Translation Techniques of Medical Terms Found in Covid-19 Guidebook

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Abstract
This study was conducted to find and analyze the use of translation techniques used by translators in translating various medical terms contained in the COVID-19 guidebook based on the theory from Rask (2008). The categories of medical terms used in this study are medical terms, epidemiological terms, and organizational terms. This study uses the descriptive qualitative method. The data were obtained through classifying and describing the medical terms in the COVID-19 guidebook according to the types of translation techniques based on Molina & Albir (2002). The findings show the type of translation technique, that has been found in this study, which gets a percentage of 63.54% as the highest frequency reaching 739 is Established Equivalence in all categories. Interestingly, it can be seen that translators are very concerned about the use of grammatical structures in the source language. Since the grammatical structure in the source language is different from the target language, translators also tend to use a more common language taken from the dictionary but equivalent to the target language.

Keywords: COVID-19 guide book, terminology, translation technique
1. INTRODUCTION

The emergence of COVID-19 has shocked the world. The COVID-19 virus has been officially declared a pandemic by the WHO (World Health Organization) (Valerisha & Putra, 2020). This virus outbreak spread quickly and claimed many lives in a short time. In Indonesia, positive cases of COVID-19 are increasing day by day. This has resulted in the death of COVID-19 patients continuing to boom. According to Sihaloho (2020) “data as of April 10, 2020, 7.56 PM stated that the percentage of deaths that occurred in Indonesia (8.71%) was greater than the percentage of deaths that occurred in the world (5.99%)”. However, people in Indonesia tend to be indifferent, do not believe in the existence of this deadly COVID-19 virus. What they believe is that the COVID-19 virus is a virus deliberately created by a country for an interest (Nasir et al., 2020).

The Indonesian government has launched various ways to prevent and break the transmission of COVID-19. Such as, stay at home movement, which requires citizens in Indonesia to stay at home for a few weeks and postpone activities that require them to leave the house, maintaining distance, with the aim that individuals have space, not crowding each other which makes individuals touch, use a mask as personal protection to keep the air that is inhaled, and wash your hands diligently to avoid germs, viruses, and bacteria that stick in the body. (Darmin Tuwu, 2020).

Another thing the government is doing is educating the public through guidelines for disseminating information about COVID-19 in various media, such as through social media containing information about (medical texts, infographics, COVID-19 posters) and handling COVID-19 books that are widely circulated through the internet that are easily accessed by the public (Trisna et al., 2021). However, considering that COVID-19 is a global (worldwide) problem, where there is a lot of information about it in various languages in the world, translation is very important and needed in communication between nations and countries (Maselink, 2020). However, ordinary people in Indonesia view translation as an activity just looking for the meaning of an expression from a foreign language contained in a dictionary (Nugroho et al., 2017). Based on these, it should have to note that there is a COVID-19 guidebook that uses a foreign language (English) as the source language (SL) and Indonesian as the target language (TL) to make it easier for the public to understand the COVID-19 guidebook, that is to prevent misinformation and uninformed knowledge about COVID19, such as the origin, transmission, and preventive measures (Nasir et al., 2020).

Based on this, to be able to convey the same or appropriate information in the source language (English) into the target language (Indonesian) which is linguistically accepted, a translator must be able to use the right translation techniques to have a positive influence on the level of accuracy and acceptability of the translation (Rongre & Saleh, 2018). Translation techniques have various forms. This study uses the theory of translation techniques according to Molina and Albir (2002).

Research on translation techniques in COVID-19 guidebooks is crucial during the current pandemic. That is because this research has never been studied by other researchers. Although translation can be easily done through machine translation, the results of machine translation tend to be less effective to use because there is a shift in meaning that is not by with the message content from the source language to the target language (Sipayung, 2021).
As said by Shams & Gholami (2019) that translators need to use the right strategy to improve the quality of the translation of the content being studied. The COVID-19 is a new thing, which contains many news and rare medical terms, so there is a high risk of being translated to readers. The translation risk in question can occur if the message from the source language fails to be conveyed properly and correctly into the target language (Pym, 2010). This can lead to mistranslation that can lead to misdiagnosis, medication errors, and misdirection of disease prevention that can lead to death (Dharmawan et al., 2019). So, there are many researchers had not studied this matter, because translating a medical text from a foreign language (English) to the target language is not an easy thing (Rask, 2008). While in the medical field, translation is also crucial, translation can be a medium to find discoveries, which can be disseminated through science (Karwacka, 2015) and for learning media in medicine, a medical translation that has good quality is also an important point, because the quality of the translation becomes a benchmark that affects the failure or success of conveying messages from the source language into the target language (Abdelmajd & Hassan, 2017). As stated by Grami (2019) that transliteration can help students understand the translation of scientific texts quickly and precisely. Thus, translation can be an interesting example for learning the field of linguistics at the university level (Nugroho et al., 2019).

As shown from the gap from previous studies, this article highlights three research problems. They are as follows:

1. What are the medical terms used in the COVID-19 guidebook?
2. What are the translation techniques used in the COVID-19 guidebook?
3. What is the translation pattern of the medical terms found in the COVID-19 guidebook?

2. LITERATURE REVIEW

In this section, there are several studies on medical translation that have been carried out, this paper will examine them as follows:

Rask, (2008) found that the translation of medical texts from English to Swedish does not match the Swedish culture. The study also found the terminology problems involved choosing the most appropriate term to describe the diagnosis, disease, organs, and symptoms. This is related to the findings of Karwacka (2015) who researched the history of medical translation and the development of medical language. As; terminology, including eponyms and multiword terms, acronyms and abbreviations, affixation, word compounding, the doublet phenomenon, polysemy, and synonymy. And also, related to that MuñozMiquel et al., (2018) found that medical intralingual translation is increasing rapidly because medical intralingual translation is urgently needed for patient needs. The focus of this study is to develop the skills of medical translators in dealing with intralingual translations.

Hadad and Montero-Martinez (2020) studied the translation of the COVID-19 text metaphor. They found that the translation of the COVID-19 text from English to Arabic contains a lot of neologism-based metaphors, thus requiring a further understanding of its Arabic equivalents. However, this study does not examine the use of translation techniques that can help in finding the right neologism for its equivalent in Arabic. In this regard, research from Afrika et al., (2021) also shows that to be able to explain the process of
neologism word formation, researchers need an understanding of translation, because the process involves terms that are difficult for readers to understand.

Ramadhani (2020) found that EFL (English as Foreign Language) students misunderstood and misinterpreted the source language (English) of medical texts related to COVID-19 into the target language (Indonesian). The results show that students make many translation errors because they are not familiar with the vocabulary and medical terms contained in medical articles related to COVID-19. The focus of this study was to find out what difficulties were faced by fifty EFL students who participated in the study as an exercise in reading comprehension in a foreign language (English) as a source language.

In other words, the similarities between this study and previous studies are that they both use medical texts as research data. The difference lies in the focus or purpose of previous research and this research. The focus of this study examines the translation technique of medical text using the theory of translation techniques from Molina & Albir (2002) namely: (1) Adaptation is a translation technique used to replace the cultural elements associated with the source language (SL) (searching for equivalent words) with the cultural elements of the target language (TL); (2) Amplification (addition) is a translation method performed by paraphrasing, adding, or explicitly expressing information in the source language to the target language; (3) Borrowing is a translation method that obtains words and expressions directly from a pure source language (pure borrowing), but it can also be borrowed because it is suitable for the target language (naturalized borrowing); (4) Calque is a common translation method that is performed by literally translating the source language; (5) Compensation is a translation technique performed by translating the target language into another part of the target language because there is no equivalent word in the same section as the source language of the target language; (6) Description is a translation method performed by replacing an expression from an expression form or source language by describing the form or function in the target language; (7) Discourse creation is a translation technique performed using equivalent words to the target language, not in the context of the source language, but is intended to be a parable of equivalent words; (8) Established Equivalence is a translation technique performed using equivalent words from dictionaries, common everyday terms, or phrases; (9) Generalization is a translation technique that uses more global terms to describe a particular thing; (10) Linguistic Amplification is a translation technique performed by adding language elements; (11) Linguistic Compression is the opposite of the amplified translation method, which is a translation method performed by redeveloping the language elements of the source language into the target language; (12) Literal Translation is a translation technique performed by translating word by word without looking at or referencing the context of the source language; (13) Modulation is a translation technique performed by changing the perspective of the source language, but it also has the same meaning for the target language; (14) Particularization is a translation technique performed using a specific term or expression; (15) Reduction is a translation method that removes parts of the source language that are considered less important (obstructive) and does not reduce the meaning; (16) Substitution is a translation technique performed by changing the paralinguistic and linguistic elements of the source language (and vice versa) to the target language; (17) Transposition is a translation technique used to change grammar
categories such as structure and units that converts the source language to the target language; (18) Variation is a translation method that changes language elements and aspects.

3. RESEARCH METHODS
The research method is a structured framework built to plan controlled research, which is designed to carry out the decision-making process (Aprianto, 2020). The researcher will conduct the research by determining the research design, data collection, and data analysis.

3.1 Research Design
This research is done by conducting a descriptive qualitative. According to the theory of Maykut & Morehouse (1994) “Qualitative research is based on the phenomenological position, which generally examines people's words and actions in a narrative or descriptive way”. In other words, research methods provide a clearer picture of social situations such as the importance of translation of COVID-19 books. The use of this method aims to find and clarify the findings of this study by describing several variables related to the problem and unit under study (Mulyadi, 2011).

3.2 Data Collection
In this study, researchers collected data through individual observation. The point is, only researchers make observations of activities. This research data is only taken from medical terms contained in the COVID-19 guidebook entitled “Guidance for Corona Virus Disease 2019 Prevention, Control, Diagnosis and Management” Editing by National Health Commission (NHC) of the PRC National Administration of Traditional Chinese Medicine of the PRC as source text and the target text entitled “Panduan Menghadapi Penyakit Virus Corona 2019 Model RRC Pencegahan, Pengendalian, Diagnosis dan Manajemen Disunting oleh Komisi Kesehatan Nasional RRC Administrasi Nasional Pengobatan Tradisional RRC. This research will focus on analyzing the use of translation techniques regarding Medical Terms, Epidemiological Terms, and Organizational Terms found in the COVID-19 guidebook.

3.3 Data Analysis
The researcher uses the analytical method from Sugiyono's theory (2015) which is contained in a book written by Sidiq, et al (2019). Namely, data collection. The researcher collected data obtained from the COVID-19 guidebook and its translation, then the data was reduced by classifying the data into types of translation techniques based on the theory of Molina & Albir (2002). Then the data findings are presented through tables. As a final step, the researcher concludes or varies the research results.

4. FINDINGS
In the finding section, the researchers collected data obtained from various terminology found in the COVID-19 guidance book, which contains Medical Terms, Epidemiological Terms, and Organizational Terms. The data collection has been identified by the translation techniques as classified by Molina & Albir (2002). Based on the translation techniques and
medical terms above, the analysis has been obtained that the average number of the translation technique of medical terms found are Established Equivalence.

The following are the result of categorizing data that contain translation techniques of medical terms found in the COVID-19 guidance book.

Table: 1 Translation techniques used in translating medical terms

<table>
<thead>
<tr>
<th>No.</th>
<th>Terms</th>
<th>Freq.</th>
<th>Translation Technique</th>
<th>Freq.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Medical Terms</td>
<td>131</td>
<td>Literal translation</td>
<td>12</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Borrowing</td>
<td>172</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Amplification</td>
<td>48</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Established Equivalence</td>
<td>395</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Reduction</td>
<td>1</td>
</tr>
<tr>
<td>2.</td>
<td>Epidemiological</td>
<td>81</td>
<td>Literal translation</td>
<td>2</td>
</tr>
<tr>
<td></td>
<td>Terms</td>
<td></td>
<td>Borrowing</td>
<td>101</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Amplification</td>
<td>48</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Established Equivalence</td>
<td>266</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Reduction</td>
<td>1</td>
</tr>
<tr>
<td>3.</td>
<td>Organizational</td>
<td>29</td>
<td>Established Equivalence</td>
<td>78</td>
</tr>
<tr>
<td></td>
<td>Terms</td>
<td></td>
<td>Borrowing</td>
<td>28</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Amplification</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>241</td>
<td>Total</td>
<td>1163</td>
</tr>
</tbody>
</table>

Table: 2 The final result of translation techniques used in translating medical terms

<table>
<thead>
<tr>
<th>No.</th>
<th>Translation Technique</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Reduction</td>
<td>2</td>
<td>0.17%</td>
</tr>
<tr>
<td>2.</td>
<td>Literal translation</td>
<td>14</td>
<td>1.20%</td>
</tr>
<tr>
<td>3.</td>
<td>Amplification</td>
<td>107</td>
<td>9.20%</td>
</tr>
<tr>
<td>4.</td>
<td>Borrowing</td>
<td>301</td>
<td>25.88%</td>
</tr>
<tr>
<td>5.</td>
<td>Established Equivalence</td>
<td>739</td>
<td>63.54%</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>1163</td>
<td>100%</td>
</tr>
</tbody>
</table>

Based on the two tables of qualification results above, the Established Equivalence technique has a high number in all categories such as in Medical Terms, Epidemiological Terms, and Organizational Terms. Based on this, it can be seen that translators tend to often use the Established Equivalence Technique because the translator finds many differences in the grammatical structure of the source language which makes the translator have to translate according to the structure in the target language by using equivalent words taken from dictionaries, colloquial terms, or expressions. The translators also often used the Borrowing translation technique because translators often use it to translate medical words that are difficult to translate purely or naturally, so the translator maintains the source language into the target language. The use of amplification techniques is also quite high compared to the use of literal and reduction techniques. It can be seen that the translator does not want to add
or paraphrase the source language too much into the target language (amplification), let alone reduce a sentence contained in the source language even though it does not affect the meaning of the source text (reduction). The use of literal techniques is also minimally used by translators because these techniques are used when the structure of the language used in the source language is the same as the target language, Molina & Albir (2002).

4.1 Medical Terms

According to Rask (2008), medical terms are purely medical terms commonly used to describe diagnoses, organs, and diseases. The following is an example of the translation of medical terms taken from data that has been analyzed by researchers:

<table>
<thead>
<tr>
<th>No.</th>
<th>Source Text (ST)</th>
<th>Target Text (TT)</th>
<th>Translation Technique</th>
</tr>
</thead>
</table>
Amp: Amplification  
Est.Eq: Established Equivalence |
| 2   | The nucleic acid of 2019-nCoV can be detected in biological specimens such as nasopharyngeal swabs, sputum, other lower respiratory secretions, blood and feces | Asam nukleat nCoV-2019 dapat dideteksi melalui spesimen biologis seperti hapusan (swab) dan sputum, sekresi saluran pernapasan bagian bawah lainnya, darah dan feses | Bor: Borrowing  
Amp: Amplification  
Est.Eq: Established Equivalence |
Bor: Borrowing |

The table above is a sample of the results of the analysis that has been done. From the table above, it can be seen that translators tend to often use the Established Equivalence and Borrowing translation techniques. Based on this, it can be seen that the translator uses the Established Equivalence Technique to translate sentences containing medical terms by using equivalent words taken from the dictionary, medical terms and based on everyday expressions in the target language, and also, the translator uses the Borrowing Technique to maintain the source language into the target language because the source language uses a lot of medical terms that have no equivalent in the target language.
4.2 Epidemiological Terms

According to Rask (2008), Epidemiological terms are terms in the medical field which describe the frequency of a disease-oriented to epidemic conditions (epidemic). The following is an example of the translation of Epidemiological terms taken from data that has been analyzed by researchers:

<table>
<thead>
<tr>
<th>No.</th>
<th>Source Text (ST)</th>
<th>Target Text (TT)</th>
<th>Translation Technique</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Since December 2019, an increasing number of cases of novel coronavirus pneumonia (NCP) have been diagnosed in Wuhan, Hubei Province.</td>
<td>Sejak Desember 2019 Lit, telah terdiagnosis peningkatan jumlah kasus Amp novel coronavirus pneumonia (NCP) di Lit Wuhan Bos, Provinsi Est.Eq Hubei Bos.</td>
<td>Lit: Literal Translation</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Bor: Borrowing</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Amp: Amplification</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Est.Eq: Established Equivalence</td>
</tr>
</tbody>
</table>

The table above is a sample of the results of the analysis that has been done. From the table above, it can be seen that translators tend to often use Borrowing translation techniques. The translator keeps the source language into the target language because the sentence contains many medical terms that are difficult to find equivalents in the target language. The example sentences above are included in the epidemiological terms because the sentence describes a pandemic condition, which is indicated by the appearance of the word "case and investigations" in the sentence.

4.3 Organizational Terms

According to Rask (2008), Organizational terms are a term in the medical field that is related to or oriented towards the care of people/patients. The following is an example of the translation of Organizational terms taken from data that has been analyzed by researchers:

<table>
<thead>
<tr>
<th>No.</th>
<th>Source Text (ST)</th>
<th>Target Text (TT)</th>
<th>Translation Technique</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Give effective oxygen therapy measures in time, including nasal cannula, mask oxygen, high-flow nasal oxygen therapy.</td>
<td>Berikan terapi oksigen yang tepat dan efektif secara terukur Amp, antara lain Est.Eq nasal Bos kanul Est.Eq, masker oksigen Est.Eq, terapi nasal Bos oksigen aliran tinggi Est.Eq.</td>
<td>Bor: Borrowing</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Amp: Amplification</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Est.Eq: Established Equivalence</td>
</tr>
</tbody>
</table>
2. Severe patients should be provided inhalation oxygen with facemask or nasal catheter. Timely assess whether respiratory distress and/or hypoxemia are relieved.

The table above is a sample of the results of the analysis that has been done. From the table above, it can be seen that the translator also uses the Established Equivalence Technique to translate sentences containing medical terms by using equivalent words taken from the dictionary, general medical terms, and everyday expressions in the target language. The example sentence above is included in the organizational terms because the sentence is patient-oriented, in another word it describes how to treat COVID-19 patients, which is marked by the appearance of the word "patient, give, and evaluate" in the sentence. Based on that, it can be seen that translating medical terms is more difficult and carries a high risk. Because it relates to a medical term that contains a diagnosis of a disease caused by an epidemic, the translator must not make mistakes. Related to that, translating organization terms is also very difficult and has a high risk. because it is directly related to patient care. If the translators made a mistake in translating it, it will be bad, it can cause death as said by Dharmawan et al. (2019). While the difficulty in translating epidemiological terms is still relatively low compared to others but still high risk, because it is related to medical terms related to the development of the epidemic, of course, if the translator makes a mistake, it will still cause misinterpretation for the readers.

5. DISCUSSION

The translation is an important factor as a medium for disseminating knowledge of discoveries in the medical field globally (Karwacka, 2015). Medical translations have different ways of writing to convey to readers (lay readers and specialists). For example, in medical articles for lay readers, translators must be able to position themselves as lay readers, so that translators can translate as well as possible with the right choice of diction so as not to widen from the message content of the source language (Peter Newmark, 1979).

As research conducted by Ramadhan (2020) that fifty students who were participants in her research had difficulty translating the COVID-19 text that they were going to read to become the research material. They have difficulty understanding the words contained in medical terms so that they cannot read the text easily. This proves that it is necessary to apply appropriate and correct translation techniques so that they can be understood easily. The urgency of this research was also reinforced by Hadad and Montero-Martinez (2020) who said that the COVID-19 text from English to Arabic needed an understanding of the use of this translation technique because, in their findings, the translation contains many metaphors that are difficult for readers to understand. In addition, research from Afrika et al., (2021) which contains the process of forming the word neologism which is currently widely found in online articles about COVID-19 also requires appropriate translation techniques so that translations containing neologisms can be conveyed properly, it does not cause misunderstanding for the readers.
As said by Rask (2008) that translating medical texts is a difficult thing. Because it has a high risk (Karwacka, 2015). The risk in question is when a medical text that is translated carelessly can cause mistranslation, which can have a bad impact on the reader and cause fatalities. Therefore, a translator must have a broad basic knowledge of how the body works and the development of disease and have good skills in choosing or using translation techniques (Dharmawan et al., 2019).

Based on the findings of this study, translating medical texts is certainly different from translating novels. The novel contains many non-literal meanings that make the translator unable to translate it literally, because it contains implied expressions (Nugroho, 2020). However, medical translations should also not be haphazardly translated literally, it contains meanings that can be at risk of harming the reader.

The results of this study indicate that translators tend to use the Established Equivalence technique and the Borrowing Technique a lot. As explained above, the Borrowing technique is a translation technique carried out by taking words or expressions directly from the pure source language (pure borrowing) but can also be (naturalized borrowing) because it has been adapted to the target language (Molina & Albir, 2002). However, the Established Equivalence Technique is mostly used by translators in translating the COVID-19 guidebook, because this translation technique is a translation technique carried out using equivalent words taken from dictionaries, colloquial terms, or expressions (Molina & Albir, 2002).

The findings of this study prove that the many uses of the Established Equivalence technique can give a high value to the translation quality for the translation (Nababan et al., 2012) which has a high value of accuracy, acceptability, and readability for laypeople because the COVID-19 guidebook is widely translated using common language in the target language so that it is easy to understand for readers. However, it should be noted that the quality of the translation is not seen from who the translator is, but is seen from the success of the translator in translating the message content from the source language into the target language. Translations by well-known translators may be worth less than novice translators who use accurate translation techniques (Najakh et al., 2018). This is also supported by findings from Nugroho et al (2016) that translators who have physical limitations and have good skills in using English cannot be as creative as translators who lack an understanding of English. However, it is possible that the translation results from visually impaired translators are less effective, because most of them translate scientific texts by reading word-for-word (Nugroho et al., 2021).

6. CONCLUSION

One of the interesting elements is that previous studies did not examine medical text translation techniques, but previous studies only used medical texts as their research data. Even though the translation technique is very interesting to study because there are various types in it as stated by Molina & Albir (2002). The results showed that the percentage of the Established Equivalence technique that reached 63.54% had the highest value in all terminology categories in the COVID-19 guidebook. Then followed by the Borrowing technique with a percentage reaching 25.88%. The use of Borrowing techniques is also a...
Translation Techniques of Medical Terms

good combination for translating medical texts, because medical texts that are universal can be conveyed universally, in other words, they are maintained as they are. Based on these results, the translator succeeded in conveying the message well from the source language to the target language. This finding can also be a new insight because so far, no research has been found that discusses it.

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