The purpose of this study is to explore the goal and the component of Smart learning, analyze the interaction in Smart English education and suggest a Smart learning model based on the results of the analysis. Even though the evolution of Smart learning is expected to improve the English education environment, discussions on Smart learning have just become active in Korea, and the related studies are insufficient. Therefore, it is necessary to analyze Smart learning and interaction in Smart English education. In order to extract implications in implementing Smart learning, an analysis on previous studies about Smart learning was conducted to find the target and components of Smart learning. Also, interactions occurring in Smart learning were analyzed to apply the interactions to Smart English education. These results were applied to a Smart English learning model. The major research findings are as follows: First, thanks to the development of web technology, the individual learning appearing in the learner-content interaction led to the cooperative learning in which learners and teachers interact. Second, Smart learning includes the 21st century skills as a goal, five components as a feature, and activities for interaction with web 2.0 tools.

I. INTRODUCTION

For some time, IT has been regarded as a solution to improving the quality of education. In this sense, the use of advanced technologies in the educational field has increased significantly
and promoted the paradigm shift in education environment during the last decade. Many countries expect that IT can enhance the quality of education and can expand the education industry. Therefore, utilization and implementation of advanced technology that composes a new learning environment is very important to the government. That is why the Korean government has chosen e-Learning as a top priority for the next few years.

ICT and its utilization in the English education field has changed drastically and rapidly. For example, there has been a big paradigm shift from e-Learning to m-Learning which has increased interaction between learners, teachers, and content with flexibility of place, cost of device, ease of use and timely application (Brown & Green, 2001; Katz & Aakhus, 2002). Development of ICT has caused changes in the English education environment again from an m-Learning environment to a u-Learning environment which allows students to study anytime and anywhere through diverse terminals without limitations of time, place or environment improving interaction between learners, teachers, and content (Moore & Kearsley, 1996). Recent interest in the English education field is social learning which uses smart devices and SNS service as educational instruments. In social learning, students can share knowledge through their SNS, connect with teachers by interacting with each other such as tagging and share multimedia content that they have created.

Recently in Korea, a convergence concept of u-learning and social learning, which is called Smart learning, is emerging. The Korean Ministry of Education, Science and Technology defined Smart Learning as Self-directed, Motivated, Adaptive, Resource enriched, and Technology embedded. The evolution of Smart Learning is expected to improve the English education environment. However, adopting social technologies in the education system could cause issues such as privacy and copyright of content. Studies on the effects of using such technologies in education has just begun, and the use of social networking in education is also becoming an issue, particularly in Korea. Moreover, it is rare to find research on interaction in Smart learning environment.

Considering future learners that adapt to the rapidly changing IT society naturally, it is time to re-define the English education paradigm. It seems that the current paper-based teaching has limitations in the teaching of English considering technological advancement. Smart English learning can supply integrated materials between languages with its hypertext and hypermedia functions, improving interaction that cannot be achieved through printed materials. It can teach the integration of language functions using non-simultaneity of text or voice notice boards and the simultaneity of chatting voice notice boards as a communication medium. Furthermore, smart devices like the tablet PC and smart phone can improve interaction in English learning.