# Application of Cooperative Learning Teaching Method to English Teaching in Private Higher Vocational Colleges

A Case Study in Huanghe Science and Technology College

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Abstract—Nowadays, with the development of globalization, higher demands for college and university students' practical English proficiency and interpersonal ability were emphasized. However, problems in English teaching and learning in Private Higher Vocational Colleges (PHVC) restrict the students to meet the needs. Therefore, the author of the present paper has conducted an empirical study on the application of Cooperative Learning (CL) teaching method to English teaching, trying to find one method which is helpful to solve these problems. It is proved feasible and effective to apply CL to English teaching in PHVC.

Keywords—CL teaching method; English teaching; PHVC

#### I. INTRODUCTION

Nowadays, with the development of globalization, higher demands for college and university students' English proficiency and interpersonal ability were made and emphasized. However, problems in English teaching and learning in Private Higher Vocational Colleges (hereinafter PHVC for short) restrict the students to meet the needs. New teaching methods should be employed to solve the problems.

Students of PHVC usually have weak English learning ability, for example, poorer academic background, learning habits and learning methods or strategies. Besides, most of them have weak communicative ability in English. What's more, they also should improve their interpersonal abilities.

Meanwhile, most English teachers in PHVC still conduct traditional teaching method. Their command of English teaching theories and practical teaching abilities needs to be improved. Passive feedbacks from the students hinder them to improve their teaching quality.

What's more, the lack of dense and positive learning atmosphere produces negative influence on English teaching and learning.

Cooperative Learning (hereinafter CL for short) teaching method has been proved pretty effective in producing higher achievement, developing interpersonal skills (Johnsons, 1987), fostering responsibilities (Kohn, 1987), and increasing motivation (Szostek,1994), etc. in different subject areas and age groups, but not in English teaching in PHVC in China.

Therefore, the author has taken this experiment to testify whether it's feasible to apply CL teaching method to English teaching in PHVC and whether it's effective to solve the problems, mainly in improving PHVC students' English learning and communicating ability, and their comprehensive interpersonal ability, as well as ameliorating the English learning atmosphere of PHVC.

# II. IMPLEMENTATION OF CL IN PHVC ENGLISH TEACHING

#### A. Subjects

The research was conducted in two classes in International School of Huanghe Science & Technology (S&T) College, a private college. One class of 32 students with 18 girls and 14 boys was chosen to be the experimental class (hereinafter EC for short). The other class, in which there are 32 students, 19 girls and 13 boys, was chosen to be the controlled class (hereinafter CC for short).

- 1) Similarities of the EC and the CC: All the participants of the research are first-year students at higher vocational level and with the same major, Accounting and Auditing. After being enrolled in the college, they were distributed to two parallel classes randomly. In the first semester before the experiment, they were taught by the same teacher, the author of this thesis, with the same traditional teaching method, and use the same textbook. Their final examination scores of the first semester were set to be the pre-test scores, which were proved to be equal.
- 2) Different Teaching Methods between the EC and the CC: The experiment was conducted in the second academic semester, in which the two classes were taught with different teaching methods. The EC was taught with CL teaching

method, while students of the CC still received traditional teaching method.

The experiment was conducted in one academic semester which lasted 15 weeks.

#### B. Research Instruments

In this experiment, data collection instruments contain pre-test and post-test, questionnaires, interviews and classroom observation. They were conducted to testify whether there were changes through implementing CL teaching method, and whether there were any differences between the EC with CL teaching method and the CC with traditional teaching method.

#### *C. Procedure of the research*

- 1) Dividing of Groups: The first step of implementing CL into English teaching is to divide the EC into groups. Students of the EC were divided into eight groups, in each of which there were four, on the basis of their previous academic achievements, personality, gender and hometown. In each group, there were one high-achiever, one low-achiever and two medium-achievers. Boys and girls were also divided averagely into different groups and four members of the same group had different personalities from different places of Henan province to achieve complementary in CL activities. Therefore, the eight groups were similar with each other in terms of the level of overall academic achievement, personality, gender and hometown.
- 2) Training before the Experiment: The training before the experiment could avoid some errors and help the experiment go on smoothly. Before the experiment, most students knew nothing about CL, so the teacher should introduce the main contents of CL to the students. By introducing the basic elements and main approaches of CL, the teacher conveyed to the students that everyone was indispensible and their interaction skills were quite important in achieving the group as well as the individual goals. In the following training process, the teacher mainly taught the interaction skills which were lacking. To guarantee everyone's participation in the CL activities, each student in one group was assigned a specific role.
- 3) Design of CL Activities: CL activities should be designed according to the content and character of the practical learning tasks. In designing the activities, different CL approaches could be put into use such as STAD, TGT, Jigsaw II, GI, Learning Together and so on mentioned in chapter three. The selection of the approaches should be based on the practical learning situation and the purpose of getting more flexible and effective implementation.

#### 4) Cooperative Learning Activities

a) Cooperative Learning Activities in Listening: In the implementation of CL into listening, the author usually conducted the approach of STAD in order to motivate every student. For example, before listening, students worked in group to learn new words and collect information on

suggestions for a cold. While listening, every member finished the task individually. Next each of them got an individual score. Then each individual's score was used to compare with his/her precious average listening test score to figure out his/her improved score. All the improved scores of one group added together to get the improved score of the group, on the basis of which, every group member could be awarded usually in form of bonus points. For each individual, the sum of this bonus points and his/her natural score of the task became his/her final score of this activity. By means of combining individual and group award together, every student's contribution was encouraged and stimulated

- b) Cooperative Learning Activities in Reading: Group Investigation was usually conducted in the implementation of CL in English reading. For example, at first, the students were asked to preview the passage including dealing with new words and expressions, collecting background information and getting a general idea about the material. In order to get more background information, the teacher assigned the task of collecting information about eight main types of music to eight groups. Every group's task was divided into four subtasks, which were the history, the famous singers or players and several representative songs of this type of music. Each member was responsible for one subtask. Then every member collected information or material which were then shared and discussed within the group to create a presentation. Next, groups took turns to give the presentation with the participation of every member. Group evaluation was usually made by the teacher and other groups according to the grade and quality of collected information and final presentation.
- c) Cooperative Learning Activities in Speaking: Listening activities were usually in forms of developing conversations and presenting group opinions, in which Jigsaw II was usually used. Take Unit 9 for example. The teacher analyzed the unit and provided related materials, which were then divided into four categories, each of which was distributed to one member in every group respectively. Jigsaw II was conducted during the preparation process of the activity. Materials on description about people's appearance were divided into four parts, expressions about figure, clothes, hair and characters on the face, which were assigned to the four members in each group respectively. Students obtaining the same material reformed "expert group" to learn and discuss how to describe on their assigned topic better. Then they went back to their own group and took turns to teach what they learnt in the "expert group" until every member mastered all the four aspects of description about people's appearance. Then they worked together to develop a conversation on this topic with examples in the textbook for reference. At last, all the groups took turns to give their presentation, in which every member should have a role to play. They were also required not to read or recite sentences in their conversation but to make the dialogues with emotion just like in real communication. The teacher took notes in the process of the role plays and reports but without correcting the mistakes immediately. After the presentation, the teacher summarized

common mistakes and gave positive comments with encouraging words as well as useful advice for better performance. All the groups were evaluated both by the teacher and other groups.

d) Cooperative Learning Activities in Writing: On implementing CL into the teaching of writing, Murray stated in 1992: "Collaborative writing was essentially a social process through which writers look for shared understanding" (Murray, 1992: 101-117). For writing one composition, all group members were involved in the construction. They first shared their view, related materials and possible vocabulary, and then discussed the topic about its purpose, structure and direction for the first draft. All the methods were assembled together and considered to compose the first draft with all members' participation. More detailed feedbacks for the first draft within the group were needed to polish their work. After the polishing, the group work was handed in and checked by the teacher. Group members received a feedback and evaluation.

#### D. Evaluation

According to the types of CL activities, two evaluation methods were usually used in the author's experiment. For those activities in which individual tests were taken and individual scores were given, the method of bonus points was usually conducted. Groups were given bonus points according to the grade of the improved scores of the group, and every member could share this bonus points to add it with his/her score of the test to get his/her score of the activity.

For activities with cooperative work and final group presentation, Group-Graded Projects were usually conducted. The group scores for the presentation of a role play, a report, or a composition, could be given to every member of the group as his/her individual score of the activity. Half of the group score came from the teacher, and the other half came from the average score given by other groups.

At the end of the semester, for each student, the scores of all the CL activities were added together to calculate the average score as his/her usual achievement of the semester, which accounted for 30% in the total score of the final examination. The evaluation stimulated every student in the EC to do indispensible individual contribution to the success of the group as well as of themselves and encouraged them to make greater efforts.

#### III. DATA ANALYSIS AND DISCUSSION

# A. Analysis of the Pre and Post Tests

In this part, the author will conduct quantitative analysis of the scores of the EC and the CC in the pre-test and the post-test in order to testify whether there's significant difference before and after the experiment and further prove whether CL is effective to improve the English proficiency of students in the EC. All the scores of the 32 students in the EC and 32 students in the CC both in the pre and post tests were analyzed with SPSS 17.0. The results were presented as follows. For the purpose of making the results of the analysis

more persuasive, both independent sample t-test and paired sample t-test will be applied.

According to Table I, independent sample t-test for pretest of the EC and the CC, the value of P in the Levene's Test for equality of variances is 0.964, which is higher than 0.05. So the two variances are equal and the comparison could be conducted between the pretest scores of the two classes. Then the p-value in the t-test for equality of means is 0.980, which is bigger than 0.05. It proves that there is no obvious difference between the students' pre-test scores in the EC and the CC. Therefore, before the experiment, no significant variation happened in students' English proficiency between the EC and the CC.

TABLE I.

		Independent Samples Test			
			Test for Equality Variances	t-test for Equality of Means	
		F	Sig.	Sig. (2-tailed)	
Pre- test	Equal variances assumed	0.002	0.964	0.980	
	Equal variances not assumed			0.980	

What's more, the mean scores of the EC and the CC in the pre-test are 70.09 and 70.16 respectively, which are pretty approximate. It means that the average score of the two classes are similar before the experiment. That is to say, before applying CL teaching method, the students in the EC and the CC were at the same level of English proficiency.

According to Table II, independent sample t-test for post-test of the EC and the CC, the p-value is 0.628 in the Levene's Test for equality of variances, which is higher than 0.05, so it means that the variances of this analysis are equal. The post-test scores of the two classes could be put together for further comparison. Then the p-value in the t-test for equality of means is 0.00, lower than 0.05, which proves that there is obvious difference between the students' post-test scores in the EC and the CC. In other words, students' English proficiency in the EC and the CC became obviously different after the experiment.

TABLE II.

		Independent Samples Test			
			Test for Equality Variances	t-test for Equality of Means	
		F	Sig.	Sig. (2-tailed)	
Post- test	Equal variances assumed	0.237	0.628	0.00	
	Equal variances not assumed			0.00	

In addition, the mean score of the EC in the post-test is 81.00, which is higher than 67.78 of the CC. It means that

the average score of the EC becomes higher than that of the CC, which proves that the English proficiency of the students in the EC has achieved great progress after 15 weeks of implementing CL teaching method.

According to the result of paired sample t-test in Table III, the mean score is -10.906, and the value of P is 0.00, which is lower than 0.05, so it proves that significant differences appeared in EC students' scores between the pre-test and the post-test. That is to say, the English proficiency of the students in the EC has been improved greatly since the implementation of CL teaching method in English classes.

TABLE III.

		Paired Samples Test				
		Paired 1	Differences	t	Sig. (2- tailed)	
		Mean	Std. Deviation			
Pair 1	pretest1- posttest1	-10.906	4.395	-14.038	0.00	

In addition, according to the result of paired sample statistics, the mean score of the EC in the pre-test is 70.09, while it achieves 81.00 in the post-test. It means that the average score of the EC students in the post-test is obviously higher than that in the pre-test, which proves that students in the EC has got great progress in the English proficiency after the implementation of CL in the English teaching. Therefore, CL teaching method is effective to improve students' English proficiency.

#### B. Analysis of the Questionnaires

All 32 students of the EC took part in the questionnaires twice, before and after the experiment respectively. All the students did the questionnaire honestly and carefully, and all the 32 answer sheets each time were valid. There were four sections with eight items in each section in the questionnaire. The first section is used to investigate the students' English learning ability. Section two is a survey on students' communicative ability in English. In the third section, eight items are used to test students' comprehensive interpersonal ability. Section four is an investigation on the English learning atmosphere. A five-point Likert-type scale 5, 4, 3, 2, 1 is used in the questionnaire. All the items are designed in positive direction and all orders of the answers are put in one direction. The total mean scores for each section are 40 points. The scores of every item for every student were analyzed with SPSS 17.0.

According to the analysis, for section one, after the experiment, the mean score is 35.09, which is much higher than 14.58 before the experiment. It means that students have got obvious progress in the ability of learning English. In section two, the mean score after the experiment is 33.53, 19.57 higher than that before the experiment. Students show their great progress in practical communication in English, such as in listening, reading, speaking and so on. The mean score of section three after the experiment is 37.82, which is much higher than 18.40 before the experiment. Students

become more wiling to provide help, cooperate and share with others. The mean score of section four reaches 36.50 after the experiment, 22.73 higher than 13.77 before the experiment. Most students show positive comments on the learning atmosphere after the experiment, which is regarded as friendly, relaxing and active.

#### C. Analysis of the Classroom Observation

From the classroom observation, the researcher found students in the EC became more active and enthusiastic to study English, finish learning tasks, practice in English, help and encourage each other. Classroom performance proved their progress in these scopes.

#### D. Analysis of the Interviews

The interviews were conducted in the EC after calculating post-test scores at the end of the semester. The researcher randomly chose 12 students to be the interviewees, three of which were high-achievers, three medium-achievers and three low-achievers according to their academic achievement. According to these interviews, though some are negative, yet the common attitude towards English teaching with CL teaching method could be concluded as positive. Most students expressed their improvement in learning and practicing English, as well as cooperating with others.

### IV. CONCLUSION

#### A. Major Findings

From the analysis of the tests, questionnaires, interviews and classroom observation, it is obvious that most experimental results positively favor the EC.

- 1) CL teaching method is effective to improve PHVC students' English academic achievement: Nearly all students in the EC got greater achievement while little improvement was achieved by the students in the CC through the comparison of their sores in the pre and post tests. In addition, no one in the EC stepped backward after the experiment.
- 2) CL teaching method can improve PHVC students' English learning ability: Most students in the EC were proved to have formed positive English learning habit little by little.
- 3) CL teaching method is effective to improve PHVC students' communicative ability in English: students of the EC became more active to share their opinions, give response to others, provide feedback to peers in English and take part in different English activities.
- 4) Through implementing CL in English teaching, PHVC students can also get progress in comprehensive interpersonal ability: In CL teaching process, they helped and encouraged each other to make more contribution for their group. Their sense of responsibility was also cultivated in cooperative process.

- 5) CL teaching method is effective to ameliorate the total learning atmosphere in PHVC: Through CL activities, Group members encouraged each other to improve themselves in order to make more contribution. Every student's hard work positively influences each other.
- 6) CL can arouse PHVC English teachers' enthusiasm in improving their command of English teaching theories and their practical teaching abilities.

#### B. Suggestions for Further Study

CL teaching method is new to English teaching in PHVC, and the present research is a preliminary exploration in this field, so further studies should be conducted.

Since the subjects and the time for the present research are limited, so the effectiveness of CL in English teaching in PHVC are advised to be proved in a wider experimental scope and longer period of experimental time.

CL teaching method was proved to be effective in improving students' English learning, communicating and comprehensive interpersonal abilities in this research, yet what kind of potential effects of CL in English teaching in PHVC is to be further studied and explored.

There are different approaches in CL teaching method. Further exploration on which type of learning content and objective would be the most suitable for each approach is needed.

Someone still hitchhiked in the experiment. How to get rid of this problem effectively? Further studies should be conducted to explore special approaches which can guarantee every member's participation and contribution.

Low-achievers' performance usually interfered the smooth going of CL activities, so attention should be paid to the exploration of how to maximize low-achievers' progress in further studies.

Not all the students in the experiment appreciated applying CL into English teaching. Further researches should be made to study how to design CL activities from which every student can get benefit.

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