Interactional Features of Synchronous Computer-Mediated Communication in the Intermediate L2 Class: A Sociocultural Case Study

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ABSTRACT

This study explores social interactive features of synchronous computer-mediated communication (CMC)—commonly known as “chat”—as such features unfolded in real time and developed over a nine-week period in two fourth-semester college Spanish classes. The study invoked the Vygotskian sociocultural theoretical framework and employed discourse analysis as a research tool to describe and explain outstanding features of chat room communication. Specific interactional features examined are intersubjectivity, off-task discussion, greetings and leave-takings, identity exploration and role play, humor and sarcasm, and use of the L1 (English). Through these communicative behaviors, learners appropriated the chat room environment, transforming it into a learner-centered discourse community governed by communicative autonomy and the use of language and discourse functions that go beyond those encountered in the typical L2 classroom.

KEYWORDS

Synchronous Computer-Mediated Communication (CMC), Chat, Vygotskian Sociocultural Theory, Discourse Analysis.

INTRODUCTION

Synchronous CMC in the CALL literature

The explosion of Internet use in recent years has brought about previously unheard of means of human communication. Many Internet users
worldwide make use of interactive features of the World Wide Web such as synchronous CMC, which allows persons in remote locations to communicate with each other in real time by typing messages onto their computer screen. Today’s foreign language learners are likely to be experienced chatters, even if only in their L1 and concerning topics of personal rather than academic interests. Coinciding with the increasing use of synchronous CMC has been a recent focus of interest in the second language acquisition (SLA) literature on the social interactive factors involved in L2 learning. Whereas much SLA research on social interaction deals with face-to-face conversation, the emergence of synchronous CMC brings forth a whole new set of research and practical issues concerning social interaction within the L2 learning context. Chat rooms are theoretically interesting environments in which to investigate L2 interaction, given that chat room interaction combines the textuality of written communication with the real-time interactivity of face-to-face communication.

The use of synchronous CMC in language instruction originated in the mid 1980s in the English Department at Gallaudet University in Washington, DC, where it served as a tool to help deaf people to communicate in English rather than American Sign Language (Beauvois, 1997). The idea of electronic networks for interaction (ENFIs) then extended into English composition classes (Bruce, Kreeft Peyton, & Baston, 1993). At the University of Texas at Austin, a program called Daedalus Interchange was designed for L1 writing classes. The Interchange program included a synchronous CMC component which students used to discuss their compositions with each other.

As the use of synchronous CMC moved into the L2 learning context, researchers working with various languages uncovered numerous advantages of electronic communication as opposed to face-to-face conversation. Kelm (1992), who used Daedalus Interchange with intermediate learners of Portuguese over a thirteen-week period, reported that synchronous CMC (a) increased participation from all members of a work group, (b) allowed students to speak without interruption, (c) reduced anxiety which is frequently present in oral conversation, (d) rendered honest and candid expression of emotion, (e) provided personalized identification of target language errors, (f) created substantial communication among L2 learners, and (g) demonstrated a significant reduction of certain grammatical errors over time. Similarly, Chun (1994) reported that her first-year learners of German performed a wide range of discourse functions in synchronous CMC: they asked more questions of fellow students and the instructor, they gave feedback to others and requested clarification when they did not understand each other, and they ended conversations with appropriate leave-taking utterances. In a study of two groups of French learners, Kern (1995) reported increased language production, a greater level of morphosyntactic complexity, a wider variety of discourse func-
tions, and reduction of anxiety over communicating in the L2, as compared to face-to-face discussion of the same topics. In a study of ESL students, Warschauer (1996) encountered equalization of participation among learners, as well as more formal and complex language in both lexical and morphosyntactic levels. Warschauer (1999) also referred to the ability of synchronous CMC to help overcome the contradiction between focus on form and meaning. In synchronous CMC learners have more opportunity than they do in oral conversation to notice structure, which is believed to be critical for language acquisition (Schmidt, 1993). Also, learners can consult previous text, dictionaries or other language reference materials, or other learners as they type their messages.

In addition to the reported advantages of synchronous CMC, a few researchers have called attention to some potential drawbacks to chatting. Among these difficulties are problems of limited keyboarding skills, slow speed, less coherence (Bump, 1990); lack of nonverbal communication; and the necessity of learning a new set of turn-taking skills (Salaberry, 1997, p. 19). Additionally, Kern (1995, p. 470) cautions that “Formal accuracy, stylistic improvement, global coherence, consensus, and reinforcement of canonical discourse conventions are goals not well served by Interchange.”

Research findings on advantages and disadvantages of synchronous CMC in L2 learning demonstrate that this medium of communication differs in fundamental ways from that of typical patterns of classroom communication. The study presented here contributes to this growing body of research by employing the sociocultural theoretical framework to illustrate and explain the particular ways that two groups of intermediate Spanish L2 learners utilized chat rooms in their classes. To that end, a brief overview of the tenets of sociocultural theory is in order.

Sociocultural Theory

Evolved from the work of the Russian psychologist and semiotician Lev Vygotsky (1896-1934), sociocultural theory operates on the assumption that human cognitive development is highly dependent upon the social context within which it takes place. (For an overview of the framework, see Lantolf & Appel, 1994.) More specifically, development occurs as the result of meaningful verbal interaction between novices and more knowledgeable interlocutors such as parents, peers, or teachers (Vygotsky, 1962, 1978). Sociocultural theory emphasizes that the locus of learning is not exclusively within the individual’s mind but, rather, is a product of social interaction with other individuals. Although Vygotsky’s theory embraced all higher mental functions, he was primarily interested in the development of language in relation to thought (Vygotsky, 1962, 1978). Vygotsky
distinguished between lower mental functions, such as elementary perception, memory, attention, and will, and the higher, or cultural functions, such as logical memory, voluntary attention, conceptual thought, planning, and problem solving. Vygotsky explained that higher mental functions appear as a result of transformations of the lower functions (Vygotsky, 1962, 1978). Fundamental in such transformations are the constructs of mediation and use of tools.

Mediation and the Use of Tools

In order for transformations from lower to higher mental functions to occur, the individual must make use of psychological tools, such as mnemonic techniques, algebraic symbols, diagrams, schemes, and, perhaps most important, language. These psychological tools function as mediators, or instruments that stand between the individual and the goal toward which the individual’s action is directed. Vygotsky’s claim was that just as individuals employ technical tools to manipulate their environment, they use psychological tools to direct and control their physical and mental behavior. In the L2 learning context, the provision of positive and negative linguistic evidence by more knowledgeable peers and the development of learning and communication strategies are some of the mediational means by which the lower linguistic processes develop into higher forms of language use (i.e., discourse competence). Higher mental functions, then, must be viewed as products of mediated activity, of which language is one of the principle tools or mediators.

An underlying assumption of the mediation construct is that humans have access to the world only indirectly, or mediately, rather than directly, or immediately (Wertsch, del Rio, & Alvarez, 1995). Mediation is an active process that involves the potential of cultural tools, as well as the unique use of such tools, to shape human action. The introduction of new cultural tools transforms the mediation process, rather than simply facilitating forms of action that would otherwise occur (Wertsch, et al., 1995). “By being included in the process of behavior, the psychological tool alters the entire flow and structure of mental functions. It does this by determining the structure of a new instrumental act, just as a technical tool alters the process of a natural adaptation by determining the form of labor operations” (Vygotsky, 1981). The boom of the computer as a cultural/psychological tool in recent years certainly lends support to Vygotsky’s thesis.

Donato and McCormick (1994) argue the importance of mediation in L2 learning: “Initially unfocused learning actions may become adjusted and modified based on how the learning of the language is mediated. Mediation is, thus, the instrument of cognitive change.” They suggest several examples of potential mediators (or tools) in L2 learning, including text-
books, visual material, classroom discourse patterns, opportunities for L2 interaction, types of direct instruction, and various kinds of teacher assistance. In today's L2 classrooms, computers would undoubtedly be added to this list. Meskill (1999) considers the computer to be a complex artifact that “like all contextual artifacts, especially tools used by members of a particular community … bring about major change in the structure and dynamics of discourse and activity.” Wertsch (1991) suggests that mediational means be viewed in terms of items that make up a tool kit, rather than being viewed as a single, undifferentiated whole. The current study explores the implications of including synchronous CMC as an item in the L2 learning tool kit.

**Intersubjectivity**

Related to the Vygotskian view of cognitive development as a byproduct of collaborative discourse is the concept of *intersubjectivity*. Engaging in collaborative discourse requires a shared communicative context. When interlocutors have similar background knowledge of a topic of conversation, the context may already be shared. If not already present, the shared context must be created (Rommetveit, 1974). Habermas (1998) referred to this concept of shared perspective as *intersubjectivity* in his philosophy of language (see also White, 1995). Rommetveit (1974, 1985) brought the term into the field of psychology, referring to intersubjectivity as the establishment of a shared perspective between an expert and a learner in a problem-solving task. According to Wertsch (1991), reaching intersubjectivity is something that communicants learn to do. The establishment and negotiation of intersubjectivity perpetuates collaborative discourse, which, according to the sociocultural view, is important for language development.

Habermas (1998) developed a speech act theory on the basis of four universal validity claims. Anyone who wants to participate in a process of reaching understanding must adhere to the following principles:

1) uttering something intelligibly,
2) giving (the hearer) something to understand,
3) making herself thereby understandable, and
4) coming to an understanding with another person.

When at least one of the validity claims is not satisfied, communicative action cannot be continued. In other words, intersubjectivity is lost. When intersubjectivity is lost, interlocutors must achieve a new definition of the situation that all participants can share in order for communication to continue. If the attempt to reestablish intersubjectivity fails, then the com-
Communicators are faced with switching to some sort of strategic action (e.g., breaking off communication altogether or recommencing action oriented toward reaching understanding at a different level). Schegloff (1992) studied the process of “defending” intersubjectivity within a certain number of conversational turns to which he referred as a turn-taking “repair space.” According to Schegloff, repair of lost understanding generally occurs within three turns of the source of trouble. If the repair attempt is made after three, or sometimes four, turns, then the repair becomes “next relevant.” The problem with becoming next relevant is that the repair may never again be relevant.

The concept of intersubjectivity has been invoked in recent sociocultural SLA studies. Investigating the sociocognitive functions of the use of the L1 in communicative tasks, Antón and DiCamilla (1998) demonstrated that their dyads of learners used their L1 “...to construct a social space that will facilitate the completion of the task by enabling learners to achieve intersubjectivity, that is, a shared perspective on the task.” They further characterize this state of task intersubjectivity as a “social and cognitive workplace, in which the students are able to provide each other with help throughout the task.” Antón and DiCamilla also stressed the importance of maintaining intersubjectivity throughout a communicative task, implying that maintaining an intersubjective state is conducive to language learning.

The current study seeks to contribute to the body of literature described above by shedding light on the social interaction of a particular group of L2 learners within a chat room context.

THE STUDY

Participants and Context

The participants were 33 learners and the teacher of two intact fourth-semester Spanish classes at the University of Pittsburgh. The classes met for three contact hours per week. Two of the class meetings were held in the classroom, and the third meeting was held in a computer laboratory. The intermediate-level Spanish curriculum at the university employed a content-driven, task-based approach to language teaching. Learners typically spent class time involved in interactive activities with specific communicative goals as defined by VanPatten and Lee (1995). Intermediate Spanish classes at the university delivered integrated-skills language instruction (speaking, listening, reading, and writing), which lent itself easily to an analysis of communication that shares characteristics of both writing and speaking and, ultimately, to the cautious generalization of findings of this research project to other foreign/second language classes that employ an integrated-skills approach.
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Method

Prior to beginning the study, learners were asked to select a pseudonym for their chat room discussions. The reasons for the pseudonyms were to promote genuine, uninhibited communication and to afford anonymity in the research findings. The learners in each class were divided into four groups, as the WebCT program provided simultaneous access to four separate chat rooms. At the beginning of each chat session, learners were given a handout containing the topic and task. The chat activities were designed by the researcher in coordination with the course instructor in order to meet both the research needs of the study and the instructional needs of the learners. (See the sample activity in the appendix to this article.) Thus, the chat sessions were integrated into the overall course program. All of the chat topics were introduced in prior class sessions and derived from authentic reading passages and/or video segments. During the chat sessions, the instructor sat at her computer at the head of the laboratory, circulating among the four chat rooms and participating for a brief time in each of the discussions. The researcher was present during the chat sessions to assist with technical problems and to observe the research environment.

Research Question

The larger study from which this article originates consisted of five research questions, however only the first of these questions will be treated here: What are some outstanding interactional features in chat among learners and the teacher? The motivation for this question was to complement existing findings regarding L2 discourse in the face-to-face mode with a theoretically framed analysis of L2 discourse in an electronic environment.

Data Analysis

To shed light on the nature of chat room communication, discourse analysis was the principal approach to data analysis in this study. As in most qualitative research, data reduction was necessary and involved systematically selecting from the 300 pages of chat room transcripts examples of discourse features that closely related to the research questions driving the study. The transcripts were organized into episodes corresponding to the week number and the assigned groups. For example, Episode 1A was the chat session of the first group during the first week; Episode 2B referred to the second group in the second week, and so forth. The group
members were changed twice throughout the semester to allow learners to communicate with new classmates. In accordance with Miles and Huberman (1994), the search for patterns in the data was driven by the prior preparation of a “start-up list” of possible interactional features gleaned from the previous synchronous CMC and sociocultural literature. After making multiple passes through the transcript data, specific patterns were identified and indexed. The interactional features were then illustrated in the form of discourse excerpts accompanied by interpretive explanations.

Findings

The interactional features of interest that emerged from the data were intersubjectivity; off-task discussion; social cohesiveness, including greetings and leave takings, use of humor, and sarcasm/insults; exploration of alternate identities and role plays; and the use of the L1 (English). The following discourse excerpts and accompanying explanations will illuminate the occurrences of each of these interactional features throughout the nine weeks of chat sessions in the study.

Intersubjectivity

As mentioned previously, intersubjectivity is defined as a shared orientation or perspective on a communicative task. Put in other terms, communicators who have established intersubjectivity are “on the same wavelength,” that is, they are able to penetrate each other’s subjective reality of the world by means of collaborative discourse. In the overall study, three full weeks (weeks one, four, and eight) of the chat transcripts were analyzed to determine the extent to which intersubjectivity seemed to occur in each episode and to describe the resulting states of intersubjectivity. The current article focuses on two illustrative examples selected from the data. In Segment A, intersubjectivity appeared to be established and maintained throughout the discussion. In Segment B, intersubjectivity was established but subsequently lost.
SEGMENT A: Movies

5
B: de que se trata?
L: Creo que los aspectos psicológicos de las películas son muy crucial a sociedad. La película de "gangsters" es no tiene moralidad buena a niños.

10
I: pero es interesante
J: yes the burbs con tom hanks
B: I think it is important that parents defend their kids from seeing movies with bad morals when the kids are little

15
L: Hay los individuos en sociedad que viven sus vidas en base de que ellos ven y oyen.
E: creo que the burbs fue una película muy terrible

20
I: no es comico
J: it’s not funny
B: dé que se trata "the burbs"?
J: the theme of the burbs is about a neighborhood where tom hanks live and everyone in the neighborhood thinks their new neighbors are kill them

25
L: Hay muchas otras formas de diversiones.
B: no se si estoy de acuerdo. creo que el cine puede ser buena cosa. depende del tipo de películas. pero entiendo porque dices esto

30
I: corey feldman es en the burbs
J: corey feldman is in the burbs
L: If movies didn’t exist the world would be better. Some movies damage the minds of society
B: si, hay muchísimos cosas que son mas o igualmente importantes.

35
J: yo pienso que es importante ver las películas para divertido, on para seriosos
J: I think it is important to see movies for fun, on for serious
B: no para seriosos

40
B: es necesario hacer otras cosas que ver películas. no es bueno pasar demasiado tiempo haciendo una sola actividad
L: Si enseñamos sus hijos de la historia ellos entenderan el mundo mejor. ellos ni si la repitieron o la cambiaron

45
B: sí, tienes razón. es necesario conocer mejor la historia.
B: ustedes creen que hay un razón otro que el dinero que se filman las películas por ejemplo para dar un mensaje a la sociedad?
J: no for serious
B: it’s necessary to do other things than see movies. It’s not good to spend too much time doing one activity

50
B: es necesario hacer otras cosas que ver películas. no es bueno pasar demasiado tiempo haciendo una sola actividad
L: If we teach our kids about history they will understand the world better. They will neither repeat it nor change it
B: yes, you’re right. It’s necessary to know history better

55
B: ¿ustedes creen que hay un razón otro que el dinero que se filman las películas por ejemplo para dar un mensaje a la sociedad?
B: do you think there is a reason other than money that they film movies? for example to give a message to society?
Prior to the beginning of this segment, the group had been discussing gangster movies. In lines 1-29, there were two concurrent strands of conversation—the movie “The Burbs” and psychological aspects of movies (a subtopic of the assigned activity). Juanita (J) and Eduardo (E) were focused on “The Burbs,” while Lourdes (L) was focused on the psychological aspects of movies. Benito (B) moved in and out of both topics for a short time and then focused exclusively on the context that Lourdes had established. After the shared perspective between Juanita and Eduardo was apparently diverted, Juanita attempted to join in on the discussion topic created by Lourdes and Benito. For some reason Eduardo dropped out of the conversation after line 19 (although he was still present in the room). Benito and Lourdes continued their in-depth discussion of film in society with Juanita contributing from time to time. The group maintained what appears to be an intersubjective state until the end of the chat session.

In most of the groups this week, the chatters appeared to have established an intersubjective state centered on the assigned topic of movies. In many of those groups, however, the shared perspective on the topic of conversation seemed to consist merely of the mention of movie titles and one- or two-sentence commentaries on each title. Unlike the other groups, the group in Segment A went far beyond the mere mention of movie titles, discussing all subtopics of their assigned task and maintaining a level of intersubjectivity that allowed them to examine in considerable depth the issue of films in society. Another notable aspect of this segment is that the learners agreed with each other at some times but did not agree at other times, which demonstrates that they immersed themselves into each other’s subjective reality enough to accept or reject each other’s perspectives and to explain their positions. Wells (1998, 1999) points out that it is precisely the ability to disagree and trace the disagreement back to the original context of the discussion that illustrates that a true intersubjective
state has been established. Segment B, taken from week one of the study, illustrates the establishment and subsequent breakdown of intersubjectivity.

SEGMENT B: Freedom

| 5  | P: Mia | J: La libertad? bueno chamo ustedes tienen mucha libertad en los estados unidos |
| 10 | P: si |
| 15 | A: Para mi, la libertad es el derecho a votar y ser un individual |
| 20 | M: Creo que libertad es el derecho para ser que quieres? |
| 25 | J: Mía estoy de acuerdo |
| 30 | I: Estas embarazado? Pregnant??? |
| 35 | P: la libertad |

Pablo (P)(who was actually a female) established a context for the conversation, that is, a potential starting point for intersubjectivity. After greeting his fellow chatters, Javier (J), who presented himself as a Cuban, put forth his perspective on freedom by stating that U.S. citizens enjoy a great deal of freedom, as compared to Cuba. Mia (M) reiterated the word libertad ‘freedom,’ followed by ellipses, presumably to indicate that she was thinking about the proposed topic. It appears that the three of them established a shared context and were attempting to maintain discussion of it. But in line 12, the shared context was redirected by Pablo’s statement about youth in Spain, which did not seem to follow the established topic (or if it did, it was not clear how it did). Alicia and Mia continued to talk about freedom, but both Alicia and the instructor were drawn to determining how Pablo’s
Interactional Features of Synchronous CMC

statement contributed to the established context. In line 25, Javier agreed
with Alicia’s last statement about freedom. Between lines 26 and 34,
though, the previously shared understanding of the communicative con-
text was again redirected. The communicators apparently did not under-
stand each other, and they made a joke of it (talking about loving each
other and being pregnant). In lines 35-36, there was an attempt to regain
intersubjectivity with relation to the original topic (freedom). Pablo ut-
tered the word libertad, and the instructor pushed Pablo to explain what
she meant by her earlier comments. Pablo then indicated that she would
rather talk about American culture. This might have been her way of rees-
ablishing an intersubjective state by transforming the topic to something
she could relate to more easily.

In this segment, the communicators seem to have achieved
intersubjectivity at the beginning, and then to have lost it for a period of
time, only to regain it later for very short periods of time. Pablo initiated
new contexts several times throughout the segment, and the other com-
municators attempted to connect with her and share the newly initiated
contexts. It can be seen that intersubjectivity broke down whenever at
least one of Habermas’ validity claims was broken. For example, in lines
18, 27, and 28, the intelligibility requirement was broken when the com-
municators put forth unintelligible utterances. When the other communi-
cators pursued the intended meanings of these unintelligible utterances
all at once, intersubjectivity was lost for a period of time. According to
Larsen-Freeman (1980), what people do in discourse sets a task for the
other communicators. For example, if one interlocutor stops communi-
cating, then the others are automatically given the task of discourse main-
tenance. Also, initiating a topic requires one interlocutor to solicit discus-
sion of that topic that the other interlocutors then either accept or reject.
In this segment, all four communicators attempted to initiate a conversa-
tional context at the beginning, but the solicitations of two of the commu-
nicators (Alicia, line 15, and Mía, line 20) were not incorporated into the
conversation. It appears that these solicitations were rejected in favor of
those of Pablo and Javier. It can also be observed that some of the commu-
nicators were silent for significant periods of time (Alicia and Mía), which
automatically assigned Pablo and Javier the task of discourse maintenance.
As seen in Segment B, due to the dynamics of discourse initiation and
maintenance in the chat rooms, intersubjectivity is both fluid and fragile.

According to Schegloff’s theory of defending intersubjectivity, repair of
lost understanding must generally occur within three turns of the source
of trouble. If such repair is not made within the three (or sometimes four)
turns, then such repair as is attempted becomes “next relevant.” The prob-
lem with becoming next relevant is that the repair may never again be
relevant. Segment B corroborates Schegloff’s findings in the chat room
context as well. The breakdown in intersubjectivity which occurred in line
was still not recovered by line 37, rendering the shared communicative context beyond repair.

This brief exploration of intersubjectivity allowed the researcher to examine and classify the various chat room discussions in this study according to the extent to which it appeared that the learners were able to establish and maintain collaborative discourse within a social space characterized by mutual understanding. When such a social space was maintained, the learners achieved coherent, often substantive, communication. When the shared perspective broke down, it was either subsequently reestablished by means of communicative strategies referred to by Schegloff as “defense of intersubjectivity,” or, in some cases, never regained. A favorable condition for the development of linguistic competence or fluency, especially at the intermediate level of L2 study, is that learners move beyond “simple” communication about the immediate context (Givon, 1979). It is when learners move into less immediately obvious contexts that they must work harder to establish a shared framework of understanding. In many of the chat sessions in this study (e.g., Segment A above), learners expanded their “here-and-now” intersubjectivity (Rommetveit, 1974) to include discussion of concepts and ideas that were beyond the tangible, everyday aspects of their lives, creating this favorable condition for linguistic competence.

The establishment of intersubjective communication is particularly challenging in the chat room environment. First, there is no nonverbal communication in chat rooms since interlocutors do not see each other while they are chatting. Also, the turn-taking system is profoundly modified since there is no systematic control over when communicators enter utterances into the conversation. The challenge becomes to merge several strands of conversation that often occur simultaneously. The above discourse analyses revealed that learners in these intermediate Spanish classes successfully overcame these communicative challenges in order to achieve and maintain shared states of understanding with each other in their L2 throughout 45-minute weekly sessions.

Off-Task Discussion

In several of the chat room discussions, the learners decided to abandon the assigned topic for a topic of their choosing. Off-task discussion, then, became one of the salient features of chat room interaction in the study. Off-task utterances occurred in every episode. Off-task discussion was operationalized as more than five consecutive utterances unrelated to the assigned task. Table 1 summarizes the topics of off-task discussion in each of the nine episodes.
### Table 1
Topics of Off-task Discussions

<table>
<thead>
<tr>
<th>Episode</th>
<th>Assigned Topic</th>
<th>Off-task Topic</th>
<th>% of Episode</th>
</tr>
</thead>
<tbody>
<tr>
<td>1C</td>
<td>freedom</td>
<td>weekend; England/Ireland</td>
<td>30%</td>
</tr>
<tr>
<td>2G</td>
<td>censorship</td>
<td>small talk</td>
<td>34%</td>
</tr>
<tr>
<td>3C</td>
<td>sexism</td>
<td>music</td>
<td>25%</td>
</tr>
<tr>
<td>4A</td>
<td>movies</td>
<td>small talk</td>
<td>15%</td>
</tr>
<tr>
<td>4C</td>
<td>movies</td>
<td>study abroad; TV</td>
<td>15%</td>
</tr>
<tr>
<td>5C</td>
<td>music</td>
<td>Halloween party</td>
<td>39%</td>
</tr>
<tr>
<td>5D</td>
<td>music</td>
<td>study abroad</td>
<td>27%</td>
</tr>
<tr>
<td>5E</td>
<td>music</td>
<td>movies</td>
<td>25%</td>
</tr>
<tr>
<td>6C</td>
<td>marriage</td>
<td>majors; residence; travel</td>
<td>58%</td>
</tr>
<tr>
<td>6F</td>
<td>marriage</td>
<td>small talk</td>
<td>15%</td>
</tr>
<tr>
<td>7A</td>
<td>family problems</td>
<td>small talk</td>
<td>14%</td>
</tr>
<tr>
<td>8A</td>
<td>animals</td>
<td>Thanksgiving; classes</td>
<td>45%</td>
</tr>
<tr>
<td>8C</td>
<td>animals</td>
<td>Thanksgiving; food</td>
<td>26%</td>
</tr>
<tr>
<td>8G</td>
<td>animals</td>
<td>Thanksgiving</td>
<td>48%</td>
</tr>
<tr>
<td>9C</td>
<td>the future</td>
<td>small talk</td>
<td>24%</td>
</tr>
<tr>
<td>9D</td>
<td>the future</td>
<td>parties</td>
<td>29%</td>
</tr>
</tbody>
</table>

*Note:* Percentages were calculated based on the number of off-task utterances divided by the total number of utterances in the episode.

As can be seen in Table 1, about one fourth of the chat episodes included a significant amount of off-task discussion, ranging from 15% to 48% of the entire chat episode. At least three patterns are prevalent in the off-task discussion data. First, the chosen topics of off-task discussion seem to be what learners found interesting and of immediate relevance to their lives. For example, in week eight—the week before Thanksgiving vacation, three of the four off-task discussions were about Thanksgiving. Five of the off-task discussions centered around small talk, characterized as conversations which flowed from topic to topic without converging on any particular topic. The second pattern of interest is that it was very often the same learners who engaged in off-task discussion. While some of the learners never strayed from the assigned topic, others did so in all or nearly all of the chat sessions. For example, one learner with the pseudonym Beatriz initiated and participated in off-task discussion in every chat session that she attended (Episodes 1C, 3C, 4C, 5C, 6C, and 8C in Table 1). A third finding regarding off-task discussion is that it always occurred when the instructor was not in the room. Learners often stayed on task for as long as the instructor was in their room, only to go off task immediately after the instructor left.

While it only takes the initiation of an off-task topic on the part of one learner to establish off-task discussion, learners often negotiated whether or not to go off task and what off-task topic to talk about. Segment C demonstrates this negotiation.
SEGMENT C: Animals

C: adiós.
R: hasta luego
5
C: bien.
C: que quieres hablar sobre?
E: no animales. esta aburrido
R: Que te parece como nosotros gastamos mas en comida para las mascotas que en comida para los bebes
C: si, si, si.
R: si esta tema es muy aburrido cambiamos al otro
10
C: si,
C: que tema?
R: cualquiera
E: escuela?
C: como se dice thanksgiving?
C: A mi me gusta el día de gracias.

As usual, off-task discussion was suggested as soon as the instructor left the room. Carlos (C) asked what his fellow chatters would like to talk about (line 6). Enitza (E) also stated her desire to abandon the assigned topic. Rosario (R) put forth an on-task statement which she probably had begun to type before the topic change was suggested. In lines 13-15, all chatters were in agreement to change the topic. Rosario suggested talking about school, while Carlos suggested talking about Thanksgiving—the topic which they eventually settled on after the episode ended. What is interesting about this exchange is that all of the learners recognized that it was difficult for them to discuss the given topic, and they collectively negotiated a topic that would work for them.

Sometimes when learners negotiated whether or not to go or stay off task, conflicts emerged. In Segment D, a conflict was produced during an off-task discussion of weekend plans, when one learner decided that it was time to get back on task.
SEGMENT D: Freedom

When Carmen (C) suggested returning to the assigned task, Beatriz (B) responded with an emphatic NO! Beatriz then summarized in one sentence all she had to say about the assigned topic and indicated her desire to talk about something more interesting to her. Carmen tried two tactics to get back on task. First, she expressed her concern that their participation grade would be lowered for being off task. Then she pushed Beatriz to explain her statement that money equals freedom. When Beatriz refused to accept the solicited topic of discussion, Carmen implored Beatriz one more time (line 11), stating that she did not understand Beatriz’s previous statement. The instructor then reentered the room, and Beatriz held on to the assigned topic, if only temporarily. As soon as the instructor left, however, the conversation reverted to off-task mode again.

Although Guajira (G) wished to remain on task, she was not able to do so because the other two interlocutors entered into discussion of another topic. So Guajira conceded and joined the off-task discussion. On another occasion, however, Beatriz’s attempt to initiate off-task discussion was overcome by the other two communicators, and the assigned topic was kept. Segment E (from Episode 2G) shows this exchange.

SEGMENT E

B: quiero salir para mi casa
B: I want to leave for home
B: hoy es VIERNES!!!
G: podemos ir a paso 2?
C: si, pienso
5 B: estoy de acuerdo
B: I agree
B: today is FRIDAY!!!
G: can we go to paso 2?
C: yes, I think so
From the above segments, it can be seen that the discussion was triggered when the instructor was not present and when one or more communicators decided to abandon the assigned topic for another, more interesting one. As Larsen-Freeman (1980) pointed out, discursive behavior of one interlocutor assigns certain communicative roles to the other interlocutors. Therefore, when one person solicits an off-task discussion, the off-task discussion occurs only if the interlocutors follow the lead of the solicitor. This situation leads to one of three results. First, the interlocutors can follow the lead of the solicitor and move into an off-task discussion. Alternatively, the interlocutors can remain on task, obligating the off-task solicitor to remain on task as well. Finally, a disagreement can take place about whether to remain on task or go off task. Eventually the disagreement has to resolve itself in favor of either off- or on-task discussion.

Social Cohesiveness

The chatters in this study engaged in extensive (on-task and off-task) electronic discourse which required them to collaborate with each other a great deal in order to establish and maintain coherent discussion. In addition to this type of collaboration, the learners also engaged in communicative behaviors that served the purpose of social cohesiveness.

Chun (1994) reported that her learners performed a wide range of interactional speech acts in chat rooms, including everyday social encounters such as greetings, leave takings, and the use of polite formulas. In the current study, similar language functions occurred very frequently. These discourse functions, which Chun referred to as demonstration of “minimal sociolinguistic competence,” became an important part of the chat discussions in that they allowed learners to share their feelings with each other and to demonstrate a sense of sociability. Such measures of social cohesiveness enabled learners to construct what Meskill (1999) refers to as a community of learners, and what Wenger (1998) calls a community of practice. In Wenger’s view, learning is largely a function of social participation in communities of practice. “Participation here refers not just to local events of engagement in certain activities with certain people, but to a more encompassing process of being active participants in the practices of social communities and constructing identities in relation to these communities.” The following excerpts illustrate learner communicative behaviors which led to the construction of an online discourse community of Spanish learners.
Interactional Features of Synchronous CMC

Greeting and Leave-taking

In many of the episodes, the learners (and the teacher when she was present) spent a significant amount of time greeting each other and talking about their current state of being or activities of importance to them before beginning their assigned task. Such conversation was not labeled by the researcher as off-task discussion since the tasks had not officially begun and since this type of discussion appeared to serve a social purpose rather than avoiding the assigned task. Segment F shows an example of greeting talk.

SEGMENT F

```
A: Hola Mario, como estas hoy?
M: Hola Amparo. Estoy muy bien. Y tu?
A: mmm ... estoy asi asi
M: Que paso en tu vida? Cualquier
interestante?
A: es viernes, pero no puedo salir este
noche, porque tengo demasiado mucho
tarea
A: :-(
10 I: Hola como estas? que hay de nuevo?
A: fui a ver Dracula anoche
I: Amparo estas contenta?
A: estoy asi asi
M: Lo siento Amparo ..Como fue la
ballet?
A: Fue bueno
A: Me gusta mucho a Renfield
I: Ampero, A que ballet fuiste?
M: Me gusta la ballet, pero a veces The
Pittsburgh Ballet no baila bien!
A: Fui a Dracula
A: si! es la verdad
I: Te gusto?
A: Si, me gusta
25 M: Recuerdaste quien bailo la primeras
partes?
I: A mi tambien me gusta EL ballet, pero
prefiero la danza moderna ...
A: ummm .. recuerdo caras pero no
nombres .. lo siento
30 A: tengo la programa en mi casa
I: Tienes El programa de Dracula?
A: si, en mi casa
M: Ahhhhh ...Creo que fue el ballet aqui en
Pittsburgh ..Tienen sus libros?
35 I: Mario, ?recuerdaste?
A: ?
I: Como se dice “recordar” en preterito?
A: ?
40 M: Si, recorde(?) mi libro.
I: Se dice “recordante”. Bueno, empccemos con los pasos ...
```
Many of the episodes in the study began with this sort of lengthy greeting and small talk before learners dove into their assigned tasks. In very few episodes did the learners begin the tasks immediately without taking time to greet each other. It appears, then, that getting sufficiently acquainted with each other each week was an important part of building their online discourse community. In some of the episodes, the leave takings were rather elaborate as well. Segment G shows one of these.

SEGMENT G

| 1 | J: | tienen un buen día ... |
| 2 | J: | chao |
| 3 | Is: | piensas que es todo para hoy |
| 4 | J: | sí |
| 5 | Is: | adiós ... |
| 6 | P: | sí, hasta luego |
| 7 | A: | Que tengan buen fin de semana |
| 8 | Is: | Me gusta hablar con UdS. Adiós |
| 9 | Is: | sí y tú también |
| 10 | Is: | yo también |

The chatters bid each other farewell in a more elaborate way than simply saying adiós ‘good bye.’ Isabel (Is) initiated the leave taking, Javier (J) and the instructor (I) both wished the others a nice weekend, and Adia (A) expressed her enjoyment of having chatted with everybody. Employing their developing L2 sociolinguistic competence in this way, they exited the conversation maintaining the type of social cohesion that they established and maintained throughout the entire chat session.

Use of Humor

In addition to greetings and leave takings, social cohesiveness was evident in other parts of the chat room conversations. In some of the episodes the learners and the instructor engaged in various forms of humor such as teasing and joking with each other. Sometimes the jokes were one-liners (e.g., in a conversation about animals in week eight, one learner said Tengo un gato y un novio. ‘I have a cat and a boyfriend.’). At other times the joking occurred over several turns of conversation and involved most or all of the group as shown in Segment H.
SEGMENT H: Sexism

In the midst of a conversation about sexism, Pico (P), the only male in the group, put forth a sexist remark. It is, of course, possible that what he expressed in this segment represented his true opinions, but, judging from the entire episode from which the segment came and the researcher’s observations of laughter during the chat session, it seems that Pico was in a playful mood during this chat session. It appears that he was taking advantage of his being the only male in the room to be playful with his female interlocutors.

The use of humor and teasing has a potential to develop strong positive and negative feelings. The humor that occurred in the above two segments contributed to the social cohesiveness of the chat room environment and thereby nourished the online discourse community. It is also noteworthy that the language play occurred almost entirely in Spanish, with very little recourse to English. Thus, when learners engage in speech events such as teasing and joking, they have an opportunity to expand their sociolinguistic competence in their L2.

Identity/Role Play

If joking and teasing contributed to the social environment of the chat rooms, role playing and experimenting with new identities were two other noted interactional features that seemed to fulfill similar purposes. Two of the female learners adopted masculine names for their chat pseudonyms (Mario and Pablo). While Pablo never assumed a masculine role in the conversations, Mario did. In the first episode, for example, Pablo stated that she was tired (Estoy cansada) using the feminine form of the adjective which immediately revealed her female identity. In another episode, when the topic was sexism, she took on a very pro-female stance. Mario, however, acted the opposite. In the first episodes, whenever she described herself with adjectives in Spanish, she used the masculine form (Estoy
cansado). She even went as far as to correct another learner who asked her *Por qué estás cansada?* and used the feminine ending. In the sexism discussion, Mario took on a very neutral stance without revealing her female identity. She maintained her male identity throughout the chat sessions. Mario’s maintenance of a male identity not only had social but also linguistic ramifications. It forced her to pay close attention to Spanish morphology (especially nouns and adjectives), which she did consistently throughout the study.

Beyond the adoption of particular pseudonyms, some learners also engaged in role plays throughout their chat sessions. Segment I illustrates one of these role plays.

**SEGMENT I**

<table>
<thead>
<tr>
<th>B:</th>
<th>selena viva!!</th>
</tr>
</thead>
<tbody>
<tr>
<td>G:</td>
<td>yay selena!</td>
</tr>
<tr>
<td>S:</td>
<td>Calmadas por favor, Oriita estoy trabajando en un nuevo cancion.</td>
</tr>
<tr>
<td>5</td>
<td>B: ha ha</td>
</tr>
<tr>
<td>B:</td>
<td>bueno</td>
</tr>
<tr>
<td>M</td>
<td>bidi bidi bam bam</td>
</tr>
<tr>
<td>C:</td>
<td>Mi padre ama Selena</td>
</tr>
<tr>
<td>M</td>
<td>ahh, bueno</td>
</tr>
<tr>
<td>10</td>
<td>B: me gusta su cancion antes de muertes</td>
</tr>
<tr>
<td>M</td>
<td>Este conversacion es muy interesante</td>
</tr>
<tr>
<td>B:</td>
<td>si</td>
</tr>
<tr>
<td>S:</td>
<td>Tambien tengo una nueva linea de ropa.</td>
</tr>
<tr>
<td>15</td>
<td>B: ha ha, me gusta ropa que cubrir mi cuerpo</td>
</tr>
<tr>
<td>B:</td>
<td>pero, me gusta ropa que cubrir mi cuerpo</td>
</tr>
<tr>
<td>M</td>
<td>Selena, nos tenemos lo mismo apeido</td>
</tr>
<tr>
<td>S:</td>
<td>QQue bien, te voy ayudad con un vestido</td>
</tr>
<tr>
<td>B:</td>
<td>selena alive!!</td>
</tr>
<tr>
<td>G:</td>
<td>yeah selena!</td>
</tr>
<tr>
<td>S:</td>
<td>Calm please. Right now I’m working on a new song.</td>
</tr>
<tr>
<td>B:</td>
<td>ha ha</td>
</tr>
<tr>
<td>B:</td>
<td>good</td>
</tr>
<tr>
<td>M</td>
<td>bidi bidi bam bam</td>
</tr>
<tr>
<td>C:</td>
<td>My father loves Selena</td>
</tr>
<tr>
<td>M</td>
<td>ahh, good</td>
</tr>
<tr>
<td>B:</td>
<td>I like her song before deaths</td>
</tr>
<tr>
<td>M</td>
<td>This conversation is very interesting</td>
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<tr>
<td>B:</td>
<td>yes</td>
</tr>
<tr>
<td>S:</td>
<td>I also have a new line of clothing.</td>
</tr>
<tr>
<td>B:</td>
<td>ha ha, I like clothing</td>
</tr>
<tr>
<td>B:</td>
<td>but, I like clothing that covers my body</td>
</tr>
<tr>
<td>M</td>
<td>Selena, we have the same last name</td>
</tr>
<tr>
<td>S:</td>
<td>Great, I’m going help you with a dress</td>
</tr>
</tbody>
</table>

The interlocutors initiated the role play situation for Selena (S), which is also the name of a famous Mexican American singer whose murder had made international news. Selena followed the role play with her comment about working on a new song. María (M) typed the words to one of Selena’s favorite songs, and Carlos (C) added that his father really likes Selena. When Selena referred to her new line of clothing, Beatriz (B) added that she likes clothing that covers her body, a comment that apparently refers to the attire of the singer. After this segment, the learners returned to serious conversation of the assigned topic. The role play gave learners the chance to talk about a famous Spanish-speaking person as well as to enjoy themselves in their chat session.

**Sarcasm/Insults**

Similar to joking and teasing, the transcripts of the chat sessions in the study show many instances of use of sarcasm and insults. Segment J contains one of these instances.
The learners had been instructed to each look up the constitution of a Spanish-speaking country and to comment on the liberties granted therein. When Mia and Pablo both wished to discuss the constitution of Mexico, Pablo began to get difficult with Mia. She limited her disagreement to saying “no” (lines 5-7). By lines 14-15, however, she became aggressive with Mia, stating that there is no rule that says they could not both work with the Mexican constitution. Sarcastically, she asked Mia if she was happy and told her not to cry. Javier was caught in the middle and seemed to be confused, perhaps thinking that they all needed to decide on one constitution. In Segment K, Pablo made a cyber attack on another learner, but this learner decided to return the insult.

Pico (PL) indicated his disagreement with Pablo’s choice of good music groups. Although his comment (bahr) was rather mild, Pablo (P) responded with an expletive. Natalia (N) and Javier (J) interjected mitigating comments, but Pablo continued to insult Pico. Unlike Javier in the previous episode, however, Pico decided to return the verbal attack with a com-
ment that temporarily ended the incident. A short while later, however, another round of insults emanated from Pablo (see Segment L).

SEGMENT L

<p>| | | | | | | | | | | | | | | |</p>
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</tr>
</thead>
<tbody>
<tr>
<td>10</td>
<td>PL: el grupos o mujeres desnudos</td>
<td>P: puedo darle su numero de telefono puta</td>
<td>P: tu no me sabes. cierra la boca mentiroso</td>
<td>J: AH Okay por favor ninos obstena de usar palabras malas. Cuanto veces tengo que decirlo</td>
<td>J: AH Okay please kids abstain from using bad words. How many times do I have to say it?</td>
<td>P: you want to ask my mother</td>
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Segments J-L illustrate what is commonly referred to as flaming in Internet terminology, electronic discourse characterized by inappropriate or excessive emotionalism, bluntness, or hostility (Sproull & Kiesler, 1991). It is believed that flaming is a very frequent Internet phenomenon, and that aggression in general is higher online than off (Wallace, 1999). It is likely that anonymity and not being face-to-face contribute to this high amount of flaming. In other words, people may feel more comfortable insulting others while hidden behind their computers than in a face-to-face situation. Learners in this study sometimes spouted off insults which were interspersed with more serious interaction, at some points taking over the serious interaction completely. One researcher working with college English composition students noted a great deal of cursing among the students which he called a “tidal wave of obscenity and puerility” (DiMatteo, 1990). In this study, it appears that flaming, at least to some extent, is a form of humor among learners. It does not appear that the learners truly meant to insult each other but rather to have fun with each other in Spanish in their learner-centered chat room discourse community. It is likely that they picked up these expressions from native speakers of Spanish and decided to practice using them with their classmates in the chat rooms. The use of profane language in this study, then, indicates another way in which these learners developed their sociolinguistic competence in Spanish. After all, knowing how, when, and whom to insult must be learned in an L2 as well as in an L1. It was notable in this study, for example, that none of the learners ever insulted the instructor as they did each other. In this way, the chat room context provided a communicative forum for the development of a type of sociolinguistic competence.
Interactional Features of Synchronous CMC

which, as would be expected, is not promoted in the typical L2 classroom but is, nevertheless, part of native speakers’ use of the L2 that these chatters are learning.

Use of English

A final interactional feature of interest in the study was the minimal use of the learners’ L1 (English). Both learners and instructor maintained Spanish as the language of communication throughout the nine chat sessions with few exceptions. When English was invoked, it was almost always to express an unknown lexical item in Spanish. Learners usually stated the entire sentence in Spanish and placed the unknown word in parentheses in English (e.g., es una (guess), … mirar a un (website …), and … las programas son (fake)). English was also used to clarify a word or expression in Spanish when the meaning was less than clear. Some examples include “que es “violada”? rapist or victim?” “que significa “amenazar”? Threatened?” Finally, English was occasionally used to give instructions for the task at hand, for example, “ok go to file and click on ‘choose new window’” and “la instructor dice ‘you should stick to the lesson plan’”.

It appears that when English was used, it was for the purpose of efficiently maintaining conversation in Spanish. For example, many of the English lexical items that were used in the chat sessions contained less common concepts that the learners probably had not been exposed to in the L2. Words used in this study such as “overblown,” “kinky,” “yuck,” and “old boy network” represent concepts that may not be part of common, everyday speech that formed the basis of the learners’ L2 experience. In order to express the meanings of these words, the learners could either attempt to circumlocute in Spanish or to use the word in English and continue the conversation. In some cases the latter, more efficient option was chosen.

The use of the L1 in L2 classes remains a debated issue in foreign language methodology. Many advocates of communicative language teaching would not condone any L1 use in the L2 class, believing that L2 learners need as much exposure and practice as possible within a solely L2 context. The L1 could also be viewed, however, as a semiotic tool to be strategically employed in maintaining communication in the L2 when the interlocutors all share the same L1. It is much easier to say a word in English and to continue the conversation in Spanish than to spend a long time trying to explain a concept in Spanish and still not getting the exact meaning across. Use of the L1—an essential part of the learners’ linguistic repertoire—as a mediational tool is consonant with a sociocultural view of L2 learning. With only minimal, strategic use of English, these learners
were able to maintain 50 minutes of electronic conversation almost exclusively in Spanish.

CONCLUSION

The purpose of this study was to examine the interactive features of synchronous CMC that emerged throughout nine weeks of in-class chat sessions. Discourse analyses revealed the unique ways in which learners took ownership of the chat room environment and constructed a dynamic, learner-centered discourse community characterized by discussion of topics of mutual interest, social cohesiveness and group belonging, joking, teasing, experimenting with identities, role plays, and even playfully insulting each other. In other words, the learners in this study used their L2 in the chat rooms for solidarity and enjoyment while, at the same time, developing their sociolinguistic competence.

The sociocultural theoretical framework, with its emphasis on social aspects of language learning, is a robust paradigm in which to frame this study of chat room communication as mediator of language learning. The social, cognitive, and affective functions of interaction illustrated in this study are consonant with the sociocultural view of discursively constructed L2 learning. The study also lends support to Vygotsky’s claim that the employment of cultural tools, such as the computer in this case, not only facilitate the achievement of a given task but can also alter the entire process and outcome of task performance. As SLA researchers and practitioners, it would benefit us to acquire as full an understanding as possible of the nature of computer mediation in the L2 learning process. It is hoped the empirical account provided by this study will fuel the ongoing investigation of that endeavor.

NOTE

1 In this and all subsequent transcripts, the researcher attempted to render in English the same grammatical and lexical inaccuracies as in the original Spanish.
Interactional Features of Synchronous CMC

APPENDIX
Sample Chat Room Task
(Week 4: “Movies”)

Step 1: After seeing some information about movies in “Yahoo” in Spanish, think about a movie that you have seen recently (it can be a movie that you read about in Yahoo or any other movie). Mention the movies in the chat room. Have you seen a movie in Spanish?

Step 2: Everyone should describe a movie that the others have not seen. Speak briefly about the characters and what happened in the movie. The others should ask questions for clarification and additional information. Be careful with the use of the preterite and the imperfect when you describe what happened in the movie. [El protagonista era una persona muy amable (imperfecto). Se enamoró de una persona antipática (pretérito).]

If someone has seen a movie in Spanish, they should comment on the differences between this movie and Hollywood movies.

Step 3: After everyone has described a movie, mention if you liked the movie you saw or not, and explain why.

Step 4: Discuss the role that movies have in contemporary society. Why are movies filmed? Why do people go to the movies or rent movies on video? What are some positive and negative aspects of movies in society? You can mention, for example, psychological, social and economic aspects.

Step 5: Give your opinion about what society would be like if movies did not exist. Be careful with the use of the conditional and the imperfect subjunctive. [Si el cine no existiera (imperfecto del subjuntivo), la sociedad sería (condicional) muy aburrida.] Mention both positive and negative aspects. Do you agree with your classmates?

Step 6: Everyone should summarize their general opinion about movies in society. Have you changed your ideas as a result of today’s conversation?

REFERENCES


Interactional Features of Synchronous CMC


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