Instructional Design of the Communicative Blended Learning for Chinese as a Foreign Language

Satoko Sugie
Graduate School of International Media, Communication and Tourism Studies
Hokkaido University
Sapporo, Japan
sugie@imc.hokudai.ac.jp

***Abstract*— This paper proposes research in progress regarding educational practice. The objective of this research is the construction of the communicative blended learning model suitable for CFL (Chinese as a Foreign Language) class in Japan. The problem addressed in the research is that of how to foster and keep motivation for Chinese language learning at CFL classes at a high school in Japan, and how to locate that motivation in the realities of students' own every-day lives. The major contribution of this research is to provide opportunities for increasing contact with young Chinese native speakers through the systematic language learning model utilizing Information and Communication Technology, which helps develop practical Chinese typing skills and enhances CFL learning motivation and satisfaction. In this research, novice learners took part in blended learning with face-to face grammatical practice, web-based training and bulletin board system interaction with Chinese native speakers. The qualitative analysis of students' assessment shows that Japanese learners have an improved feeling of satisfaction and feeling of effectiveness from the experiences of real on-line Chinese verbal communication with native speakers. This communicative blended learning model has highly increased the motivation for Chinese language learning in the non-Chinese speaking environment.**

Keywords-Computer Asisted Language Learning; Network Based Language Teaching; e-learning; blended learning

I. INTRODUCTION

This paper is composed of 8 parts including introduction, previous studies about Chinese language education with ICT, instructional design models, site design and contents, collaborative classwork and online interaction, data collection, data analysis and present findings, and conclusion and future work.

In Japan, the Ministry of Education, Culture, Sports, Science and Technology (MEXT) has promoted globalization and the adoption of IT (Information Technology) in high school education since the late 1990s. The "New Reform of Education Guidelines" was announced in 2009, in which measures of digitalization at high school are mentioned, as well as the recommendation of ICT (Information and Communication Technology) utilization in the classroom [1]. At the same time, with the recent rapid economic development of China, the level of interest in learning Chinese is on the rise. However, most high schools continue to bolster English education as the primary foreign language for learners, and Chinese is usually offered as a "Second Foreign Language". There are few professionals of Chinese language pedagogy at high schools in Japan, and the teaching/learning environment (monolingual environment, closed classroom, large class size, and short class hours) makes class management highly difficult. Unfortunately, Chinese education goals are often separated into two extremes: Simply grammatical competence, or just for fun. Most teachers who teach, and students who learn, Chinese, aimed at simply obtaining required grades or passing exams, eventually develop a dislike for the Chinese language.

II. PREVIOUS STUDIES ABOUT CHINESE LANGUAGE EDUCATION WITH ICT

Under the influence of the Internet's growth and development of ICT, the digitization of Chinese language education has gradually been developed. Academic associations and international conferences focused on the introduction of ICT methods in Chinese language teaching and learning have also been established, for example, the "Association for Modernization of Chinese Language Education (AMCLE)" [2] or "The International Conference and Workshops on Technology and Chinese Language Teaching (TCLT)" [3] etc. In this way, practical educational methods with ICT have developed globally and are being applied in many parts of the world.

TABLE I. NUMBER OF PAPERS ABOUT DIGITIZATION OF CHINESE LANGUAGE EDUCATION (AMCLE) [4][5][6][7]

Year	Venue	Theme	Published papers
1995	San Francisco, USA	Collections of Papers	contents unknown (NIS)
2000	Guilin, China	Modernized Educational Technologies and Chinese Teaching and Learning	
2002	Nanjing, China	E-Learning and Chinese Teaching and Learning	
2004	Beijing, China	New Technologies in Teaching and Learning Chinese	79
2006	Hongkong, China	Research and Applications of Digitized Chinese Teaching and Learning	76
2008	Daejeon, Korea	Advancements and Insights of Digitized Chinese Teaching and Learning	103
2010	Yantai, China	Digitized Teaching of Chinese as a Foreign Language (Practice and Reflection)	60

On the other hand, in Japan, in spite of the neighboring country of China, only several research papers related to the practical educational methods with ICT about CFL have appeared at the relevant conferences (see Table II). Also, they have few discussions about the practice of

communication-focused and learner-centered Chinese language education with ICT.

Thus, the practice of the communicative blended learning for Chinese language education is an unexplored field. The research about this field is significantly worthy and meaningful challenge in Japan.

TABLE II. NUMBER OF PAPERS ABOUT DIGITALIZATION OF CHINESE LANGUAGE EDUCATION IN JAPAN [8]

Year	Title of the conference	Published papers
2001 -2011	The Chinese Linguistic Society of Japan	28
	The Japan Association of Chinese Language Education	14
	Japan Society for Educational Technology (JSET)	11
	Japanese Society for Information and Systems inEducation（JSiSE）	6

III. INSTRUCTIONAL DESIGN MODELS

The objective of this research is the design of a communicative blended learning model for CFL. In this paper, the definition of blended learning is the delivery of teaching/learning through the combination of online and face-to-face interaction resulting in improved student learning. [9] It is necessary to design the lesson plan based on a systematic ID (instructional design) process. The most basic and applicative ID process consists of the following steps: (1) Analyze, (2) Design, (3) Develop, (4) Implement, (5) Evaluate (ADDIE model) [10]. Of these five steps, (1) is the most important fundamental.

Chinese language learners in Japan do not have ready access to Chinese-speaking environments and rarely have opportunities to communicate with Chinese people in daily life. A general lack of awareness of the need for Chinese language competence is also an issue; students are not aware of any benefit in learning the language, especially in a closed classroom environment. In this situation, the key to ID is knowing how to analyze learners' needs, context, educational goals, performance goals, and how to motivate learners to learn and use Chinese. Keller's ARCS-V model [11] – a model derived from the synthesis of motivational concepts and theories, namely attention (A), relevance (R), confidence (C), satisfaction (S) and volition (V) – is one of the most helpful concepts of the motivational design for learning (see Table III).

TABLE III. ARCS-V MODEL [11]

Attention	Motivation to learn is promoted when a learner's curiosity is aroused due to a perceived gap in current knowledge.
	Sub category: Perceptual Arousal/Inquiry Arousal/Variability
Relevance	Motivation to learn is promoted when the knowledge to be learned is perceived to be meaningfully related to a learner's goals.
	Sub category: Familiarity/Goal Orientation/Motive Matching
Confidence	Motivation to learn is promoted when learners believe they can succeed in mastering the learning task.
	Sub category: Learning Requirement/Success Opportunities/Internal Attribution
Satisfaction	Motivation to learn is promoted when learners anticipate and experience satisfying outcomes to a learning task.
	Sub category: Natural Consequences/Positive Consequences/Equity
Volition	Motivation to learn is promoted and maintained when learners employ volitional (self-regulatory) strategies to protect their intentions.

In the present study, a Chinese lesson plan is carefully designed to cover each of the elements of the ARCS-V model. Figure 1 shows the communicative blended learning design, which includes learner-centered & communication-focused interaction. This circular process will generate the interest of learners in various aspects of China as a country and foster motivation to learn the Chinese language.

As shown in Figure 1, Chinese novice learners (Japanese high school students) take part in a one-year communicative blended learning class, which is based on the study of grammar in the general classroom and WBT (web-based training) and on-line interaction between Chinese college students in an ICT-equipped classroom. Through the first semester (April to September), Japanese students study basic vocabulary and grammar, and at the same time, practice simplified Chinese typing as preparation for BBS interaction. In the second semester (October to February), in addition to the learning contents above, Japanese and Chinese students start BBS interaction, for their own purpose of practical communication.

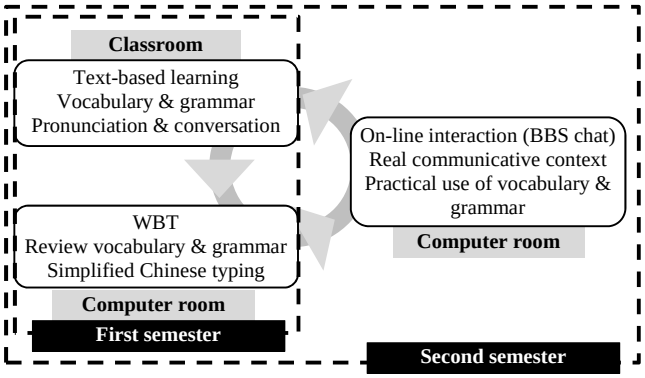


Figure 1. Communicative Blended Learning Design

IV. SITE DESIGN AND CONTENTS

Learners work on the unique web site "Chinese and Japanese Students Interaction Web" (see Figure 2) which was developed on a UNIX server managed by Hokkaido University, built around the free contents management system "Magic3" [12]. WBT and BBS interaction are carried out on this web site. In consideration of security and information protection, users must be pre-registered by an administrator. User access is restricted through the use of a password.

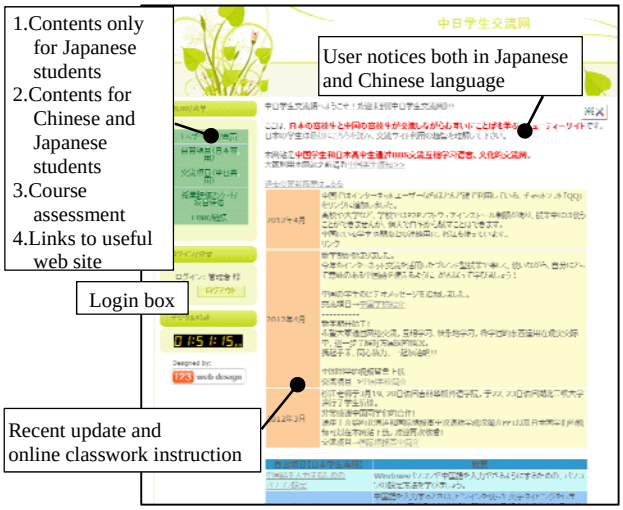


Figure 2. Top Page of Chinese and Japanese Students Interaction Web [13]

The "Interaction Web" site contents consist of 4 major parts, the functions of which are as follows:

TABLE IV. "INTERACTION WEB" SITE CONTENTS

Contents only for Japanese students	Instructions on how to change the PC settings Instructions on how to type simplified Chinese characters WBT (textbook reviews, typing exercises)
Contents for Chinese and Japanese students	BBS Japanese school and class activities introduction Chinese school introduction School annual events introduction
Course assessment	Japanese and Chinese students make assessment online (via Moodle CMS) and give feedback at the end of semester
Links	Japanese and Chinese school web site On-line dictionaries and translation site Chinese grammar explanation site Chinese level certification test information

V. COLLABORATIVE CLASSWORK AND ONLINE INTERACTION

Japanese high school students planed and created video content, namely a "school introduction", text & photo contents regarding "hot trends with Japanese high school students", and video content consisting of Chinese speeches introducing Japanese culture (see Figure 3). In addition, students wrote on topics such as "self-introduction" and "my hobby" on the BBS. 26 Chinese college students saw this content and directly interacted with Japanese students (see Figure 4).

As a basic rule of BBS interaction, Japanese and Chinese learners must use both Japanese and Chinese at the same time. In this way, they not only practice reading and writing in the foreign language which they are studying, but can also demonstrate authentic verbal behavior to each other in their respective languages. However, it is difficult to control the language use of Chinese students all the time; at times, they only write in Japanese because they do not always access the BBS during class hours. They will also take part in this interactive activity as a volunteer after returning to their dormitories.

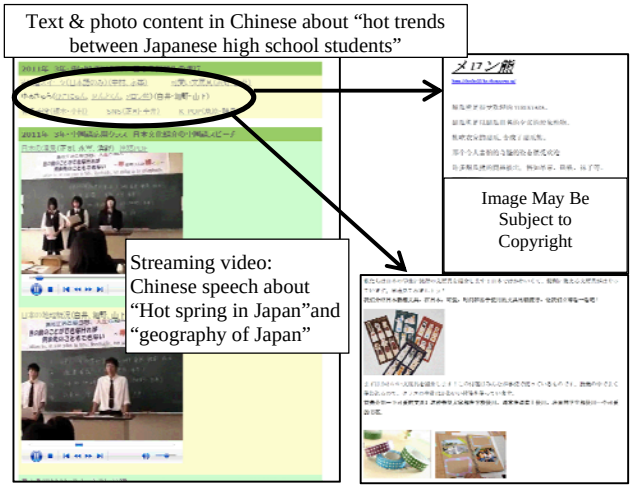


Figure 3. Japanese school and class activities introduction

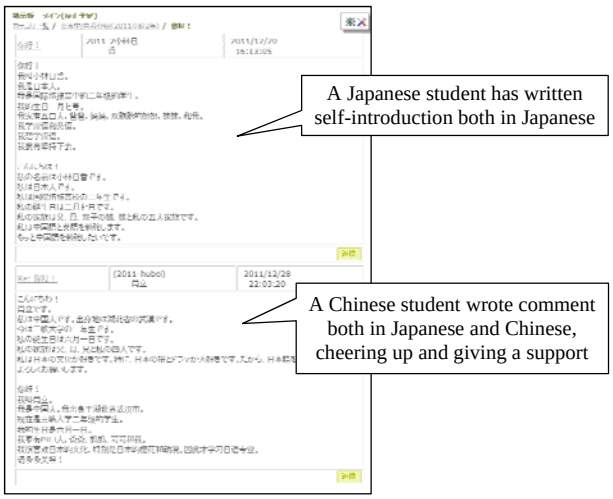


Figure 4. Japanese and Chinese students' Interaction on BBS

VI. DATA COLLECTION

The aim of data collection is to understand the actual feelings of Japanese students towards collaborative blended learning.

The "Chinese and Japanese Students Interaction Web" was established in August, 2009, and content was upgraded annually. In this research, data collection was based on classwork from May to December in 2011. 13 Japanese high school students and 26 Chinese college students directly interacted via the BBS. Japanese students accessed the BBS during Chinese class hours, and Chinese students accessed the BBS from their own computers after class. Data was collected via an online questionnaire (see Figure 5) and a group interview after the second semester.

Figure 5. Online Questionnaire Constructed by Moodle

The online questionnaire and supplementary interview consisted of 3 parts, (1) course design (Q.1-16), (2) collaborative group work (Q.1-20), and (3) outcomes of the communicative blended learning (Q.1-25).

Because of the difference of semester periods between Japan and China, only data from the Japanese students has been collected at the current moment.

VII. Data Analysis and Present Findings

In this exploratory research, to understand whether the communicative blended learning design worked as expected or not, the qualitative analysis of learners' subjective personal reaction was the first step in the analysis. 13 Japanese students assessed communicative blended learning for CFL, and their answers show positive improve of ICT skills and a growing motivation for learning Chinese language. Figure 6 and 7 show a portion of the quantitative analysis (closed questions), and Figure 8 shows the qualitative analysis (open questions).

As shown in Figure 6, all Japanese students surveyed showed positive feelings of effectiveness in relation to the communicative blended learning design for CFL.

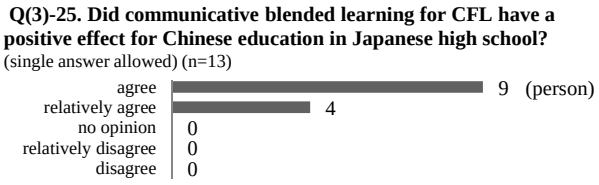
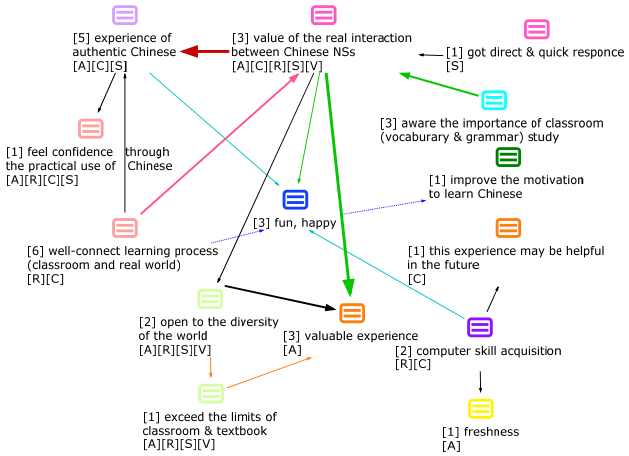


Figure 6. Positive Feelings for Communicative Blended Learning for CFL

As for the reasons for positive feelings of effectiveness, Japanese students mentioned the following, with Figure 7 showing a concept map created via open coding (the heavier the line, the greater number of students mentioning the same concepts in the open questions).

The most remarkable reaction was that 6 students had positive feelings in terms of the course being a "well-connected learning process", which means they felt they could apply language knowledge acquired in the classroom to real interaction situations. This in turn led to other positive feelings such as "there was value in real interaction with Chinese native speakers" or "was able to experience authentic Chinese language". This value recognition of self-directed and practical use of Chinese language in specific interaction situations increased their motivation for learning CFL. Also, some students were "aware of the importance of classroom study", which means they independently recognized a lack of vocabulary or grammatical competence, and the need for classwork to rectify that situation. "Computer skill acquisition" was also an example of positive feedback. Students recognized future demand for an integrated ability of Chinese language, computer skills and ICT.

Returning to the present study's central model of motivational design, the Japanese students' feedback apply well to the five elements in the ARCS-V model.



[A]= Attention, [R]= Relevance, [C]=Confidence, [S]=Satisfaction, [V]=Volition

Figure 7. Open Coding Map: Reasons of Positive Feeling Towards Communicative Blended Learning for CFL

As another significant effect of communicative blended learning for CFL, all participants acquired Chinese IME setting and simplified Chinese typing skills. More than half the participants felt confident about creating Chinese documents and Chinese to Japanese or Japanese to Chinese translation abilities with on-line learning support tools and resources. Indeed, all participants submitted Chinese writing assignments created in MS Word in preparation for BBS interaction, even though some of the participants did not have much confidence in their abilities.

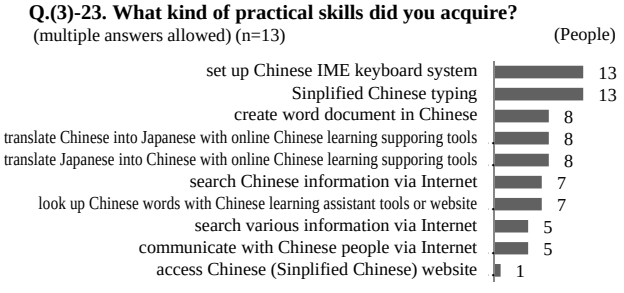


Figure 8. Practical Skill Acquisition

VIII. Conclusion and Future Work

In conclusion, the communicative blended learning design for CFL highly increased the motivation for Chinese language learning in a non-Chinese speaking environment. The qualitative analysis of students' assessment shows that the Japanese learners acquired an improved feeling of satisfaction and feeling of effectiveness through the experience of real on-line Chinese verbal communication with Chinese native speakers, analyzed according to the ARCS-V instructional design model.

The future challenge is to collect more feedback from both Japanese and Chinese students in order to ascertain the validity of the effect of communicative blended learning for CFL. It is necessary to abstract the feeling of effectiveness through the axial cording (comparing incident to incident) and selective coding (to refine the hypothesis or theory) based on the grounded theory [14], aiming ultimately at the goal of theoretical generalization.

Also, in order to provide real insights to the effectiveness of this communicative blended learning model, the adaptive triangulation must be considered. CFL class size is almost the same every year (about 30 learners for the first year class and about 10 learners for the second year class), therefore it is difficult to validate the evidence solely through qualitative analysis. Therefore, one must be careful to ensure the objectivity of results.

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