CHAPTER I
INTRODUCTION

This chapter provides a general overview of the study conducted which comprises background of the study, statement of problems, aims of the study, scope of study, significance of study, and clarification of key terms. In the end organization of paper is also highlighted to accommodate readers with a systematical view of the whole content of this study.

1.1. Background of Study

Information and communication technology (ICT) plays essential role in almost all aspects of life (Clark & Mayer, 2011; Moonen, 1995; Swan, Lin, & van't Hooft, 2008), so does the ways educational progression and enhancement acquired (Hernes, 2002). The dependence on information and communication technology is increasingly pervasive in the teaching-learning process today and in the future (Guo, 2006; ITEA, 2007, Player-Koro, 2012). Existing teaching-learning approaches and methods fostering ICT are largely designed to fulfill the gap of the demands of living standards with the current globalization (Lin, 2002).

When looking at the current widespread diffusion and utilization of ICT in modern societies especially by the young, coupled with the demands from the educational policy maker, then it should be clear that, as educators, teachers and lecturers have responsibility to raise educational standards with innovative approaches of management, teaching, and instruction through ICT utilization (Cornu, 1995; Cox et al., 2003; Dexter, 2003; Engida, 2011; UNESCO, 2004). Accordingly the acquisition of ICT-literacy as a part of professionalism is an important element for the teachers to attain the prevailing standards of education (Sajidan, 2011).

However, there are many factors following teachers to overcome with ICT, those include the resistance of the educator as a result of lack of time, motivation, supports, and reward (as a result of unconcerned educational
institution towards them), coupled with insufficient ICT skill and literacy (Punie, Zinnbauer, & Cabrera, 2008). Meanwhile the students who incidentally belong to the digital generation are learning and living by using technologies intuitively; they are advanced in harnessing ICT more than the former generation which are their parents and in many cases their teachers. Today’s children are introduced as digital native, referring to they who grow up using technology and feel confident and comfortable with it. On the contrary, the former generation is told to be digital immigrants who considered late comers in the world of information and communication technology (Dudeney & Hockly, 2007). As far as it is concerned, what matters is that the effective learning through an integrated use of ICT often comes up not because of the role of the teacher (Loveless, Devoogd, & Bohlin, 2001; Richards, 2005).

The gap arisen lies on how an educator functions in an active environment which demands problem solving skills and critical thinking. A demand from current digital environment when the students are more advanced in technology and could easily absorb almost every single aspect of life without much regard for educator who are expected to improve students’ learning with the new technologies brings an urge for educator to be ready with ICT literacy. What matter is that the educator undertakes to understand the emerging cultures brought up by the students, to narrow the digital generation gap and to change their way of teaching to meet the learning needs of new generation (Guo, 2006: p. 63).

Further, some studies relevant to teachers dealing with ICT in educational context are popularly conducted. Most of them mainly focused to figure out the impact of information and communication technology on the teacher (Smeets et al., 1999). The results show that despite the progress of the innovative uses of ICT by the teachers made, much remains to be done since it does not show all characteristics of innovate, student-centered learning environment. Though ICT provide potential opportunities for learning more widely and equitably across the teaching force and also improve the quality and variety of available resources and support which opened up new avenues to professional development (Robinson, 2008), the use of ICT by some university teachers as ‘weapons against ignorance’
was hindered because of the lecturers’ limitation and socio-cultural influences (Zare-ee, 2011).

More importantly, in Indonesian context, the research on the teachers addressing the pedagogical-transforming ICT is still rare. Under the context of teacher proportion, it is therefore considered importance to examine the ICT-awareness of the educator. What the researcher in this study has been engaging in comes to be one of the attempts at describing the ICT-literacy of lecturers. This study tried to explore the pattern of being ICT-literate in lecturers’ perspective; their attitudes toward ICT, and the way they infuse ICT into pedagogical practice. The research focuses on the attainment of lecturers’ harnessing of ICT as educational tools, lecturers’ consciousness of ICT literacy, and how the lecturers imply the ICT-literacy in their professional practice.

1.2. Research Questions

In order to reach the purpose of the study, it is an obligation for the researcher to give a rise to the problems to be investigated. Hence, the problems of the research are formulated as follows.

1. What are the perspectives of lecturers toward ICT literacy in the relation to ICT integration into pedagogical practices?
2. What are language lecturers’ attitudes towards ICT for professional purpose?

The first question addresses the viewpoints coming from lecturers over the ICT literacy and integration in language teaching and also identifies their current ICT integration. It is designed to understand the lecturers’ current use of ICT before the focus was shifted to conception of the importance of ICT literacy. The second question first examines the lecturers’ attitudes toward ICT, and simultaneously investigates the factors that lay upon them (the attitudes).

The purpose of such examination was to contribute the knowledge about the way technology is implemented in pedagogical instructions, and therefore to formulate a vision for the role of ICT literacy among lecturers.
1.3. Aims of Study

The literacy of information and communication technology (ICT) among lecturers is a topical and important issue. There is a need for a systematic study in this field to describe the digital literacy required by educators as one of the indicators of professional competence.

The purpose of this study is to investigate the ICT awareness and ICT literacy among lecturers at a state university in Bandung, Indonesia. The rationale for conducting this research lies in the following. First, the shift from traditional practice to the incorporation of newer technological practices in education is underway especially in higher or tertiary level. Second, a systemic study of the characteristics of ICT integration by lecturers will help policy makers effectively design curriculum and instruction. Third, making analysis on lecturers’ skills and attitudes pertaining to ICT literacy will provide better understanding of the pedagogical usefulness of technology.

This overall study aims to gather an in-depth understanding of lecturers’ perspectives and attitudes toward ICT that influence their integrated use and the reason that governs the ICT literacy. It aims particularly to encourage debate on the challenge related to being ICT-literate in lecturers’ perspective, and at the same time raise the awareness and recognition of how lecturers embed the ICT-literacy in their teaching performance.

1.4. Scope of Study

The term ‘ICT literacy’ covers a broad range of defining, accessing, managing, integrating, evaluating, creating, and communicating, that is involving the ability of harnessing some information ethically and legally through digital technology in order to function in a knowledge society (Egan, 2006).

Being ICT-literate is likely to be complex and variable, depending on social environment, educational background, gender, age, and other factors. The pattern of ICT-literate on lecturers’ perspective can be approached in different ways. In this study, a broad view of ICT-literacy of lecturers was taken. It is
therefore of how the lecturers address ICT in terms of access and harness educational practice, and the attitudes drawn within the integration that lead to the conception of ICT literacy of lecturers.

1.5. Significance of Study

The positive exposure for academicians towards the current understanding of the conception of ICT literacy and lecturers’ attitudes to ICT is what the researcher expected from the study. For theoretical benefits, this study hopefully is expected to enrich the literature and methods of enhancing the educators’ literacy of ICT in Indonesian context.

In terms of practical benefits, the result of the study provides some information for teachers and other educators through the language teacher educators’ perspective on disseminating ICT-literacy in language teaching context. Willis and Mehlinger (1996) as cited in Balsanti (2006) correlate the current technology and teacher education as the situation where most pre-service teachers hardly know how to make use the ICT effectively and it is believed that there is pressing need to enhance fundamentally the amount and quality of teachers’ instructional acceptance of technology.

Professionally, the result of the study is expected to help academicians enhance the professional competence through the literacy of ICT. This study hopefully can provide some exposure to a better paradigmatic on how to guide students from digital generation through ICT-literacy in order to establish knowledge society.

1.6. Clarification of Key Terms

Some key terms used in the study was being clarified in order to have the same perception among the researcher and the readers. The terms are ICT, ICT-literacy, ICT integration, and lecturer.

ICT stands for information and communication technology. ICT has been adopted in schools and colleges in place of ‘IT’ to signify that, in education,
technology is not merely to process information but also communication (Rank, 2011).

ETS (2004) and its framework, International Information and Communication Technologies Literacy Panel (IICTLP, 2002, 2007), define ICT literacy as “the use of digital technology, communication tools, and/or networks to access, manage, integrate, evaluate, and create information in order to function in a knowledge society”.

The term ICT integration is adopted from William's (2003) as cited in Andoh (2012) which refers to the use of ICT tools and devices to assist teaching and learning.

Under Indonesia Government Regulation No. 37 year 2009, lecturers refer to professional educators and scientists with the main task of transforming, developing, and disseminating knowledge, technology, and arts through education, research, and community service. In this study, the terms teacher and lecturer may be switched interchangeably.

1.7. Organization of Paper

Following the introductory chapter is information of the background of the research, the research questions, the aims of the research, the scope of the research, the significance of the research, and the organization of paper.

Chapter II provides a review of theories that frame the research. The theoretical review briefly includes the basis theory of ICT literacy, the approaches of the integration of ICT in pedagogical practice, the characteristics behind lecturers’ attitude toward ICT and the issues following, and some review from related studies.

The elaboration of methodology of the research fulfills Chapter III, and in Chapter IV it is findings and discussion. The analysis of the data taken from the field is elaborated in chapter four. The sequence of discussions of each part in chapter four is based on the research questions. The explanation in chapter four may be overlapping, the elaborated data in one part may be repeated in another
parts. A plausible explanation for this is that the answers to the research questions are interrelated to one another.

The last chapter, Chapter V, discusses the theoretical and practical implication of the findings on the teaching learning activities. The chapter ends with recommendation and suggestion for further research.

To a large extent, the proposed introduction described earlier then allows us to generate a basic conception to what the researcher attempts to explore through this study. Such a study will inform policy-makers, educational institutions, and lecturers about how ICT is seen from an educator’s point of view with an eye to take up the opportunities to evolve with ICT and address the limitations of ICT integration, especially within their broader professional contexts.