CHAPTER I

INTRODUCTION

In this introductory chapter, the background to the present study and the current issue in teaching English as a foreign language (TEFL) in Indonesia will be provided along with the report of related studies. This chapter will also set out the objectives of the study guided by the associated research questions that the thesis attempts to answer. The justification of practical and theoretical contribution of the study will be described along with a brief overview of the research methodology and clarification of some key terms used in this study. Finally, an outline of the structure of the paper is also included in this chapter to provide a brief summary of the content of this thesis.

1.1 Background of the Study

This study is concerned with investigating a teacher's implementation of scientific method to teach English as a Foreign Language (EFL) classroom at senior high school level as it is required by the 2013 English curriculum.

The term "scientific method" has come along in the development of English language teaching for junior high school, senior high school, and vocational high school since the introduction of the 2013 curriculum as the new "umbrella" of schooling system in Indonesia. Scientific method in learning is considered the procedure of acquiring learning outcomes which values much on the process of learning and student-centeredness so that it can facilitate and develop students' cognitive, affective, and psychomotor capability. As the new curriculum has been initiated, the use of scientific method becomes prominent with regards to the decree of Minister of Education and Culture No. 69/2013 that requires the integration of scientific method into all subjects including English language teaching. Consequently, English teachers currently are required to conduct successful instruction through scientific method in order to help students gain their target language mastery.

Originally, scientific method is a familiar term used in the field of Science. There are many literatures that give description about the nature of scientific method. Scientific method is defined as a logical orderly approach that involves gathering data, formulating and testing hypothesis, and proposing theories (Wicander & Monroe, 2006). Scientific method is also the process of asking questions and making experiments to find the answers (McMurry & Fay, 2008). From a psychology textbook, "scientific method refers to a set of assumptions, attitudes, and procedures that guide researchers in creating questions to investigate, in generating evidence, and making conclusions" (Hockenburry & Hockenburry, 2000). In short, scientific method is regarded as a body of techniques consisted of several procedures intended to investigate phenomena, acquiring new knowledge, or correcting and integrating previous knowledge.

Scientific method has been long used in the field of teaching Science (See Rusbutlt, 1997; Godfrey-Smith, 2003; Wieman, 2006) but it has never been used in the teaching of second or foreign language. Thus, many practitioners and experts in English language teaching skeptically responded the curriculum maker's decision in integrating scientific method in language teaching (Chodijah, 2013 cited in Prathivi, 2013; Natahdibrata, 2013, Richards, 2014). The most critiques have been delivered in the forum of Teaching English as a Foreign Language in Indonesia (TEFLIN) International Conference held in Solo at October $7^{th} - 9^{th}$, 2014. In the panel discussion, Richards (2014) stated that there is no literature that supports the use of scientific method in language teaching. Thus, he questioned the practicality and the effectiveness of scientific method to serve the nature and the purpose of language learning and teaching. The teachers also considered it difficult in applying scientific method to the language classroom because they are not familiar with scientific method and they argue that some of them did not get enough training and professional development (Mulyasa, 2013). Consequently, this condition has led classroom teachers to own different beliefs and perceptions regarding the implementation of scientific method in classroom practice.

Further, there has been an effort to make scientific method integrated in EFL classroom practice in Indonesian context. Referring to the idea stated by Priyana, (2014), Syahmadi (2013), and Sudrajat (2013), the model of scientific steps in classroom can be arranged into the following order: (1) observing is the

phase when the students observe the model of text; (2) questioning is when the students are able to find something they need to answer (e.g., what is the feature of the text? for what purpose? and how is it constructed?) based on their observation; (3) experimenting is the phase when they are trying to seek the answer through guiding tasks (e.g., interviewing someone, watching video, discuss the topic by referring to the book, etc.); (4) associating is when the students begin to draw conclusions to answer questions by classifying, identifying, and comparing the information they get; and (5) communicating is the stage where students are presenting the knowledge they have constructed to the class in oral or written communication.

Concerning scientific-based learning activities that require the students to do comprehending the given information, expressing and activities such as deliberating some questions, collecting and noting piece of information and presenting their ideas to the peers, the researcher views that the model of teaching through scientific method shares similar characteristic to cognitive approach to language teaching which integrates stimulating tasks to be dealt by students in learning the target language (See: Skehan, 1998; Nunan, 2004), problem-based learning (Larson, 2001; Tan, 2003), project-based learning (Kotti, 2008; Nunan, 2004) and inquiry learning (Alfiery et al., 2010; Balim, 2009) in which apparently, those models have been long used as alternatives of English language teaching practice in other countries (See Larsson, 2001; Fragoulis, 2009; Masrom and Yusof, 2013). Similarly, the integrated language learning has also been the feature of many alternative language instructions which have been already known in the literature of TEFL and TESL such as content-based instruction, themebased instruction, and task-based teaching (See Krahnke, 1987; Brown, 2001).

As the introduction of 2013 curriculum has just been initiated recently, the transition of the approach to teaching and learning process required by the curriculum becomes a considerable challenge for language teachers as far as it is concerned with the level of classroom practice because they have to learn new method required by the curriculum. The problem seems to be worse since there are some evidence that indicate some teachers were not capable in composing material and lesson plan for teaching. Study conducted by Suhendra & Sundayana

(2011) revealed that teachers' knowledge in developing syllabus was not satisfying. Further, Sundayana et. al, (2012) found out that teacher's conceptual understanding of designing, developing, and applying syllabus and lesson plan did not reach the expectation. During the first year of the implementation of the 2013 Curriculum, it was noticed that some teachers faced difficult time in administering the instruction based on scientific method so that they were not likely to teach English effectively in the classroom (See Kompas: *Suasana Kelas Belum Sesuai Harapan*, 2014). Instead, they showed some resistance and keep teaching by using the technique they are already comfortable with.

Moreover, from the observation carried out in a junior high school and senior High School in Bandar Lampung prior to the present study, the researcher noticed that scientific method could not be used to teach certain language expressions such as giving suggestion and offer, giving and asking for opinion, and making a wish. Instead, the scientific method was generally used to teach type of texts such as narrative, recount, report, procedure, and description. When the teacher used the scientific method in the classroom practice, several points of weakness had been noted by the researcher. In the main activity, sometimes the teacher did not give enough time for the observing and questioning stage. Instead, the teacher took much time in the experimenting as it was noticed that the group discussion required more time than other stages. As the task cannot be accomplished by the students in the same time, the teacher sometime missed the communicating stage. Consequently, the students did not get enough time for communicating with peers and it might disrupt the attainment of the learning objectives.

Concurrently, several studies confirmed that English teachers have different perceptions towards the implementation of the 2013 curriculum in classroom practice. According to Jasmi (2014), teachers were likely to be unconfident in implementing the 2013 curriculum due to inadequate training. Therefore, it is hard for them even to design the lesson plan before teaching. In addition, Budianto (2014) stated that English teachers have enough conceptual understanding regarding the new curriculum but they were not likely to perform effectively in the level of implementation due to ineffective time management in carrying out

the instruction. It is also added by Shofiya (2014) that some teachers had some trouble with doing assessment along with the application of "scientific steps" in the classroom.

Even though the research mentioned above have explored the teacher's perception and problem regarding the implementation of 2013 English curriculum, little has been known regarding to what extent teachers are able to apply scientific method in classroom practice, particularly in senior high school level as it is required by the 2013 curriculum. Also, there is no further exploration of how the teachers interpret scientific method in relation to their teaching practice. Therefore, there is a need for further study documenting the implementation of discovery skill or scientific-based learning in EFL classroom practice. It is believed that a case study in a school implementing the 2013 curriculum served the purpose of this study since the teaching English as a foreign language is very specific in terms of context and situation.

1.2 Purpose of the Study

This study portrayed the implementation of scientific method in EFL classroom practice, particularly in senior high school which is piloting the 2013 curriculum and using it until now. More specifically, this study attempted to discover how the process of teaching in terms of observing, questioning, experimenting, and associating was carried out in order to find out to what extent the teacher was able to interpret and to implement scientific method as it is required by the 2013 curriculum. At last, this study attempts to reveal students' perception towards scientific method activity in the classroom because it may reveal the potential benefit of scientific method for students.

1.3 Research Questions

In relation to the purposes of the study concerned with the teacher's effort in

implementing scientific method in classroom practice, three research questions are

formulated in order to guide the inquiry process. They are presented as follows.

1. How does the English teacher implement scientific method to EFL

classroom practice?

2. How does the teacher interpret scientific method?

3. How do the students perceive scientific method activity in EFL

classroom?

1.4 Research Methodology

In order to answer the research questions presented initially, case study was

carried out in a senior high school which is piloting 2013 English curriculum. The

participants involved in this study was English teacher who is trying to teach

English through scientific method-based learning in EFL classroom, particularly

grade 11 who have been taught under the 2013 curriculum. Questionnaire was

also distributed to the students in order to reveal how they perceive scientific

method activity during English lesson. The procedure of collecting the data

followed the principles of qualitative study which seeks to understand this

contextual case in a natural setting.

Significance of the Study 1.5

Since the implementation of the 2013 curriculum has just been initiated

recently, the report of the present study that concerns the implementation of the

2103 curriculum may contribute significant information to English teachers who

are trying to conduct their classroom practice through scientific method. In

addition, the finding of the study may also contribute to the literature of English

teaching methodology in Indonesia. It may also give new perspective to

practitioners who are involved in TEFL and TESOL in Indonesia regarding the

use of scientific method in the EFL or ESL classroom practice. Finally, the

present study may open new window to researchers who share similar interest and

Achmad Yudi Wahyudin, 2015

those who concern the benefit and challenge of scientific method in the context of EFL classroom practice in Indonesia.

1.6 Clarification of Key Terms

In relation to the report of this thesis, there are several key terms necessary to clarify in order to provide clear understanding. Those key terms include the 2013 Curriculum, scientific method, pilot school of 2013 Curriculum, and EFL

classroom practice.

The first term is related to the 2013 Curriculum. The 2013 Curriculum refers to the curriculum initiated in 2013 by the decree of the Minister of Education and Culture No. 67, No. 68, No. 69 /2013 under the signature of Minister of Education and Culture in the era of President Susilo Bambang Yudhoyono. By the time this thesis is being written, there is a transition of the government as Joko Widodo has been elected as the new president of Indonesia. The current Minister of Primary and Secondary Education takes over the control and the implementation of the

2013 Curriculum for elementary school until senior high school.

The second term is concerned with scientific method. Scientific method in this study refers to *pendekatan saintifik* or *scientific approach* stated in the document of the decree of Minister of Education and Culture No. 69/2013. The researcher uses the term scientific method rather than scientific approach because the term approach does not truly represent the procedure of teaching stated in the document of the 2013 Curriculum. In the field of language teaching, the term method is considered suitable for procedural level and approach is in theoretical level (See Anthony, 1963; Richards & Renandya, 2002; Celce-Murcia, 2001). Therefore scientific method serves *pendekatan saintifik* that has been stated in the 2013 Curriculum.

The third term deals with pilot school of the 2013 curriculum. In this case, before the initiation of the 2013 Curriculum for all schools, the government had decided several schools for every province in Indonesia to be the schools that pilot the 2013 Curriculum in 2013. Due to sufficient number of facility and professional teaching staff, and also the readiness of each stake holder associated

Achmad Yudi Wahyudin, 2015
THE IMPLEMENTATION OF SCIENTIFIC METHOD IN TEACHING ENGLISH AS A FOREIGN LANGUAGE AT SENIOR HIGH SCHOOL LEVEL
Universitas Pendidikan Indonesia | repository.upi.edu | perpustakaan.upi.edu

with the school community in implementing the 2013 curriculum, these schools become a model of the implementation of the 2013 Curriculum up until now.

The last term is associated with EFL classroom practice. This term refers to the practice of teaching English where it is considered a foreign language. It means that this language has not yet become official language and its use is limited to particular condition and circumstance. This classroom practice can be seen in the secondary and tertiary education in Indonesia since English has become a compulsory subject at those levels.

1.7 Outline of the Thesis

In order to facilitate the ease of reading, this thesis is outlined into five chapters: (1) Chapter 1 which provides the background and purpose of the study, formulated research questions, brief review of research methodology, and significance of the study; (2) Chapter 2 that concerns the overview of related concepts and literature of previous studies; (3) Chapter 3 which focuses on research methodology including the site and participant, data collecting technique and procedure, instrument and data analysis; (4) Chapter 4 that is composed to provide findings and discussion in the present study; and (5) Chapter 5 that is concerned with the conclusions as well as the limitation of the study and the recommendation for further study.