Exploring the Effects of Teachers' Feed up and Feed Forward on Chinese Senior High Students' English Writing Self-efficacy and Writing Motivation

Yifei Fang *

Institute of Linguistics, Shanghai International Studies University, Shanghai, China

* Corresponding Author Email: 0201150009@shisu.edu.cn

Abstract. In second-language writing, learners need to coordinate a great number of linguistic and epistemic procedures and resources. Learners' motivation and self-efficacy are influenced by many factors, among which teacher's feedback is particularly important. This study investigated the correlation between writing self-efficacy and motivation and feed up and feed forward. 56 Chinese students from one senior high school participated in questionnaires that were employed to collect the research data. The participants were asked to complete writing self-efficacy and motivation questionnaires as a pre-test and post-test after receiving feed up and feed forward over the course of four sessions. This study shows that teachers' feed up and feed forward considerably increased participants' writing motivation, but did not significantly affect their writing self-efficacy, according to the results of two scales and paired samples t-test comparisons. According to the study's conclusions, it is advised that teachers should recognize the complex relationship between feed up, feed forward and students' writing self-efficacy and motivation thus proposing some coping strategies.

Keywords: Feed forward; feed up; writing motivation; writing self-efficacy.

1. Introduction

Writing in a second language necessitates a person to coordinate a variety of linguistic and epistemic procedures and resources. Individual variations factors like self-efficacy and motivation can impact students' effort levels in the writing process by affecting their attention and cognitive engagement [1]. One of the primary factors that possibly affect language learners' writing motivation and self-efficacy in the daily teaching process is instructors' feedback. However, during the author's high school internship, it is found that some students pay more attention to non-corrective feedback, such as feed up and feed forward (FU and FF). Because they want the teacher to praise the parts of their essay that fit the writing requirements and point out what needs to be improved next step. So, it is worthwhile to study the effects of FU and FF on students' writing motivation and self-efficacy. This study's aim is to find how writing motivation and self-efficacy in second-language writing are impacted by FU and FF. It should be emphasized that the author uses the Hattie and Timperley feedback model. According to this paradigm, "feedback" includes corrective feedback, feed forward, and feed up.

1.1. Feed up and Feed Forward

Within the scope of the English discipline, Keh defined feedback as “input from a reader to a writer with the effect of providing information to the writer for the revision of the article” [2]. Feedback is very important in the process of second language writing teaching. As Mittan once mentioned, “Learning to use language requires specific feedback from people, because the object of language is other people [3].” In the feedback model proposed by Hattie and Timperley, effective feedback for students includes corrective feedback, feed up and feed forward. Corrective feedback includes comments on the errors and the correct forms. Feed up involves the teacher's assessment of the accomplishment of objectives (for example, "I believe you have attained our objective. You did a good job writing it," and reminders of the objectives (such as "Keep in mind that creating a paragraph with coherence is our goal."). Additionally, feed forward offers guidance on the following performance step, presenting suggestions on the upcoming tasks and activities (for example, "We are
going to learn how to write an argument paragraph in the session after that.”) [4]. Providing effective feedback may have a good effect on writing anxiety, motivation, and self-efficacy, according to Zarrinabadi and Rezazadeh [5]. Based on the study's findings, students' feelings about writing might be significantly influenced by professors' responses to their performance.

1.2. Writing Motivation and Self-efficacy

One of the main affective aspects in learning a second language is motivation [6]. Gardner's definition of motivation, which is based on social psychology on the subject of language, is "an individual's desire to learn the language and acquire satisfaction through this activity" [7]. Previous research also suggest that there are various correlations between motivation and feedback. As an illustration, a fixed language mentality, or the belief that language intelligence cannot be altered, increased the cost of seeking feedback and, as a result, negatively predicted feedback monitoring, according to research by Papi et al. on feedback-seeking behaviors in writing [8].

Self-efficacy is the concept within social theory proposed by Bandura [9]. He regarded self-efficacy as the belief of someone achieving something and associated with someone's confidence in doing something [9]. Shell and Murphy deemed that writing self-efficacy refers to the belief and confidence that the students have to complete specific writing tasks and make use of the specific writing skills successfully [10]. In other words, writing self-efficacy involves writing task self-efficacy and writing skill self-efficacy. Lent et al. believed that writing self-efficacy can directly stimulate students' internal motivation and affect students' specific behavior in the process of writing, to help learners improve their writing ability [11]. Lee and Evans also discovered that receptive and productive mastering experiences, social comparisons, and achievement goal orientations all played a dynamic role in the construction of writing self-efficacy [12].

2. Method

This research used a pretest-posttest experimental design to examine the impact of FU and FF on the motivation and self-efficacy of Chinese senior high school students writing in English.

2.1. Participants

This research focuses on senior high school students. All 56 students are from senior high school and all of them have already learned English for 9 years. This research chose one class in Grade Two in a senior high school in Anshan. At the time of the experiment, the students were in the third semester of senior high school. After two years of English learning, they have already got used to teaching in senior high school.

The students were taught by a female language instructor (age: 29, MA in English teaching background, 4 years, 3 months of teaching experience). The author trained her to deliver the treatments. Teaching sentence structure and how to write various kinds of paragraphs were incorporated into the writing lessons for the kids.

2.2. Experimentation

Presenting written FU and FF forward to two student-authored compositions was part of the study's intervention. Each student was required to write two assignments over the course of four sessions. The pupils had to complete their tasks on paper, and then the teacher wrote FU and FF at the bottom. In regard to FU, the teacher highlighted the goal of these courses was to write two fully structured English essays that are related to the topic of the class (in the light of structure, grammar, vocabulary, etc.). She attempted to reiterate the goals and expectations to the pupils in this way. And the teacher made a conscious effort to provide FF that was relevant to the following steps of writing. As a result, the teacher clearly indicated the next action by mentioning writing characteristics that would be helpful going forward (for example, "You should focus more on using topic-based vocabulary in your paragraph in the next lesson.") or various types of paragraphs that should be written (for example,
"This semester's subsequent task is to compose a paragraph explaining why the phenomenon occurs"). They were instructed by the teacher to pay close attention to the instructions for the upcoming task.

2.3. Instruments

2.3.1. English Writing Self-efficacy Scale for High School Students

The writing self-efficacy scale used in this research was Senior High Students' English Writing Self-efficacy Questionnaire made by Wang Yuanni [13]. There are 20 items in total, which can be divided into two parts. The first aspect is the English writing task self-efficacy, which contains lots of dimensions about the requirements of senior high students. And the second part is the English writing skill self-efficacy, which aims to find out students' self-efficacy in different writing skills such as proper usage of nouns and verbs. What's more, the questionnaire is in the form of a 5-scale. 1 refers to completely inconsistent; 2 means basically inconsistent; 3 refers to sometime consistent; 4 means basically consistent; 5 refers to completely consistent. Meanwhile, this questionnaire is presented in Chinese in order to avoid unnecessary misunderstanding and help participants finish filling it out without troubles.

2.3.2. Questionnaire on English Writing Motivation of Senior High School Students

The participants' writing motivation was evaluated using the Waller and Papi writing motivation scale [14]. Seven items on a six-point (from never to always) Likert scale were included in the survey. When responding to questionnaires, some participants could indiscriminately give each item a positive evaluation without giving the item's presentation format more thought. Some of the Motivation for English Writing questionnaire's items are negatively expressed to prevent this impact. For the questionnaire in the pretest and posttest, Cronbach's reliability values were .84 and .87, respectively.

2.4. Procedure

The author asked for permission to see the teacher who assisted in carrying out the interventions before beginning the study. The teacher and the author met privately twice, during which time she received comprehensive instruction from the author on how to provide FU and FF as well as introductions to various model sentences and phrases (for examples, see Table 1). The author also verified the proper implementations of FU and FF by reviewing five sample texts with her annotations. The whole experiment lasted for 4 weeks (December 13, 2022 - January 13, 2023).

The writing self-efficacy and motivation scale were handed out in December of 2022, before the experiment. It serves as the pretest in order to give students their scores of writing self-efficacy and motivation. The aim of these two scales was to measure there 56 students' writing self-efficacy and motivation levels and find out their current writing self-efficacy situation. And this data was compared with the scores that were made by the end of the experiment so that the researcher can know whether and how the teachers' FU and FF affect students' writing self-efficacy and motivation. At that time, the researcher made a brief introduction to writing self-efficacy and motivation and explained there was nothing to do with their writing scores. And the duration of taking the self-efficacy and motivation questionnaires was about 20 minutes. A total of 56 writing self-efficacy and motivation questionnaires were handed out and all 56 questionnaires were recovered so that the recovery rate was 100. The pretest was taken in English class and some of the students played the questionnaire down and didn't take it seriously. Therefore, 2 of the total number was invalid. The next weeks were all for the written FU and FF. Almost every two weeks, students were given a writing task. And then the teacher gave written FU and FF to them.

After the experiment, the participants were required to complete the writing self-efficacy and motivation questionnaires again in order to compare the final data with the beginning data. The writing self-efficacy and motivation questionnaires were given out on January 13th, 2023. The researcher illustrated the aim of the writing self-efficacy scale again and explained there was nothing to do with their final exam scores so that participants can tick the answers as much as honestly as
they can. And then the scores were recorded and compared with the data collected before the experiment.

Table 1: Examples of FU and FF.

<table>
<thead>
<tr>
<th>Type of feedback</th>
<th>Example</th>
</tr>
</thead>
</table>
| FU               | • Excellent! Writing an effective paragraph is our aim. I believe you're getting closer.  
|                  | • Writing a good cause-and-effect paragraph is one of the course's objectives. I believe you can succeed with perseverance.  
|                  | • You will succeed in creating an orderly and cohesive paragraph if you keep on writing in this way. |
| FF               | • I believe that the following step should be to write in a more sophisticated manner.  
|                  | • Writing supporting sentences will be covered in the following class.  
|                  | • Developing a nice summary paragraph comes next.  
|                  | • You should concentrate more on supporting phrases for the upcoming assignment. |

2.5. Data Analysis

Using SPSS, the survey's findings were calculated, and the statistical analyses' correctness and dependability were checked. The current study's statistical analysis included the following steps: (1) Descriptive analysis to describe the general profile of writing self-efficacy and motivation with their means, standard deviation and standard error mean; (2) Paired sample T-test to explore the influence of FU and FF on writing self-efficacy and motivation.

3. Result

3.1. Descriptive Analysis of Students' Writing Self-efficacy

One of the research questions is whether the written FU and FF have an impact on students' writing self-efficacy and what the effects are. In this section, the results will be presented and analyzed in detail.

Table 2: Descriptive Statistics of Students' English Writing self-efficacy.

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Writing skill self-efficacy</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>33.35</td>
<td>6.332</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>33.66</td>
<td>6.511</td>
</tr>
<tr>
<td>Writing task self-efficacy</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>29.72</td>
<td>7.330</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>29.85</td>
<td>6.952</td>
</tr>
<tr>
<td>Writing self-efficacy</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>63.08</td>
<td>11.266</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>63.52</td>
<td>10.905</td>
</tr>
</tbody>
</table>

As is shown in Table 2, the mean of the scores of writing self-efficacy, writing skill self-efficacy and writing task self-efficacy is 63.08, 33.35, 29.72 in pre-test and 63.52, 29.85, 33.66 in post-test. Based on the three groups of the collected data, the mean of post-test data is much higher than pre-test data, but the overall difference is slight. According to the total score of 90 points on the writing self-efficacy scale, the students are at an intermediate level of writing self-efficacy, which suggests that students in these two classes have insufficient confidence in English writing and still needs helps to improve their writing self-efficacy.

3.2. Paired Samples Statistic of Two Dimensions

Table 3: Paired Samples T-test of Students' English Writing self-efficacy.

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
<th>t</th>
<th>df</th>
<th>Sig.(2-tailed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Writing skill self-efficacy</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>33.35</td>
<td>6.332</td>
<td>-1.144</td>
<td>47</td>
<td>.258</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>33.66</td>
<td>6.511</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Writing task self-efficacy</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>29.72</td>
<td>7.330</td>
<td>-.643</td>
<td>47</td>
<td>.523</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>29.85</td>
<td>6.952</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Table 3 expresses the various data of students in class 1 and it can be seen that the mean of both writing skill and task self-efficacy does not change a lot, but the mean of them indeed increases slightly, which can give a hint that written FU and FF also help students to improve their writing self-efficacy in a respectively slow way. In addition, from the sig. data, the sig. of writing skill self-efficacy is 0.258 (>0.05) and the writing task self-efficacy is 0.523 (>0.05), which shows that there is no significant effect on students' writing self-efficacy.

3.3. Descriptive Analysis of Students' Writing Motivation

Table 4: Descriptive Statistics of Students' English Writing motivation.

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Writing motivation</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>22.20</td>
<td>5.26</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>31.30</td>
<td>4.36</td>
</tr>
</tbody>
</table>

As seen in Table 4, the mean of the pre-test questionnaire in writing motivation is 22.20, with a standard deviation of 5.26, and the mean of the post-test questionnaire in writing motivation is 31.30, with a standard deviation of 4.36. After learning in the tenth grade, the students realized the importance of writing. Generally speaking, before the experiment, most of the students are willing and had the motivation to write. The mean of the writing motivation ranges from 22.20 to 31.30, with the standard deviation from 5.26 to 4.36 indicating that some motivation intensities are stronger than others.

3.4. Paired Samples Statistic of Two Dimensions

Table 5: Paired Samples T-test of Students' English Writing self-efficacy.

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Standard Deviation</th>
<th>t</th>
<th>df</th>
<th>Sig.(2-tailed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Writing motivation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pre-test</td>
<td>56</td>
<td>22.20</td>
<td>5.26</td>
<td>-6.166</td>
<td>56</td>
<td>.000</td>
</tr>
<tr>
<td>Post-test</td>
<td>56</td>
<td>31.30</td>
<td>4.36</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

From Table 5, the p=.000<.005 compared with the pretest questionnaire, there is a significant improvement in the post-test questionnaire. The difference between the means is -9.10 points on the writing motivation scale. It can prove that teachers’ written FU and FF do have an effect on the improvement of students' writing motivation.

4. Discussion

The study’s findings demonstrated that FU and FF generated different changes in students' writing motivation and writing self-efficacy. It is worth noting that the findings about writing self-efficacy were intriguing. The results showed that displaying FU and FF did not significantly alter thoughts about one's ability to write. But according to Lee and Evans, receiving constructive criticism increased students' writing self-efficacy [13]. This indicates how critical constructive criticism is for the growth of language learners' self-efficacy views. According to Lee and Evans, giving learners corrective feedback may help them achieve a sense of positive mastery in their writing assignments, ease self-regulation, and enhance their performance in following writing activities [13].

The findings also showed that providing FU and FF considerably increased participants' writing motivation. The success of FU in encouraging writing may be attributed to the possibility that having certain purposes may affect both the value that students place on second language writing assignments as well as the fascinating component of students' writing motivation. It follows that it would make sense to believe that offering feedback on students' goals will improve the value they place on their writing assignments and spur greater enthusiasm and writing drive. The fact that giving feedback on students' engaged effort and perseverance in completing writing exercises boosts students' interest and another argument for why FU and FF are successful in increasing students' motivation is that it generates positive self-perception.
The findings of this investigation imply that learners' feelings about writing can be significantly influenced by teachers' responses to their performance. Moreover, it is evident from the results of this research that students' writing self-efficacy and motivation are significantly increased when written corrective feedback is given along with judgment on the purposes (FU) and on the activities and objectives of the subsequent session (FF). The study's findings highlight the need and benefit of FU and FF for developing the psychological components of language education and writing training. Kormos's claims that individual differences play a significant role in L2 writing are further supported by the results of this research, which show that effective feedback have a significant impact on learners' attitudes toward L2 writing.

5. Conclusion

This study looked at how FU and FF instruction affected the motivation and self-efficacy of senior high Chinese student writers. The study's findings demonstrated that using FU and FF can positively impact writers' motivation and self-efficacy.

Additionally, this study has some repercussions for specialists in the sector. On one hand, this study is school-based research, so the participants selected in this study are not representative enough. The number of subjects is relatively small with only 56 students participating in the research. Thus, it must be doubtful whether the findings are universal. The results of the study may not be applicable to the writing teaching of all senior high school English teachers. On the other hand, this study relies solely on a questionnaire survey with respondents from only students or from the same grade in one senior high school, which is obviously a limitation. Writing self-efficacy and motivation is implicit and difficult to monitor. This paper only utilizes a questionnaire to investigate students' writing motivation, which may not be comprehensive.

Considering the limitations of this research and the development of English writing teaching, there are some suggestions for future study. While this study addresses the relationship between FU, FF and students' English writing self-efficacy and motivation, future investigations can focus on more combinations of different kinds of feedback. Besides, further study can pay more attention to how students' writing self-efficacy and motivation react to their writing performance. Thirdly, the subjects are limited. Further study can be done in other grades in senior high school, junior high school or some universities to further verify the research results and fill in the gap.

The author expects that the results of this research will make educators more conscious of how their FU and FF affect the second language writing skills of Chinese senior high school students. This should lead to more effective and efficient second language writing teaching.

References


