

# Languaging: Collaborative Dialogue as a Source of Second Language Learning

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A theoretical claim is that languaging is a source of second language (L2) learning (Swain, 2006, 2010). The concept of languaging derives from Vygotsky's work which demonstrated the critical role language plays in mediating cognitive processes. Language and thought are not the same thing; in fact, Vygotsky argued that language "completes thought." In essence, we can think of languaging as an activity, a "process of making meaning and shaping knowledge and experience through language" (Swain, 2006, p. 98), and as such, it is part of the process of learning. The verb *languaging* forces us to understand language as a process rather than as an object.

When confronted with a complex problem, we may speak with another person about the problem and how to solve it (collaborative dialogue, interpersonal communication), or we may speak aloud or whisper to ourselves (private speech, intrapersonal communication). These are two types of languaging. Talking with (or writing to) others and talking with (or writing to) oneself are connected theoretically and in practice. As with any example of languaging, the goal is to solve a complex cognitive problem using language to mediate problem solution.

In this entry, we first define collaborative dialogue (a type of languaging). Following that, we discuss some of the research which suggests that collaborative dialogue is a source of L2 learning and development, and ways in which collaborative dialogue mediates L2 learning and development. This is followed by a discussion of studies which consider the impact context has on the quality and quantity of collaborative dialogue. We conclude with a statement of why collaborative dialogue is important to both learners and teachers of second or foreign languages. Our focus throughout this entry is on research concerning collaborative dialogue *between peers* in the area of second or foreign language education. We include studies that (a) explicitly use the term collaborative dialogue, or (b) provide data which we consider to be examples of collaborative dialogue although the researchers may label it differently.

## Definition

Collaborative dialogue has been defined as dialogue in which speakers are engaged in problem solving and knowledge building (Swain, 2000). Collaborative dialogue may be about anything (e.g., mathematics, physics, language). During collaborative dialogue, one or both speakers may refine their knowledge or come to a new or deeper understanding of a phenomenon. Speakers (or writers) are using language as a cognitive tool to mediate their own thinking and that of others. Speaking produces an utterance, a product (an artifact) that can be questioned, added to, discredited, and so forth. This action of co-constructing meaning is collaborative dialogue, and is a source of language learning and development.

The example below is illustrative. In this example, two grade 8 French immersion students, Doug and Kathy (pseudonyms), are in the process of writing out a story based

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on a set of pictures they have been given (see Swain & Lapkin, 1998, for details of the task). In the part of their dialogue provided below, they are working out how to write in French their intended meaning, “while she combs her hair and brushes her teeth,” to complete what they have already written, “*Yvonne se regarde dans le miroir . . .*” (“Yvonne looks at herself in the mirror . . .”). The translation of what Doug and Kathy say is in **bold**.

- 1 Kathy: Pendant qu’elle brosse les cheveux.  
**(while she brushes her hair)**
- 2 Doug: Et les dents.  
**(and her teeth)**
- 3 Kathy: Non, non, pendant qu’elle brosse les dents et . . .  
**(No, no, while she brushes her teeth and . . .)**
- 4 Doug: Elle se brosse . . . elle SE brosse.  
**(She brushes . . . she brushes [emphasizes the reflexive pronoun])**
- 5 Kathy: Pendant qu’elle se brosse les dents et peigne les cheveux.  
**(While she brushes her teeth and combs her hair)**
- 6 Doug: Ya!
- 7 Kathy: Pendant qu’elle . . . se brosse . . . les cheveux, I mean, no, pendant qu’elle se PEIGNE les cheveux.  
**(While she . . . brushes . . . her hair, I mean, no, while she COMBS her hair)**
- 8 Doug: Ya.
- 9 Kathy: Et se brosse . . .  
**(And brushes . . .)**
- 10 Doug: Les dents.  
**(Her teeth.)**
- 11 Kathy: Pendant qu’elle SE peigne les cheveux et SE brosse les dents.  
**(While she combs her hair and brushes her teeth [emphasizes the reflexive pronouns])**  
(from Swain, 2000)

In this example, we see Kathy and Doug co-constructing the second half of the sentence. They end up with the complex and correct structure “*pendant qu’elle se peigne les cheveux et se brosse les dents*” (“while she combs her hair and brushes her teeth”). To do so, they had to consider which verb goes with which noun, and the reflexive nature of the particular verbs they were using. Kathy started off with “*brosse les cheveux*,” a phrase that directly translates the English “brushes” and “hair.” Doug’s offer of “*et les dents*” (“and her teeth”) in turn 2, however, triggered Kathy to reject her verb/noun collocation of “*brosse/cheveux*” and replace it with the more usual collocation of “*brosse/dents*” (turn 3). Doug quickly reacted to Kathy’s use of “*brosse*” in turn 3 by pointing out through emphasis in turn 4 that “*brosse*” is a reflexive verb: “*elle SE brosse*.” Kathy incorporated this information in turn 5 for “*brosse*” and generalized it (correctly) to “*peigne*” in turn 7 although her focus in turn 7 was on using the verb that best accompanied “*les cheveux*.” In turn 9, with Doug’s encouragement, she continued with “*et se brosse*,” then hesitated. Doug again provided her with the appropriate noun “*les dents*.” In turn 11, Kathy shifted her focus to the form of the verbs as reflexives, thus fully incorporating Doug’s contributions to this conversation.

The dialogue between Kathy and Doug represents “collective cognitive activity which serves as a transitional mechanism from the social to internal planes of psychological functioning” (Donato, 1988, p. 8). Through it, they regulated each other’s mental (and affective) activity, and their own. Their dialogue provided them with opportunities to co-construct a complex linguistic structure by focusing their attention and providing opportunities to revise their own language use.

## Collaborative Dialogue as a Source of Learning

A number of studies have suggested that peer–peer collaborative dialogue is *a source* of L2 learning. Donato’s (1994) pioneering study examined the collaborative dialogue of three university learners as they jointly constructed a scenario to be performed in French, the foreign language they were studying. The analysis of the collaborative dialogue revealed that the three learners, regardless of their linguistic abilities, provided mutual support to each other in order to solve the linguistic problems that they encountered, much as Kathy and Doug did in the example above. Some of the forms that the students collaboratively constructed were successfully reused after their interaction when they role-played the scenario. Donato’s study demonstrated that although the students were individually novices, collectively they were experts who created linguistic forms that none of them could have created on their own.

Swain and her colleagues have shown how peer–peer interaction provides L2 learners with an opportunity to engage in collaborative dialogue as they seek out and provide assistance with language-related problems (e.g., Swain & Lapkin, 2002; Watanabe & Swain, 2007; Brooks & Swain, 2009). These studies used language-related episodes (LREs) as a unit of analysis to operationalize the construct of collaborative dialogue. Swain and Lapkin (1998) defined LREs as “any part of a dialogue where the students talk about the language they are producing, question their language use, or correct themselves or others” (p. 326). In other words, through collaborative dialogues, students form and test hypotheses about appropriate and correct use of language, as well as reflect on their language use. By using posttests tailor-made to the LREs produced by each pair of students, it is possible to trace the L2 learning that occurred during the LRE. Thus an LRE is a useful unit for understanding the process and product of L2 learning. In effect, LREs represent L2 learning in progress.

Other research has explored whether peer–peer collaborative dialogue is more effective in learning vocabulary and grammar than working alone. When the solitary condition involves the use of private speech (versus think-alouds, which do not necessarily serve the same mediating function as private speech), the two conditions appear to produce comparable results. For example, Borer (2007) explored the effect on learning L2 vocabulary of languaging in the form of collaborative dialogue and private speech. She examined eight English for academic purposes (EAP) students who were learning five unknown words when working alone and five different unknown words when working in pairs. Borer found that individual and pair conditions were equally effective. Other research examining whether collaborative dialogue is more effective than private speech in learning vocabulary (Kim, 2008) and L2 grammar in writing (Storch & Wigglesworth, 2007) found the results favored the pair condition.

## Mediational Means Used During Collaborative Dialogue

Research has examined the use of different mediational means during collaborative dialogue. These mediational tools include scaffolding, the use of the L1, and repetition.

### Scaffolding

The concept of scaffolding (Wood, Bruner, & Ross, 1976), the process by which an adult assists a child to complete a task beyond the child’s actual developmental level, initially referred to adult–child interaction only. However, researchers who applied the notion of scaffolding to peer interaction demonstrated that peers can simultaneously be experts and novices and thus are able to provide scaffolded assistance to each other (e.g., Donato, 1994; Ohta, 2000). These studies have contributed to the extension of the concept of scaffolding

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from the unidirectional help of the expert to the novice to an opportunity for learning and development for all learners.

For example, Villamil and de Guerrero (1998) examined the collaborative dialogue that occurred during two peer writing revision sessions carried out by seven pairs of adult learners of English. The data indicate that a large majority of modifications (74%) discussed during peer revisions were incorporated into the final drafts. The researchers also found evidence of development in the learners' shift from other-regulation to self-regulation while engaging in collaborative dialogue.

### Use of L1

Use of the L1 in L2 classrooms is a controversial issue. Sociocultural theorists argue that L1 has a place in the second language classroom because it is a cognitive tool essential to make sense of the L2 learning process. Antón and DiCamilla (1998) investigated the socio-cognitive functions of L1 use in the collaborative dialogue of adults learning Spanish as an L2. Qualitative analysis of five dyads working collaboratively on writing tasks demonstrated how the L1 mediated intersubjectivity and externalization of inner speech (i.e., private speech) during cognitively difficult activities.

In their examination of the collaborative dialogue between university ESL students as they engaged in peer revision of their L2 writing, Villamil and de Guerrero (1996) found that the learners used their L1 to make meaning of text, solve language-related problems, generate ideas, gain control of the task, and maintain dialogue. Villamil and de Guerrero's study underscored the importance of the L1 as an essential cognitive tool for the learners' collaborative problem solving.

### Repetition

DiCamilla and Antón (1997) examined the use of repetition to mediate solutions to language-related problems. The participants in their study were adult L2 Spanish learners engaged in collaborative writing tasks. DiCamilla and Antón concluded that in peer-peer collaborative dialogue, repetition functioned to create and maintain learners' shared perspective of the task and mediated the co-construction of linguistic knowledge.

## **Contexts Implicated in the Quality and Quantity of Collaborative Dialogue**

Recent studies on collaborative dialogue have focused on how aspects of the context affect the quality and quantity of collaborative dialogue. The research to date has examined patterns of pair interaction (e.g., Storch, 2002), the level of L2 proficiency (e.g., Leiser, 2004; Kim & McDonough, 2008; Watanabe, 2008), type of tasks (e.g., Swain & Lapkin, 2001; de la Colina & Garcia Mayo, 2007), and computer-mediated communication (CMC) (e.g., McDonough & Sunitham, 2009; Zeng & Takatsuka, 2009).

### Patterns of Pair Interaction

Storch (2002), in her study of collaborative tasks in an adult ESL classroom, uncovered four different patterns of pair interaction that influenced the degree of collaboration and opportunities for learning. In the collaborative pattern, both learners work together throughout the task completion process and are willing to share ideas with each other. In dominant/dominant pairs, there is an unwillingness or incapacity to engage with each other's contribution. Dominant/passive pairs involve a dominant participant with an authoritarian stance who takes control of the task, and a passive partner who maintains a subservient

role. In expert/novice pairs, the more knowledgeable learner (expert) actively encourages the less knowledgeable learner (novice) to engage in the task. Storch found that the pairs with a collaborative orientation (collaborative and expert/novice) afforded more opportunities for learning than the pairs with a non-collaborative orientation (dominant/dominant and dominant/passive). Using Storch's (2002) framework, Watanabe and Swain (2007) proposed an additional pattern of interaction (expert/passive), indicating a need for further study in this area.

### Proficiency Differences

Kowal and Swain (1997) documented that in a highly heterogeneous grouping (e.g., upper-middle and low), the stronger student tended to carry out most of the work either because the weaker student was too intimidated to say anything, or was willing to let the stronger student do the task, or was not allowed to do any of the task whether their opinion was valid or not. A successful support framework for group members requires respect for one another's perspectives and trust in each other's opinions. This may be difficult to achieve when proficiency differences are too large.

Leeser (2004) focused on the impact of learner proficiency on collaborative dialogue in an adult L2 Spanish class as they engaged in a dictogloss task. Leeser analyzed the frequency, type (i.e., lexical or grammar-based) and outcomes of LREs (i.e., problem solved correctly, not solved, or solved incorrectly) produced by three different groupings of learners: high-high, high-low, and low-low. Leeser found that as the overall proficiency of a pair increased, the learners produced a greater number of LREs, correctly resolved more LREs, and focused more on form than on lexical items.

Watanabe (2008) and Watanabe and Swain (2007) investigated how four adult ESL learners each interacted with both more and less proficient peers and how their interaction affected the nature of collaborative dialogue and L2 learning. The analysis of the collaborative dialogue and patterns of pair interaction as well as pre- and posttest scores suggested that the patterns of pair interaction greatly influenced the frequency of LREs and posttest performance. When the learners engaged in collaborative patterns of interaction, they were more likely to achieve higher posttest scores regardless of their partner's proficiency level. The researchers thus claimed that proficiency differences did not seem to be the decisive factor in affecting the nature of collaborative dialogue. Rather, the pattern of interaction co-constructed by both learners had a greater impact (see also Kim & McDonough, 2008).

### Type of Task

Researchers have also explored whether the type of task affects the quality and quantity of collaborative dialogue (e.g., Swain & Lapkin, 2001; de la Colina & García Mayo, 2007). Swain and Lapkin (2001) examined how different task types (jigsaw and dictogloss) encouraged form-focused LREs of grade 8 French immersion students in two different classes. The students in one class engaged in a jigsaw task while the students in the other class completed a dictogloss task. No significant differences were found between form-focused LREs generated by the two different tasks (see also de la Colina & García Mayo, 2007). Both tasks generated a comparable and substantial proportion of form-focused LREs. The most salient difference was that the dictogloss imposed a smaller range in the total number of LREs produced by the students relative to the jigsaw task.

### Computer-Mediated Communication (CMC)

CMC is a relatively new interaction context that has begun to be investigated. Studies have explored the role of peer-peer (face-to-face) collaborative dialogue at the computer (e.g.,

McDonough & Sunitham, 2009) and text-based (online) collaborative dialogue (e.g., Zeng & Takatsuka, 2009).

McDonough and Sunitham (2009) investigated whether Thai EFL learners reflect on and remember language forms during computer-mediated collaborative tasks in a self-access environment. The analysis of LREs and tailor-made tests of 48 Thai EFL learners indicate that they successfully resolved the majority of their LREs in collaboration with their peer. However, it was found that learners remembered only one-third of the grammatical forms and less than half of the lexical items that they had discussed. The authors speculated that because the computer activities were not connected or reinforced during class time, the learners might have had little motivation to remember the language items.

Zeng and Takatsuka (2009) examined the collaborative dialogue between Chinese EFL learners as they carried out collaborative tasks in a CMC context using online chat. The researchers found that the learners provided assistance to each other in attending to language forms, which promoted metalinguistic awareness. The analysis of LREs showed that the students produced a high frequency of LREs and successfully resolved most (90%) of the emerging language problems. The results of two tailor-made posttests suggested that collaborative dialogue was a source of L2 learning.

## Conclusion

The studies we have discussed indicate how languaging as collaborative dialogue is a source of L2 learning. Analyses of learners' collaborative dialogues have shown how L2 learners use language as a cognitive tool to mediate their thinking, and how talking about the language mediates L2 learning and development. Evidence that collaborative dialogue is a source of L2 learning is based on tracing relationships between collaborative dialogue as process and product, and tailor-made posttests. Still under-researched is whether collaborative dialogue mediates the learning of L2 reading and listening, and L2 pragmatics. Also worthy of exploration is how the presence of specific artifacts such as textbooks affects the quality and quantity of collaborative dialogue. The importance of collaborative dialogue to teachers and learners of second or foreign languages is that by listening to it, insights into the cognitive and affective processes that learners are using in their particular learning/teaching context are inevitable.

**SEE ALSO:** Inner Speech in Second Language Acquisition; Internalization in Second Language Acquisition: Social Perspectives; Language Play in Second Language Acquisition; Lantolf, James P.; Ohta, Amy Snyder; Private Speech in Second Language Acquisition; Sociocultural Theory Approaches to Second Language Acquisition; Swain, Merrill; Vygotsky and Second Language Acquisition; Zone of Proximal Development in Second Language Acquisition

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