

CMC and Japanese University Students Studying English

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Abstract

Computer-mediated communication (CMC) is becoming common in foreign language classes worldwide. In many countries, Japan included, students study English for years, yet rarely have the chance to use it. CMC has proven to be a viable and possibly even preferable alternative to face-to-face communication, providing an ideal environment in which English can be used in communicative situations. In addition to being an environment where using, learning, and modifying English takes place, CMC offers many benefits which traditional face-to-face language classes do not. In this paper, language learning theory and how it relates to CMC will be discussed, as well as why CMC may be a great potential benefit to Japanese university students of English.

What is CMC?

CMC encompasses all forms of communication that are mediated by a computer system. CMC can be synchronous, as in a chat system, where participants are online at the same time, or it can be asynchronous, for example in the use of discussion boards and e-mail. Each form of CMC has its own properties and uses, and varying levels of difficulty in being implemented by the teacher. Please see Table 1 for the main forms of CMC being used in language classes today.

Table 1 – The Three Main Forms of CMC

Form of CMC	Advantages	Disadvantages
E-mail	<ul style="list-style-type: none"> • students can use their own e-mail accounts so no setup is necessary • one-to-one communication allows students to develop a more personal relationship with each other 	<ul style="list-style-type: none"> • only one source of linguistic input, therefore chance of learning new language is more limited • student pairs may not communicate well with each other depending on personalities and interests

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Discussion board	<ul style="list-style-type: none"> • “many to many” so there are many sources of input • a good vehicle for discussion • provides a learning environment where knowledge building can take place 	<ul style="list-style-type: none"> • requires a program, which can be expensive (Moodle being the notable exception, as it is free) • teacher/facilitator needs to prepare carefully in advance and monitor and support interaction • can be very time-consuming for the teacher
Chat	<ul style="list-style-type: none"> • more similar to speaking than either discussion boards or e-mail • some free software available (Yahoo Messenger etc.) 	<ul style="list-style-type: none"> • requires fast typing skills • less time for reflection

Foreign Language Learning Theory

Much theoretical work has been done on trying to discover how foreign language learning can be facilitated. Long (1980, cited in Warschauer, 1998) claims that language learning is facilitated by interactional modifications due to negotiation for meaning. This process of negotiation of meaning, or resolving miscommunication, is known as the Interaction Hypothesis (Long & Robinson, 1998), which states that the conditions for language learning are enhanced by having learners negotiate meaning with other learners by producing more opportunities for comprehensible input and modified output (Gass, 1997; Long, 1991, 1996). Learners intake language from their language partners and process it if it is comprehensible, and try to negotiate the meaning using a variety of methods when it is not.

This negotiation of meaning leads directly to language learning through the learner incorporating the new data, received as input from various partners, into their *interlanguage* (Swain & Lapkin, 1995), which can be briefly defined as the learner’s developing second language. In addition, in producing output, learners’ interlanguage is developed further when they become aware that they have made a mistake in the foreign language. This mistake can be brought to the learner’s attention by either the learner’s own reflection or by external feedback, for example by a request for clarification. By noticing a mistake, the learner is pushed to modify their output and therefore improve their interlanguage. In this model, language learning is viewed as the development of a learner’s linguistic competence, and the purpose of interaction is to provide the input and the output to make this development possible (Warschauer, 1997).

This relates directly to Vygotskian sociocultural learning theory (Vygotsky, 1978), which states that with the help of teachers and more capable peers, students can learn

more than they could on their own. In the context of language learning, the teacher and other students provide input for other students to compare to their own interlanguage, and modification and improvement of all students' interlanguage is the desired result.

CMC and Foreign Language Learning Theory

According to recent research, CMC provides an environment where foreign language learning can be facilitated by the negotiation of meaning (e.g. Blake, 2000; Chapelle, 1997). Studies done by Pellettieri (2000) and St. John & Cash (1995) showed extensive incorporation of new syntactical patterns and lexical chunks during computer-mediated interaction and have concluded that CMC facilitates such incorporation by giving greater opportunity to study incoming messages and to carefully plan responses.

Our data suggest that because students have more time to process language in (CMC) than in oral conversations, and because they can view their language as they produce it, they are more likely to “monitor” and edit their messages, all of which can result in even more “quality” interlanguage than there would be in a non-electronic environment (Pellettieri, 1996).

In an online CMC environment, students may feel less pressure. In e-mail and discussion boards (both asynchronous forms of CMC), students have the time to check what they write before submitting it. This allows them time to reflect on what they write, to make sure that they are saying what they mean to say. Dictionaries, classmates, and teachers can be consulted, and the chance of miscommunication may lessen as a result. The act of composing itself, if various sources of input are used, can result in higher quality interlanguage.

In addition, Warschauer (1997) showed that students' attention to linguistic form increases when using a text-based medium to communicate. This is referred to in the literature as *focus on form* (Long, 1991), and although this focus may occur when speaking face-to-face, it is more likely to occur in a written environment.

Benefits of Using CMC in Language Learning

I have briefly described how CMC may outperform traditional face-to-face discussion in facilitating language learning. In practice, there are many more benefits which may occur as a result of using CMC. The most often cited benefit in research

findings is that CMC promotes the equalization of participation of language students in discussion (Kelm, 1992; Kern, 1995). First, teacher talk is reduced to a minimum, as the teacher becomes a mere participant, rather than an authority figure (Kern, 1995). Student participation increases as a result, but more importantly, the students who participate least in face-to-face communication increase their participation the most in electronic discussion (Warschauer, 1996). In a study by Warschauer (1996), the four quietest members of the class in face-to-face discussion increased their participation almost ten-fold and thus went from almost total silence to relatively equal participation. The most active participants were not disadvantaged, however. Their participation dropped as a result of using CMC, but not below 25% in a four-person group. Thus, the most verbal students decreased their participation to a more equal level, and the least verbal students (who were Japanese) increased their participation dramatically. In addition, learners need not be concerned with pronunciation issues which may inhibit efforts in oral communication (Ortega, 1997).

For many teachers with students who are unwilling to participate in oral communication, these are welcome benefits indeed. They all relate to the fact that in CMC, participants are invisible. There are no faces, no facial expressions, and CMC is low in social cues (body language, tone, pitch, etc.). According to Hoffman (1996, p. 55), "The anonymous quality of network communication can be face-saving as well, relieving learners of the inhibitions associated with face-to-face communication and allowing them to express themselves more freely." It is perhaps the face-saving quality of CMC which may make it such an appropriate learning environment for Japanese students in particular.

Although CMC is usually a written form of communication, voice chat provides the opportunity for students to communicate orally. This form of communication may be more stressful to students as they have to think on the spot and have little time for reflection.

Shyness in Japanese Culture

Zimbardo (1977, cited in Doyon, 2000) found that shyness is more prevalent in Japan than in any other culture surveyed. Over 90% of Japanese labeled themselves as shy (currently or shy in the past) and 75% see shyness as a problem. More than any other nationality, the Japanese reported feeling shy in virtually all social situations.

The Japanese education system fosters passivity in students (Doyon, 2000). Teachers lecture to students and students are expected to absorb what they are taught. There is little or no discussion or questioning. Knowledge is seen as discrete and objective and can be passed directly from teacher to student. As well, in English language classes, Japanese students rarely have the chance to practice speaking English. The emphasis is on reading, writing, and mastering grammar. Thus, many Japanese students have a much higher proficiency in reading and writing English than they do in speaking it.

Since they have not had much opportunity to practice speaking English, students are often shy when asked to converse in English. Japanese students also worry that they will make mistakes when they speak English, and this creates more stress.

This stress can be lessened by moving from a face-to-face environment to a computer-mediated environment. In this way, students are still using their developing English interlanguage to communicate with each other, but barriers to communication are lessened by the faceless environment and the opportunity to reflect on and modify what they will say before they say it. In some classes, discussion via CMC can be a good opener to a face-to-face conversation. In others, it could replace face-to-face discussion entirely, depending on the goals of the class.

CMC and International Sister Classes

Although using CMC within a class does provide the conditions for language learning to take place, students can benefit greatly when an international element is introduced. It is in many-to-many classroom partnership exchanges (usually via discussion board) that the full range of CMC's capabilities are brought to bear for developing critical, literate skills in a second language (Cummins & Sayers, 1990, 1995). In addition, students find communicating with international students to be exciting and motivating. In the Australaskan Writing Project, students were strongly motivated by using their computers to communicate and by the increased cultural knowledge they gained (Beazley, 1988, cited in Kupelian, 2001). In another exchange between British and French students using CMC and including some video conferencing (Zahner, Fauverge, Wong, Maillet, Yanes, Chahed, Egert & Schuller, 1998), participants were very enthusiastic. Some advantages mentioned were the chance to get immediate feedback from a native speaker, to practice communication in different registers, and the opportunity to gain cultural insights (Zahner et al, p. 29).

There have been many projects which have not gone well. Case studies have been described where normal etiquette breaks down in a CMC environment with disastrous results. Janangelo (1991) writes, "The anonymity of computer-generated text gives writers the option of publishing discourse without taking responsibility for its contents. With no hallmark to identify them, some writers may feel free to speak their minds, even when they know they are being offensive or hurtful" (p. 57). The facilitator is the one who must deal with such negative situations, and in general, the more prepared the facilitator, the less will be the likelihood of major problems arising. But success in using CMC depends not only on the facilitator but on the participants, and these are variables which may not be easily controlled.

The reasons for success and failure differ from project to project, but the golden rules could perhaps be stated as, "Be culturally sensitive" and "Prepare well". Facilitators and students should learn about the other culture beforehand to minimize the chances of cultural miscommunication. For example, in some cultures, it is normal to criticize others but in other cultures it is not (Murphy, 1991). Because participants come from all over the world, with a wide range of experiences and viewpoints, everyone must go into the experience with an open mind and a spirit of toleration for opinions different from one's own.

Online International Sister Class Projects involving Japanese Students

In the past decade, there have been fewer than 10 projects involving Japanese students interacting online with a sister class (Carney, 2006). Of these projects, the stated goals were varied, but several focused on the acquisition of intercultural awareness (see e.g. Gray & Stockwell, 1998; Fedderholt, 2001; and Azuma, 2003). In all three projects, intercultural awareness reportedly increased as a result of the online international sister class project.

However, no projects have considered shyness as a variable which could be affected by computer mediated communication. In the future, it is hoped that projects specifically designed to measure the reluctance of Japanese students to communicate in English in both traditional face-to-face communication and online communication will be developed and carried out.

Conclusion

In conclusion, CMC has many things to offer language students in general, and Japanese university students of English in particular. According to language learning theory, CMC provides an environment rich in input, from which students can learn from each other, improving their own interlanguage. Asynchronous CMC gives students time to reflect before responding and reduces the chances of losing face. Teacher talk is reduced and overall student participation increases. Individual student participation increases as well, and it is usually those who contribute the least in face-to-face discussions whose participation increases the most in online discussions. In addition, international sister classes offer the chance to become acquainted with members of another culture. Using English in such situations can be very motivating, as English is being used to truly express and exchange ideas and opinions in an international forum. Studies done in Japan have shown that intercultural awareness can be increased by using CMC with sister classes in other countries. However, care must be taken by the facilitator to prepare well beforehand, as it is possible for an exchange to go badly.

But until online international projects are designed to identify shyness of Japanese students as a variable to be measured, we will not know whether reluctance to communicate in English can be reduced by using CMC. It is hoped that the many benefits offered by CMC and its potential for reducing the effects of shyness will encourage researchers to explore this area.

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