THE EFFECT OF ACTIVATION OF BACKGROUND KNOWLEDGE READING STRATEGY ON STUDENTS' READING COMPREHENSION PERFORMANCE: A CASE STUDY

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Abstract: This study examined the effect of background knowledge reading strategy among ESL learners as well as to identify the pre-reading strategies that are commonly used by the students. The sample comprised of 160 form one students from one of the semi-urban schools in Kuala Terengganu. The quasi–experimental design was used in the study. Students were divided into experimental and controlled groups. Modules were designed for the purpose of this research which contained six reading texts with ten comprehension questions for each text. For the experimental group, pre-reading activities were included in the module as the intervention. The English Language teachers conducted the module in their respective reading classes. Students were asked to answer the questions based on the module prepared for them. After the module session was done, ten students from the experimental group were selected for Think Aloud Protocol (TAP) session and interviews. The reading comprehension tasks were analysed to investigate the performance between the experimental and controlled groups. The result of the Think Aloud Protocol (TAP) sessions and interviews were analysed by the researchers to support the result of the reading comprehension marks. The study revealed that the reading strategy helped students from the experimental group in their reading comprehension performance. The findings of this study had revealed that there is significant improvement in the reading comprehension performance of the lower secondary students after being exposed to activation of background knowledge reading strategy.

Keywords: Reading comprehension, reading strategies, background knowledge.

INTRODUCTION

Malaysia is moving towards developed country and the use of information and communication technology (ICT) will be greater emphasis in schools (10th Malaysia Plan). In the era of information explosion through the new media, students read and engage with texts in the internet that requires reading comprehension strategies in aiding them to comprehend the texts (Liaw, 2009). ESL students nowadays are facing greater challenge as they need to read the materials in the internet for them to gain latest information. Thus, they need to have effective reading strategies for them to engage themselves in the internet reading and to help them in their reading comprehension (Norizah & Hazita, 2011; Liaw, 2009).

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Comprehension of a text represents one of the most important aspects in learning as it plays an important role in the process of acquisition, sharing and construction of knowledge. Accessing and building background knowledge will provide critical support for reading comprehension (Fathollah, 2013). It will provide readers with the necessary information that makes texts more comprehensible. Background knowledge is even more important in second language reading. This is because background knowledge and language proficiency will interact during second language reading. Thus, it is easier for those who have background knowledge to overcome comprehension difficulties due to language proficiency limitation (Chia, 2008).

According to schema theory, prior knowledge provides a schema, a framework or structure that helps thinking (Allington, 2010). It deals with the reading comprehension as an interactive process between readers' prior knowledge and the text being read. A reader with a rich background will comprehend better than the one who has a poorer background (AbdulMohsen, 2012). Thus, background knowledge is essential and should be activated to help readers comprehend the text better. According to Sharmini Guru *et. al.*, (2006), Naseer Omer (2006), Chia (2008) and Nurul Aleena (2006), lack of background knowledge have been the main problem among ESL learners of primary school students and form one students that hamper reading comprehension. Thus, students are having difficulties because the demands of comprehension have increased as they interchange in the learning process from primary school to lower secondary (Sharmini Guru *et. al.*, 2006; Kay, 2008).

In addition, the demands for complex comprehension increases for ESL learners as students shift from lower to higher grade (Sharmini Guru *et. al.*, 2006; Kay, 2008). Students from primary school, particularly standard six students, deal with reading texts with their length range from 60-200 words and the vocabulary are less complicated (Margeret & Norhanim, 2007). But, they would be dealing with longer reading texts with their length range from 150-350 words and the vocabulary are more complicated when they enter form One in secondary school (Tan & Benedict, 2002). Furthermore, when the students enter form One level, they would be introduced to the literature components such as poems, short stories and graphic novel (Zubaidah and Saidatul, 2007; Huraian Sukatan Pelajaran Form One, 2003) that require deeper comprehension. Having such situation, less proficient ESL learners are having a greater challenge and in need of proper reading strategies to help them in reading comprehension as strategies that readers use when interacting with printed materials play an important role in reading comprehension in first and second language (Rajendran & Deepak, 2004; Negmeldin, 2011).

Among the main problems in students reading comprehension are lack of background knowledge, low language proficiency and lack of motivation (Sharmini Guru *et. al.*, 2006; Chia, 2008; Lee, 2006). Lack of background knowledge means readers don't have enough schemata about the topic when they are reading the

texts. Students need to have background knowledge to help them understand texts better, especially when reading literature texts because to comprehend the literature texts better they need to have background knowledge (Subadrah & Rajeshwari, 2006; Marzilah & Tg.Nazuwin, 2010; Tina & Muhd Hassan, 2007). Background knowledge can be activated through pre-reading activities (Tudor, 1989). However it has been an issue among English teachers whether there are enough pre-reading activities done by teachers in the classroom that students need to be exposed and aware of, in aiding them in their reading comprehension. These pre-reading activities have been a neglected essential in the ESL reading class (Parviz Ajideh, 2003; Abbas & Seyedeh, 2011; Lee, 2006; Hesam, 2005).

Research has shown that background knowledge is the key to efficient reading comprehension of English texts (Tarchi, 2010). However, so far the studies on background knowledge and language proficiency have been conducted on pre-university and university students (Singaravelu, 2004; Chia, 2008) and those from urban areas whereby the students are mostly proficient in English language because of the exposure to the language (Singaravelu, 2004; Tarchi, 2010). Evidently, there is a lack of study being done on younger ESL learners especially in the sub-urban areas where the students are comprise of mostly less proficient in English language due to the lack of exposure to the language and in need of proper reading comprehension strategies, particularly in Terengganu, Malaysia.

Researches have also shown that reading strategies provide positive effect on students' reading comprehension, mostly reading strategies that focus on the readers cognitive (Eghbal, 2012, Harvey & Goudvis, 2013). In addition, research by NorAireen & Nurulsyaida (2010), Parviz Ajideh (2003) and Seyyed *et. al.*, (2012), have shown that explicit pre-reading strategy instruction has helped students in their reading comprehension score. These reading strategies involved students' schemata that require them to access their previous background knowledge. However, there are lack of researches being conducted that focusing on pre–reading strategy and on younger ESL learners.

Thus, this research intends to fill up the gap in the research field in which there is none experimental researches on activation of background knowledge reading strategy that had been done on younger students especially in the east coast of peninsular Malaysia. It is hoped that this research will help to provide some ways of enhancing the students' reading comprehension performance by acknowledging the effective reading strategy and for the teachers in their teaching of reading comprehension among lower secondary students.

The purpose of the present study is to investigate the effect of activation of background knowledge reading strategy on the lower secondary students reading comprehension performance. It seeks to identify the effect of activation of background knowledge on lower secondary students' reading comprehension performance; to identify the effect of language proficiency on lower secondary

students reading comprehension performance; to identify the pre-reading strategies used by the low and high proficiency students and to determine whether background knowledge activation is able to help lower students in their reading comprehension performance.

LITERATURE REVIEW

Background knowledge and language proficiency have been the main variables that relate to reading comprehension. Both have positive effects on the students' reading comprehension performance (Singaravelu, 2004; Tarchi, 2010). Singaravelu (2004) has conducted a research to examine the role of background knowledge in second language learners reading comprehension of unfamiliar texts among form 6 students in a high school at Subang Jaya, Selangor. Two additional texts of similar content and subject matter were given as background knowledge input to the treatment group. Then, there were pre-test and post-test conducted by the researchers on the treatment group and controlled group. The results indicate that prior knowledge provided to the treatment group subjects improved their reading comprehension.

In congruent with Singaravelu, Tarchi (2009) in her research intended to analyse both direct and indirect effects of prior knowledge on reading comprehension that comprise of background knowledge of domain, background knowledge of facts and background knowledge of meanings. Participants were 7th grader in 5 secondary schools in Florence, Italy. Findings showed that prior knowledge plays a central role, influencing comprehension both, directly and indirectly. Thus, it is since the 1970's that the role of the background knowledge has been established and activating background knowledge during pre-reading stage will enhance reading comprehension performance.

Chai (1990) conducted a research on the effects of Pre-Reading Instructions on the comprehension of text by ESL readers based on their level of proficiency. The research was conducted on selected ITM MARA students, pursuing intensive English course. The respondents were divided into two groups; good readers (group 1) and poor readers (group 2). Background knowledge input was given to group 2 during the pre-reading. The results showed that the pre-reading instructions are effective and have benefited more to the high proficiency readers than the low proficiency readers.

O'Brian (2007) in her research intended to investigate the most effective pre-reading activities that can activate students' background knowledge, in helping them to comprehend texts. The pre-reading activities are KWL Chart and Anticipation Guide. The research was conducted in a high school in Mid-Western, USA. The result showed that both KWL Chart and Anticipation Guide are effective pre-reading activities strategies in activating students' background knowledge and that the students' grade has improved due to the usage of them.

However, despite the positive effect of background knowledge on reading comprehension performance, Johnston (2009) argued on the effects of background knowledge. They have found out that background knowledge has not given positive effect or no effect at all on reading comprehension. Background knowledge also has been said to be interference rather than facilitates. The effect depends on the cost that associates with schema activation and the process involved in understanding such as translating, predicting or 'pre-fetching' (summaries, advance organizer ,informative titles) before reading texts. The effect of activation of background knowledge is no longer positive due to those elements that readers have in mind before they read the texts.

Further, the need to teach students appropriate reading strategies is one of the important aspects in teaching reading (Majdi, *et. al.*, 2009; Seyyed, 2012). It is an aspect that should not be overlooked because reading strategies are used consciously by readers for them to comprehend texts. Readers, who are aware of the reading strategies, will help them in selecting certain path, the means to the goal and processes used to achieve the goal and help improve reading comprehension performance. Researches on reading strategies have been conducted by several researchers that relate to the background knowledge (cognition), which has been applied during pre, while and post reading.

Yesim Ozak & Muharrem Civelek (2006) conducted a research to identify the reading strategies employed by university students of Dicle University, Turkey while reading a text, and which reading strategies are needed to be developed to understand the text better. Reading strategies were evaluated under pre-reading, while reading and post reading. The results of Think Aloud Protocols (TAPs) analysis revealed that the students used only one strategy namely, "*relating the title to the text content*" in the pre-reading phase. As for the while-reading phase, the most effectively employed strategies were: *using the dictionary parsimoniously*, *guessing the meaning of a word from the context*, *skipping some unknown words, thinking-aloud during reading*, and *assimilating the text with the background knowledge*. The strategies identified helped the students in their reading comprehension.

Another research on cognitive reading strategies was conducted by Chubuku (2007). She focuses on the reading strategies of teacher trainees at a state university in Western Turkey. The respondents were undergraduate teacher trainees and Reading Strategies Scale was administered on them in order to find out the reading strategies used by the students. The findings highlight the importance of strategy trainings and students with proper strategy training would enhance their reading comprehension.

Focusing on cognitive reading strategy conducted during pre-reading, Majid (2002) conducted a research to evaluate the effect of explicit training of a selected

number of cognitive reading strategies on students' comprehension of English for Specific Purpose (ESP) texts. Results showed that participants in experimental group outperformed the control group in terms of comprehension of ESP reading text due to the reading strategy trainings.

Similarly, NorAireen & Nurulsyaida (2010) in their research have examined and compared the cognitive reading strategies employed by students who have undergone a reading course and students who have not undergone a reading course. The 'think aloud' technique was used to identify the cognitive reading strategy employed by the participants. Findings of the study showed that cognitive reading strategy has given positive impact on participants who attended a reading course. The reading strategies helped them to become skilled reader and able to comprehend texts better.
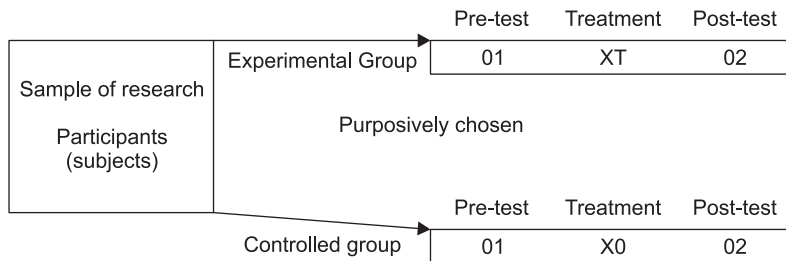
In a research by Eghbal (2012), cognitive and metacognitive reading strategies implemented on the students, through pre-reading activities helped them with their reading comprehension scores. The results of one-way ANOVA revealed that there was no significant difference between the self-esteem measures of those students who were taught cognitive and metacognitive strategies as compared to those taught traditionally. However, there were significant differences between their total scores in the course and their academic success measures.

Reading strategies are indeed important in improving students' reading comprehension. In a current research by Seyyed *et. al*., (2012), discussed on how the effect of reading instructions improved and developed students' reading comprehension ability. The participants were 70 undergraduate students of Urmia University, Iran. The participants formed a reading class that was held two sessions (approximately 90 minutes) a week. The class was an intact group taught by the researcher himself through learning-centred method. The research started with pre-test for the students followed by 4 months of interventions (reading instructions). Post test were administered to see the effect of the treatment and the *t*-test results revealed that the teaching intervention had a significant effect and has been successful in improving students' reading comprehension.

Based on previous researches conducted on background knowledge implementation, it was found that they have given some indications of the possible effect of the reading comprehension on students' overall performance in English as second or foreign language. The studies have shown the effectiveness in promoting students' reading comprehension performance. Moreover, reading strategies have become a helpful and useful tool in helping readers, particularly students, in their reading comprehension. The students must acknowledge that they need reading strategies in helping them to comprehend texts. However, there are lack of reading strategies that emphasise during the pre-reading and on younger learners.

METHODOLOGY

This study employed a quantitative data analysis with the support of the qualitative data analysis. The data collection procedure took 8 weeks involving a quasi-experiment method. The researchers had designed and adapted an instrument (reading module) to measure the performance of each student's reading comprehension performance taken from O'Brian (2007) and followed the procedure of Think Aloud Protocol (TAP) by Thoreson (1997). From these instruments, the researchers identified the level of students' reading performance at the end of the reading activities sessions (post test) and compared the mean with the pre-test. The researchers selected 160 form one students from SMK Seri Nilam, 80 students were the controlled group and another 80 students were the experimental group. The participants were selected through purposive sampling due to the availability of finding the ESL learners as subjects who are basically having reading classes in school.

	Pre-test	Treatment	Post-test
Experimental Group	01	XT	02

Sample of research Participants (subjects) — Purposively chosen

	Pre-test	Treatment	Post-test
Controlled group	01	X0	02

Figure 1: Pre-test-post-test Control-Group Design
(Adapted from Johnson & Christensen, 2004)

Where:

01 and 02 represent the pre-test and post-test assessment of the dependent variable.

XT represent the treatment condition (pre-reading strategies)

XO represent the control or standard treatment condition or traditional condition.

The pre-reading activities are The KW Chart and Anticipation Guide. The Anticipation Guide helps to introduce the key topics of a reading that will direct the students' attention to their reading. The KW Chart is for the students to respond in a graphical way in activating their background knowledge. *K* signifies what I want to know. And *W* signifies what I want to learn. These two parts are included in the pre-reading portion of the reading lessons. Students were given the key concepts of the reading text where they did the brainstorming in order to fill in the chart. Students' cognitive were anticipated through this chart to activate their background knowledge.

The researchers has chosen to use inferential statistic to analyze the quantitative data. This is because the researchers intended to see the relationship of the dependent

variable between controlled and experimental group and between pre-test and post-test. For qualitative data, the researchers appointed two content experts to analyze the Think Aloud Protocol (TAP) transcribe where they were given a checklist and the researchers use transcribe interview protocols to analyze the interviews. To analyze the score, the researchers has chosen to conduct a t test in order to compare them, using the SPSS software for windows.

FINDINGS

Reading Comprehension Performance for Controlled Group (Pre and Post)

A paired-sample *t*-test was conducted to compare the pre-test and the post-test results of the controlled group for their reading comprehension performance. It was found that there was no significant difference in the score for the pre-test ($m = 10.82$, $sd = 2.57$) and the post-test ($m = 10.82$, $sd = 2.31$); $t (79) = -3.90$, $p = 0.697$. The result showed that there is no increase in scores from their pre-test to post-test score. This is because the controlled group was not given the intervention of the activation of the background knowledge reading strategy from the reading module.

TABLE 1: PAIRED SAMPLES T-TEST ON READING COMPREHENSION
MARKS OF CONTROLLED GROUP (CG)

	Input	*Mean*	*SD*	*t-value (df)*	*Sig. (2-tailed)*
Pre-test	–	10.82	2.57	–3.90(79)	0.697
Post-test		10.82	2.31		

*($p > 0.05$)

Reading Comprehension Performance for Experimental Group (Pre and Post)

A paired-sample *t*-test was conducted to compare the pre-test and the post-test results of the experimental group for their reading comprehension performance. It was found that there was a significant difference in the score for the pre-test ($m = 11.02$, $sd = 2.57$) and the post-test ($m = 12.27$, $sd = 2.53$); $t (79) = -3.95$, $p = 0.00$.

TABLE 2: PAIRED SAMPLES T-TEST ON READING COMPREHENSION
MARKS OF EXPERIMENTAL GROUP (EG)

	Input	*Mean*	*SD*	*t-value (df)*	*Sig. (2-tailed)*
Pre-test	Background Knowledge	11.02	2.57	–9.35(79)	0.00
Post-test		12.2.7	2.53		

*($p < 0.05$)

The findings for TAP results revealed, for *Elaboration* coding, all students have been recorded as being able to activate their background knowledge during reading. However, the low proficiency students mention less prior knowledge than the high proficiency students. For *Monitoring Comprehension* coding, four high proficiency students have been coded with "posted questions on some aspects of the text". Then, for *Monitoring Non-Comprehension* coding, the lower proficiency students have been coded with "signalling confusion without providing evidence of a 'fix-up' strategy". Lastly for *Text Analysis-Planning* coding, the lower proficiency students have been coded with "commented on the structure of the text", while the high proficiency level students have not mentioned anything on the text structure.

From the overall TAP result, it can be said that the students have activated their background knowledge while reading. The result is similar to Yesim Ozak and Civek (2006) who revealed that students have assimilated the text with their background knowledge which had helped them in their reading comprehension.

Pre-Reading Strategies that are Commonly Used by the Lower Secondary Students

The findings revealed that the pre-reading strategies are reading the text more than once, reading the first sentence, underlining the difficult words and finding the meaning in the dictionary. The findings are similar to Marzilah and Tengku Nazwin (2010) and Nurul Aleena (2006) who revealed reading strategies that are commonly used by the ESL students are using the dictionary, reading the text more than once, reading the first sentence and underlining the difficult words. The results also determine that lower secondary students were not aware of the cognitive reading strategies that relates to their own background knowledge. Some of them do not even have any reading strategies before reading. Thus, this present study intended to examine the effectiveness of the activation of background knowledge reading strategy towards the lower students reading comprehension performance.

The Effect of the Activation of the Background knowledge Reading Strategy on Lower Secondary Students' Reading Comprehension Performance

To determine whether did the activation of the background knowledge help the lower secondary students in their reading comprehension, interviews were conducted by the researchers on ten students of the experimental group who gain good marks in their reading comprehension and three English language teachers. There were ten questions for the students and seven questions for the teachers prepared by the researchers.

Question number seven from the students' interview session was 'What do you think of the English texts after you have been introduced to the reading strategy?'

Excerpt 1: (Five Respondents)

R2 : I think the texts have become easier because of the exercises before reading.

R5 : I understand text better. Before this I do not understand the English text at all and it is difficult for me to understand them.

R6 : When I did the exercise before I start reading, I feel that the texts are easier to read.

R7 : I feel the texts are much easier because I did the exercises with my teacher before reading.

R9 : After doing the exercises before reading the texts, I can read the text a little bit smooth because it has become easier to understand.

Based on five selected responses given by the participants, they said that English texts have become much easier to be understood after the reading strategy has been introduced to them. The results showed the activation of background knowledge reading strategy had helped the students' in their reading comprehension. The findings confirm Rubeval's (2004) schema theory of activating background knowledge in helping students reading comprehension. Students found the English texts easier because their background knowledge had been activated through the reading strategy given. Thus, the activation of background reading strategy had helped them in their reading comprehension.

Question number eight from the students' interview session was 'Did the reading strategy help you in your understanding of the texts? How?'

Excerpt 2: (Five Respondents)

R1 : Yes. When I did the exercises before reading, I remembered about what I have done before when I start reading the texts.

R2 : Yes. After doing the pre-reading exercises, I tried to remember my previous experience. When I start reading the texts, they have become easier.

R4 : Yes. Because it made me remember my past activities and when I read the texts, it becomes related. It has made the texts become easier.

R7 : Yes. It made me wonder in my thoughts remembering my previous experience. Then, when I start reading the texts, they have become easier because I have thought about the topic before.

R8 : Yes the reading strategy helped me. It made me remember my past experience. When I read the texts, they have become easier because the texts have been related to what have happened to me before.

Based on five selected responses given by the participants, the activation of background knowledge reading strategy helped them in their reading comprehension by helping them remember their previous experiences or past activities. The

findings had a similar result as O'Brian (2007) who discovered that the activation of background knowledge helped the students in their reading comprehension and their reading comprehension had improved. Li and Wu's (2007) Schema Theory supported the fact that the reader's background knowledge had become the key in understanding a text. Thus, the activation of background knowledge reading strategy is an effective strategy in helping the students in their reading comprehension.

Question number 9 from the students' interview session was 'Did your marks in your reading comprehension improved?'

Excerpt 3: (Five Respondents)

R1 : Yes, my English mark improved.

R3 : Yes, my English mark has improved. Instead of just the passing mark, I managed to get C for my English subject. I am thankful.

R4 : My English marks is getting better. I am happy because now I can understand the text in the comprehension section better.

R7 : When my teacher told me that my English mark has improved, I did not believe it. But when I got the exam paper, it is true that my English mark has improved.

R8 : Yes. I am happy to see my English mark has improved. I have to read more English texts after this.

Based on five selected responses given by the participants, the activation of background knowledge reading strategy helped them improve in their reading comprehension performance. The background knowledge activation reading strategy had helped lower secondary students in their reading comprehension performance. The findings are similar to Yesim and Muharrem (2006), who revealed that metacognitive reading strategies that were given during pre-reading activities would help the students in their reading comprehension and they obtained better marks. The findings confirmed Majdi and Syakirah's (2009) Schema Theory that readers with higher background knowledge would comprehend the text better. Thus, in this study, the researchers found an effective reading strategy for lower secondary students, which was the activation of background knowledge reading strategy. This would help the students in their reading comprehension performance.

Interviews were also conducted by the researchers on three English teachers. The teachers had conducted the module with the experimental group students. There were seven questions prepared by the researchers. Question number two from the teachers' interview session was 'Why do you think that the problem arises?

Excerpt 4: (Two Respondents)

T1 : It seems that my students cannot relate their experiences with the texts that they are reading. This has cause the loss of interest in reading the texts.

T3 :   The students have less or no background knowledge about the text they are reading.

Based on the responses given by two selected teachers, they have stated that their students are having problems in reading comprehension because they lack background knowledge and they cannot relate their experience when reading a text. Thus, this will hamper their comprehension of the text and will perform poorly in their reading comprehension. These findings were similar to Chai (1990) who revealed that readers who did not activate their background knowledge before reading a text performed poorly compared to those who did. Thus, students should have proper and effective reading strategies in helping them in their reading comprehension.

Question number four from the teachers' interview session was 'What do you think about the activation of background knowledge reading strategy?

Excerpt 5: (Three Respondents)

T1 :   It is an interesting reading strategy. My students like it and they understand the English texts better now.

T2 :   The reading strategy is something new to us. It captured my students' attention and has made the English text become easier to them.

T3 :   In my opinion, the reading strategy is good because it helped my students to comprehend the English texts better.

Based on the responses given by all the teachers, the activation of background reading strategy is a good strategy that helped the students to perform better in their reading comprehension. The findings are supported by Parviz Ajideh (2003) who revealed that background knowledge input given during pre-reading to the students have positive improvement in their reading comprehension of texts. Thus, readers, especially lower secondary students should be exposed to this reading strategy in order to help them in their reading comprehension.

Question number four from the teachers' interview session was 'Did your students' reading comprehension performance have improved after the strategy was applied to them?'

Excerpt 6: (Three Respondents)

T1 :   Yes. Their English marks have improved from the previous marks.

T2 :   Of course. As the English teacher I am so happy to see their improvement.

T3 :   Yes. My students have performed better in reading comprehension section.

Based on the responses given by all the teachers, their students' reading comprehension performance improved after the activation of background knowledge

reading strategy was applied to them. The reading strategy had helped the students in their reading comprehension and they had performed better. The findings had supported Zaidah's (2001) Top-Down Reading Theory that readers who employ their background knowledge when reading have anticipated the content that will help them in their reading comprehension, that would lead to better comprehension performance.

Referring to findings of the interviews, it is clear that background knowledge has a positive impact on students reading comprehension. It helped the students to comprehend English texts better. Moreover, the findings of the effect of the activation of background knowledge reading strategy through reading modules prepared by the researcher had showed significant difference in students reading comprehension performance. The implementation of the reading strategy based on the reading module had fulfilled the Schema Theory by Rubeval (2004) and was supported by Royer and Cunningham (1981) and Li and Wu (2007) who agreed that readers who activate their background knowledge understand the text better. In conclusion, based on the results of the paired sample *t*-test, TAP and interviews, it is suggested that the activation of background knowledge reading strategy had given an impact on overall reading comprehension of the students.

DISCUSSION

This study aimed at measuring the effect of activation of background knowledge reading strategy on students' reading comprehension performance through the reading module which consists of pre-reading activities, reading texts and comprehension questions. The results indicated that the students' exposure to the reading strategies in the module had a significant, positive impact towards their reading comprehension performance. The findings are parallel with the research conducted by Tan (1986), who discovered the role of background knowledge and stated that background knowledge and language proficiency had significant effects on the students' comprehension. The Rubeval's (2004) Schema Theory states that organized background knowledge is needed to lead readers to expect or predict in their interpretation of discourse. Thus, background knowledge plays an important role in students reading comprehension of texts.

The findings of this current study are also comparable with the research conducted by Gunasegran (2004) who stated that background knowledge plays a vital role in second language learners reading comprehension of texts. The prior knowledge (background knowledge) treatment given to the students has helped them in their reading comprehension performance. The findings confirmed with the Majdi and Syakirah's (2009) Top Down Reading Theory who believed readers with higher background knowledge would comprehend the reading texts better. Thus, the background knowledge has given positive impact on the students reading comprehension performance.

The findings are also parallel with the research conducted by Tarchi (2010) who mentioned that background knowledge plays a central role in influencing reading comprehension of the students whether it is given directly or indirectly. This is clearly seen after treatments have been given to them. The findings had fulfilled the Li and Wu's (2007) Schema Theory which mentioned that readers' background knowledge is the content domain of reading materials that has become the key in understanding a text. Hence, background knowledge will enhance the reading comprehension performance of the students.

In the present study, the researchers has been emphasizing on the activation of the background knowledge during the pre-reading activities as a reading strategy in examining its effectiveness on the students reading comprehension. The K-W Chart and the Anticipation Guide have been used as the pre-reading activities before the students read the text. The findings are parallel with the research conducted by Langer (1984) where she stated that the background knowledge that is activated through pre-reading activity has significantly improved the performance of the students' reading comprehension. Thus, background knowledge activation did not only help the students in their reading comprehension performance but also best applied during pre-reading activities for greater impact.

The findings of the current study are also similar with the research conducted by Chai (1990) who mentioned that pre-reading instructions are effective and has benefited the students in their reading comprehension. Thus, the pre-reading activities are effective in engaging the students in their reading and the implementation of background knowledge strategy during pre-reading will help the students to improve their reading comprehension.

The findings are also allied with the research conducted by O'Brian (2007) who revealed that effective pre-reading activities that can activate students' background knowledge will help them in comprehending the texts. Thus, an effective reading strategy is needed to help the students in their reading comprehension performance.

The findings of the present study are also equivalent to the findings from the research conducted by Chia (2008) who stated that students who were provided with relevant background knowledge before reading had significantly higher reading comprehension scores. The pre-reading activities which can activate students' background knowledge has given an improvement in students' reading comprehension scores. Thus, activation of background knowledge as a pre-reading activity is an effective reading strategy in helping the students in their reading comprehension performance.

The present study also revealed that the background knowledge has a positive effect on reading comprehension of the students. Thus, it has not supported the findings of research conducted by Johnson (1984) and Alverman *et. al.,* (1985) who

have stated that background knowledge input that were given to the students before reading text is rather interfering than facilitating. The background knowledge has no positive impact to the students reading comprehension. However, the present research has proven that background knowledge has a positive effect on students' reading comprehension.

The present study is also intended to find an effective reading strategy in helping the students in their reading comprehension of English texts. Background knowledge (cognition) activation was applied as the reading strategy to help the students in their reading comprehension performance and the results showed that the activation of the background knowledge reading strategy helped the students in their reading comprehension performance. The findings are parallel with the research conducted by Yesim & Muharrem (2006) who have mentioned that reading strategies are essential and should be developed for the students to understand the text better. The strategies identified helped the students in their reading comprehension.

The findings are also similar with the research conducted by Chubuku (2007) who stated that it is important of have reading strategies to help students in their reading comprehension. Cognitive reading strategies have been administered to them and they have enhanced the students' reading comprehension. Thus, it is important to have reading strategies and most importantly to have an effective reading strategy to help students in their reading comprehension.

The findings of the present study are also parallel with the research conducted by Nur Airen & Nurul Shuhada (2010), who revealed that cognitive reading strategies had given a positive impact on the students who have undergone a reading course. The reading strategies have helped them to comprehend the text better. Thus, reading strategies are essential for the students to understand the text better.

The findings are also allied with the research conducted by Parviz (2003) who mentioned that reading strategies focusing on pre-reading activities helped the students in their reading comprehension. The students have showed positive improvements in the reading comprehension of texts after the pre-reading activities as the reading strategy were given to them. Hence, reading strategies which are given during the pre-reading activities helped the students in their reading comprehension performance.

The present study supported the findings of the research conducted by Eghbal (2012) who revealed that cognitive and metacognitive reading strategies that are given through pre-reading activities helped the students with their reading comprehension scores. There are improvements in their reading comprehension scores after pre-test and post-test were conducted on them. Hence, the cognitive reading strategies helped the students in their reading comprehension performance.

The findings are also comparable with the research conducted by Seyyed *et. al.*, (2012) who revealed that reading strategies improved and developed students'

reading comprehension ability. The pre-test and post-test results showed that the reading strategies had significant effect and had succeeded in improving students' reading comprehension. Thus, it is important to have reading strategies for the students to have better comprehension of texts.

The analysis of Think Aloud Protocol showed that all the students did activate their background knowledge when reading. The cognitive processes have occurred when they are reading the texts. The results of the interviews revealed that most of the students felt that the activation of background knowledge reading strategy helped them a lot in understanding the text better. Their reading comprehension score improved after being introduced to the reading strategy. Thus, they would use the reading strategy in their future reading. The teachers also said that the activation of background knowledge reading strategy helped them in their reading classes. The reading strategy helped the students to deal with the reading texts better and their score have improved. The findings supported the The Rubeval's (2004) Schema Theory and supported by Li and Wu's (2007) and Parviz Ajideh (2003) who agreed on the role of background knowledge in aiding readers' reading comprehension. Hence, the activation of background knowledge is an effective reading strategy and the teachers would apply them in their reading classes.

With this current study, it is hoped that the reading comprehension problems in the reading class of lower secondary students will be minimized. With the awareness of the importance of reading strategies and the activation of background knowledge reading strategy that has been proven effective, it is hoped that it can help the students in their reading comprehension performance. Based on this present study, the researchers had suggested that a reading handbook should be provided for English teachers with pre-reading activities that can activate students' background knowledge based on the Malaysian setting.

CONCLUSION

In conclusion, the present study had revealed that there is significant improvement in the reading comprehension performance of the lower secondary students after being exposed to activation of background knowledge reading strategy. The pedagogical implications of this study were that an adapted version of activation of background knowledge reading strategy could be used as one of the instructional strategies to teach reading comprehension and also could be a useful training technique for independent learning. Recommendations for further educational practise were that a larger scale with different groups of participants should be used for further studies on activation of background knowledge reading strategy and training should be given to English language teachers to give them exposure on a reading comprehension strategy. Thus, this study is very important in contributing ideas for providing suitable Malaysian setting reading handbook for English teachers.

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