# A CORPUS-BASED QUANTITATIVE ANALYSIS OF SEVEN ENGLISH VERSIONS OF "*SHU DAO NAN*" CONCERNING THE HARMONY-GUIDED THREE-LEVEL POETRY TRANSLATION CRITERIA

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**Abstract:**

This paper makes a comparative study of seven English versions of "*Shu Dao Nan*" at the lexical, syntactic and textual levels. It carries out an objective quantitative study on the theory, Harmony-Guided Three-Level Poetry Translation Criteria -- "Harmony-Resemblance in Style, Sense and Poetic Conception-Eight Beauties" criteria, to reveal the styles of different translated versions and to provide reference and inspiration for the comparative study of poetry translation.

**Keywords:** corpus, harmony-guided three-level poetry translation criteria, Shu Dao Nan, Li Bai

## 1. Introduction

Translation is a bridge of information and cultural exchange. An increasing number of translation theories have been put forward in practice and constantly developed while guiding translation activities. However, translation studies based on translation theories have strong conventionality which results in the inability of making reasonable explanations for some translation phenomena as the field of translation studies continues to expand (Yu Guoliang, 2008:84). Therefore, more attention has been paid to corpus-based translation studies.

The research of the application of corpus linguistics based on data covers many fields of language research because of the creative methodology. The study of poetry language based on corpus is inevitable in the process of furthering corpus linguistics research to achieve scientificity during literature text study including poetry text study.

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It is required for the intersection of social sciences and natural sciences. Nowadays, corpus-based language analysis and study have become popular. Reliable findings require a great number of objective language usage data on the research of describing and analyzing language (Yang Huizhong, 2004:54).

From the perspective of corpus, the authors established seven micro corpora based on the seven English versions of "*Shu Dao Dan*", and made an objective, quantitative analysis by using software such as Wordsmith 7, AntConc, and Readability Analyzer 1.0.

## 2. Introduction to the Original Text and its English Translations

*"Shu Dao Nan"* was written by Li Bai when he was in Chang'an (now Xi 'an) to send his friend Wang Yan to Sichuan. The poem, consisting of 294 words, is mainly composed of seven-character lines. Although there is no strict rhyme but a strong sense of rhythm, the whole poem brings readers fairly high spirits, which fully shows Li Bai's impassioned and romantic, bold and unrestrained characteristics. The poem describes the perilous but magnificent landscape at the Shu area, and shows a vivid picture through the artistic method of exaggeration, unique images of Shu and culture-loaded allusions, all of which bring great cultural challenges to translation.

The poem has at least 17 English versions, excluding those on the internet. In view of the large number of versions, the authors selected seven versions that are highly discussed in the academic circle and whose translators have different cultural backgrounds. The first one is the latest version of Zhao Yanchun; the second is of Sun Duyu, a famous Chinese translator who is proficient in translating ancient Chinese poems; the third is of Yang Xianyi and Gladys Yang from whom the translation works reflect the collision and integration of Chinese and British cultures, as Gladys is a British expert in Chinese literature; the fourth is of Xu Yuanzhong; the fifth is of an English scholar, Arthur Cooper; the sixth is the joint version of Witter Bynner and Kiang Kanghu; the seventh is of W.J.B. Fletcher. They will be briefly referred to as Zhao's, Sun's, Yangs', Xu's, Cooper's, Bynner's and Fletcher's in this article.

## 3. Research Methods

The authors built seven micro corpora respectively on the basis of the above-mentioned seven versions by the use of Wordsmith 7. Sun Dayu has two English versions in the form of prose and poetry, and the later one is selected because this paper centers on the comparative study of poetry translation. With the help of AntConc, the obtained data of the total number of words, the average length and the standard deviation of poetic lines, the token-to-type ratio (TTR) and the lexical density were all used to study the "Eight Beauties" mentioned in Wang (2015). Furthermore, this paper studied the "Harmony-Guided" criteria at the macro level and the "resemblance in style, sense, and poetic conception" criteria at the meso level by analyzing the combined data.

## 4. Data Analysis Based on "Harmony-Guided Three-Level" Poetry Translation Criteria

### 4.1 Data Analysis of the Eight Beauties Criteria

"Eight Beauties" criteria includes the beauty of form, beauty of musicality, beauty of image, beauty of emotion, beauty of suggestiveness, beauty of diction, beauty of allusion and beauty of gestalt.

The research of the "beauty of form" and "beauty of musicality" is carried out in analyzing the corpus data of the number of words, length and standard deviation of poetic lines. The "beauty of form" can be reflected in the regularity of form, which means the numbers of words in lines keep a certain rule. The length and antithesis of poetic lines are the two main aspects of presenting the beauty of form. The "beauty of musicality" in poetry translation stresses the metrical pattern and rhythm. The research of the "beauty of image", "beauty of diction" and "beauty of emotion" refers to the data information of type/token ratio (TTR), which shows the richness of lexical vocabulary. The reproduction of these three kinds of beauty has high requirements for vocabulary to be suitable and precise to convey the cultural connotation, to express the emotion of the poem and to display the artistic conception of the original poem. The study of "beauty of suggestiveness" can be carried out from the angle of lexical density. The "beauty of suggestiveness" and "beauty of allusion" supplement each other. Proper application of the allusion loaded with rich Chinese traditional cultural characteristics makes poetries concise, suggestive and profound. The above seven kinds of specific beauty can be analyzed concretely and the "beauty of gestalt" is a comprehensive representation of all types of beauties.

### 4.1.1 Number, Length and Standard Deviation of Poetic Lines

The poetic line with shorter average length makes the translated texts more concise on visual effect and makes the rhythm stronger, which endows the translation with more "beauty of musicality". The discrete degree of poetic lines contributes to the analysis of the regularity of poetic lines, which displays the "beauty of form". This paper collects the number of poetic lines, the average length (the average number of words per poetic line) and the standard deviation of poetic lines (the degree of construction dispersion), as shown in Table 1.

**Table 1:** Numbers, Standard Deviation and Average Length of Poetic Lines

| | Source Text | Zhao's | Sun's | Yangs' | Xu's | Cooper's | Bynner's | Fletcher's |
|---|---|---|---|---|---|---|---|---|
| The number of poetic lines | 49 | 43 | 40 | 48 | 43 | 56 | 45 | 54 |
| Standard deviation | 1.744 | 2.154 | 2.738 | 2.287 | 2.703 | 3.021 | 2.421 | 1.123 |
| Average length | 6 | 8 | 11 | 7 | 8 | 6 | 9 | 5 |

The table presents that Zhao's and Fletcher's are the closest to the original text considering the standard deviation and average length of poetic lines. In other words, Zhao's and Fletcher's not only achieve the relative concision of poetic lines, but also control the rhythm of poetic lines and the uniformity of the translated texts, which well reproduce the "beauty of form" and "beauty of musicality" of the original poem. Moreover, regarding the metrical style of the two versions from Zhao and Fletcher, the later one uses a strict ending rhyme, promoting the beauty of form and musicality to a higher level.

### 4.1.2 Type/Token Ratio

This type/token ratio (TTR) is positively correlated with the richness of lexical vocabulary. "*In simple terms, type/token ratio is a measure of the range and diversity of vocabulary used by a writer, or in a given corpus. It is the ratio of different words to the overall number of words in a text or collection of texts. A high type-token ratio means that the writer draws on a wider range of vocabulary. A low type-token ratio means that a writer draws on a more restricted set of vocabulary items*" (Baker, 2000:250). Token refers to the number of all words in a text, and type is the number of unique words. The ratio of type to token called TTR, an important parameter, can reflect the variation of the corpus's vocabulary to some extent. The higher the richness of vocabulary is, the more advantages it has to produce the "beauty of image", "beauty of diction" and "beauty of emotion".

**Table 2:** Token, Type and TTR

|       | Fletcher's | Cooper's | Yangs' | Zhao's | Bynner's | Xu's | Sun's |
|-------|-----------|----------|--------|--------|----------|------|-------|
| Type  | 201       | 220      | 224    | 210    | 249      | 213  | 274   |
| Token | 286       | 345      | 363    | 347    | 410      | 354  | 458   |
| TTR   | 0.70      | 0.64     | 0.62   | 0.61   | 0.61     | 0.60 | 0.60  |

As can be seen from Table 2, the TTR of Fletcher's are greater than that of the other six versions, and there is no significant fluctuation among the data of the six corpora ranking at the bottom. This part discusses the relationship between TTR and the beauty of image, diction and emotion by analyzing Sun's translation with the lowest TTR, Fletcher's translation with the highest TTR, whereas the latest version of Zhao ranked in the middle. The specific example is as follows.

**Example 1:**

**The Original Text:**

上有六龙回日之高标，
下有冲波逆折之回川。
黄鹤之飞尚不得过，
猿猱欲度愁攀援。

**Fletcher's:**

<div align="center">

Above on Kao-piao Mountain
Six dragons bear back the sun.
Beneath it, a piled-up fountain,
Bursting, wild billows run.
Never attain this height
The yellow cranes in flight:
Apes are sickened of climbing,

</div>

**Sun's:**

<div align="center">

Up above there is the highest cliff for Xihe
To drive and turn his six dragons of the Sun-chariot round,
And down below there are the clashing currents of the whirling stream.
Yellow storks could not fly over that and gibbons and hapales
Would be troubled by trying to climb up over it.

</div>

**Zhao's:**

<div align="center">

Up, the peak barring Apollo's cart by six dragons drawn;
Down, the waves swirling and surging up to the Milky Way.
Yellow cranes flying there at the height cringe;
Chimpanzees would climb but to start they sway.

</div>

From the lexical point of view, Fletcher is relatively conservative in selecting words because of being subject to the source text and have the literal translation as the main translation strategy, which result in the reproduction of cultural images and the beauty of images. Besides, Fletcher's has no eye-catch point with the smallest number of words and no richness in vocabulary. In contrast, Sun uses the translation method of amplification on the premise of being faithful to the original text, such as "the highest cliff" and "gibbons and hapales". Abundant adjectives make the pictures in readers' mind more vivid and specific, which helps to produce the "beauty of image". The emotion usually comes from images, so the realization of "beauty of emotion" is perfected by the reproduction of the "beauty of image". In terms of the scope of words' selection, Zhao uses such exclusive words loaded with traditional western culture as "Apollo" and "Milky Way". Appropriate employment of domestication strategy not only ensures the richness of vocabulary and makes the translation concise and fluent, but also helps English readers fully understand the context of the original poem. So, the reproduction of "beauty of diction" shown in the use of culture-loaded words will complement the reproduction of the "beauty of image" and the "beauty of emotion".

### 4.1.3 Lexical Density

Lexical density means the proportion of notional words to the whole words. The bigger the data of lexical density is, the higher the frequency of notional words is and the greater

the amount of information is. On the contrary, the lower the frequency of notional words is, the smaller the amount of information is (Baker 1995). Hu Zhuanglin (2002:42) classifies nouns, verbs, adjectives and adverbs as notional words. According to Hu Zhuanglin's classification standard and the formula for calculating lexical density proposed by Ure (1971) (lexical density = number of notional words / total number of words × 100%), this paper gets data from seven micro corpora. The results are shown in Table 3.

**Table 3:** Data of Lexical Density

|  | Cooper's | Bynner's | Xu's | Sun's | Yangs' | Zhao's | Fletcher's |
|---|---|---|---|---|---|---|---|
| Noun | 95 | 114 | 98 | 124 | 116 | 99 | 124 |
| Verb | 52 | 51 | 60 | 84 | 55 | 65 | 41 |
| Adjective | 23 | 40 | 27 | 42 | 32 | 24 | 31 |
| Adverb | 23 | 26 | 29 | 30 | 22 | 40 | 15 |
| The number of notional words | 193 | 231 | 214 | 280 | 225 | 228 | 211 |
| Lexical density | 55.94 | 56.34 | 60.45 | 61.14 | 61.98 | 66.52 | 73.78 |

Chinese poetry is characterized by conveying the most abundant information with the least words and expressing the poet's real feelings and purposes implicitly, so readers have to look for the real thoughts and emotions from notional words. Compared with other kinds of notional words, adjectives and adverbs are positively correlated with the production of "beauty of suggestiveness" in poetry. The translated texts with high density have the advantage of presenting the "beauty of suggestiveness". The lexical density of Fletcher's is obviously higher than that of other versions while the lexical density of Cooper's is the lowest. The authors take the top-ranked Fletcher's and the bottom-ranked Cooper's as examples.

**Example 2:**

**The Original Text:**

但见悲鸟号古木，
雄飞雌从绕林间。
又闻子规啼夜月，
愁空山

**Cooper's:**

I only see
Mournful birds,
Summoning mates
From ancient woods,
Cock follow hen
Into thicket,
And hear a cuckoo call
On moon to light
Sad, bare slopes

**Fletcher's:**

<div align="center">

Wailing about old trees so bent

But sad-voiced birds I hear.

Male pursuing the female

Around the woods in flight....

Hark! how the goatsucker's moan

Sobs to the Moon by night !

Wailing its mate....A-hone!

Through vacant hills alone;

</div>

The original text brings readers into a desolate state where the sad birds are tweeting on ancient trees, and exaggerates the dismal atmosphere of the journey at the Shu area. Back to the text, Fletcher uses a large number of verbs and adjectives, such as "wailing", "sobs", "moan", "vacant" and "alone", to describe the scene, aiming to reinforce the sad atmosphere and completely reveal the poet's worries and sorrow hidden in the poem. Moreover, prepositional phrases like "in flight" and "by night", conduce to a more vivid picture of the deep night. But, Cooper just makes a brief description through simple words like "mournful", "call", "sad" and "bare", which fails to achieve the poet's "suggestive" purpose: making use of scenery to express feelings. Therefore, the lexical density is positively related to the reproduction of "beauty of suggestiveness".

### 4.2 Data Analysis for Resemblance in Style, Sense and Poetic Conception Criteria

The study at the meso level, and the study at the micro level, calls for more data to meet the need of multi-angle and multi-dimensional analysis.

The resemblances in style, sense and poetic conception complement each other, and the similarities of sense and poetic conception between the translated one and the original text conduce to the similar style. As for how to reproduce the style of the original text, Herbert Cushing Tohnan holds that as long as the rules of the target language are allowed, the translator should try his best to reproduce the rhetorical devices in the original text, so that the translation can reproduce the style of the original text. The use of rhetorical devices, also including the writer's choice of words and sentence patterns in a broad sense, is an important factor to reflect the writer's style (Guo Jianzhong, 2000:11-12). Figures of speech require not simplification, but strive to enrich types. Richness in types means the language is novel and varied; richness shows wisdom and creative skills. Therefore, the discussion of style can return to the discussion of the richness of words, namely TTR, and the discussion of the richness of information, namely the lexical density. In other words, the research of "resemblance in style" refers to the analysis of TTR and the lexical density. The translation with higher lexical richness and more information can reproduce the style of the original poem in a more flexible and ingenious way.

The cultural difference between high-context China and low-context English-speaking countries must be well considered, in order to achieve the "resemblance in sense" during translation (Wang Feng, 2015:149). Chinese culture, a high-context culture,

emphasizing "images beyond images" and "meaning beyond the words", has the main expression way of suggestiveness, while the low-context culture of English-speaking countries, loading information into clear codes, requires the accuracy of language. Therefore, the resemblance in poetics at the meso level can be related to the study of the "beauty of suggestiveness" in the previous part.

"Resemblance in poetic concept" means the comprehensive effect of artistic conception produced in readers' mind is similar to that of the original text produced in the native reader's mind. In general, poetic concept is concerned with emotion and image. Therefore, the study of the resemblance in poetic conception involves the reproduction of "beauty of the image and emotion", namely, the study of the resemblance in poetic conception involves the analysis of lexical richness and lexical density. Take as an example Zhao's translation, in which the lexical richness and density are relatively higher than others':

**Example 3:**

**The Original Text：**

连峰去天不盈尺，
枯松倒挂倚绝壁。
飞湍瀑流争喧豗，
砯崖转石万壑雷。

**Zhao's:**

The range is less than a foot from the blue;
Rotten pines hang upside down in cliffs high.
Water dashes rocks and turns like thunder;
Waterfalls and whirlpools noisily vie.

The poet describes the natural scenery and expresses feelings with imagination, exaggeration and allusion. At this part, the poet describes that the distance between the peak and the sky is only less than a foot, and the voice from the collision of water and stones sounds like the deafening thunder. Zhao translates "去天" as "from the blue", which reflects the poet's romantic feelings and colors the picture of a spectacular scenery, and translates "争喧豗" as "noisily vie", which vividly depicts the turbulent noise of whirling whirlpool and waterfall. Zhao's is rich in vocabulary, concise in language and wealthy in information, which well reproduces the style, bold and unconstrained, of the original poem. The reappearance of the style is inseparable from the achievement of resemblance in sense and poetic conception.

## 4.3 Data Analysis for Harmony Criteria

The study on "harmony" criteria, the sublimation of the study on "resemblance in style, sense and poetic conception", stresses that translators should not be paranoid about the advantage of one side in face of various disharmonies caused by language differences.

Although short poetic lines are concise and rhythmic, they are poor in reproducing the "beauty of image", "beauty of suggestiveness" and "beauty of emotion". To illustrate this point, Fletcher's translation, mainly in literal translation with short and concise poetic lines, has the smallest standard deviation of poetic lines and the highest uniformity, but fails to show the spectacular and fantastic scenery as the original poem shows. Fletcher translates "六龙回日" and "地崩山摧壮士死" as "six dragons bear back the sun" and "the mighty died", which simplifies the allusion of "六龙" and weakens the danger and emotion to some extent. On the contrary, Sun adds "highest cliff for Xihe" to the translation, which enriches the background of the story and restores the romantic color through a myth, though the poetic line becomes longer and the standard deviation of poetic lines becomes bigger after amplification.

The "harmony" criterion has different meanings in different situations. Translators can choose words on a certain level of difficulty, have poetic lines with a specific length, and select translation strategies to achieve the specific functions of the text according to different translation purposes.

To give an example, as for the translated poems in textbooks for elementary school students, the difficulty of words of the translation should meet the reading capacity of elementary students, and the sentence patterns should be concise and neat. In addition to the standard deviation of poetic lines, the readability of the text is also an important parameter. The authors randomly selected 300 words from the seven versions with the help of Readability Analyzer 1.0 and got the data to analyze the readability of each translation.

Reading level of difficulty: 0-29 is very difficult; 30-49 is difficult; 50-59 is relatively difficult; 60-69 is standard; 70-79 is relatively simple; 80-89 is simple; 90-100 is very simple.

**Table 4:** Level of Reading Difficulty

|  | Sun's | Bynner's | Zhao's | Yangs' | Xu's | Cooper's | Fletcher's |
|---|---|---|---|---|---|---|---|
| The level of reading difficulty | 78.60 | 87.90 | 95.50 | 95.60 | 96.50 | 98.40 | 99.00 |

According to Table 4, Fletcher's ranked as relatively simple, is more suitable than other versions, when it is prepared for elementary school students. On this occasion, the pursuit of "harmony" centers on the pursuit of reading simplicity. So, the "harmony" criterion is said to be flexible and indefinite.

## 5. Conclusion

This paper introduces the research method of corpus and applies it to the comparative study of poetry translation and the study of poetry translation theory. The findings of this paper are more objective and practical by using relevant corpus software: Wordsmith 7, AntConc, Readability Analyzer 1.0. The "Harmony-Guided Three-Level" Poetry Translation Criteria--"harmony-resemblance in style, sense and poetic conception"

criteria put forward by Dr. Wang Feng--characterized with ruling competence, is a guiding theory for comparative studies of poetry translation. The reproduction of the "beauty of musicality" in translated versions requires appropriate meter, rhythm and similar length of poetic lines. The standard deviation of poetic lines is better to be close to that of the original one, and poetic lines' length is required to be consistent with or proportional to that of the original poem, to achieve the "beauty of form". In order to present the" beauty of image", "beauty of diction" and "beauty of suggestiveness", the selection of words should avoid repetition and stereotype but try to diversify the vocabulary and enlarge the amount of information. As for the last one of "eight beauties" criteria, translators should overall consider the seven beauties above to maximize the reproduction of "beauty of gestalt". Furthermore, the study of "resemblance in style, sense and poetic conception" criteria at the meso level and the "harmony-guided" criteria at the macro level, which are based on several types of data, are more complicated than that of the "eight beauties" criteria. Moreover, specific standards of "harmony" at the macro level will differ due to the purpose of translation, the types of texts and other reasons.

The "Harmony-Guided Three-Level" Criteria needs further practices and study for the purpose of creating translation in high quality and helping Chinese poetries go abroad. This paper, based on corpus linguistics, aims to provide a new model for the comparative study of poetry translation and for the study of poetry translation theory by quantifying the objective standards of comparative poetic study. Though an innovative approach to poetry translation studies, this corpus-based method may need more research regarding its theoreticality, rationality and practicability.

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**Conflict of Interest**
The authors declare that there is no conflict of interest.

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