Application of English cohesion theory in the teaching of writing to Chinese graduate students

ZHOU Xin-hong

(Foreign Languages College, Zhejiang Normal University, Jinhua Zhejiang 321004, China)

Abstract: The English cohesion theory proposed by Halliday and Hasan makes great contributions to the understanding of the coherence and cohesion of the English texts. It should be applicable in the teaching of English writing so as to improve the cohesion in the students' compositions. The present paper describes apractice of this order among non-major graduate students, and discusses its results. The conclusion is that teaching activities of this kind can indeed improve the cohesion in the students' compositions. Finally the paper raises a few concerning problems which remain to be further explored.

Key words: English cohesion; English writing; graduate students

1. Introduction

Since the publication of *Cohesion in English* by Halliday and Hasan (1976), many researches have been made in the field of cohesion and coherence in the English texts. Although different ideas concerning their theory exist, its overall description of the situations of cohesion and coherence in English is still worth studying. In the field of the teaching of English Writing only, some experiments have been made in the teaching practice on the basis of their theory. Some MA or PhD candidates used it as the subject of their dissertations (XU Ling-chun, 2002; FANG Cheng, 2002; KONG Ling-ling, 2002). The subjects of their experiments are mostly undergraduates. The present paper describes a teaching practice when the author is teaching a writing course to the graduate students of non-English majors. The purpose of the teaching practice is to show whether it is possible to improve the quality of the compositions of the students on the aspect of cohesion by teaching them Halliday's cohesion theory. By teaching the Chinese non-English major graduate students the theory of English cohesion, is it possible to raise the level of cohesion and coherence in their English compositions, hence the overall quality of their English compositions? Here is a description of the process and result of this teaching practice.

2. Theoretical basis

The main theoretical basis for this teaching experiment is the cohesion theory of Halliday and Hasan. Since their theory is a complicated system containing a large number of contents, some of which are still controversial and are in fact ambiguous, some parts of their theory are not included as teaching contents and basis for statistical analysis. For instance, in lexical cohesion, the boundary of "collocation" is not clear-cut. In the book of Halliday and Hasan, the definition of this kind of cohesion is rather ambiguous: "...cohesion that is achieved through the association of lexical items that regularly co-occur." (Halliday & Hasan, 1976) In the later part of the same book

ZHOU Xin-hong, female, M.A., associate professor of Foreign Languages College, Zhejiang Normal University; research field: applied linguistics.

they said, "There is always the possibility of cohesion between any pair of lexical items which are in some way associated with each other in the language." (Halliday & Hasan, 1976) and this kind of cohesion is even beyond the area of two-word lexical items: "It is very common for long cohesive chains to be built up out of lexical relations of this kind, ..." (Halliday & Hasan,1976). Judging form the above, important as this kind of cohesive device is, it is not easy to apply it in teaching practice and in statistics. Therefore, it is temporarily excluded in the experiment. So, the occurring frequencies of the following ten cohesive devices belonging to four kinds in the students' compositions are involved in the present study: (1) reference (including personal reference, demonstrative reference and comparative reference; (2) substitution (including nominal substitution and verbal substitution); (3) conjunction (including elaboration, extension and enhancement); (4) lexical cohesion: reiteration.

Here some points that need to be clarified are as follows: Firstly, clausal substitution is omitted in the "substitutions" listed above. The reason for doing so is that this kind of substitution is rarely seen in written texts (LI Chang-zhong, 2002), and therefore, in written texts such as compositions, it is basically of no statistical value. Secondly, Conjunctions are divided according to the three kinds of expansion in the logical-semantic relations in Halliday's book *An Introduction to Functional Grammar* (Halliday, M. A. K., 1994). The reason is that this kind of division is "more reasonable and scientific", "eliminating the difficulty in classifying some of the conjunctional elements with the earlier method of classification" (ZHU Yong-sheng, ZHENG Li-xin & MIAO Xing-wei, 2001). Thirdly, in lexical cohesion, the classification which is used in the experiment is consistent with the classification by Halliday in 1976. Both synonyms and antonyms are included in reiteration, and for the reason stated above, "collocation" is omitted.

3. Teaching process

The subjects of this study are non-English-major graduate students for master's degree of two classes in Zhejiang Normal University in China. They are from three or four majors, and their native language is Chinese. The number of students in the experimental class is 43, while the contrastive class consists of 38 students. In the statistics, 20 students are chosen at random from each class. They have all passed the entrance examinations for master's candidates including an English examination. Their writing ability should be at an intermediate level.

3.1 Analysis of the pre-test

The pre-test: The English writing course for graduate students lasts for two terms. The term examination for the first term is used as the pre-test of this experiment, the purpose of which is to obtain some information about the use of cohesive devices in their English writings before specific instructions about English cohesion is conducted. The statistical results for the two classes are shown in Table 1 and Table 2 (The average length of the compositions is about 340 words, and the style is a narration).

 $Table\ 1\quad The\ use\ of\ English\ cohesive\ devices\ before\ instruction\ (the\ experimental\ class)$

Students'		Reference		Substit	ution		Conjunctio	n	Lexical
number	personal	demonstrative	comparative	nominal	verbal	elaboration	extension	enhancement	reiteration
1	21	1(1)*	3(1)	0	0	0	3	8	30
2	17	1	0	0	0	4	5	7	17
3	11	3	0	0	0	0	2	3	6
4	69	0	1	0	0	1	3	4	17
5	57	0	0	0	0	2	4	5	21
6	32	0	0	0	0	0	1	8	9
7	20	0	0	0	0	0	2	2	24
8	27	7	0	0	0	2	4	8	13
9	18	0	0	0	0	6(1)	3	7	12
10	23	1	0	1	0	1	2	5	7
11	21	2	0	0	0	2	6	3	13
12	68(1)	0	0	0	0	8	5	4	7
13	17	0	0	0	0	1	6	5	15
14	6(1)	0	0	0	0	1	3	7	16
15	23	2	1	0	0	1	1	7	11
16	23	1	3	1(1)	0	1	1	8	19
17	74(2)	0	0	0	0	1	4	13	11
18	28	0	1	2	0	1	6(1)	7	8
19	54(1)	2	0	1	0	1	2	9	5
20	39	2	0	2	0	1	1	4	7
average	32.4	1.1	0.45	0.35	0	1.7	3.2	6.2	13.4

Note: The figure in the brackets refers to the number of errors in the use of this kind of cohesive device.

 $Table\ 2\quad The\ use\ of\ English\ cohesive\ devices\ before\ instruction\ (the\ contrastive\ class)$

Students'		Reference		Substit	ution		Conjunction				
number	personal	demonstrative	comparative	nominal	verbal	elaboration	extension	enhancement	reiteration		
1	11(1)	3	0	0	0	1	1	4	20		
2	6(1)	0	1	0	0	1(1)	0	2	15		
3	61	0	0	0	0	1	1	1	6(1)		
4	60	1	0	0	0	3	3	5	11		
5	32	2	1	1	0	3(1)	2	8	23		
6	37	0	0	0	0	2	4	5	17		
7	64	5	0	2	0	2	6	9	7		
8		0	0	0	0	2	5	5	24		
9	28	0	1	2	0	2	5	10	30		
10	21	0	0	0	0	3(1)	3	9	13		
11	28	0	0	0	0	2	2	8(2)	15		
12	27	0	0	0	0	2	8	8	16		
13	13	5	1	2	0	2	2	7	16		
14	61	0	(1)	0	0	3	3	10	7		
15	55	1	1	0	0	2	2	8	8		
16	15(5)	3	0	0	0	1	1	3	20		
17	17	7	0	1	0	3	10	9	16		
18	14	0	0	0	0	1	4(1)	6	31		
19	20	0	0	0	0	2	3	3	16		
20	9	1	0	0	0	1(1)	0	2	15		
average	29.85	1.4	0.25	0.4	0	1.95	3.25	6.1	16.3		

Note: The figure in the brackets refers to the number of errors in the use of this kind of cohesive device.

It can be found from Table 1 and Table 2 that the item of "personal reference" is extensively used, and lexical reiteration is moderately used. Besides that, all other cohesive devices are seldom used. The use frequencies of the two classes are also similar. According to some investigators in China, the English compositions of the Chinese undergraduate students are in a quite similar situation. (XU Ling-chun, 2002; FANG Cheng, 2002; Halliday, M. A. K., 1994) Therefore, it is clear that as far as this point is concerned, non-English-major graduate students do not have substantial difference from undergraduates who are comparatively better at English writing. So, in order to improve their ability in this respect, it is necessary to involve some instructions in cohesive devices in the second term. Since it is an experimental comparative study, an experimental class and a contrastive class are set up so as to show whether the instruction is effective and to what degree it effects. Both classes are taught by the same instructor. In the teaching of the experimental class, the content that is described later is added to the normal content. The normal content is still included, but simplified. The teaching of the contrastive class is conducted as usual. Here are the four teaching steps related to cohesive devices in the experimental class: (1) Familiarize the students with Halliday's theory about English cohesion, especially the different kinds of cohesive devices that are mentioned above. The instructions are backed by profuse examples, which can best help the students really understand how many cohesive devices there are in English texts, and at the same time try to identify which ones are often neglected in their compositions or they are not at all able to use. (2) After getting familiar with all these devices, the students are required to find an English text (from various sources), and make a data analysis of all the cohesive devices in it. The purpose is to see which devices are used more frequently and which ones are used comparatively less. (3) Find a composition written by themselves (it should be as similar as possible in style to the English text that has been analyzed), and make a similar statistical analysis of the cohesive devices used in it, and make a comparative study to find out the differences. Caroline H. Vickers and Estela Ene believes that "It is possible for learners to notice the mismatch by comparing their own output to reading passages rather than native speaker reformulations" (Vickers, Caroline H. & Estela Ene, 2006). The results of the comparison can be expected: Almost all of them find the biggest difference lies in the use of the two items of "conjunction" and "lexical cohesion". And in the use of "comparative reference", the difference is also striking. In fact, their findings are basically identical to the results of the comparative analysis made by Song and Xia (SONG Mei-hua & XIA Wei-rong, 2002). They made an investigation to compare the features of textual cohesion of the good and poor compositions written by 364 non-English majors of Chinese college freshmen. They also found that the biggest contribution made by cohesive devices to good compositions comes from lexical cohesion, and the second one is grammatical cohesion, followed by anaphoras. It is also similar to the findings of the students after they make a comparison between the English texts and their own compositions. (4) Based on the above analysis, the students are required to write several compositions, and they may make comparisons again and repeat the process described above.

3.2 Analysis of the post-test

The post-test: the term examination of the second term is used as the post-test. In order to eliminate any factors that may affect the truth of the result, the students are not told that the compositions they write in the examination will be the post-test. The results of the post-test are shown in Table 3 and Table 4 (The average length of the compositions is also about 340 words, and the style is narration).

 $Table\ 3\quad The\ use\ of\ cohesive\ devices\ after\ the\ instruction\ (the\ experimental\ class)$

Students'		Reference		Substit	tution		Conjunction	l	Lexical
number	personal	demonstrative	comparative	nominal	verbal	elaboration	extension	enhancement	reiteration
1	23	0	3	0	0	4	5	10	37
2	30	1	0	0	0	4	5	7	23
3	24	3	0	1	0	2	2	5	10
4	22	0	1	0	0	5	6	9	37
5	33	1	0	0	0	2	2	11	21
6	27	1	0	0	0	2	5	8	15
7	26	1	0	0	0	3	3	6	24
8	21	7	0	0	0	2	9	11	29
9	27	4	0	0	0	3	5	10	16
10	16	3	0	1	0	6	6	5	12
11	15	2	0	1	0	4	7	3	26
12	23	0	0	1	0	8	5	8	19
13	32	0	0	0	1	2	6	7	19
14	18	2	0	0	1	4	7	7	27
15	29	0	0	2	0	8	7	8	25
16	22	2	0	2	0	4	3	8	16
17	17	0	0	1	0	4	8	5	21
18	14	1	0	0	0	8	7	5	19
19	16	0	0	1	0	4	4	9	27
20	45	0	0	2	0	3	1	9	20
average	24	1.4	0.2	0.6	0.1	4.1	5.15	7.55	22.15

Table 4 The use of cohesive devices after the instruction (the contrastive class)

Students'		reference		Substit	ution		Conjunction	ı	Lexical
number	personal	demonstrative	comparative	nominal	verbal	elaboration	extension	enhancement	reiteration
1	15	0	0	2	0	6	3	2	29
2	21	2	0	0	0	2	1	2	32
3	22	1	2	0	0	3	1	2	33
4	45	0	2	0	0	8	3	2	23
5	39	1	0	1	0	8	2	10	12
6	27(1)*	3	0	0	0	4	2	1	27
7	16	1	1	0	0	3	3	3	24
8	16	1	0	1	0	0	1	3	38
9	49	0	0	0	0	6	5	7	41
10	29(1)	0	0	0	0	1	0	6	22
11	33	0	0	0	0	0	0	9	28
12	46	1	0	0	0	1	4	5	30
13	20	6	0	0	0	2	6	5	13
14	37	2	0	0	0	2	2	9	27
15	23	4	0	0	0	5	5	2	26
16	46	2	0	0	0	1	3	6	42
17	31	0	0	1	0	5	8	3	12
18	15	0	0	0	0	3	4	7	12
19	25	0	0	0	0	4	2	2	14
20	32	1	0	0	0	1	3	5	14
average	29.35	1.25	0.25	0.25	0	3.25	2.9	4.55	24.95

Note: The figure in the brackets refers to the number of errors in the use of this kind of cohesive devices.

4. Discussion of the results

It can be clearly seen from the two statistics that the performances of the students of both classes have experienced changes, which is demonstrated in Table 5.

Class		Substitution			Lexical				
Class	personal	demonstrative	comparative	nominal	verbal	elaboration	extension	enhancement	reiteration
Experimental class (pre-test)	32.4	1.1	0.45	0.35	0	1.7	3.2	6.2	13.4
Contrastive class (pre-test)	29.85	1.4	0.25	0.4	0	1.95	3.25	6.1	16.3
Experimental class (post-test)	24	1.4	0.2	0.6	0.1	4.1	5.15	7.55	22.15
Contrastive Class (post-test)	29.35	1.25	0.25	0.25	0	3.25	2.9	4.55	24.95

Table 5 A comparison of the use frequencies of various cohesive devices of the two classes

A comparison of the results of the pre-test and post-test shows that, as far as the experimental class is concerned, of the all nine devices, significant rise in the use frequency has been achieved in "nominal substitution", the three items in "conjunction", and "lexical reiteration". In "demonstrative reference" and "verbal substitution", there is also a little rise. However, in "personal reference" and "comparative reference", the frequency of use decline slightly. Comparatively, as far as the contrastive class is concerned, besides the obvious rise in the use frequency of the two items of "elaboration" in "conjunction" and "lexical reiteration", all the other items may rise or fall to a small degree, which is almost of no statistical value.

A comparison of the two classes can also be seen in Table 5. In the pre-test, there is no substantial difference between the data of the two classes. The figures may be higher or lower for this class or for that class. But in the post-test, there are more items for which differences occur than the items for which no differences occur. Firstly, there is no obvious difference for the item of "reference". There is a certain amount of difference for the item of "substitution", among which the biggest difference occurs in the device of "nominal substitution". In the item of "conjunction", obvious difference occurs between the classes. In the three items of "elaboration", "extension" and "enhancement", the average use frequency of the experimental class is comparatively higher than the contrastive class by 26.2%, 77.6% and 65.9% respectively. The gap seems to be rather big. Finally, in the item of "lexical reiteration", the two classes both get improvement, and the increasing rates are also quite close to each other (65.3% and 53.1% respectively).

5. Conclusions and some problems to be explored further

We can conclude from the above statistics and analysis that the teaching of cohesive devices is helpful in improving the cohesions of the English compositions of the graduate students. The areas in which the most effect has been achieved seem to be the device of "conjunction" in the grammatical cohesion, and the "reiteration" in lexical cohesion. According to the comparative analysis of the "good compositions" and "poor compositions" of undergraduate students made by Song and Xia (2002), the most obvious gap between the "good compositions" and "poor compositions" appears in these two items. Hence it is quite necessary to spend some time in teaching cohesive devices in the writing course of the graduate students in China, and perhaps anywhere else. It should be helpful in improving the writing skills of the students, at least in the area of textual cohesion.

However, some problems and areas that need further study can be found in the above statistics.

Firstly, it can be found from Table 5 that both experimental class and contrastive class do not register significant rise in the use frequency of "reference". For the experimental class, the use frequency of "personal reference" even has a great drop. This, however, may not mean the drop of the writing quality of the compositions, because though "personal reference" is used quite frequently in narrative writing, its overuse may mean the unsophisticatedness of writing skills. The drop in the use frequency of "reference" may even mean the rise of the degree of formalness of the written text; however, the relation between 'reference', especially "personal reference", and the formalness of the articles is a question that needs further exploration. And, "comparative reference" is still rarely used in the compositions of the Chinese students. It is even more so after the instruction of the cohesive devices. It may mean that the students are still unfamiliar with this kind of cohesive device, and they are less able to use it freely. It may be necessary to pay more attention to this kind of device in English instruction

Secondly, whether it is "nominal substitution" or "verbal substitution", and whether it is before or after the instruction, the use frequency of "substitution" is quite low. It is arguable that the cohesive device of "substitution" is more frequently use in oral language. It is not so meaningful to written texts.

Thirdly, though after the instruction, the use frequency of "lexical reiteration" is markedly raised, its relation with the writing quality of the composition may be complicated and uncertain. Such a case may even exist: above a certain level, the more the authors use "lexical reiteration", the more limited their vocabulary will be. Therefore, if it exceeds a certain limit, the use frequency of "lexical reiteration" may have an inverse relation with the quality of the writing. Similarly, it needs to be confirmed.

References:

FANG Cheng. (2002). Lexical cohesion and writing quality. Unpublished M.A. Thesis, PLA Foreign Languages College.

Halliday, M. A. K. (1994). An introduction to functional grammar. London: Edward Arnold (Publishers) Limited.

Halliday, M. A. K. & R. Hasan. (1976). Cohesion in English. London: Longman Group Limited.

KONG Ling-ling. (2002). A study of the cohesive features in the argumentative writing of the Chinese English majors—And its pedagogical implications for the teaching of English writing in China. Unpublished M.A. Thesis, Guangdong University of Foreign Studies.

LI Chang-zhong. (2002). Textual cohesion and college English writing, Foreign Languages and Their Teaching, 164 (11): 25-28.

SONG Mei-hua and XIA Wei-rong. (2002). Combination of textual cohesive ties and textual teaching for the teaching of English writing -- a statistical analysis of the good and poor compositions written by non-English major freshmen. *Journal of the Foreign Language World*, 92 (6): 40-44.

Vickers, Caroline H. and Estela Ene. (2006). Grammatical accuracy and learner autonomy in advanced writing. *ELT Journal*, 60 (2): 109-116.

XU Ling-chun. (2002). Textual cohesive ties employed by NES and Chinese EFL writers in expository essays: A contrastive study. Unpublished M.A. Thesis, Zhejiang Normal University.

ZHU Yong-sheng, ZHENG Li-xin & MIAO Xing-wei. (2001). A contrastive study of cohesion in English and Chinese. Shanghai: Shanghai Foreign Language Education Press.

(Edited by SHI Li-fang, REN Li-ping and ZHANG Dong-ling)