Stability of Translation Across Sound Effect Type: Focusing on Onomatopoeia in Japanese Shonen Manga

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Abstract

This paper investigates whether *giongo* and *gitaigo* in Japanese *shonen* manga retain their type (sound words/ descriptive words) when they are translated into English. Three manga representing different genres of shonen manga were selected, and sound effects were manually extracted from the original Japanese version and the English translated version, compiling a database of 1000 instances of onomatopoeia. Statistical analysis indicated that giongo tended to retain their type, whereas gitaigo were often translated into sound words. Qualitative analysis then showed that context affected the translation of sound effects. The findings indicate that translation of onomatopoeia varies depending on their type.

1 Introduction and Background

Manga constitute a large portion of the graphic novel market in the United States, and their popularity and demand have been steadily increasing (Hibbs, 2022, 2023). Therefore, the translation of manga plays a vital role in this market. One challenging aspect of this is the translation of sound effects. The term sound effect has traditionally been used to describe texts, primarily onomatopoeia, that appear in panels to add meaning to the scenes being depicted. Japanese is a language rich with onomatopoeia (Maeda et al., 2015), and they, with their unique meanings and creative usages, have a significant presence in Japanese manga (Inose, 2010). According to Unser-Schutz (2010), in reference to comics and manga, "[o]nomatopoeia are text which are written directly on the background, usually by hand in a graphic style" (p. 33). There are two subcategories of onomatopoeia, *giongo* and *gitaigo*; the former refers to audible sound effects, while the latter refers to the representation of the state of objects. The term onomatopoeia is used interchangeably with the term sound effects in this paper.

As sound effects are heavily utilized in comics, especially in modern Japanese manga (Forceville et al., 2017; Guynes, 2014; Natsume, 1997/2022), studies have analyzed their features and functions from various perspectives (e.g., Augereau, et al., 2018; Baek et al., 2022; Pratha et al., 2016). For instance, Pratha et al. (2016) analyzed and compared the representation of sound effects in American comics and Japanese manga statistically. Regarding the lexical features of sound effects, the study indicated that onomatopoeic sound effects (equivalent of sound words in our study) were by far more common than descriptive sound effects (descriptive words) in American comics. As for Japanese manga, *shonen* manga contained more giongo compared to *shojo* manga. They then claimed that the distribution of different types of sound effects is one of the features that characterizes each genre of comics.

Translators and researchers have pointed out that it is challenging to translate Japanese onomatopoeia into other languages, such as English (Bartashova & Sichinskiy, 2014; Inose, 2007; Petersen, 2009; Sasamoto, 2021). Therefore, many strategies for translation have been devised. For example, Sell and Pasfield-Neofitou (2016), based on the classification by Kearns (2009) observed that there were primarily four linguistic strategies adopted in translating Japanese sound effects: equivalence, coinage, descriptive strategies, and omission. As part of a larger study, they analyzed sound effects related to silence and demonstrated how each linguistic strategy for translation was utilized in translating them into English. The study found that translation into sound words and spoken words were two subcategories of equivalence/coinage strategies and that English translation tended to express audible sounds even when the original Japanese word referred to

a state. The study also showed that a descriptive strategy was preferred when translating sound effects related to quietness of the action and that omission was infrequent.

This paper will examine the translation of three shonen manga to find out whether giongo and gitaigo retain their type (sound words/descriptive words) when translated into English.

2 Methodology

2-1 Materials

Three shonen manga were chosen as materials, aiming to collect approximately 1000 instances of onomatopoeia. The following manga were selected based on their recent and expected popularity in the US market (Hibbs, 2022, 2023): *My Hero Academia* (*僕のヒーローアカデミア*) (Horikoshi, 2014, 2015), *Spy x Family* (*Spy × Family*) (Endo, 2019, 2020), and *The Elusive Samurai* (*逃げ上手の若君*) (Matsui, 2021, 2022). These manga represent three different genres within shonen manga, diversifying the onomatopoeia collected for the study.

2-2 Extraction of data

Sound effects were extracted from the original Japanese version and the English translated version of the three manga. For each manga, all the sound effects written outside of the bubbles were manually input in an Excel file, with the Japanese onomatopoeia and the English translation noted side by side. Spoken words in the original Japanese version were not included in the data. In total, 1000 instances of onomatopoeia were identified in the three manga.

2-3 Classification of data

Each Japanese onomatopoeia was first classified into giongo and gitaigo based on the context in which the sound effect appeared. Giongo was defined as representation of sounds, and gitaigo was defined as description of state or action. As Japanese onomatopoeia can have multiple meanings (e.g., Yamaguchi, 2015), context was utilized as an additional criterion for classification. Following these criteria, the authors of this paper independently classified the data. After the initial classification, discussion sessions were held with a third researcher to resolve any disagreement in the classification. Each English sound effect was then classified into sound words and descriptive words, and the correspondence between the original Japanese sound effect type was noted. The definition of sound words was the same as giongo, and the definition of descriptive words was the same as gitaigo. As English sound effects could be classified into sound words and descriptive words, they were categorized based on the word itself. There was a small number of Japanese sound effects that were translated into spoken words in English, and they were classified accordingly. The classification was conducted by one of the authors, and the other researcher checked the classification.

3 Results and Analysis

3.1 Quantitative Analysis

In total, 1000 instances of onomatopoeia were identified in the three manga: 258 in *The Elusive Samurai (Samurai)*, 362 in *My Hero Academia (Hero)* and 380 in *Spy x Family (Spy)*. In each manga, a diverse range of onomatopoeia was used; there were 191 different onomatopoeia in *Samurai*, 275 in *Hero*, and 285 in *Spy*. This meant that only a limited number of sound effects occurred repeatedly in each manga. In fact, the only onomatopoeia which appeared five instances or more were *ka!*, *za!*, *da!*, *ba!*, in *Samurai*, *ooo*, *su*, *dokun*, *ba!* in *Hero*, and *gaan*, *gacha*, *ba!* in *Spy* (! refers to a contracted sound).

Table 1. Distribution of Giongo and Gitaigo

	Giongo	Gitaigo	Total
Samurai	112 (43.4%)	146 (56.6%)	258
Hero	124 (34.3%)	238 (65.7%)	362
Spy	150 (39.5%)	230 (65.0%)	380
Total	386 (38.6%)	614 (61.4%)	1000

As mentioned above, the original Japanese sound effects were classified into giongo and gitaigo, and there were 386 giongo and 614 gitaigo in the data (see Table 1 for the breakdown). In all the manga, gitaigo appeared more frequently than giongo. A chi-square test showed that the distribution of giongo and gitaigo did not differ significantly across the three books (χ^2=5.5266, *df*=2,

p=0.06). This confirmed that these three manga were representative samples for analyzing onomatopoeia in today's shonen manga.

Among the 386 instances of giongo, 333 (86.3%) were translated into sound words, 47 (12.2%) were translated into descriptive words, and 6 (1.6%) were translated into spoken words. There were 614 instances of gitaigo, and 302 (49.2%) were translated into sound words, 308 (50.2%) were translated into descriptive words, and 4 (0.7%) were translated into spoken words. As spoken words were not classified as onomatopoeia in English, this category was eliminated from further quantitative analysis. Table 2 and Table 3 provide a summary of the types of English translation for giongo and gitaigo. As the tables show, over 90% of the giongo in the data were translated into sound words, while only around 50% of the gitaigo were translated into descriptive words.

Table 2. Translation of Giongo

	Sound Word	Descriptive Word
Samurai	101 (90.2%)	11 (9.8%)
Hero	99 (81.1%)	23 (18.9%)
Spy	133 (91.1%)	13 (8.9%)
Total	333 (87.6%)	47 (12.4%)

Table 3. Translation of Gitaigo

	Sound Word	Descriptive Word
Samurai	93 (63.7%)	53 (36.3%)
Hero	86 (36.3%)	151 (63.7%)
Spy	123 (54.2%)	104 (45.8%)
Total	302 (49.5%)	308 (50.5%)

A chi-square test confirmed that giongo were translated into the same sound effect type, that is, sound words, at a significantly higher rate than gitaigo (χ^2=163.77, df=1, p=0.00, φ=0.41). There seemed to be differences among the three manga in terms of the translation tendency of giongo (χ^2=7.0193, df=2, p=0.03, Cramer's V=0.14); however, chi-square tests between each pair of manga with the Bonferroni correction indicated that none of the differences reached the significant level. This indicated that giongo tended to retain its sound effect type when translated into English regardless of the manga. On the other hand, some differences were observed regarding the translation of gitaigo across the three manga (χ^2=30.32, df=2, p=0.00, Cramer's V=0.22). Chi-square tests with the Bonferroni correction showed that there were significant differences between *Samurai* and *Hero* (χ^2=26.18, df=1, p=0.00, φ=0.27) and *Spy* and *Hero* (χ^2=14.29, df=1, p=0.00, φ=0.18). The effect sizes were not large enough to fully support the findings, but the results indicated that *Hero* in comparison to *Samurai* and *Spy* tended to retain its original sound effect type in the English translation version.

3.2 Qualitative Analysis

Examining the giongo and gitaigo that were translated into spoken words provides some insight into why they were translated in this way. In many of these cases, the context differed in some way from other instances where these giongo and gitaigo appeared. Four examples will be discussed to highlight this point.

One type of context that can affect the translation of sound effects is emotional context. In *Hero*, the giongo AAAAAA (あああああ) was translated into the spoken word YEAHHHH, an informal way of saying yes. However, this giongo was translated into the sound words AAAA, AAAAAAAA, and WAAHH in other instances where it appeared. In these cases, characters were making sounds that expressed internal conflict or a sense of panic. However, in the case where it was translated into YEAHHHH, the sound effect was used to express the noise created by a cheering crowd. It is possible that the translator used sound words when expressing negative emotions but opted for a spoken word when expressing positive emotions.

Another example of this appears in *Hero* when the giongo WAA... (わあ...) is translated as the spoken word WHOA..., a word that means to stop or slow down, but which is also used when expressing amazement. In other instances where this giongo appeared, it was translated as WAAAH!, WAHHH, and WAHHHH, sound words that resemble the original Japanese sound effect. In

these cases, the sound words expressed panicked or negative emotions. In the panel where WHOA... is used, a person is expressing amazement or admiration for what they see. Therefore, it is possible that emotional context could affect how a sound effect is translated, with sound effects linked to negative emotions being translated as sounds while sound effects linked to positive emotions being translated differently.

Another type of context that can affect the translation of sound effects is whether internal or external reactions are being expressed. In one scene in *Spy*, the gitaigo GAAN (ガーン) is translated into the name of another character in the scene, "Anya?" In other instances, this gitaigo is translated as SHOCK or GAAH when expressing a character's reaction, or as JOLT or TWITCH when emphasizing the movement of the character's body when they react. In all these instances, characters react to something another person said, so the reaction is internal. In the case where the gitaigo is translated as a spoken word, it is a reaction to what someone has done. In this case, a child (Anya) stops holding hands and suddenly runs away, and the mother figure responds by calling her name. This seems to show that the mother figure is more worried about the feelings of the child rather than merely experiencing her own feelings. Therefore, the reaction is external rather than internal.

Finally, the translations of sound effects can be affected by the context set by the text that appears in word balloons. In one scene in *Spy*, the gitaigo PI! (ぴっ) is translated into the spoken word TEN-HUT, an expression used to call soldiers to attention. In other cases where this gitaigo is used, it is translated into sound words such as SHUP and FWIP when referring to movement or into BEEP when referring to machinery. However, in this scene, a family is getting ready for a school interview. The father starts the scene by saying "The decisive battle is upon us." Then as each family member is addressed, they stand to attention. In using TEN-HUT, the translator draws on the expression "decisive battle." Therefore, the text in word balloons can affect the way that sound effects are translated.

4. Discussion

The study confirms that a wide variety of sound effects is used in Japanese manga and that only a few onomatopoeia are repeated in each manga. This means that translators must be flexible when encountering creative usages of onomatopoeia. This is especially true when translating gitaigo as the analysis indicated that only half of the gitaigo retained their type in the English version. This means that there are many instances where gitaigo are not easily translated into descriptive words. On the other hand, giongo tend to retain their type when translated. This may be due to the tradition of using sound words in American comics to represent audible sounds.

Another approach to translating sound effects is to translate giongo and gitaigo into spoken words. These instances were examined in the qualitative analysis section. The analysis shows that context can affect the translation of sound effects: negative or positive emotions, internal or external reactions, and the context derived from the speech around the sound effect.

5. Conclusion

In conclusion, onomatopoeia in Japanese shonen manga are translated into English in different ways depending on whether they are giongo or gitaigo. Giongo tend to be translated into sound words in English, therefore retaining their type. Gitaigo, on the other hand, are translated into both sound and descriptive words, indicating that their type is less stable in translation.

Drawing on the qualitative analysis of the sound effects translated into spoken words, it may be of interest to re-examine the translation of gitaigo and the effect that context may have on whether they are translated into sound words or descriptive words. This may lead to a better understanding of how gitaigo are translated into English.

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