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## The Impact of Planning Participatory Structure on EFL Learners' Planning Processes

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#### ABSTRACT

Pre-task planning can be divided into individual planning and collaborative planning in terms of its planning participatory structures. This study aims to explore the influence of planning participatory structures on EFL learners' planning processes. Results show that collaborative planning can improve students' planning strategy use in all dimensions by analyzing the reflective journals and planning strategy questionnaires of participants. The study also reveals the whole detailed planning process under argumentative writing, which can give writing teaching some enlightenment.

**Keywords:** Pre-task planning; Planning process; Planning strategy; EFL writing.

#### **I Introduction**

With the development of cognitive psychology, the research on writing has gradually shifted from product-oriented study to process-oriented study. Hayes and Flower's writing model (1981) divides the writing process into three stages: planning, translating and revising, where planning is considered the most primary and fundamental skill. As an important role in the writing process, planning has greatly raised researchers' attention and has been proven to improve the quality of writing text. (Rahimpour, 2011; Seyyedi, 2013; Wang, 2016; Sima, 2019)

Rod Ellis distinguishes two principal types of task-based planning: pre-task planning (PTP) and online planning (OLP) in terms of when the planning takes place. Pre-task planning can be further divided into rehearsal and strategic planning, which differs in whether the pre-task planning involves the whole task work or just part of the work (i.e., an outline). Strategic planning can also be further divided into individual planning (IP) and collaborative planning (CP) in terms of the participatory structure. There are studies investigating the impact of planning time allocation (Ong & Zhang, 2010), and writing tasks (Rahimi & Zhang, 2017) on the planning process. However, little attention was paid to the participatory structure of planning.

Therefore, the present study adopts a mixed method to explore learners' planning processes under different planning participatory structures. It not only conducts in-depth research on learners planning processes but also on the use of planning strategies.

#### **II Literature Review**

#### 2.1 The Definition of Planning

Flower and Hayes (1981) put forward a cognitive process model of writing, which divided planning into three stages: planning, translating, and revising. But they do not think that these three have equal status or roles. After an in-depth analysis of the thinking-aloud report, they concluded that planning skills are primary and basic, presentation skills are critical, and revision skills are only subordinate. Again, it illustrates the importance of planning in the writing process.

From a cognitive perspective, Hayes and Nash (1996) believe that planning is a kind of preparatory thinking, in which the writer identifies information to be expressed in the mind, retrieves it from long-term memory, and embeds it into the content structure and form structure of the language output. This definition is consistent with Hayes and Flower's writing process model, both expounding

ideas from the perspective of cognitive psychology, which has had a profound impact on subsequent related writing psychology research and provides directions for writing planning research.

#### 2.2. Classification of Planning

Ellis Rod (2005) distinguishes two principal types of task-based planning: pre-task planning and online (within-task) planning in terms of when the planning takes place--either before the task is performed or during its performance.

Pre-task planning is further divided into rehearsal and strategic planning (Ellis, 2005). Rehearsal entails providing learners with an opportunity to perform the task before the "formal performance". In other words, it involves task repetition, the first execution of a task is seen as preparation for subsequent executions. Strategic planning entails learners preparing to perform the task by considering the content they will need to encode and how to express this content.

Online (within-task) planning can be differentiated according to the extent to which the task performance is pressured or unpressured.

Both pre-task and on-line planning can be further categorized which are of potential theoretical and practical significance. For example, learners can be left to their own devices when planning a task (unguided planning) or they can be given specific advice about what and how to plan (guided planning). Another option relevant only to strategic planning concerns participatory structure, i.e., whether the planning is undertaken by the learners working individually, or collaboratively in small groups. This classification is the guide of this research.

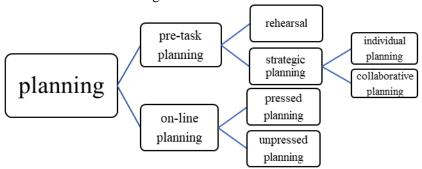


Figure 1: Types of Task-based Planning (Adopted from Ellis, 2005, p. 4)

#### 2.3 The Process Investigation of Pre-task Planning

Although many researchers are interested in planning, few of them probe into what writers actually do when planning, that is the process of investigation of planning. The fact is little few writing studies systematically investigated the cognitive processes of different participatory structures of planning (Rostamian et al., 2017).

Among the inadequate studies concerning the planning process, two research try to investigate how attentional resources are distributed during planning (formulating) and writing (translating and evaluating). Rostamian et al. (2017) found that pre-task planning reduced the number of processes during writing and fluency improved as a function of that. Tabari's study (2021) identified five attentional categories during planning: content, organization, language (accuracy), complexity, and use of L1, based on the video stimulated recall interview. He found that pre-task planners were more oriented to directing their focal attention to encoding propositional content, complexifying their ideas

and translating them into lexical units, and organizing the essays.

Another two studies further concentrate on writers' metacognitive activities during the planning process (Ong, 2014; Li, 2007). Ong's study focused on five of the text reflection metacognitive processes: generating new ideas, elaborating new ideas, organizing new ideas, thinking of essay structure, and thinking of language aspects of the task. The analysis showed a main effect of task conditions but no effect of planning time on the metacognitive processes during planning.

Li (2007) made a great contribution to L2 writers' planning process. He identified five planning strategies that have an effect on writing performance They are: topic exploring strategy; goal-setting strategy; audience awareness strategy; genre strategy; and specific planning methods. What's more, Li creatively constructed the planning process model for Chinese high-level English learners by thinking aloud approach. There are five sub-processes in the model: explore the topic, set rhetorical goals, extract information, evaluate information, and organize information.

By reviewing the four research concerning the planning process, it shows that researchers adopt different cognitive or metacognitive planning subprocesses, and writers' planning processes are varied for different tasks, planning conditions and individual preferences. Since all the studies have taken planning time and task conditions into consideration, the participatory structure of planning remains unknown in terms of its effect on writers' planning process, which lead future studies to investigate and explore learners' planning processes under different planning participatory structures.

### **III Research Methodology**

### 3.1 Research Questions

Guided by Ellis's (2005) category about planning, and the product-process approach, the present study aims to investigate writers' planning process under collaborative planning and individual planning, addressing the following two questions:

- (1) Does participatory structures of planning (CP vs. IP) have effects on learners' planning strategy use?
- (2) Does participatory structures of planning (CP vs. IP) have effects on learners' planning process?

#### 3.2 Participants

The present study will take place under natural teaching conditions, and thirty-four EFL learners from XUniversity in Hubei, China will participate in the experiment. They are enrolled in the same class (class A), with the same teacher for the EFL writing course. There are 29 girls and 5 boys, whose average age is about 19 with an average English learning experience of 10 years.

Unlike previous studies, one experimental group and one control group were used to examine the difference between CP and IP, the present study only chose one group (within-subject), in order to minimize the influence of learners' personal preferences on the research result. Meanwhile, in order to avoid the interaction effect of the sequence of individual planning and collaborative planning, the participants were divided into two groups randomly. In the first week, Group 1 (N=16) took writing task 1 under individual planning, while group 2 (N=18) took writing task 1 under collaborative planning. Two weeks later, Group 1 took writing task 2 under collaborative planning, while Group 2 took writing

task 2 under individual planning. The two-week duration between the two writing tasks is designed to minimize the impact of the previous writing task on the learner and to mitigate learners' fatigue from writing. And implementing the writing task under IP before CP can remove the impact of CP on writers' planning performance in IP conditions.

During collaborative planning, all the writers were required to plan with their self-selected pair. Previous studies have recommended that allowing participants to select their own partners can make learners feel more motivated and inclined to talk with their self-selected peers (Tavakoli, 2014; McDonough, 2019).

#### 3.3 Instruments

Two writing materials, a planning task sheet, a retrospective questionnaire, and a reflective journal are the main research tools.

### 3.3.1 Writing Materials

Two argumentative writing tasks with the same complexity were used in the present study. The two writing tasks used in the present study came from CET-6 composition database. Theoretically speaking, they are with the same cognitive complexity and match the English level of the participants in the present study.

A pilot study was implemented in order to make sure the homogeneity of the two argumentative tasks in terms of cognitive complexity. Another class (class B) of thirty English-majored freshmen with the same English proficiency was chosen to write the two tasks. The newest English testing scores of each group were analyzed by SPSS23 software. Table 1 shows that class A and class B are homogeneous in English proficiency (t(67)=1.275, p>0.05).

Table 1 The independent t-test of Basic English Scores between class A and class B

	~-		~-				
	Cla	ss A	Cla	ss B			
	(n=	=34)	(n=	30)	MD	t (67)	Sig.
	M	SD	М	SD			
English Scores	77.53	8.418	75.14	7.088	2.387	1.275	.207

In a pilot study, class B was divided into 2 groups randomly. Half of them wrote writing task 1, rest of them finished writing task 2 in 45 minutes (15 minutes for planning and 30 minutes for writing). The writing scores of the two tasks by class B were given by Pigai Web, an on-line system for automatically correcting English compositions by computer, to verify the consistency of the cognitive complexity of the two writing tasks. The results showed that there was no significant difference (t=-1.226, p=0.23) between the two writing tasks in terms of cognitive complexity.

Table 2	Table 2 The independent t-test of class B's writing scores between the two tasks							
	Writing	g Task 1	Writing	Task 2				
	(N	=15)	(N=	15)				
	Mean	SD	Mean	SD	t	df	Sig.	
Writing scores	78.53	4.684	80.4	3.7	-1.226	28	.230	
Writing scores	78.53	4.684	80.4	3.7	-1.226	2	8	

## 3.3.2 Planning Task Sheet

For collaborative prewriting to be beneficial, it may be necessary to scaffold the task by providing explicit instructions and visual tools to facilitate collaboration (McDonough, 2019).

Inspired by previous research (Tavakoli & Rezazadeh, 2014; McDonough 2018), a planning task sheet was used in this study, including an instruction and an organization framework (introduction; argumentation for each perspective; conclusion).

## 3.3.3 Retrospective Questionnaire

In order to have a better understanding of writers' planning process, a retrospective questionnaire for planning strategies is used (adopting from Li's (2007) planning strategy questionnaire). The questionnaire is designed with items on a 5-point Likert-type scale, where 1 represented the least agreement whilst 5 represented the greatest agreement. There are five sub-categories: topic exploring strategy (4 items); goal-setting strategy (3 items); audience awareness strategy (3 items); genre strategy (4 items); and specific planning methods (11 items). Since the questionnaire has been reported to have great reliability and validity, and the questionnaire is designed in Chinese, the present study will use it with little adjustment (only in language organization, not the essential content and design).

#### 3.3.4 Reflective Journal

The reflective journal is used to capture a grounded understanding of writers' planning process based on Li's planning process model (2007). Li identified five sub-processes during planning: exploring the topic, setting rhetorical goals, extracting information, evaluating information, and organizing information. And the reflective journal used the five categories as guidance to ask the writer to elaborate on their planning process. Students were required to write no less than 20 words in Chinese for each category. So, the total reflective journal contained at least 100 words.

#### 3.3 Data Analysis

## 3.3.1 Retrospective Questionnaire

62valid questionnaires of the two writing tasks were finally collected. The data was then keyed into the computer and SPSS version 23 to conduct statistical analysis. A descriptive statistic and pared-sample T-test were conducted to get the mean scores and standard deviations of each item in the

questionnaire to investigate how students in different planning conditions used their planning strategies.

### 3.3.2 Reflective Journal Data

67 reflective journals of the two writing tasks were finally collected. All the journals first were typed into texts and then analyzed according to the given topics in the reflective journals: exploring the topic, setting rhetorical goals, extracting information, evaluating information, and organizing information. A comparative analysis of collaborative planning and individual planning was conducted to find students' different planning processes.

## **IV Results and Findings**

## 4.1 Effects of Planning Participatory Structures on Learners' Planning Strategy Use

The different use of planning strategies of each group under individual planning and collaborative planning would be reported to investigate whether planning participatory structures or the order of planning participatory structure would influence students' use of planning strategies.

After two rounds of writing tasks, 30 valid questionnaires (15 in IP; 15 in CP) in group 1 were collected, and 32 valid questionnaires (16 in CP; 16 in IP) in group 2 were collected. The scores of five sub-categories (topic exploring strategy; goal-setting strategy; audience awareness strategy; genre strategy; and specific planning methods)were analyzed which were presented by the average score of each item. Table 5 and Table 6 show the results of the paired-sample T-test of group1's and group 2's scores in the five sub-categories between collaborative planning and individual planning.

# 4.1.1The use of the planning strategy of group 1 under individual planning and collaborative planning

The use of the planning strategy of group 1 under individual planning and collaborative planning was analyzed using the paired samples t-test in SPSS 23 in order to verify whether the planning participator structure has an effect on the use of planning strategy.

As the results are shown in table 3-1, the mean score in each sub-category of planning strategy under collaborative planning was higher than that under individual planning. The mean score of planning strategy in CP (3.7342) was relatively higher than in IP (3.3794). The results showed great improvement in collaborative planning on planning strategy usage.

Table 3-1Planning Strategy Descriptive Statistics of Group 1 under IP and CP

		Mean	N	S.D.	S.E. Mean
Topic Exploring	IP	3.8333	15	.89476	.23103
	CP	4.2667	15	.57838	.14934
Goal Setting	IP	2.8222	15	.92468	.23875
	CP	3.2220	15	.72005	.18592
AudienceAwareness	IP	3.7444	15	.67526	.17435
	CP	4.2891	15	.58930	.15216

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Genre Strategy	IP	3.2667	15	.77613	.20040
	CP	3.5333	15	.86016	.22209
Planning Methods	IP	3.2302	15	.71755	.18527
	CP	3.3598	15	.57769	.14916
Whole Scale	IP	3.3794	15	.66640	.17206
	CP	3.7342	15	.56534	.14597

Table 3-2 is a related statistical table of the planning strategy of Group 1 under individual planning and collaborative planning. There is a linear relationship between planning strategy under IP and CP because the correlation between the reading scores of the two is very high (0.800) and the significance level is very low (0.000).

Table 3-2 Planning Strategy Paired-Samples Correlation of Group 1 under IP and CP

		N	Correlation	Sig.
Topic Exploring	IP&CP	15	.601	.018
Goal Setting	IP&CP	15	.636	.011
Audience Awareness	IP&CP	15	.507	.054
Genre Strategy	IP&CP	15	.574	.025
Planning Methods	IP&CP	15	.719	.002
Whole Scale	IP&CP	15	.800	.000

As shown in Table 3-3, the paired-samples t-test is performed on the planning questionnaire scores of group 1's planning strategy use under individual planning and collaborative planning, and the significance probability of the paired samples t-test(Sig. (2-tailed)=0.004) is much less than 0.05. In addition, the 95% confidence interval of the difference is -.57681~-.13282, which doesn't include 0, indicating that there is a significant difference in the planning strategy used between individual planning and collaborative planning.

In detail, analyzed from the five dimensions, the significance probability of the paired samples t-test in the topic exploring dimension and audience awareness dimension are less than 0.05, and the 95% confidence interval of the difference doesn't include 0, which showed that the topic exploring strategy and audience awareness strategy is improved significantly after collaborative planning compared with individual planning. However, in the other 3 strategies, goal setting strategy, genre strategy, and specific planning methods, there was no statistically significant improvement after collaborative planning.

Table 3-3 Planning Strategy Paired Samples T Test of Group 1 under IP and CP

				Paired Difference					
		Mean	S.D.	S.E. Mean	95% Confidence of the Difference				
					Lower	Upper	t	df	Sig. (2-tailed)
Topic Exploring	IP-CP	43333	.71631	.18495	83001	03666	-2.343	14	.034*
Goal Setting	IP-CP	39978	.72585	.18741	80174	.00218	-2.133	14	.051
Audience Awareness	IP-CP	54467	.63209	.16320	89470	19463	-3.337	14	.005**
Genre Strategy	IP-CP	26667	.75868	.19589	68681	.15348	-1.361	14	.195
Planning Methods	IP-CP	12964	.50212	.12965	40770	.14843	-1.000	14	.334
Whole Scale	IP-CP	35482	.40087	.10350	57681	13282	-3.428	14	.004**

<sup>\*</sup>p<0.05

<sup>\*\*</sup>p<0.01

# 4.1.2 The use of the planning strategy of group 2 under individual planning and collaborative

The use of the planning strategy of group 2 under collaborative planning and individual planning was analyzed using the paired samples t-test in SPSS 23 in order to verify whether the planning participator structure or the order of planning participatory structure has an effect on the use of planning strategy.

As the results are shown in table 4-1, the mean score of planning strategy in CP (3.4349) was a little lower than in IP (3.4604). In addition, in the topic exploring category and genre category, the mean scores remain the same under CP and IP; even in the goal setting category and audience awareness category, the mean score in CP is higher than in IP, even though they took individual planning after collaborative planning. Only in the specific planning methods category did the mean score of IP go higher than in CP. The results indicated that after getting collaborative planning first, participants' use of planning strategy hardly could be improved in individual planning, except for specific planning methods.

Table 4-1 Planning Strategy Descriptive Statistics of Group 2 under CP and IP

		Mean	N	S.D.	S.E. Mean
Topic Exploring	CP	3.8594	16	.70100	.17525
	IP	3.8594	16	.59839	.14960
Goal Setting	CP	2.8750	16	.65405	.16351
	IP	2.8544	16	.95058	.23765
Audience Awareness	CP	4.0000	16	.76012	.19003
	IP	3.9167	16	.82999	.20750
Genre Strategy	CP	3.0938	16	.79517	.19879
	IP	3.0938	16	.81074	.20268
Planning Methods	CP	3.3466	16	.38636	.09659
	IP	3.5781	16	.37016	.09254
Whole Scale	CP	3.4349	16	.41542	.10386
	IP	3.4604	16	.53649	.13412

Table 4-2 is a related statistical table of the planning strategy of Group 2 under collaborative planning and individual planning. There is a linear relationship between planning strategy under CP and IP because the correlation between the reading scores of the two is very high (0.852) and the significance level is very low (0.000).

Table 4-2 Planning Strategy Paired-Samples Correlation of Group 2 under CP and IP

		N	Correlation	Sig.
Topic Exploring	CP&IP	16	.724	.002
Goal Setting	CP&IP	16	.732	.001
Audience Awareness	CP&IP	16	.446	.083

Genre Strategy	CP&IP	16	.819	.000	
Planning Methods	CP&IP	16	.520	.039	
Whole Scale	CP&IP	16	.852	.000	

As shown in Table 4-3, the paired-samples t-test is performed on the planning questionnaire scores of group 2's planning strategy use under collaborative planning and individual planning, and the significance probability of the paired samples t-test(Sig. (2-tailed)=0.724) is much more than 0.05. In addition, the 95% confidence interval of the difference is -.17681~0.12580, which includes 0, indicating that there is no significant difference in the planning strategy use between collaborative planning and individual planning.

Analyzed from the five dimensions, the significance probability of the specific planning method category (Sig. (2-tailed) =0.025) is less than 0.05, and the 95% confidence interval of the difference is -.42906 ~-.03389, which doesn't include 0, indicating that participants' use of planning strategy got improved after getting individual planning. It can be referred that even after collaborative planning, the planning method strategy can also be improved in individual planning.

Table 4-3 Planning Strategy Paired Samples T Test of Group 2 under CP and IP

		<u> </u>		ired Diffe	rence	_			
				S.E.		onfidence al of the			
		Mean	S.D.	Mean	Diffe	erence			Sig.
					Lower	Upper	t	df	(2-tailed)
Topic	CP-IP	.00000	.49160	.12290	26195	.26195	.000	15	1.000
Exploring									
Goal	CP-IP	.02063	.64944	.16236	32544	.36669	.127	15	.901
Setting									
Audience	CP-IP	.08333	.83887	.20972	36367	.53034	.397	15	.697
Awareness									
Genre	CP-IP	.00000	.48305	.12076	25740	.25740	.000	15	1.000
Strategy									
Planning	CP-IP	23148	.37080	.09270	42906	03389	-2.497	15	.025*
Methods									
Whole	CP-IP	02550	.28394	.07099	17681	.12580	359	15	.724
Scale									

<sup>\*</sup>p<0.05

## 4.2 Effects of Planning Participatory Structures on Learners' Planning Process

## 4.2.1 Learners' planning process under individual planning

After two writing tasks, altogether 33 valid reflective journals were collected (16 in group 1, 17 in group 2).

As there are five sub-categories in a reflective journal, participants' planning process will be presented by the frame of the reflective journal (exploring the topic, setting rhetorical goals, extracting information, evaluating information, and organizing information). All the journals were analyzed by the researcher. The whole analysis work goes for twice, with a duration of 1 month, in order to ensure the accuracy and validity of the data analysis. A content analysis was conducted for each answer in a reflective journal. According to theme and sub-categories, the journals were first given labels as much as possible, and the codes and labels were then reduced and classified into ultimate codes. These codes finally were extracted into several themes. The ultimate codes in the five themes are presented in table 5.

Table 5 Ultimate Codes in Analyzing Reflective Journals of Individual Planning

	Codes					
Exploring topic	Translating and comprehending					
	Circling keywords					
	Grasping writing instruction					
	Relating to oneself					
Setting goals	The complexity of the topic					
	Subject preference					
	Social values					
	Being persuasive					
Extracting	Examples of others					
information	Own experience					
	External information (books, news)					
	Knowledge learned before					
Evaluating	Pertinent to the topic					
information	Avoiding redundancy					
	Social value (positive; real; reasonable)					
	Within language command (grammar; lexis)					
Organizing	Dimensions of information sources (society; family; person)					
information	The inner logic of information (progressive; causality; contrast)					
	Relating to writing instructions (genre; writing goals)					

As shown in Table 5, in exploring the topic category, there are four codes: translating and comprehending; circling keywords; grasping writing instruction and relating to oneself. When asked to plan, students all first try to figure out what they are required to write, and what the writing tasks saying. They first translated the tasks and understood them. This step appeared more frequent in group 2's journal telling, as they were receiving a more abstract writing task than group 1 when doing individual planning, so they paid more attention to translating and comprehending. Then students reported that they would circle keywords in the instruction to help themselves plan well. After knowing the intention of the task, they paid attention to the demands of the task, such as time limitations, words demand, and others. This step was classified into grasping writing instruction. Finally, as for relating to oneself, it means students relate the writing task to themselves when planning. When choosing writing tasks, the campus topic was preferred, as to make participants familiar with the writing task. And the genre of the

writing tasks in this study was argumentative writing. So, when students plan, they easily related the topic to themselves to make a decision.

As for the second category in the planning process, setting goals, four codes were produced: the complexity of the topic; subject preference; social values; and being persuasive. As the genre was argumentative writing, participants were asked to make a decision between two choices and to defend themselves. When making choice, their writing goal was also set. The first principle to set a writing goal was the complexity of the topic, that is whether the topic they chose was easy to write. The second principle was subject willingness. Most participants reported that they made the choice quickly as they already had a preference in their minds. The third principle was social values. Participants reported that they would consider whether the goal they set was positive or conformed to social values. Last, as the genre was argumentative writing, participants preferred a topic that was more persuasive.

As for extracting information, four codes were: examples of others; own experience; external information; and knowledge learned before. Extracting information is the process of participants finding viewpoints to support their argument. Their viewpoints basically come from examples of others or themselves; come from books, news, and such kind of external information; and come from the knowledge they learned before.

When evaluating information, four principles appeared: pertinent to the topic; avoiding redundance; social value; within language command. After extracting information, participants should evaluate the information they had gotten. The first principle is the information should be pertinent to the writing topic. If it was not highly related to the topic, it would be passed. The second principle was avoiding redundancy, that is to say, participants tried to filter out repeated opinions, or tried to classify them into one group. The third principle was social value, they preferred to write some positive opinions. The last principle was within language command. If the opinion was difficult for participants to write (grammar, lexis), it would be cut out.

As for the last step, organizing information, there were three codes: dimensions of information sources; inner logic of information; and relating to writing instruction. The three codes represent three ways to organize information. The first one refers to organising information (opinions) according to the sources. For example, they arrange the order of information as society, family, and person. The second way, the inner logic of information refers to organising information according to the logical relation of the opinions. Such as progressive relationship, causality, or contrast. The last one, relating to writing instruction means going back to the demands of writing tasks, and organising the information according to the relevance or importance of the topic.

## 4.2.2 Participants' Planning Processes under Collaborative Planning

After two writing tasks, altogether 32 valid reflective journals were collected (16 in group 1, 16 in group 2).

The whole analysis work in 4.2.2 is similar to 4.2.1, and the ultimate codes of the reflective journal in collaborative planning are almost identical to the codes of the reflective journal in individual planning (in table 7). The biggest difference is the negotiation between pairs which appears in the topic exploring category, goal setting category, extracting information category, and evaluating information category. The frequency of the negotiation in five categories in the reflective journal is counted in the table below:

1 1 1			J
	Group 1	Group 1	Total
Topic exploring	2	0	2
Goal setting	2	0	2
Extracting information	2	2	4
Evaluating information	0	2	2
Organizing information	0	0	0

Table 6 frequency of pairs negotiation in five categories in reflective journal

As the table shows, negotiation happened most frequent in extracting information category. It indicated that participants sought the pair's help to get more information and negotiate to produce better information. In the topic exploring category, goal setting category, and evaluating category also happened negotiation. It seemed all the negotiation is for producing opinion, more in content rather than language, let alone organization.

#### **V** Conclusion

After two rounds of writing tasks, the study investigated the planning strategy use and planning process of 34 EFL learners by analyzing the questionnaire and reflective journal. The present study main found:

- (1) Compared with individual planning, collaborative planning can improve learners' planning strategy use when learners first get individual planning and then collaborative planning. That is to say, individual planning cannot have positive and significant effects on learners' planning strategy use once they got collaborative planning. It indicated that learners need constant and long-period collaborative planning training to enhance their planning ability.
- (2) The planning participatory structure nearly has no significant effects on learners' planning process except the negotiation with pair in collaborative planning. It showed that learners mainly negotiated on content, hardly on language and organization. By analyzing the reflective journals, this study dug out the detailed planning process for general argumentative writing (table 5).

The findings above reveal that teachers can apply the collaborative planning method in writing teaching to enhance learners' planning ability. And once learners had accepted collaborative planning, this method should be carried on for long-term effect. What's more, teachers can combine collaborative planning training with normal teaching to enhance students' planning ability in language and organization.

In the meanwhile, the present study has some limitations. First, the study just focused on 34 EFL students, the amount and range are limited. Second, the study just executed two rounds of writing tasks, as such the experiment was quite short. Future studies can improve the two shortcomings to achieve a more complete experiment.

## References

[1]. Ellis, R. (Ed.). (2005). Planning and task performance in a second language (Vol. 11). John Benjamins

- Publishing.
- [2]. Flower, L., & Hayes, J. R. (1981). A cognitive process theory of writing. College composition and communication, 32(4), 365-387.
- [3]. Li, Z X. (Ed.). (2007) Research on the planning process of English majors. Henan University Publishing.
- [4]. McDonough, K., De Vleeschauwer, J., & Crawford, W. (2018). Comparing the quality of collaborative writing, collaborative prewriting, and individual texts in a Thai EFL context. System, 74, 109-120.
- [5]. Nash, J. R. H. J. G. (2013). On the nature of planning in writing. The science of writing: Theories, methods, individual differences and applications, 29.
- [6]. Ong, J., & Zhang, L. J. (2010). Effects of task complexity on the fluency and lexical complexity in EFL students' argumentative writing. Journal of Second Language Writing, 19(4), 218-233.
- [7]. Rahimpour, M., & Safarie, M. (2011). The effects of on-line and pre-task planning on descriptive writing of Iranian EFL learners. International Journal of English Linguistics, 1(2), 274.
- [8]. Rahimi, M., & Zhang, L. J. (2018). Effects of task complexity and planning conditions on L2 argumentative writing production. Discourse Processes, 55(8), 726-742.
- [9]. Rostamian, M., Fazilatfar, A. M., & Jabbari, A. A. (2018). The effect of planning time on cognitive processes, monitoring behavior, and quality of L2 writing. Language Teaching Research, 22(4), 418-438.
- [10]. Seyyedi, K., Ismail, S. A. M. M., Orang, M., & Nejad, M. S. (2013). The Effect of Pre-Task Planning Time on L2 Learners' Narrative Writing Performance. English Language Teaching, 6(12), 1-10.
- [11]. Tabari, M. A. (2021). Task preparedness and L2 written production: Investigating effects of planning modes on L2 learners' focus of attention and output. Journal of Second Language Writing, 52, 100814.
- [12]. Tavakoli, M., & Rezazadeh, M. (2014). Individual and collaborative planning conditions: Effects on fluency, complexity and accuracy in L2 argumentative writing. Teaching English as a Second Language Quarterly (Formerly Journal of Teaching Language Skills), 32(4), 85-110.
- [13]. Wang, J P., & Pu,X W. (2016). The effects of pre-task planning and On-line planning on L2 written linguistic performance in timed writing. Foreign Languages and Their Teaching, (6), 66-74.