

Chapter Five

Conclusion And Implications

On the basis of data analyses and findings, this chapter presents a conclusion of the study concerning the students' performance on the "Discourse Structure" test, their metacognitive awareness of the strategies they used and difficulties they encountered in taking the DS test, and their responses toward this activity. First of all, a summary of findings is presented in an attempt to answer the research questions proposed in Chapter One. Then, some pedagogical implications from this study for English teachers in Taiwan are suggested. Finally, the limitations of this study and suggestions for future studies are discussed.

5.1 Summary of findings

On the basis of data analysis and comparison of the statistical results, some major findings are summarized as follows. First, in terms of the first research question asked in the first chapter concerning the effect of the treatment, it is found that the integrated treatment is indeed effective in enhancing Taiwanese senior high school students' performance on the DS test, and that higher-proficiency participants (High and Mid) have benefited more than low-proficiency ones from this activity. A comparison of the participants' performance between pre-tests and post-tests shows a significant difference for the participants as a whole and for each of the three groups, i.e. High, Mid, and Low. That is, the participants of any proficiency level in this study have made significant progress on the DS test after the integrated treatment. In the response questionnaire, as many as fifty-seven participants (82.6%) also voiced their recognition of the effect of the treatment, saying that the treatment has promoted their confidence in taking the DS test. As for the degree of improvement, the gains of the

mean scores show that the integrated treatment has exhibited a more facilitative effect on High and Mid groups than on the Low group in taking the DS test.

The second research question asked whether the integrated treatment would enhance the participants' metacognitive awareness of text structure and cohesive devices in taking the DS test. The answer, based on the results of the questionnaires, is a clear yes. A comparison of the metacognitive awareness questionnaires before and after the treatment has exhibited a significant difference in the participants' attention to the unity and coherence of the text and their use of cohesive devices, such as pronouns, demonstratives, lexical ties and conjunctions, as clues to make decisions on which alternative to choose for a blank in taking the DS test. That is, the participants' awareness of text structure and cohesive devices in taking the DS test has increased significantly after the treatment. In the response questionnaires, the participants also expressed the opinion that the treatment, especially the instruction session and think-aloud modeling, has helped them capture the manifestation of text structure and cohesive devices and directed their attention to these clues when taking the DS test.

With regard to the third research question, "Do the participants of different English proficiency levels demonstrate different degrees of text structure awareness in the undertaking of the DS test?" some findings are revealed from the analysis of the four participants' think-aloud protocols. First, lexical ties account for most of the cohesive devices identified in the protocols among the three categories of cohesive devices, which reveals the fact that a text inevitably contains repeated occurrences of certain words and related vocabulary. Second, proficient readers tend to be more well-rounded and sophisticated in detecting crucial cohesive ties, while low-proficiency readers are more likely to depend on lexical ties only. That is, the types of cohesive devices identified by proficient readers as clues in taking the DS test show greater variety than those identified by low-proficient readers. The difference is

most evident with references, which are manifested differently in English and in Mandarin Chinese and can bring about great difficulty for Taiwanese students in reading comprehension. Third, the number of cohesive ties detected by proficient readers as clues to decide on the answers is greater than that by less proficient ones, while in excluding alternatives where lack of cohesion is obvious, there is a greater number for low-proficiency readers. This result means that proficient readers are more sensitive to prominent cohesive ties, while less proficient readers have to rely more on the technique of exclusion, showing their lack of confidence in perceiving text coherence. Finally, proficient readers are more competent in detecting misjudgment of cohesion and having their errors corrected. This further demonstrates that proficient readers are more meaning-oriented.

The final research question, asking about the participants' perception of the three sessions of treatment, gets mostly positive responses. It is found that most participants considered the instruction of text structure the most facilitative in their taking the DS test, which provides further proof that awareness of text structure and cohesive devices is essential in taking the DS test. Think-aloud modeling ranked as the second most facilitative, as the participants stated that it provided a concrete example of thinking process of undertaking the DS test, especially on when and how to use certain strategies. The think-aloud technique, though rejected by some participants, still helped most of the participants concentrate better and allowed them to be more aware of the problems they had toward comprehension and then more strategic in solving the problems. Besides, negative comments on think-aloud modeling and the think-aloud technique reflect that there is individual difference in problem-solving skills and in learning approaches.

Additionally, there are several other findings. First, the results of the metacognitive awareness questionnaires show that the participants' general reading

strategies have also been reinforced by the treatment, especially the global ones and guessing word meanings. It is also found that a lack of vocabulary has constituted a great barrier to the detection of lexical ties between sentences and therefore has caused great difficulty in taking the DS test. Moreover, the participants' responses show that the instruction of text structure has also improved their writing quality.

5.2 Pedagogical implications

The findings derived from this study show that a combination of instruction of text structure with think-aloud modeling and the think-aloud technique can be an alternative approach in helping students take the DS test. In this study, the feasibility and effectiveness of this approach on the performance of the DS test have been verified. Therefore, English teachers in Taiwan can try training their students with this approach to enhance students' performance on the DS test and to reinforce effective reading strategies and the awareness of text structure and cohesive devices.

In addition, since almost one-third of the participants in this study claimed that this training was also facilitative to their writing, English teachers can consider incorporating this approach in the writing class. Also, since the "Discourse Structure" test mode aims to test the understanding and command of text structure, it can serve as excellent teaching material to reinforce the awareness of text structure and cohesive devices.

Finally, the following are some suggestions for those who intend to implement this approach. First, it is suggested that think-aloud modeling of different texts be provided, especially for low-proficiency students, so that the manifestation of text structure and cohesive devices can be comprehensively displayed in the modeling and therefore fully captured by the students. Second, in teaching and modeling the use of cohesive devices, teachers should place more emphasis on lexical ties and references in particular, as they seem to cause greater difficulty for Taiwanese EFL learners to

perceive as having cohesion property. Finally, when the think-aloud technique is adopted, difference in problem-solving skills and learning approaches among the students should be taken into consideration to avoid potential rejection.

5.3 The limitations of this study

There are some limitations in this study. First, because of the short-term training (approximately three weeks), the long-term effectiveness of the three-in-one training on the performance of the DS test, on EFL reading in general and on overall aspects of students' metacognitive awareness could not be effectively assessed. On the other hand, the duration of the experiment could bring about doubts that the participants' progress or the change of their metacognitive awareness could also be attributed to other factors such as the instruction of regular English classes and the interactions between the researcher and the participants, especially when the two classes recruited were somewhat different in nature⁹.

Second, since the participants involved in this study were only two classes of female senior high school students, it might be bold, if not impossible, to generalize the results of the study to all the EFL learners in senior high school in Taiwan.

Third, two classes participated in this study, but due to some practical restrictions, only the think-aloud protocols of four participants from the Gifted class were recorded and analyzed.

Fourth, it is impossible to compare results of this study with those of studies of a similar nature because only four participants' think-aloud protocols were recorded and investigated, and because the categories and subtypes of cohesion contained in the articles for pretests, posttests and think-aloud practice were not exhaustive. As a result,

⁹ As mentioned in Chapter Three, the two classes recruited for the present study were different in several aspects. First of all, one class was a second-year Mathematically-Gifted Class, while the other was a normal third-year class. Besides, though both taught by the researcher, the former had received instruction from the researcher since the first year, while the latter only since one month before this study was conducted.

the findings derived from the present study are tentative.

5.4 Suggestions for future studies

Based on the research findings in this study, some suggestions for future studies are given as follows. First, it is recommended that future studies consider adding a control group in the study design. Since the improved performance on the DS test and change of metacognitive awareness observed in this study could also result from the classroom instruction during the duration of the experiment, it would be hard to determine the exact effect of the treatment. Therefore, it is suggested that future studies include a control group of a similar nature as a base line for the comparison with the variation of the experimental group.

Second, future studies of a similar nature are reminded that articles adopted for testing and training contain as many categories and subtypes of cohesion as possible, so that more comprehensive information can be obtained. In addition, since the participants in this study reported that the training improved their writing quality, it is recommended that future studies explore the effect of similar training on EFL writing.

Third, future studies can consider adopting both individual think-aloud and pair think-aloud as tools to compare their effects now that the participants in this study exhibited interest in it.

Finally, future studies can consider exploring the individual effect of instruction, think-aloud modeling and the think-aloud technique by including three experimental groups.