ORIGINAL ARTICLE

Peer Interaction by English as a Foreign Language (EFL) Students in a Decision Making Task

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ABSTRACT
Tasks are frequently used in English as a Foreign Language (EFL) classes. The sociocultural theory considers tasks to mediate learners through language. However, how a specific task can embrace such a claim remains an issue to explore. This study was set out to address the questions of how a decision making task stimulated interaction among peers and how it mediated knowledge construction. Thirty EFL junior college students forming fifteen pairs participated in the study. The recorded videos of their decision-making task performance were used for data analysis. The findings reveal that cumulative talk was present in all pairs' recordings. While exploratory talk was not generated as frequently as cumulative talk, it tended to conduce to more language learning and knowledge construction. The findings also indicate that with the same task, peers interacted in different patterns and mediated each other by providing immediate assistance with English vocabulary and ideas.

1. INTRODUCTION

Interaction among peers in language classes has been emphasized for its benefits of promoting idea exchanges, language use and collaborative work. When facilitated effectively, peer interaction is supposed to result in language learning. The appearance of the communicative language teaching approach in the 1980s was a catalyst for the creation and use of language tasks that put peers into communication in the classroom. Seen from sociocultural theory (SCT) perspectives (more discussion of the theory is presented in the literature review of this paper), peer interaction plays critical role in students' language learning because their language use serves to scaffold one another in performing language tasks. Peer scaffolding may even mediate and assist students to do the language activities beyond their current abilities.

This paper reports an empirical study on how a decision making task stimulated interaction among peers and how it mediated knowledge construction. Given the fact that tasks are vital in EFL classes for promoting real-world processes of language use, opportunities to speak, and co-constructing meaning (Sato & Ballinger, 2016), exploring the processes of students learning with English tasks will provide insights into how and what students might be able to achieve from tasks. As tasks are considered to perform a mediating role in SCT through peer interaction with the use of explicit language structures and forms emerging from difficulties experienced during the completion of tasks (Ogilvie & Dunn, 2010), analyzing the recorded peer interaction when working on tasks is of significance.

2. LITERATURE REVIEW

This paper adopted SCT as the theoretical framework; thus, the theory is introduced in the following section. Besides, how peer interaction and tasks seen from SCT are presented, followed by the discussion of the previous studies to identify the gaps that the current study to fill.

Sociocultural Theory

Sociocultural theory (SCT) developed by Vygotsky and his colleagues (Lantolf, 2000) maintains that learning occurs during interaction with the world by the application of a number of principles, one of which is mediation. Mediation has been defined as the way in which people change aspects of the world around them using "psychological tools" including cultural artefacts, language, signs or symbols facilitating interaction with the world and enabling cognitive change. Daniels (2015) describes mediation as "the process through which the social and the individual mutually shape each other". In language classrooms, language is used as the most essential tool for language learners to complete the tasks through interacting with each other. In fact, research on interaction drawing on SCT as a framework have shown that learners support each other during oral production by providing assistance and expressing interest and encouragement (Foster & Ohta, 2005) and produce a complex form which no single member of the group could do individually (Donato, 1994).

Mediation in SCT

Research in language learning refers to mediation mainly in expert-novice patterns. Besides, studies have been carried out to explore how talks among peers lead to new learning in the language in forms of vocabulary, structures, new linguistic knowledge and concept understanding (Ahmadian & Tajabadi, 2017; Kim, 2016; Storch, 2001a; Storch, 2001b; Storch, 2002; Zheng, 2012). However, minimal literature can be found to discuss how mediation takes place in a specific task given to EFL learners, especially a decision-making task.

Mediation is considered to take place via scaffolding, a concept first introduced by Wood et al. (1976) who described it as a process of constructive support in form of interaction between an expert (more capable peer) and a novice (less capable peer) until the novice can do things independently. A number of studies have revealed an important finding that there is cognitive value even in homogeneous pairing; that is to say in such peer interaction there are no identifiable or constant "experts" (Ohta, 1995; Villamil & De Guerrero, 1996). In this sense, mediation can occur in collaborative form and accomplishment where scaffolders can exchange their roles frequently and get mutual benefits from providing "peer scaffolding" or "collective scaffolding" (Donato, 1994). This form of assistance is performed when his/her own weaknesses and strengths may be complementary (Ohta, 2001, p. 76). In other words, scaffolding can be defined as a "collaborative process, through which assistance is provided from person to person so that an interlocutor is enabled to do something she or he might not have been able to do otherwise" (Ohta, 2000). Wells (2004, p. 127) considered that scaffolding possesses three particular features in which knowledge is co-constructed, the activity in which knowledge is embedded, and the role of artifacts that mediate knowing. In other words, scaffolding requires the interaction between two peers acting as an expert and a novice alternately and by the use of language, tasks, and other necessary mediational tools. They complete the problem-solving and knowledge-building dialogues collaboratively for the ultimate independent ability of solving language challenges and better linguistic performance.

Peer Scaffolding

SCT also emphasizes mediation via the form of peer scaffolding in language learning situations. Mercer and Fisher (1998) proposed the following criteria of scaffolding help, which should a) enable learners to carry out tasks that they themselves would not have been able to manage; b) be intended to bring learners to a state of competence that will enable them eventually to complete tasks on their own, and c) be followed by evidence of learners having achieved some greater level of independent competence as a result of scaffolding. Moreover, the participants in the peer interaction also play an important role in the process of new knowledge construction and later independence of learning. In the case of peer interaction in speaking tasks, peer scaffolding becomes valuable when the peers should wait for each other to finish their utterance, prompting, through co-construction or recasts (Ohta, 2000). Lin and Samuel (2018) found that peers played different roles as "teachers", "facilitators", "advisors", "examiners", "experts", "evaluators", and "team-players" to facilitate learning grammatical rules, adding missing words and correcting their sentence structures.

Communication Tasks

Tasks aim to involve real-world processes of language use so in EFL collaborative pair work, learners can profit from each other's knowledge, work together to move the task along and co-construct meaning (Sato & Ballinger, 2016). "A task-based activity not only involves comprehension but also gives learners the opportunity to focus

continually on the meaning which demands spontaneous and structurally dissimilar samples of language that have not been rehearsed" (Coultas & Booth, 2019). In SCT, although tasks may provide opportunities for learners to extend their L2 knowledge, these opportunities are not only created by tasks themselves but also by the way in which learners perform them.

SCT emphasizes the role of learners, more knowledgeable peers, the use of language and other mediational tools, social interaction and mutual scaffolding in language learning. With an emphasis on the participants and their social interaction through the mediational tool as language, peer interaction tasks should be chosen with the concerns of the language learners themselves so that "Students act as language users with the explicit analysis of language structures and forms emerging from difficulties experienced during the completion of tasks" (Ogilvie & Dunn, 2010)

SCT suggests using the tasks which can create the learning environment as in real-world in which language learning is a social process between language learners and others within learners' reach and language is one of the semiotic tools (Lantolf & Thorne, 2006). That is to say, individual language learners in their learning environment should have the chance to take active participation in peer interaction and use language as a mediational tool to solve language problems.

Speaking tasks are supposed to create the most interactive opportunities in order to involve students verbalizing their thoughts while working together. According to Mackey and Gass (2005, p. 65), decision making tasks (also called consensus tasks) are to manipulate the kinds of interactions in which learners are involved, the kind of feedback they receive during the interaction, and the kind of output they produce in order to determine the relationship between the various components of interaction and second language learning.

The tasks that have been investigated varied from vocabulary (Ahmadian & Tajabadi, 2017), grammar (Ohta, 2000), reading, writing (Roberson, 2014; Storch, 2001a; Storch, 2002; Watanabe & Swain, 2007; Zheng, 2012) and speaking (Le, 2004; Le, 2007) which are classified into two types of oral and written performance of language. In other words, collaborative interaction and scaffolding provide opportunities for learning through the use of language in oral and written performance. Thus, the speaking and writing tasks are all in the paradigm of SCT and confined within its tenets.

Decision Making Tasks

The aim of this study is to scrutinize how peers interact and mediate with each other in language learning. The adoption of a task that involves dyads is thus necessary. A decision making task usually triggers more talk and the exchange of thinking in the process of "two heads are better than one". Besides, Nunan (2006) pointed out that tasks create an enhancement of the learner's own personal experiences as important contributing elements to classroom learning. There is also the linking of classroom language learning with language use outside the classroom when learners work on a language task.

In this study, the decision-making task was adapted from Pica et al. (1993) in which learner dyads are given a problem for which there are a number of possible outcomes and they must choose one through discussion. "The Desert Island" (Appendix A) by Sadow (1982) provides a situation of two people on a sinking boat and they were allowed to bring five out of twelve items, namely torchlight, pillows, canned food, clothes, freshwater, knives, map, family documents, handphone, first-aid kit, matches and gun, for their survival on a desert island until they were rescued. The task required both participants to use their critical thinking to choose five items and persuade their partners to agree with the items.

Related Studies

Studies on peer interaction have been conducted to explore the interaction patterns established and to show the relationship between the two participants in pair work. For example, Storch (2001a) investigated the patterns of dyadic interaction in the context of an advanced level adult English as a second language class, the formation of different patterns of interaction and the links between these patterns and second language development. The analysis of data from audio-recorded pair talks by 10 pairs completing three different language-focused tasks of writing, observation notes, a survey on attitudes to pair and group work showed four distinct patterns of dyadic interaction: collaborative, dominant/dominant, dominant/passive and expert/novice. The results revealed evidence of a transfer of language knowledge from pair to individual performance in the data of the collaborative and expert/novice dyads than in the other two patterns of dyadic interaction.

Studies on peer interaction in the small group have also been carried out. For example, the study by Shima (2008) focused on peer interaction in a small group work task of a pre-intermediate level Japanese language classroom at an Australian university. The findings from audio-recordings showed the positive results of mutual

assistance in peer interaction in terms of providing various learning opportunities and two-way direction of assistance. The study, however, revealed the changeable nature of expert and novice roles in peer interaction, which came not only from different levels of expertise but also from the learners' relative positioning of themselves in interaction with their peers.

In an investigation on how pair work influences language learning of six Korean college pairs in EFL lessons, Kim (2016) explored the type of peer interaction, learners' perception of the interaction, and the relationship between the interaction and language learning opportunities. Data from transcripts of audio-recorded pair talk in completing seven different activities, from observation notes, and from interviews indicated that the learner's engagement is important in pair interaction with a collaborative orientation because it can lead to the language development of socially co-constructed and mutually accepted language knowledge.

Dyadic interaction, or interaction in pairs, has been explored in the sociocultural framework. For example, Ahmadian and Tajabadi (2017) documented the dyadic interaction in an EFL course for young learners at the pre-elementary school level in Iran. Data were analyzed from recorded dialogues of 9 pairs completing a recognition task and a production task to identify the four patterns: collaborative, expert/novice, dominant/dominant, and dominant/passive patterns of the interaction coding scheme. The comparison between the patterns and the participant's performance on a vocabulary test revealed that collaborative and expert/novice were associated with better learning outcomes. Another example was shown in the study by Chen (2018) which examined the interaction of dyads on a dictogloss task, focusing on the transition process of learners' role relationship. The results revealed that a collaborative pattern of interaction is more conducive to L2 learning than other patterns such as dominant/dominant, dominant/passive. During an interaction in pairs, students adjusted their relationship to become more collaborative, which resulted in increased frequency of language-related discussion.

Despite the rather large volume of research using SCT to investigate mediation in peer interaction and discussing how different factors including language, tasks, materials, textbooks lead to new learning in learners, a study that delves into a specific task for dyads to interact has not been carried out. The current study focuses on peer interaction with very minimal or no participation from the teacher. The teacher just asked students to do the tasks at the beginning. It studies the interaction patterns by EFL students and how peer interaction mediates language learning in a decision making task. The study adopted SCT as a theoretical framework to analyze and interpret peer interaction.

3. MATERIALS AND METHODS

Research Setting and Participants: This study took place at a college in Vietnam where students studied for three years to obtain a college degree. Responding to the invitation from the researchers, thirty ELF college students volunteered to participate in the study. Their English proficiency was determined as "pre-intermediate" level or A2 level based on CEFR. Their ages ranged from 20 to 22. They were in their first year at a junior college of pedagogy and were expected to obtain the B2 level of English up on graduation from the junior college. All the participants were female due to the fact that few male students enrolled in the program at the research site and none of them volunteered to join the study. This fact, however, does not affect the research outcomes as this study aims to investigate peer interaction in a given task and does not purpose to compare how different genders interact in pair work.

Observation with Video-Recording: This study used classroom observation with video-recording on the ground that this method is able to capture what is actually going on when students are working in pairs in the class. For the purpose of the observed recording, smartphones with video functions were used. Particularly, classmates were asked to do the recordings while the researcher remained outside the classrooms for any instant help. In this way, the discussions were recorded in a comfortable atmosphere without any interference from the researcher. Due to their sitting postures, the visual recordings focused from the level of the table surface upward, which showed the upper parts of the bodies of the two participants. Each pair was recorded separately by their friends acting as cameramen who had some technical training.

The recordings with can-be-heard sound, clear images were chosen for transcribing. However, gestures of the participants were not examined due to the fact that the focus of the study was on verbal interaction. The images helped to identify the speaker in the talks. Task achievement is the primary criterion to extract the transcript. That means each pair had to complete the given task once or the participants had to come to a conclusion of the five things to bring to the desert island. Pair discussion of the problem solving task was then transcribed by the researcher, and

certain sections re-transcribed and analyzed using conventions from sociocultural discourse analysis (Mercer, 2004, p. 141). According to Mercer (2004), sociocultural discourse analysis focuses on the use of language as a social mode of thinking and a tool for teaching and learning, constructing knowledge, creating joint understanding and tackling problems collaboratively. Transcription of classroom interactions was extracted as excerpts for commentaries.

The researcher and a separate coder having understanding and experience in coding the talks worked independently on the analysis of the interaction transcript. The coding process started with the interaction transcripts of three pairs piloted and was then compared to see any mismatches. According to Storch (2001a, p. 134), the reliable norm of coding interaction is acceptable with more than 80% of results in consensus. The two coders in this study reached a higher level of consensus for all the recordings. In general, there was not any difference of coding results between the two coders thanks to the specific examples.

The transcription in this study follows the verbatim in which fillers were noted with "…" before and after the non-word utterances. The participants sometimes used Vietnamese for the vocabulary and structures they did not know or remembered. The phrases or sentences produced in Vietnamese were translated into English, italicized and put in parentheses next to the utterances. The unclear words were followed by a question mark in parentheses (?) while utterances that could not be understood are marked [unintelligible].

Sociocultural Discourse Analysis: Sociocultural discourse analysis (SDA) was coined by Mercer (2004) and his colleagues in the educational research for analyzing talks to understand how spoken language is used as a tool for thinking collectively. SDA with the focus on the use of language as the social model of thinking provided qualitative and quantitative data for interaction-based research. The current study adopted this approach to analyze peer talks for the understanding of peer interaction in an EFL context. Mercer's (2004) classification was elaborated as the operational definitions with examples in the table below.

Table 1. Sociocultural Discourse Analysis

Types of talk	Definitions	Examples (Mercer, 2004, 148-149)
Disputational	Involves the disagreement and individualized decision making with short exchanges consisting of assertions and challenges or counter assertions	Carol: Just write in the next letter. "Did you have a nice English lesson" Jo: You've got to get it on there. Yes, that's you. Let's just have a look at that. "Hi, Alan did you have a nice English lesson. Yes, thank you, Yeah. Yes, thank you it was fine." Carol: You've got to let me get some in sometimes. Jo: You're typing. Carol: Well you can do some, go on. Jo: "Yes thank you" Carol: [unintelligible] Jo: You're typing. "Yes thank you" "I did, yeah, yes, thank you I did." Carol: You can spell that. Jo: Why don't you do it? Carol: No, because you should.
Cumulative	Relates to positive and uncritical responses to the partner's ideas with repetition, confirmation and elaboration.	Sally: Yeah. What if she says erm erm "All right, yeah." No, just put "Yeah all right." No, no. Emma: No. "Well I suppose I could." Sally: "spare l5p." Yeah? Emma: Yeah. Sally: "I suppose." Emma: "I suppose I could spare 50p." Sally: "50?" Emma: Yeah. "Spare 50 pence." Sally: "50 pence."

		Emma: "50 pence." And Angela says "That isn't enough I want to buy something else." Sally: Yeah, no. "I want a drink as well you know I want some coke as well". Emma: "That isn't enough for bubble gum and some coke." Sally: Yeah, yeah.
Exploratory	Characterizes the critical but constructive exchanges with visible reasoning and explicit arguments for the joint consideration.	George: We've got to decide. Tina: We've got to decide together. George: Shall we right, right, just go round like [take Tina: [No, go round. You say what you think, and she says. George: I think she should be saying "Did you steal my money from me?" Tina: Your go. Sophie: I think we should put "I thought that my money's gone missing and I thought it was you". George: "I think it was you". Sophie: Which one? Tina: Now what was it I was going to say, Um, um. George: No because she's thinking, so we need to do thought. So we could write to her saying Sophie "My money's gone [missing so" Tina: [I was going to say if we're doing the one where she's saying, this is saying not thinking. Sophie: "My money's gone do you know where it is?" Tina: No, [on the saying one she could say George: [You should be saying Tina: Like she could be thinking to say to Robert, she could be saying "Do you know where's my money?" "Do you know anything about my money going missing?" George: Yeh, what, yeh that's good. When she's thinking I think she should be thinking "Oh my money's gone missing and it's definitely Robert." Tina: Yeh. Sophie: No 'cos she's saying it to him isn't she? Tina: [No she's thinking at the moment. George: [No she's thinking. Tina: That's the speech bubble.

In accordance with theoretical framework of SCT, the concept of mediation was also examined to clarify the features of the peer talks, the techniques the participants used to interact with their peers and to mediate language learning when completing the speaking tasks.

4. RESULTS AND DISCUSSION

4.1. Results

This study's main aim is to identify the interaction features in peer interaction on completing a decision making task, more specifically, talk types and how peers mediate each other when performing the task.

The Types of Talk

The types of talk were identified in accordance with Mercer's convention of sociocultural discourse analysis (Mercer, 2004). The following table shows the types of talks found in the task transcriptions of all pairs.

Table 2. Types of Talk in Peer Interaction in Decision Making Task

Pair	Talk Pattern
S1-S2	Cumulative → Exploratory → Cumulative
S3-S4	Cumulative → Disputational → Exploratory → Disputational → Cumulative → Disputational → Exploratory → Cumulative → Disputational → Cumulative
S5-S6	Cumulative → Exploratory → Disputational → Cumulative → Exploratory → Cumulative
S7-S8	Cumulative → Exploratory → Cumulative → Exploratory → Cumulative
S9-S10	Exploratory → Cumulative → Exploratory → Cumulative
S11-S12	Exploratory → Disputational → Exploratory → Disputational → Exploratory → Cumulative
S13-S14	Cumulative → Exploratory → Cumulative
S15-S16	Disputational → Exploratory → Disputational → Cumulative → Disputational → Cumulative
S17-S18	Cumulative → Exploratory → Cumulative
S19-S20	Cumulative → Exploratory → Cumulative
S21-S22	Cumulative → Exploratory → Cumulative
S23-S24	Cumulative → Exploratory → Cumulative → Exploratory → Cumulative
S25-S26	Exploratory → Cumulative → Exploratory → Cumulative
S27-S28	Cumulative → Disputational → Cumulative
S29-S30	Cumulative → Exploratory → Cumulative

The table above reveals the predominance of the cumulative talk type. The general interaction among the pairs started with cumulative talks (except pairs S9-10, S11-12, and S25-26 with an exploratory pattern and pair S15-16 a disputational one) and ended with a cumulative one. There is evidence of three types of talk in each pair's interaction. The task involves language learners into various steps of thinking, reasoning and challenging with different skills of negotiation, communication and collaboration, which entails the occurrence of different talk types and a complicated combination of talk types within each pair in this speaking task. Besides, with the same task, talk patterns varied among the pairs, which indicates that peers are a decisive factor creating the patterns of talks. It should also be noted that all the pairs ended their talks with a cumulative talk. This could be explained by the fact that students had to reach certain confirmation related to the decision that the speaking task requires.

Below are examples of the three kinds of talk.

Cumulative Talk

Excerpts 1 and 2 below illustrate the cumulative talk type.

Excerpt 1:

S2: How about clothes? What's your opinion?

S1: You're right. ..mm.. We need clothes to wear… ..mm.. during the days we live on the island.

S2: I feel the same way.

S1: What about a hand phone?

S2: ..mm.. I think we don't need… it because on the… island ..mm.. unable to connect ..mm.. to with anyone.

S1: ..mm.. Yeah, I… completely agree with you.

There was no evidence of dispute in the talk between S1 and S2 about clothes and a hand phone. In fact, they seemed to agree with each other's ideas quickly and share the common solutions through confirmation of the other's ideas. The cumulative talk type in the task was produced in the harmonious agreement with confirmation and elaboration.

Excerpt 2:

S8: In my opinion ..mm.. I will bring torchlight.

S7: Torchlight?

S8: Yes.

S7: Oh why?

S8: Because mm torchlight ..mm.. because in isl… in the island very dark, so I I need to I need to torchlight to find the way to go.

S7: Oh, yes. That's right.

S8: Anything else?

S7: Oh, I think so. ..mm.. in the island very dark at night and we bring torchlight.

S8: Ok.

Both of the participants in excerpt 02 above accumulated their "common knowledge" of the torch light with repetition and confirmation. Each echoed the other, for example, on what the other had said. S7 paraphrased the idea of S8 without any explicit critical opinions.

Exploratory Talk

The excerpts below represent the exploratory talk type.

Excerpt 3:

S11: I think a hand phone is unnecessary to bring it.

S12: Yes, I have the same with you.

S12: Because.. maybe on the desert island we don't… we can't… we can't connect to the other people.

S11: Yes

S12: So we needn't to bring it.

S11: and I know that, in there, there isn't the electricity. So we cannot charge the hand phone.

The exploratory type indicates both participants' efforts to solve the linguistic problems with explanations for the final shared decision of whether to bring a hand phone to the island or not. S11 and S12 provided their reasonable opinions on hand phone with explicit reasoning for their ideas and even build upon each other's opinions. Thus, they can make joint understanding through the use of a cultural tool, namely language and a mediational tool of hand phone as shown in the cue card of the speaking task for their knowledge con-construction.

Excerpt 4:

S25: And the next item, I will choose canned food.

S26: Canned food?

S25: Yes.

S26: Why?

S25: Because in a desert island, I think not enough food here. Yeah and maybe ..mm.. have many vegetables we're not ..mm.. we do not eat. Yeah we can't find food in there. Yeah so canned food can help me live ..mm.. it can help me ..mm.. to… help me to eat ..mm..

S26: overcome ..mm..

S25: overcome?

S26: overcome hungry.

S25: yes yes overcome (laugh) hungry

S26: No. I don't agree with you. I think food can find… in desert island or you can… bắt cá là gì? *(what word is "bắt cá"? catch fish)* ..mm.. it is the sea… so you can… fish

S25: find fish?

S26: find fish.

S25: find fish in the sea. (laugh)

S26: find fish in the sea. Yes. So it not… it don't need for you in ..mm.. in… in op… in my opinion…

S25: Oh no. I think it's difficult to..mm.. difficult to find fish because it lives far… lives far from (laugh) so you can't catch ..mm.. it. Catch là bắt đúng không ta? *(Is the word catch for catch fish, right?)*

S26: Oh, so ..mm.. Yes, so so.

There is evidence of mediation in the exploratory talk above with visible explanations, explicit arguments, rejection and reasons by both peers. In the beginning, when being asked for opinions about canned food, S25 explained the reasons for bringing canned food due to the lack of food on the island and got assistance from S26 to complete the idea. S26 immediately rejected with some linguistic difficulties but could come to the solution with the support from S25. Consequently, S26 continued to persuade S25 by explicitly reasoning the opportunity to catch fish in the sea so that they can have food instead of canned food. S26 was mediated and they came to the shared solution of how to have food on the island. In general, the knowledge of food on the desert island was co-constructed with

the collaborative contribution and critical analysis of looking for food. The mutual mediation via the talk and the task resulted in the ability to use the correct phrase "catch fish".

Disputational Talk

The excerpts below characterize the disputational talk type.

Excerpt 5:

S11: You bring water from the sea and you warm it to drink.

S12: you drink the sea? (laugh)

S11: yes, you can (laugh)

S12: no, I don't think so.

S11: yes, I think you can.

Both S11 and S12 cannot give any explanations or reasons for their opinions. The short exchanges and quick rejection of the other's ideas resulted in no further interaction. The excerpt displays little discussion of language and ideas between the two participants during the process of working through the task. Thus, they cannot gain any knowledge co-construction with such short utterances and typical disagreement in this type of talk.

Excerpt 6:

S3: And what about family documents?

S4: I don't think so. When ..mm.. we ..mm.. lost ..mm.. on a desert island I don't think so we need ..mm.. family documents. I think we should bring canned food.

S3: No, I'm very strong. I can swimming and earn some fish for us. I think we should bring matches to create fire.

S4: I don't agree with you. We will bring a torchlight so we don't need to bring matches.

S3: I don't think so.

The disputational exchanges between S3 and S4 include rejection and disagreement. They challenged their peer's decisions but did not provide any logical arguments. In spite of S1's efforts to mention his/her strength to swim for fish, S2 still disregarded his/her peer's opinions.

Excerpt 7:

S15: And the other thing I will choose is matches because you use matches to light a fire to cook. And I heard that wild animals are scared fire. So what do you think? It's a good idea?

S16: Đâu có thức ăn đâu mà nấu ăn. *(There is no food to cook)*

S15: Thì ở trên đó mầy giết động vật rồi mầy phải nấu chứ đúng không? Không lẽ mầy giết rồi mầy để mầy ăn sống à? *(So on the island you have to kill the animals and cook them, right? How can you kill them and then eat them raw?)*

S16: Chưa chắc là đã giết được. *(You can't be sure that you can kill the animals)*

S15: Mầy phải nấu. Mầy nói đi. *(You have to cook. Your turn to say)*

S16: I don't agree.

S15 and S16 in the excerpt above make their arguments in their mother tongue. They tried to defend their opinions and abruptly objected to their partner's ideas. Although both participants took their active parts during the talk, there was little evidence of joint or cooperative engagement. Much of the interactional talk consisted of commands and assertion. They hardly considered the other's ideas and the excerpt ends with the individual decision of not to bring matches on the island.

The excerpts above document the change of talk types in one speaking task. The most common pattern is cumulative → exploratory → cumulative, which was identified in six out of fifteen pairs, including pairs S1-S2, S13-S14, S17-S18, S19-S20, S21-S22 and S29-S30. The most complicated pattern belongs to pair S3-S4 with all types of talk shifting within the pair talk. This could be explained that the same task when carried out by different peers and prior knowledge of peers, the talk types would be different.

Features of Peer Interaction in the Decision Making Task

SCT considers interaction as the fundamental factor in language learning and highlights the roles of peer interaction in the process of learning language via mediation. The students in this study completed their speaking tasks by assisting each other to solve the linguistic problems with unknown words and elaborate the ideas generated by the task. This indicates that language learners mediate each other to co-construct knowledge. In other words, language mediation and task mediation may result in collaborative thinking and language understanding. This section shows the results of interaction features to better understand how EFL college students interacted with their peers in the decision making task.

The recorded data of the decision making task performance disclose that the students used various types of questions to encourage and involve the partners in the talk. They also used feeding back and explaining techniques to facilitate each other to discuss the appropriate solutions for survival on the desert island. While they were reasoning the arguments, they were also building up their thoughts on each other's opinions. Initially, one student could choose one item and the reason for their choice. Then the other student was encouraged to clarify the meaning through scaffolding to reach their final decisions. Besides, it is also found that feeding back played a surpassing role to become the most popular technique with high percentages in most of the pairs in this study.

The following examples illustrate the mediational features in the speaking task.

Excerpt 8:

S3: Ok. ..mm.. handphone? I think handphone ..mm.. help us relax when we ..mm.. are on the is…island

S4: handphone hả? handphone là gì? handphone nghĩa là gì? *(What does "handphone" mean?)*

S3: (use a finger to point at the ear and move her finger in a circle)

S4: but the ..mm.. but the ..mm.. on a desert island ..mm.. I think ..mm.. I think ..mm..

S3: không có Wi-Fi *(There's no Wi-Fi)*

S4: it ..mm.. it ..mm.. it ..mm.. it isn't ah hasn't ..mm.. internet.

S4 in the excerpt above asked for information to a question "what a hand phone is". S3 used the feeding back technique to provide the answer. S4 then understood and continued with the talk to reach the conclusion.

Excerpt 9:

S26: I agree with you. I think you should I think ..mm.. I think I choose the first-aid-kit.

S25: First-aid-kit? Yeah, ok.

S26: Yes. Because in in ..mm.. từ này đọc là gì? (*How do we pronounce this word*?*)*

S25: cái gì? (*what?*) desert island

Both: in a desert island.

S26: Yes. Because in the desert island, it has a lot of thing, it will dangerous for you so when you have first-aid-kit, maybe you can ..mm.. it helps you ..mm.. làm gì? (*help you do what?*)

S25: (laugh) giải quyết (*solve*)

Both: (look at each other and laugh)

S26: giải quyết được…

S25: to solve. It helps me to solve problems.

S26: Yes. Ok. And ..mm.. for you to solve problem for you and ..mm.. people. What about you?

In excerpt 09, S25 used feeding back to give information to S26's question to pronounce a word in English. S26 then asked the question of what to use the first-aid-kit for. S25 then gave hint in the first language with the equivalent word in English "solve". S25 also used questioning to understand S26's problem and then to provide linguistic help. S25 was then able to continue with the talk.

The excerpt below shows how S21 scaffolded S22 to use a knife in response to the requirement of the task.

Excerpt 10:

S21: And next I will choose a knife

S22: Knife?

S21: Yes

S22: Why?

S21: A knife, it's the basic thing you need when you in a jungle, when you go to travel in a jungle or in something, some dangerous area. First, it can protect, you can use it to protect yourself, it is the first. And second, you can use it to hunt, you can hunt some small animals to make food and the third it is the.. the item to making food

S22: Ok. That's good.

S21: Basic item

S22: I agree with you. I think maybe there is a lot of danger ..mm.. in the island. ..mm..I should bring knives to defend ourselves.

S21: Yes

Excerpt 10 reveals the process of thinking when S21 provided critical reasons with a daily experience of using knives to persuade his/her peer to bring it to the island. Thanks to the explanations of S21 that S22 could develop his/her ideas drawing on S21's opinions about the importance of knives and consequently S22 agreed with "bringing knives to defend ourselves".

4.2. Discussion

This study adopted SCT as the theoretical framework to explore peer interaction in a decision making task. The mediation taking place in peer interaction was scrutinized from the transcription of the recorded tasks. It is argued that peer interaction may have no identifiable or constant "experts" (Ohta, 1995; Villamil & De Guerrero, 1996). Even when this is the case, the transcript from this study shows that mediation can occur in a collaborative form where students can exchange their roles frequently and get mutual benefits from providing "peer scaffolding" (Donato, 1994) because each learner has his/her prior knowledge and sociocultural background relevant to the task at hand. The EFL college students in the present study used various scaffolding techniques to support their partners to use their language and thinking. The findings show that peer interaction results in confirmation and repetition on receiving the mediation and assistance from their peers. Overall, the co-construction of knowledge present in the excerpts in the current study derived from two language learners with similar proficiency working collaboratively and scaffolding mutually. In other words, the unclear and unidentifiable role of experts or more knowledgeable peers in peer interaction on completing given speaking tasks could also lead to better talk outcomes, which is in line with Edwards (2005) but unlike other studies (Kasper, 2001 for example) prioritizing the superior roles of experts in boosting peer learning. This raises the focus to the fact that language learning can occur in interactive contexts where peers with similar proficiency interact. The results revealed that three types of the talk were evident in peer interaction in the decision making task but with different numbers in each pair. Cumulative talk plays a dominant role, which indicates that the peers and their proficiency do not influence much on the clustering and combining of talk types. Besides, the qualitative investigation of each pair's discussion revealed that the exchanges that exhibited exploratory talk showed more in-depth reasoning than other exchanges did, which is consistent with Mercer (2004). The participants in exploratory talks used their prior knowledge for reasoning and critical explanations. As a result, this type is more conducive to language learning and knowledge construction.

This study also examined tasks that are considered to be mediating artifacts in SCT. More specifically, the decision making task in this study provides an authentic learning context for the meaningful communicative interaction. With the use of questions, students draw their partners into a shared understanding of the tasks in which they are engaged (Mercer, 2004). Wegerif and Mercer (1997) found the transition from one type (exploratory) to another type (disputational) in the interaction of three nine-year-old pupils working on a series of graphical puzzles taken from a reasoning test. Similarly, Polo, Lund, Plantin and Niccolai (2015) reported the shifting natures from disputational talks to exploratory talks continuously under the circumstance of arguing and claimed that engaging in a given type of talk is not only a matter of cognitive ability. In the same vein, Saadi's (2016) investigation into the talk types pointed out that participants make meaning through seven types of talk consisting of uni-level (Disputational, Exploratory, and Cumulative), bi-level (Disputational/ Exploratory, Disputational/ Cumulative, and Exploratory/ Cumulative), and multi-level (Disputational/ Exploratory/ Cumulative) categories. The results in the present study are in line with previous studies, which claim that natures of talks are changeable (Polo et al., 2015; Saadi, 2016; Wegerif & Mercer, 1997) with rather unidentifiable routes. Moreover, interaction in the current study facilitates the students in the task performance through finding unknown words, elaborating the ideas and also providing critical analysis of the arguments in order to reach the consensus. Therefore, peer interaction results in the co-construction of knowledge and language learning, at least in terms of the vocabulary and structure to express the ideas to complete the given task.

5. CONCLUSION

This study aims to investigate the types of talks in peer interaction and the features of peer talks. Data were recorded from 15 pairs doing a decision making task and transcribed for analysis. The results revealed that three types of talk, namely cumulative, exploratory and disputational were present in all pairs' talks; however, the cumulative talk was generated with the highest percentage. The analysis of the recordings revealed that the exchanges that exhibited exploratory talk showed more in-depth reasoning than the other exchanges did because peers resorted to their prior knowledge for reasoning and critical explanations to complete the task. As a result, this type tended to be more conducive to language learning and knowledge construction in peer interaction.

Another finding of the current study is that the most salient feature of peer interaction is feeding back followed by the technique of questioning. These two features facilitated peers into a shared understanding of the tasks in which they were engaged. With these two techniques, peers were able to clarify unclear information, seek help with

language and ideas, encourage participation, and even correct the wrong use of words. The task itself played a critical role in generating thoughts in peer interaction and the immediate need arising from the task promotes peer scaffolding, benefiting both partners in the interacting process.

It should be noticed that the peers in this study were not trained to follow or use certain types of talk, or scaffolding techniques. However, they naturally resorted to the interaction to mediate with the other peer to complete the task. These findings suggest language teachers pair students with similar language abilities. It is thus worth investigating how to direct peers to talk in a given task that brings about linguistic and cognitive development as well as effective use of peer interaction.

The current study did not aim to explore whether peers were able to retain the language structures, vocabulary and ways to elicit other peers to talk during tasks. It did not either focus on the comparison of peer interaction in different language tasks. The further study thus can dwell into these topics to gain more insights into EFL peer interaction.

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REFERENCES

Ahmadian, M., & Tajabadi, A. (2017). Patterns of interaction in young EFL learners' pair work: The relationship between pair dynamics and vocabulary acquisition. *3L: Language, Linguistics, Literature*, *23*(3), 98-114. https://doi.org/10.17576/3L-2017-2301-08

Chen, W. (2018). Patterns of pair interaction in communicative tasks: The transition process and effect on L2 teaching and learning. *ELT Journal*, *72*(4), 425-434. https://doi.org/10.1093/elt/ccy015

Coultas, V., & Booth, P. (2019). Exploratory talk and Task-based Learning: A case study of a student's learning journey on an MA (Education) English Language Teaching Course. *Changing English: Studies in Culture and Education*, *26*(1), 30-47. https://doi.org/10.1080/1358684X.2018.1545109

Daniels, H. (2015). Mediation: An expansion of the socio-cultural gaze. *History of the Human Sciences*, *28*(2), 34-50. https://doi.org/10.1177/0952695114559994

Donato, R. (1994). Collective scaffolding in second language learning. In J. P. Lantolf & G. Apple (Eds.), *Vygotskian approaches to second language research* (pp. 33-56). Norwood, NJ: Ablex Publishing Corporation.

Edwards, J. A. (2005). Exploratory talk in peer groups: exploring the zone of proximal development. *Fourth Congress of the European Society for Research in Mathematics Education CERME 4*. Retrieved from http://eprints.soton.ac.uk/18139/

Ellis, R. (2003). *Task-based language learning and teaching*. Oxford University Press.

Foster, P., & Ohta, A. M. Y. S. (2005). Negotiation for Meaning and Peer Assistance in Second Language Classrooms. In *Applied Linguistic*s, *26*, 402-430. https://doi.org/10.1093/applin/ami014

Kasper, G. (2001). Four Perspectives on L2 Pragmatic Development. *Applied Linguistics*, *22*, 502-30.

Kim, Y. H. (2016). *Pair interaction among adult EFL learners: A South Korean case study*. University of London.

Kos, T. (2013). *Peer interactions in mixed-age EFL secondary school classrooms*. Retrieved from http://eprints.lancs.ac.uk/84540/

Lantolf, J. P. (2000). *Sociocultural theory and second language learning* (Vol. 78). Oxford University Press.

Lantolf, J. P., & Thorne, S. L. (2006). Sociocultural Theory and Second Language Learning. In *Biological Therapy (Ukraine)* (pp. 197-220). https://doi.org/10.1007/BF02916194

Le, P. H. H. (2004). *A Socio-cultural analysis of learning English in unassisted and assisted peer group*. Victoria University of Wellington.

Le, P. H. H. (2007). The more knowledgeable peer, target language use, and group participation. *The Canadian Modern Language Review*, *64*(2), 333-354.

Li, D. (2009). Is there a role for tutor in group work: Peer interaction in a Hong Kong EFL classroom. *HKBU Papers in Applied Language Studies*, *13*, 12-40.

Lin, P. S. S., & Samuel, M. (2018). Students' roles during peer response sessions. *Malaysian Online Journal of Educational Sciences*, *1*(1), 55-63.

Mackey, A., & Gass, S. M. (2005). *Second Language Research: Methodology and Design*. https://doi.org/10.1192/bjp.111.479.1009-a

Mercer, N. (2004). Sociocultural discourse analysis: Analysing classroom talk as a social mode of thinking. *Journal of Applied Linguistics*, *1*(2), 137-168.

Mercer, N., & Fisher, E. (1998). How do teachers help children to learn. *Learning Relationships in the Classroom*, *2*, 111.

Nunan, D. (2006). *Task-based Learning in the Asian Context* (P. Robertson & J. Jung, Eds.). Asian EFL Journal Press.

Ogilvie, G., & Dunn, W. (2010). Taking teacher education to task: Exploring the role of teacher education in promoting the utilization of task-based language teaching. *Language Teaching Research*, *14*(2), 161-181.

Ohta, A. S. (1995). Applying Sociocultural Theory to an analysis of learner discourse: Learner-Learner collaborative interaction in the Zone of Proximal Development. *Issues in Applied Linguistics*, *6*(2). Retrieved from https://escholarship.org/uc/item/0zs5j7ps

Ohta, A. S. (2000). Rethinking interaction in SLA: Developmentally appropriate assistance in the zone of proximal development and the acquisition of L2 grammar. *Sociocultural Theory and Second Language Learning*, *4*, 51-78.

Ohta, A. S. (2001). Second language acquisition processes in the classroom: learning Japanese. In *Asian Languages & Literature*. Mahwah, NJ: Lawrence Erlbaum Associates.

Pica, T., Kanagy, R., & Falodun, J. (1993). Choosing and using communication tasks for second language instruction. In G. Crookes & S. Gass (Eds.), *Tasks and language learning: Integrating theory and practice* (pp. 9-34). Multilingual Matters Ltd.

Polo, C., Lund, K., Plantin, C., & Niccolai, G. (2015). *Analyzing exploratory talk as a Socio-Cognitive practice: Identity, group argumentation, and class debate quality*. Retrieved from https://hal.archives-ouvertes.fr/hal-01208319

Roberson, A. P. (2014). *Patterns of interaction in peer response: the relationship between pair dynamics and revision outcomes* (Georgia State University). Retrieved from http://scholarworks.gsu.edu/alesl_diss/34

Saadi, Z. K. (2016). *Meaning making, agency, and languaging in dialogic interactions on academic writing tasks: A sociocultural discourse analysis*. Retrieved from https://eric.ed.gov/?id=ED566408

Sadow, S. A. (1982). *Idea Bank: Creative Activities for the Language Class.* Rowley, MA: Newbury House.

Sato, M., & Ballinger, S. (2016). *Understanding peer interaction*. https://doi.org/10.1075/lllt.45.01int

Shima, C. (2008). Fluidity of Peer Interaction in a Japanese Language Classroom. *Electronic Journal of Foreign Language Teaching*, *5*(1), 126-139. Retrieved from http://e-flt.nus.edu.sg/v5sp12008/shima.htm#Swain 2000

Storch, N. (2001a). An investigation into the nature of pair work in an ESL classroom and its effect on grammatical development (The University of Melbourne). Retrieved from http://hdl.handle.net/11343/38809

Storch, N. (2001b). How collaborative is pair work? ESL tertiary students composing in pairs. *Language Teaching Research*, *5*(1), 29-53.

Storch, N. (2002). Patterns of interaction in ESL pair work. *Language Learning*, *52*(1), 119-158.

Swain, M. (2000). The output hypothesis and beyond: Mediating acquisition through collaborative dialogue. In J. Lantolf (Ed.), *Sociocultural theory and second language learning* (pp. 97-113). Oxford University Press.

Swain, M. (2006). Languaging, agency and collaboration in advanced second language proficiency. *Advanced Language Learning: The Contribution of Halliday and Vygotsky*, 95.

Van De Pol, J., Volman, M., & Beishuizen, J. (2010). Scaffolding in teacher - student interaction: a decade of research. *Educ Psychol Rev*, *22*, 271-296. https://doi.org/10.1007/s10648-010-9127-6

Villamil, O. S., & De Guerrero, M. C. M. (1996). Peer revision in the L2 classroom: Social-cognitive activities, mediating strategies, and aspects of social behavior. *Journal of Second Language Writing*, *5*(1), 51-75.

Watanabe, Y., & Swain, M. (2007). Effects of proficiency differences and patterns of pair interaction on second language learning: collaborative dialogue between adult ESL learners. *Language Teaching Research*, *11*(2), 121-142. https://doi.org/10.1177/1362168806607074599

Wegerif, R., & Mercer, N. (1997). A dialogical framework for researching peer talk. In *Computers and Talk in the Primary Classroom* (pp. 49-65). Clevedon: Multilingual Matters.

Wells, G. (2004). *Dialogic inquiry: Towards a socio-cultural practice and theory of education*. Cambridge University Press.

Wood, D., Bruner, J. S., & Ross, G. (1976). The role of tutoring in problem solving. *Journal of Child Psychology and Psychiatry*, *17*(2), 89-100. https://doi.org/10.1111/j.1469-7610.1976.tb00381.x

Zheng, C. (2012). Understanding the learning process of peer feedback activity: An ethnographic study of exploratory practice. *Language Teaching Research*, *16*(1), 109-126.

Appendix A: Decision Making Task

THE DESERT ISLAND

You are on a sinking ship. There is only one lifeboat left for your rescue. The boat can only hold a limited amount of supplies and people. You can see a small desert island in the distance. If your boat makes it there safely, you will need things to help you survive until you are rescued.

Instruction: Look at the following list of items that you have. Choose only five items that you will bring with you. Working with a partner, you must decide and agree mutually on which five items to take. You have 10 minutes to plan what and how to say. However, you are only allowed to talk without your notes.

Items	Tick (✔) to indicate your choice
1. Torchlight	
2. Pillows	
3. Canned food	
4. Clothes	
5. Fresh water	
6. Knives	
7. Map	
8. Family documents	
9. Handphone	
10. First-aid kit	
11. Matches	
12. Gun	

(Adapted from Sadow, 1982)