CHAPTER V

DISCUSSION

The present study examined the effects of the Interactive Whiteboard presentation on the writings of EFL students, their attitudes towards writing, and their attitudes towards utilizing the IWB in pre-writing instruction. Verifying the efficiency of the IWB in foreign language classrooms could be highly significant from instructional as well as administrative prospects. At the instructional level, teachers will be triggered to integrate the IWB in their instruction. Moreover, they will feel the urge to undergo professional training so that they can attain optimal use of the IWB in their classes. At the administrative level, administrators will be enthusiastic to provide the required facilities and professional training to their teachers. This study might be valuable for policy makers and stakeholders who will perceive the installation of the IWB into classrooms as an essential need so that they can facilitate the work modifications requested by the teachers in private or public schools and allocate necessary funds. These following research questions were addressed and analyzed in the current study:

1. Does the use of Interactive Whiteboard in pre-writing instruction improve the development of ideas in the writings of EFL students?
2. Does the use of Interactive Whiteboard in pre-writing instruction lead EFL students to use topic-related vocabulary words properly?

3. Does the use of Interactive Whiteboard in pre-writing instruction boost the attitudes of EFL students towards writing?

This chapter includes a summary of the study procedures, discussion of the findings, implications and limitations.

A. Summary of the Study Procedures

The current research study investigated the written performance and attitudes of 134 participants from six classes in one of the English language school (EF Kediri) in Kediri. The participants were divided into three control classes comprising 69 participants and three experimental classes involving 65 participants. Control classes received regular prewriting instruction, while experimental classes received IWB prewriting instruction. The quantitative data comprised six essay writings, and three 5-Lickert scale questionnaires that studied the participants‘ views of their performance and their attitudes towards writing and the use of IWB in prewriting instruction.

A series of independent t-tests and paired t-tests were used to determine whether the independent variables, IWB prewriting instruction, has significant effects on the dependent variables, idea development and proper use of topic-related vocabulary in participants‘ essay writings. Descriptive statistics of the 5 Lickert scale questionnaires was carried out to inspect the participants‘ performance, attitudes towards writing and attitudes towards the use of IWB in prewriting instruction to validate the quantitative findings.

Before carrying out the research study, official permission was taken from the Director of Study of English First Kediri and the Manager of English First Kediri. It‘s worth mentioning that intermittent meetings with the teachers of the control and experimental classes were held to discuss the materials and procedures of implementing the regular as well as the IWB prewriting instruction before and during the execution of the research study.

B. Discussion of the Research Findings

1. Hypothesis 1

The first hypothesis, The use of the Interactive Whiteboard in pre-writing activities improves EFL students‘ development of ideas in writing was retained. Data analysis of essay scores indicated that the participants who received IWB prewriting instruction outperformed those who received regular instruction. Participants in the experimental group were able to develop their ideas in essay writing much better than those in the control group. Likewise, descriptive statistics of the performance questionnaire showed the efficacy of the IWB prewriting instruction on the participants‘ performance in essay writing as viewed by the participants themselves.

The present findings concur with findings of several preceding research studies. Marzano (2009) validated the usefulness of the IWB in elementary and secondary language, mathematics, and science classes by carrying out a large-scale project that involved fifty schools in USA. Higgins et al (2005) examined the impact of IWB on the achievement of 5th and 6th graders in various areas and found improvement in

students‘ achievement especially in the area of language, and mainly in writing. Likewise, Lopez reached the conclusion that the IWB could improve students‘ performance in English Language Learning settings.

Kennewell (2006), in his turn, verified the efficacy of IWB instruction on students‘ ability to comprehend complex concepts. The IWB instruction addresses a number of senses, sight, hearing, and even touching, when students work on the board. This improves the performance of students who can‘t conceive abstract concepts. This study, also, corroborates with the study of Lee and Boyle (2004) who found out that IWB instruction enabled students to get higher scores on national tests in Australia. Likewise, Swan et al. (2008) reported significant gains in fourth and fifth graders‘ scores on state achievement tests in reading and math subjects.

Similarly, Lewin, Somekh, & Stephen (2008) revealed that IWB instruction improved students‘ achievements in language and math in national tests. Thompson & Flecknoe (2003), also, reported significant progress in students‘ achievement in math resulting from IWB instruction. Along the same line, Kaya, Akçakın, and Bulut (2013) revealed a substantial effect of IWB on students‘ achievement in transformational geometry, and Zittle (2004) noted the positive influence of lessons with the IWB on elementary school students‘ achievements in geometry. Dhindsa and Emran‘s experimental study (2006) revealed significant performance in chemistry of college students taught via IWB. Amola‘s study (2007), also, showed the positive contributions of the IWB to students‘ achievement in Social Sciences. BECTA (2007) determined a

relative relation between students‘ achievement and the amount of time of students‘ exposure to IWB instruction.

Smith et al. (2006) hinted at the social dimension to learning via IWB which yields better learning and achievement. Indeed, IWB enhances learners‘ motivation, attention, emotions, self-concept, self-esteem, and social interaction in the learning environment where students exchange knowledge overtly and learn by making mistakes together. This is supported by the current research study as well as previous literature ((Kennewell & Beauchamp, 2007; Schmid, 2008; Smith et al., 2005; Armstrong et al., 2005). Levy‘s (2002) research proved that IWB-based lessons alleviate students‘ learning, for they make students more interested, engaging, and cooperative. The interactive nature of the IWB leads students to be more attentive and, consequently, able to understand better. If students interact with the board themselves, they can end up being autonomous learners and acquire higher order thinking skills (Walker, 2003). In the same vein, Glover et al. (2007) verified that the use of IWB in the K-12 classes increased students‘ interest and promoted higher levels of continual concentration due to the multimedia aspects of the IWB.

Several studies (Lamberth, 2012; Akbaş & Pektas, 2011; Chen, 2009; Smith et al., 2005) yielded no significant gains in students‘ achievement. This can be attributed to a failure in achieving a balance between interactivity and teacher-centered instruction (Glover & Miller, 2001). Another reason can be the fact that many teachers abandon some distinctive and interactive IWB when devising IWB lessons. This is due

to their ignorance of them, lack of training on how to use them and implement them in instruction, and\or the fact they using such features in IWB flipcharts requires time (Miller, 2006). This means that a skillful teacher is the one who specifies when and how to use the IWB in instruction, for IWBs as mere technological devices do not in essence lead to significant gains in learning. In the present study, the IWB lessons were devised in a professional way by the researcher and an IWB trainer who is a teacher of English language for more than ten years and an expert in IWB use. Moreover, teachers of the experimental classes were fully aware of the capabilities of the IWB. This really contributed in making proper use of the IWB capacities, and consequently, in the success of the IWB treatment. It is clear now that IWB has the ability to make a promising effect on learning and teaching at all educational levels if it is used in specific subject matter and context.

Briefly, the findings of the current study verified the effectiveness of IWB prewriting instruction in having the EFL learners at English First Kediri develop their ideas better in essay writing.

2. Hypothesis 2

The second hypothesis, the use of the Interactive Whiteboard in pre-writing instruction leads EFL students to use topic-related vocabulary words properly was retained. Data analysis of essay scores revealed that the participants who learned vocabulary words through IWB prewriting instruction achieved better scores in writing

than those who learned vocabulary words through regular pre-writing instruction. Such results were also evident in descriptive statistics of the performance questionnaire.

The findings of this study concur with what Chen (2009) noted about the value of IWB in facilitating acquisition of words due to its interactive nature. Schmid (2008) and Kennewell and Beauchamp (2007) hinted at the efficiency of IWB original activities which allow students to learn together on the board such as matching words to their analogous pictures in collaboration with their peers while being oriented by their teacher. In Martin‘s study (2007), most students credited the use of pictures and the sound in IWB flipcharts and pointed out how they made them understand better. Students can refer to electronic dictionaries and encyclopedias anytime they encounter a new word, and they can comprehend it in diverse contexts through sample sentences offered online. More importantly, students become able to conceive abstract terminologies through audio and visual materials displayed via IWB.

Kaya, Akçakın, and Bulut (2013) considered that the interactive features of the IWB and its potential in addressing students of diverse learning styles allow students to recall information better and faster. When students interact with the board themselves, they become more motivated and attentive. Glover et al. (2007) affirmed that the multimedia facets of the IWB resulted in higher levels of attentiveness and concentration, and hence, better learning outcomes. Participants of this study who received IWB prewriting instruction practiced a variety of vocabulary activities

devised to match diverse learning styles and to use the targeted vocabulary words contextually.

In a word, IWB prewriting instruction allowed the EFL learners at English First Kediri to use topic-related vocabulary words in their essay writings properly.

3. Hypothesis 3

The third hypothesis, the use of Interactive Whiteboard in pre-writing instruction boosts the attitudes of EFL secondary students towards writing was retained. Findings proved that participants who received prewriting instruction via IWB showed positive attitudes towards writing in contrast to their peers who received regular pre-writing instruction. This was illustrated by the results of the pre-post questionnaire on students‘ attitude towards writing.

Findings of this research study are in tune with previous literature. Albaaly (2010) verified that the use of IWB in a writing class had a significant role in alleviating Egyptian ESL students‘ attitudes towards writing. Several studies have revealed learning via IWB provoked students to be more attentive and engaged in learning, active participants in the class, and more interactive with their teachers, peers, and the IWB (Smith et al., 2005). The findings of various studies showed that the use of IWB made students more motivated, focused, and disciplined because they found it enjoyable and original (Levy, 2002). Moreover, when students become motivated, they like to continue on-task. Bryant and Hunton (2000) reached the conclusion that the interactive nature of the IWB induced them to be more engaged and positive towards

the learning environment. Motivation, attention, and behavior represent an overall student attitude in the classroom. Hence, the higher the level of motivation, attention, engagement, and interaction is, the better the attitude towards learning is. This concurs with what the participants in this research study expressed in the questionnaire of student attitude towards writing and with the remarks of the interviewed teachers. Along the same line, prior studies supported the fact that students‘ interaction with IWB affects the influence of the IWB on students‘ attitudes. If students interact with the board themselves, they will be familiarized with what they are learning, and consequently, will have favorable attitudes towards it.

Glover et al. (2007) reported that IWB use in the K-12 classes augmented student interest. Lewin et al. (2008) highlighted the function of the IWB as an intermediary of interactions among the students themselves, between the students and the IWB and the teacher and student. The researchers found out that students were more motivated to demonstrate their knowledge of the content displayed via the IWB.

As the analysis of quantitative data indicated, another important factor behind students‘ favorable attitudes towards writing is the ability of diverse functions of the IWB to address various student learning styles (Glover et al., 2007; Slay, Siebörger, & Hodgkinson-Williams, 2008). Indeed, Some students may encounter complications with a particular method of learning; thus, including a range of multimedia approaches in a lesson can attend to the needs of learners with varied learning modes (Somekh et al., 2007). In the same vein, Beeland (2002) appreciated such IWB potentiality and hinted at its ability to engage students in learning as well.

To sum up, the EFL learners at English First Kediri showed favorable attitudes towards writing when the IWB was used in prewriting instruction.

C. Implications

Findings of the present research study indicated the usefulness of the IWB in enhancing students‘ development of ideas and proper use of vocabulary words in essay writing. They, also, reported positive attitudes of students towards the use of IWB in prewriting instruction and towards writing when the IWB was used in the writing class. Based on the aforementioned findings, the following implied issues are to be taken into account:

1. IWB prewriting instruction improved students‘ writing skills. Therefore, teachers are invited to integrate IWB in prewriting instruction to reach similar result.
2. It is worth to mention that prewriting instruction carried out in this study was devised in light of the CALL approach and the constructivist paradigm to EFL learning in addition to the process model of writing and students‘ modes of learning. Thus, in order to attain gains in students‘ achievements in a writing class, teachers should take into consideration the above mentioned issues when preparing IWB prewriting instruction.
3. It was noted from reviewed literature that several research studies did not yield successful learning outcomes due to teachers‘ lack of training on professional use of IWB in the class, their inability to devise IWB lessons well, and/or its lack of experience in establishing learner-centered

environment. This propelled the researcher to select teachers who made a series of workshops on the proficient use of technology (IWB) in language classes and who are well known as EFL teachers with a minimum of ten years of teaching experience. Moreover, the researcher herself prepared IWB lessons with the assistance of an IWB trainer to guarantee the quality of the instruction. Furthermore, the researcher held intermittent meetings with the teachers in order to agree upon how to implement IWB prewriting instruction avoiding the aforesaid shortcomings. Accordingly, teachers should receive adequate training on how to prepare IWB lessons and how to use IWB efficiently before implementing IWB prewriting instruction in their writing classes.

4. Findings of this study revealed that students, even the low achievers and the passive ones, adopted positive attitudes towards writing and towards the use of IWB in prewriting instruction due to the interactive activities and to the fact that students were given space to work collaboratively with their classmates on the IWB and to actively participated in discussions on what was displayed via IWB. Hence, teachers are requested to use IWB prewriting instruction with their students, especially passive learners and those who show high apprehension towards writing. However, teachers should make proper use of the potentials of IWB and provide ample opportunities for all types of students to participate in learning when implementing IWB prewriting instruction.

5. One of the factors behind the success of the IWB prewriting instruction in this study is the aspect of novelty. The recent installation of IWB in Indonesia private schools and the integration of technology in them might have yielded in significant contributions to students‘ high levels of interest and engagement and their favorable attitudes. Thus, teachers are requested to involve students in innovative activities and tasks to prevent students from feeling bored when they got used to using technology in their classrooms.