with the ability of students who have low intelligence, the challenges and efforts that are harder for the teacher in providing reading comprehension material must require a lot of time. To solve the problem, he simplify the strategies and techniques he uses in delivering material into four meetings so that learning plans can be achieved according to the HOTS criteria in learning.

Similar to teacher C, the teacher expressed her opinion that the reduced time system for English lessons made it more challenging in teaching HOTS, especially in teaching reading comprehension. From the challenges that must be faced, he focuses on providing exercises and texts which usually don't take much time. However, usually several strategies in HOTS especially in teaching reading comprehension. To solve the problem, the teacher needs four meetings so that all strategies are achieved and students can understand what they are reading.

# b. Students' Learning Ability

Based on the results of interviews with the three teachers, regarding challenges in using HOTS in teaching reading comprehension. The first is related to intellect or basic knowledge that they get from the lower class. According to teacher A, their lack of literacy knowledge from the lower classes makes their learning outcomes less at the upper levels such as high school. Students are used to being taught and there is no initiative to read so they could gain more knowledge. If they want, they must be asked first. That is what makes them difficult to understand the information in the reading. To solve the problem, the teacher uses the HOTS strategy in teaching reading comprehension such as activating their prior knowledge, and providing an opportunity for to students express their opinion on the information that has been read.

In the opinion of teacher B, students' ability to understand and extract information still needs to be improved because of the vocabulary skills of some students, so they still experience difficulties and the teacher usually allows students to underline vocabulary that is still difficult to understand. Based on the problem above, the teacher usually gives a text with pictures, the story in a ppt, and a list of vocabulary to students memorize.

Meanwhile, according to teacher C, at the high school level, the output of students from the lower classes is less, making students still have difficulty understanding a text. Based on the problem, the PBL or Jiksaw method is one of the teacher's strategies to make it easier for students, especially in reading comprehension. The lack of vocabulary and interest from students makes the teacher more trying to find strategies to attract students' learning interests, especially in reading.

#### c. Students' Mastery

Student mastery is the next challenge. Students' capacity to learn is directly related to how well they do basic tasks. Based on the interview, three of the English teachers had some opinions, because elementary schools had not introduced much English content, the interviews revealed that students' knowledge of these subjects was still rather limited. When teaching reading, the teacher makes a lot of effort. Teachers A, B, and C find it difficult to provide additional content if the level of mastery of each student is still different. To solve the problem above, the teacher's answer was to continue reading in groups, but the boys read first or the girls read first. When students read at this speed, it is easier for the teacher to reassess their understanding. Using HOTS in reading comprehension, the teacher repeats it so that students correctly understand information from the text.

# d. Planning Domain

The planning domain is the last challenge for the teacher. Regarding the curriculum material, the time allocated for teaching and learning, and the students' capacities, teachers carefully prepared their teaching and learning of HOTS. It will have a bad effect if the teacher doesn't design. Therefore, the curriculum serves as the foundation for teachers to make intelligent and original decisions while planning HOTS teaching and learning in the classroom. The teacher has created HOTS-based teaching plans based on the findings, however, there are still challenges in the plan.

Based on the results of the interviews, to solve the problem Teachers A, B, and C teacher made the same plan that in stages four meetings with the first explanation meeting, the second gave examples, the third using strategies, and the four results from student learning outcomes being practiced in the future by using HOTS, especially in reading comprehension. The teachers divides the time so that students can grasp the material that has been conveyed by the teacher with the steps that must be passed in learning. In addition, Teachers A, B, and C gave a classroom environment that also poses a challenge to every teacher where they must create a comfortable classroom atmosphere. Therefore, the activity they usually do is ice-breaking with games.

#### **B.** Discussion

The research's findings are discussed in this section. It presents the data that the researcher collected through observation and interviews. Two problem statements are put presented in this research. (1) Teacher strategies of using higher-order thinking skills in teaching reading comprehension, and (2) Teacher challenges when using Higher Order Thinking Skills in teaching reading comprehension which were explained in chapter two. This study aims to aim to understand the strategies used by teachers when using HOTS as a strategy in implementing teaching reading comprehension. According to the findings of the observation and interview with a teacher of English at SMAN 1 Sungai Loban. It can be concluded that there are several teaching strategies and challenges in using HOTS in teaching reading comprehension.

## 1. The Strategy of Using Higher-Order Thinking Skills in Teaching Reading Comprehension

There are five strategies, namely informing learning objectives, practice before assessment, teach through questioning, review, refine and improve, provide assessment and feedback (Limbach and Waugh, 2010). In using HOTS, the teacher has used in teaching reading comprehension through several techniques according to Solano and Fernandez (2017), and Retnawati et al (2017), namely activating prior knowledge, visualization, making predictions, making inferences, scanning, and skimming. Literal comprehension, inferential questions, summarizing, and questioning. In each of these strategies, the teacher involves a level in students' thinking, namely analysis, evaluating, and creating as a level of thinking in HOTS.

The teacher's strategy in using HOTS in teaching reading comprehension based on the findings of this study can be achieved to build students' critical thinking. Based on observations, English teachers use all the right strategies in a certain way in teaching. In using the HOTS strategy, Teachers A, B, and C focus on the process of analyzing, evaluating, and creating. The teacher adjusts the strategies and techniques in the process in stages such as providing analysis activities by implementing strategies for learning objectives, and teaching through question and answer for one meeting. it relates to the theory of Limbach & Waugh (2010) which states that teachers must determine learning objectives to improve students' critical thinking before starting class (p.3).

Then evaluate the practice before grading, review, refine, improve and create such as providing ratings and feedback with techniques on reading comprehension. Based on interviews with the three teachers, it was revealed that strategies in Teaching Reading Comprehension using HOTS were rarely applied to students, namely scanning techniques, making predictions, and asking questions because students' abilities required a lot of critical thinking. This relates to the theory from Maulidina (2020) stating that "the question and answer process encourages students to ask their questions to increase their understanding, obtain information, clear up confusion, identify problems, identify new information, and more" (p.53). Based on the interviews, the three teachers more often used the techniques of activating learning objectives, visualization, making inferences, literal questions, and summarizing. so, because of this use, it is easier for teachers to apply HOTS and students more easily understand the material through analysis, evaluation, and creating activities that are following HOTS criteria.

# 2. The Challenges of Using Higher-Order Thinking Skills in Teaching Reading Comprehension

Based on the interviews conducted by the researcher with the related teachers, there are several challenges faced by teachers when using higher-order thinking skills in teaching reading comprehension. Seman et al. (2017) and Nourdad (2018) discuss that higher-order thinking can be taught by taking an approach to teaching using HOTS effectively. However, there are several challenges that teachers have to face when using HOTS in teaching reading comprehension.

Time was the biggest challenge for teachers in implementing strategies for using higher-order thinking skills in teaching reading comprehension. According to the results of the researcher's interview with the teachers, they revealed that "*time was a challenge for me*, because with limited time, it is difficult for us to apply all the strategies in one meeting, so the teachers usually use the HOTS such analyzing, evaluating and creating in teaching reading comprehension in three to four meetings so that all strategies can be implemented. Therefore, each subject has a busy schedule and a lot of material, the solution of the teacher is to divide the time according to the strategies and techniques in teaching HOTS into several meetings.

Student learning ability is the next challenge faced by teachers. From the interviews conducted, the teacher said that the first problem with students' learning ability was vocabulary. The vocabulary that students know is limited, and most of it is newly learned vocabulary. The solution is, before starting to discuss the material, sometimes they will underline difficult words. Then, students are asked to find the meaning of these words. This was done because some students already knew the definitions of these words, and some did not. This is related to the statement of Seman et al (2017 p. 541) that students' abilities in learning to think are the biggest challenges for teachers, especially students who are lacking not only in terms of cognitive but also psychomotor and affective.

The intellect or output of students from the lower class affects their ability to feel in the upper class. According to the interview results, the teacher stated that students' interest in reading was still lacking due to an environment that did not accustom them to literacy. To overcome the problem that in reading activities, students need to be understood first and after that, they can carry out their reading comprehension well. participants need to read more and the teacher must try more to attract students' attention in reading. From the results of the interviews, the students' mastery was still lacking, due to the different elementary schools and several elementary schools which had not introduced English material. The statement above relates to the theory of Seman et al (2017 p.541) that students with different levels of cognitive ability have different levels of proficiency. So, the teacher also needs to explain it repeatedly. The planning domain was the next challenge that was felt by teachers in using HOTS, especially in teaching reading comprehension. The final challenge is the planning domain. If the teacher fails to design, it will have a negative impact. Seman et al. (2017) Stated that all designs related to higher-level thinking skills must be planned in detail and systematically so as not to fail. According to the teacher's statement, they have already planned the strategies and techniques to be used according to the HOTS criteria and made a domain plan that he would use in class.

The discussion above states that challenging teachers to use HOTS in teaching reading comprehension. In addition, the next step for the teacher is to liven up the classroom atmosphere by providing some icebreakers that will motivate them to learn, namely with games that can improve students' reading comprehension.