

CHAPTER III

METHODOLOGY

This chapter explains how the study is conducted. It deals with the design of the research, data source, and data analysis.

3.1 Research Design

This study was a descriptive qualitative study. Litosseliti (2010) explained that qualitative study is something that has to do with structures or patterns. Moreover, a content analysis was also used to analyze the data that have been collected. Fraenkel et al. (2011) stated that content analysis is a method used to analyze written contents or documents by categorizing and comparing the data source of the research. This research was actually a part of a larger research project that sought to examine the rhetorical structures and translation techniques in the abstracts. Because of that reason, the researcher tried to identify the realization of the moves and steps, followed by the translation techniques used in translating the Humanities (H) and Hard Sciences (HS) students' undergraduate thesis abstracts (UTA) in Universitas Pendidikan Indonesia.

3.2 Data Source

The data were taken from 30 undergraduate thesis abstracts written in Indonesian and their translation in English, a total of 60 abstracts from 2016 to 2020 of the two faculties; Faculty of Language and Literature Education and Faculty of Science and Mathematics Education of the Universitas Pendidikan Indonesia. Furthermore, a random sampling technique by filtering 1,639 data based on students' majors which are English Language Education (UTA H1), Indonesian Language and Literature Education (UTA H2), Sundanese Language Education (UTA H3), International Program on Science Education (UTA HS1), Chemistry Education (UTA HS2), and Mathematics Education (UTA HS3) has been used.

3.3 Data Analysis

This present study used Hyland's (2000) five-move analysis theory as a guideline to analyze moves and steps in the Humanities and Hard Sciences abstracts,

namely (1) *introduction* which explained the significance of the topic, made topic generalization, defined the key term(s), and identified the gap; (2) *purpose* which stated general and/or specific purpose of the research including the hypothesis; (3) *method* which described the participants/data source, instrument(s), followed by procedure and context; (4) *product* which described the main specific findings of the research; and (5) *conclusion* which deduced the conclusion, evaluated the significance of the research, stated limitation, and presented recommendation or implication. In addition, Molina and Albir (2002) translation theory was also used in analyzing the translation techniques used by the students in translating their abstracts. Those are (1) *adaptation*, (2) *amplification*, (3) *borrowing*, (4) *calque*, (5) *compensation*, (6) *description*, (7) *discursive creation*, (8) *established equivalent*, (9) *generalization*, (10) *linguistic amplification*, (11) *linguistic compression*, (12) *literal translation*, (13) *modulation*, (14) *particularization*, (15) *reduction*, (16) *substitution*, (17) *transposition*, and (18) *variation*. The theory of Move Analysis by Hyland (2000) and Translation Techniques by Molina and Albir (2002) were used because those theories were found as the most predominantly employed analytical framework by researchers.

In analyzing the data, the researcher first identified the moves and steps that are in students' undergraduate thesis abstracts (both in Indonesian and English versions). Then, using the translation technique theory, the researcher investigated the way the authors of the abstracts translated their undergraduate thesis. The following was the sample of analysis of the rhetorical structures and translation techniques used in the Humanities undergraduate thesis abstract.

Table 1 A Sample of Rhetorical Structures Analysis in the Humanities

Undergraduate Thesis Abstract Written in English

Sentence	Move	Step
This study was aimed to investigate the outcomes of implementing picture strip story technique in narrative speaking and discover students' responses toward the implementation of picture strip story technique itself.	2	-
The participants of this study were 32 students of one class in junior high school in Bandung.	3	1

One group pre-test post-test was implemented as a research design.	3	3
The data were collected by using two instruments; speaking assessment namely pre-test (before treatment) and post-test (after treatment) and students' interview.	3	2
The results of the study showed that picture strip story technique has successfully improved ninth graders speaking ability which can be seen from the progress of decreasing students' speaking problems.	4	-
The students' mean score of speaking assessment also increased from 72.28 in pre-test to 78.81 in post-test.	4	-
In addition, based on the result of interview, the students showed positive and negative responses toward the implementation of picture strip story technique in learning narrative speaking.	4	-

*Table 2 A Sample of Rhetorical Structures Analysis in the Humanities
Undergraduate Thesis Abstract Written in Indonesian*

Sentence	Move	Step
Penelitian ini bertujuan untuk menyelidiki hasil penerapan teknik cerita strip bergambar dalam berbicara naratif dan menemukan respon siswa terhadap penerapan teknik cerita strip bergambar itu sendiri.	2	-
Partisipan penelitian ini adalah 32 siswa dari satu kelas di SMP di Bandung.	3	1
Satu kelompok pre-test post-test diimplementasikan sebagai desain penelitian.	3	3
Data dikumpulkan dengan menggunakan dua instrumen; penilaian berbicara yaitu pre-test dan post-test dan wawancara siswa.	3	2
Hasil penelitian menunjukkan bahwa teknik cerita strip bergambar telah berhasil meningkatkan kemampuan berbicara siswa kelas sembilan yang dapat dilihat dari penurunan masalah	4	-

berbicara siswa.		
Nilai rata-rata siswa dalam penilaian berbicara juga meningkat dari 72,28 pada pre-test menjadi 78,81 pada post-test.	4	-
Selain itu, berdasarkan hasil wawancara, siswa menunjukkan respon positif dan negatif terhadap penerapan teknik cerita bergambar dalam pembelajaran berbicara naratif.	4	-

Table 3 A Sample of Translation Techniques Analysis in the Humanities Undergraduate Thesis Abstract

Source Language (SL)	Target Language (TL)	Translation Technique
This study was aimed to investigate the outcomes of implementing picture strip story technique in narrative speaking and discover students' responses toward the implementation of picture strip story technique itself.	Penelitian ini bertujuan untuk menyelidiki hasil penerapan teknik cerita strip bergambar dalam berbicara naratif dan menemukan respon siswa terhadap penerapan teknik cerita strip bergambar itu sendiri.	Literal translation
The participants of this study were 32 students of one class in junior high school in Bandung.	Partisipan penelitian ini adalah 32 siswa dari satu kelas di SMP di Bandung.	Literal translation – Established equivalent
One group pre-test post-test was implemented as a research design.	Satu kelompok pre-test post-test diimplementasikan sebagai desain penelitian.	Literal translation - Borrowing
The data were collected by using two instruments; speaking assessment namely pre-test (before treatment) and post-test (after treatment) and students' interview.	Data dikumpulkan dengan menggunakan dua instrumen; penilaian berbicara yaitu pre-test dan post-test dan wawancara siswa.	Literal translation - Borrowing - Reduction

The results of the study showed that picture strip story technique has successfully improved ninth graders speaking ability which can be seen from the progress of decreasing students' speaking problems.	Hasil penelitian menunjukkan bahwa teknik cerita strip bergambar telah berhasil meningkatkan kemampuan berbicara siswa kelas sembilan yang dapat dilihat dari penurunan masalah berbicara siswa.	Literal translation
The students' mean score of speaking assessment also increased from 72.28 in pre-test to 78.81 in post-test .	Nilai rata-rata siswa dalam penilaian berbicara juga meningkat dari 72,28 pada pre-test menjadi 78,81 pada post-test .	Literal translation - Borrowing
In addition, based on the result of interview, the students showed positive and negative responses toward the implementation of picture strip story technique in learning narrative speaking.	Selain itu, berdasarkan hasil wawancara, siswa menunjukkan respon positif dan negatif terhadap penerapan teknik cerita bergambar dalam pembelajaran berbicara naratif.	Literal translation

The same way was also done to analyze the rhetorical structures and translation techniques used in the Hard Sciences undergraduate thesis abstracts below.

Table 4 A Sample of Rhetorical Structures Analysis in the Hard Science Undergraduate Thesis Abstract Written in English

Sentence	Move	Step
Scientific literacy appears to become more urgent in the 21st century by which it can help developing responsible citizens who fully aware and actively engage with global problems.	1	1
The purpose of this research is to profile the scientific literacy of junior high school students in the natural science subject and the difference between students' scientific literacy and students'	2	-

gender.		
The descriptive method with survey design was employed .	3	3
The sampling method was simple random sampling.	3	3
The participants involved were 203 ninth grade junior high school students who came from two public schools and one private school in Medan City.	3	1
The instrument developed and used in this research was in the form of an online test consisting of 25 simple multiple-choice questions in Bahasa.	3	2
Scientific literacy aspects, such as Scientific Competencies, Scientific Knowledge, and Attitudes toward Science were covered in the test.	3	3
The results are students' scientific literacy is at Level 1, according to the science proficiency level descriptions.	4	-
Students' achievements in Scientific Competencies Aspect is in a low category, meanwhile results in Scientific Knowledge and Attitudes toward Science Aspects are in the medium categories.	4	-
There is no significant difference between students' scientific literacy achievements and students' gender.	4	-
Therefore, scientific literacy needs to be promoted and trained since school years by using the relevant learning strategies used in learning activities.	5	4

Table 5 A Sample of Rhetorical Structures Analysis in the Hard Science Undergraduate Thesis Abstract Written in Indonesian

Sentence	Move	Step
Literasi sains menjadi lebih penting di abad ke-21 ini di mana literasi sains dapat membantu dalam pembinaan warga negara yang bertanggung jawab dan secara sadar aktif terlibat dengan masalah dunia.	1	1
Tujuan penelitian ini adalah untuk mengetahui literasi sains siswa sekolah menengah pertama dalam mata pelajaran IPA dan	2	-

perbedaan antara kemampuan literasi sains siswa dan jenis kelamin siswa.		
Penelitian ini menggunakan metode deskriptif dan desain survei.	3	3
Metode pengambilan sampel adalah simple random sampling.	3	3
Partisipan yang terlibat sebanyak 203 siswa Sekolah Menengah Pertama kelas sembilan yang berasal dari dua sekolah negeri dan satu sekolah swasta di Kota Medan.	3	1
Instrumen yang dikembangkan dan digunakan dalam penelitian ini adalah dalam bentuk tes dalam jaringan (daring) yang terdiri dari 25 pertanyaan pilihan ganda dalam bahasa Indonesia.	3	2
Aspek literasi sains, seperti Kompetensi Ilmiah, Pengetahuan Ilmiah, dan Sikap terhadap Sains dimasukkan ke dalam tes ini.	3	3
Hasil penelitian adalah literasi sains siswa berada di Level 1 sesuai dengan deskripsi tingkat kemahiran sains.	4	-
Capaian siswa dalam Aspek Kompetensi Ilmiah tergolong rendah, sedangkan hasil aspek Pengetahuan Ilmiah dan Sikap terhadap Sains berada di kategori sedang.	4	-
Selain itu, tidak ada perbedaan yang signifikan antara pencapaian literasi sains siswa dan jenis kelamin siswa.	4	-
Oleh karena itu, literasi sains perlu dipromosikan dan dilatih sejak masa sekolah dengan menggunakan strategi pembelajaran yang relevan dalam kegiatan belajar.	5	4

Table 6 A Sample of Translation Techniques Analysis in the Hard Science

Undergraduate Thesis Abstract

Source Language (SL)	Target Language (TL)	Translation Technique
Scientific literacy appears to become more urgent in the 21st century by which <i>it</i> can help developing responsible citizens who fully aware and	Literasi sains menjadi lebih penting di abad ke-21 ini di mana <i>literasi sains</i> dapat membantu dalam pembinaan warga negara yang	Calque - Literal translation - Description

actively engage with global problems.	bertanggung jawab dan secara sadar aktif terlibat dengan masalah dunia.	
The purpose of this research is to profile the scientific literacy of junior high school students in the natural science subject and the difference between students' scientific literacy and students' gender.	Tujuan penelitian ini adalah untuk mengetahui literasi sains siswa sekolah menengah pertama dalam mata pelajaran IPA dan perbedaan antara kemampuan literasi sains siswa dan jenis kelamin siswa.	Literal translation - Calque - Adaptation
The descriptive method with survey design was employed.	Penelitian ini menggunakan metode deskriptif dan desain survei.	Transposition - Calque
The sampling method was simple random sampling .	Metode pengambilan sampel adalah simple random sampling .	Literal translation - Borrowing
The participants involved were 203 ninth grade junior high school students who came from two public schools and one private school in Medan City.	Partisipan yang terlibat sebanyak 203 siswa Sekolah Menengah Pertama kelas sembilan yang berasal dari dua sekolah negeri dan satu sekolah swasta di Kota Medan.	Literal translation
The instrument developed and used in this research was in the form of an online test consisting of 25 simple multiple-choice questions in Bahasa .	Instrumen yang dikembangkan dan digunakan dalam penelitian ini adalah dalam bentuk tes dalam jaringan (daring) yang terdiri dari 25 pertanyaan pilihan ganda dalam bahasa Indonesia .	Literal translation - Amplification
Scientific literacy aspects, such as Scientific Competencies, Scientific	Aspek literasi sains , seperti Kompetensi Ilmiah, Pengetahuan Ilmiah, dan Sikap	Calque - Literal translation

Knowledge, and Attitudes toward Science were covered in the test.	terhadap Sains dimasukkan ke dalam tes ini.	
The results are students' scientific literacy is at Level 1, according to the science proficiency level descriptions.	Hasil penelitian adalah literasi sains siswa berada di Level 1 sesuai dengan deskripsi tingkat kemahiran sains.	Literal translation - Calque
Students' achievements in Scientific Competencies Aspect is in a low category, meanwhile results in Scientific Knowledge and Attitudes toward Science Aspects are in the medium categories.	Capaian siswa dalam Aspek Kompetensi Ilmiah tergolong rendah, sedangkan hasil aspek Pengetahuan Ilmiah dan Sikap terhadap Sains berada di kategori sedang.	Literal translation
There is no significant difference between students' scientific literacy achievements and students' gender.	Selain itu , tidak ada perbedaan yang signifikan antara pencapaian literasi sains siswa dan jenis kelamin siswa.	Amplification - Literal translation - Calque
Therefore, scientific literacy needs to be promoted and trained since school years by using the relevant learning strategies used in learning activities.	Oleh karena itu, literasi sains perlu dipromosikan dan dilatih sejak masa sekolah dengan menggunakan strategi pembelajaran yang relevan dalam kegiatan belajar.	Literal translation - Calque

After identifying the rhetorical structures and translation techniques, the researcher then continued to analyze the differences between abstracts in Indonesian and English. Then, the results were presented by writing it on findings and discussion before making a conclusion.