



English Relative Clauses by Thai EFL learners:
A Case Study of Translation Task
ความสามารถของนิสิตไทยในคณานุกรมประโยคภาษาอังกฤษ:
กรณีศึกษาผ่านการแปลภาษา

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Abstract

English relative clauses (ERC) has gained attention from a number of scholars, including Thai researchers (Kimura, 2015; Phoocharoensil & Simargool, 2010; Termjai & Cedar, 2013; to name a few). These studies found that non-English major students faced problems in ERC production in several ways. The present study focused on English major students' abilities in embedding ERC into the sentences based on the Noun Phrase Accessibility Hierarchy (NPAH) and the Perceptual Difficulty Hypothesis (PDH). Twenty-six English major students from the Faculty of Education, Naresuan University translated 12 Thai sentences into English sentences with ERC structure. The results reveal that the students followed the NPAH theories and the percentages in their production of SU and OBJ, GEN RCs were 98%, 72%, and 37% respectively. In terms of PDH, it was found that the students could embed OBJ RCs to the right of sentences better than in the center of sentences, while they did well both in right-embedded and center embedded structures in the part of SUB RCs. Moreover, the students could not embed GEN RCs correctly in both right of sentences and the center of sentences.

Keywords: English relative clauses, Thai EFL learners.

Introduction

Azar (2002) states that an English relative clause (ERC) or an adjective clause is a dependent clause which is one of the components in English complex sentence structures. The important function of ERCs is to modify nouns or pronouns in order to identify, describe, or provide additional information about the nouns and pronouns. In academic textbooks at the university level, a relative clause structure is found most frequently when compared to the other two complex sentence structures, namely adverb clause and noun clause (Ngam-kitjawat, 2014). Interestingly, Celce-Murcia & Larsen-Freeman (1999) posit that relative clauses have been regarded as a complicated and problematic structure for most EFL and ESL learners when compared with other structures. This claim corroborates Rattanasak (2014)'s study in that Thai EFL learners have difficulty dealing with adjective clauses. Not surprisingly, in Thailand,

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several studies have shown that Thai EFL learners both undergraduate students and high school students mostly faced struggles in producing adjective clauses (e.g. Kimura, 2015; Termjai & Cedar, 2013; Rattanasak, 2014). Moreover, it was found that Thai EFL learners faced problems in the production of the genitive relative clause (GEN) or “whose + noun + verb” structures, and students usually avoid using them (e.g. Phoocharoensil & Simargool, 2010). The results mentioned above reveal that Thai students still have problems with RC production. As a result, the topic of ERC production by Thai EFL learners should be further studied.

However, in Thailand, most of the existing studies focus on non-English major students. Thus, to gain a clearer picture of the problems and the production process of ERCs by Thai students, the present study aims to examine the English major students' production of the subject (SUB), object (OBJ), and genitive (GEN) in relative clauses based on Keenan and Comrie's (1977), namely the Noun Phrase Accessibility Hierarchy (NPAH), and on Kuno (1974)'s Perceptual Difficulty Hypothesis (PDH). The findings would reflect the abilities of Thai learners in producing ERCs whether they were congruent with both theories. Therefore, Thai EFL learners or people who are interested in these fields will have a better comprehension on the factors which have an impact on ERC production so that they can apply and produce ERCs correctly in the use of English in their daily lives. Also, this study can bring awareness to the students about which one (SUB, OBJ, and GEN) they should pay special attention to while reading or writing. In addition, Thai English teachers have some ideas to prepare appropriate teaching materials when dealing with ERCs in the classroom. Finally, this present study might inspire other researchers to conduct further studies.

Literature Review

This part is divided into three major sections. The first section focuses on the Noun Phrase Accessibility Hierarchy (NPAH), and the next part is about the Perceptual Difficulty Hypothesis (PDH). The last section deals with the related previous studies.

The Noun Phrase Accessibility Hierarchy (NPAH)

Keenan and Comrie (1977) posit that relative clauses consist of Noun Phrases (NPs) which are modified with clauses related to those phrases. They also refer to the Noun Phrase Accessibility Hierarchy (NPAH) and describe that the NPAH can predict the degree of difficulty in the RC production. The NPAH scale from the easiest to most difficult degree is as follows: Subject (SU) > Direct Object (DO) > Indirect Object (IO) > Oblique (OBL) > Genitive (GEN) > Object of Comparative (OCOMP). The following is related examples of NPs in each type:

Easy ↓ ↓ ↓ ↓ ↓ ↓ Difficult	SU:	The woman [that __carries the baby]
	DO:	The baby [that the woman carries__]
	IO:	The baby [that the woman gives the food to__]
	OBL:	The baby [whom the woman cares about__]
	GEN:	The woman [whose baby my kids like__]
	OCOMP:	The woman [who my sister is taller than__]

(Algady, 2013, p. 35-36)



The Perceptual Difficulty Hypothesis (PDH)

In Perceptual Difficulty Hypothesis (PDH), the positioning NPs into the right of sentences (right-embedded) is easier than positioning NPs into center of sentences (center-embedded) because center-embedded RCs can interrupt sentence production process of human (Kuno, 1974). In other words, in the right-embedded structure, the information flows along better than the center-embedded one. Thus, the right-embedded structure takes less time and is easier to acquire than the counterpart. Thus, second language learners (L2 learners) tend to perform better and learn faster in the right-embedded ERCs than the center-embedded ERCs. The following are the sentence examples:

Easy	right-embedded ERCs:	She is the woman <u>whom I told you about</u> .
↓		
Difficult	center-embedded ERCs:	The man <u>whom I saw</u> was Mr. Jones.
		(Azar, 2002, p.269)

Related studies

Hatch (1971) studied the comprehension of RCs in 20 kindergarten and 20 second grade children by focusing on two embedding positions (center vs. right) and SU RCs, OBJ RCs, and GEN RCs. The results showed that the children understood SU right-embedded RC the most, and the least one was GEN center-embedded RC. Similarly, Cho and Lee (2016) studied the frequency of using RCs in science and engineering journal papers and found that the SU RC structure (which + a verb phrase) was frequently found in the journal articles, and GEN SU structure (whose + a noun + a verb phrase) was found the least which was compatible with the Hatch's (1971) result. Moreover, it was found that all journals in the study also used right-embedded RCs rather than center-embedded RCs (Cho & Lee 2016). In other words, the results of these two studies were in accordance with the Keenan and Comrie's (1977) NPAH and Kuno's (1974) PDH. By the same token, Kubota (1993) examined the accuracy order in production of ERCs and found that the participants in the study preferred to produce ERCs with right-embedded ERCs over center-embedded ERCs. It demonstrates that the results matched the PDH of Kuno (1974). However, in the section of NPAH, the participants followed the Keenan and Comrie's (1977) except for the genitive type. The scale of frequency in production of ERCs by the participants was as follows: SU > GEN > OBJ > OPREP.

In Thailand, a number of researchers have attempted to study on ERCs within NPAH and PDH theories in several fields. Many previous studies in Thailand reveal that most Thai learners especially undergraduate students throughout Thailand had the abilities to learn and produce ERCs in right-embedded structure better than center-embedded structure (e.g. Kimura, 2015; Phoocharoensil & Simargool, 2010; Rattanasak, 2014; Termjai & Cedar, 2013). In other words, most Thai learners follow the PDH theory of Kuno (1974). Moreover, Thai learners mostly followed the Keenan and Comrie's (1977) NPAH theory. For instance, Phoocharoensil and Simargool (2010) claimed that the ERC structure types which Thai learners used the most to the least were as follows: SU,



OBJ, OPREP, and GEN RCs, respectively. The results of Phoocharoensil and Simargool (2010) were obviously related to the Keenan and Comrie's (1977) NPAH theory. However, the study of Rattanasak (2014) had a conflicting result with NPAH theory. The result from the participants in high language competent group revealed that they understood the GEN ERCs better than OPREP ERCs. The results of Rattanasak's (2014) were similar to the results of Amornwongpeeti and Pongpairroj (2014)'s study in the part of NPAH. The participants in Amornwongpeeti and Pongpairroj (2014)'s study had the least understanding in terms of OBL ERCs. It may be concluded that some Thai learners seem to have less understanding in OBL RCs.

In summary, the previous studies indicated that ERCs which were preferred to use the most was SUB ERCs. Although the hypothesis of Keenan and Comrie (1977) stated that GEN ERCs is one of the two most difficult types, the results of some studies did not correlate with NPAH. Moreover, a study especially in the case of Naresuan University only focused on ERC production by non-English major students in the field of SUB and DO right-embedded RCs and SUB and DO center-embedded RCs (Termjai & Cedar, 2013), but the study did not focus on GEN right and center embedded ERCs which are in a more difficult level. In other words, there is more room to expound. Thus, to prove whether the NPAH and PDH theories work well with the Thai case and whether the results of this study will relate with the previous study or not, the present study aims to examine how English major students at Naresuan University conformed to the NPAH in the field of SUB, OBJ⁵ and GEN and emphasized the abilities to produce ERCs of the English major students in right-embedded and center-embedded RC structures. The findings would answer the following two research questions. First, based on the NPAH, which one (SUB, OBJ, GEN) do students perform the best and the worst. Second, based on the PDH, which structure (right-embedded and center-embedded ones) do students perform better.

Research Methodology

This part deals with the participants of the study, instruments, procedures of collecting data, and data analysis.

Participants

Twenty third year undergraduate English major students, under the Faculty of Education, Naresuan University participated in this study. They had learned several English courses, such as Intensive English Grammar, Basic Writing, Basic Reading courses. So, their English proficiency was supposed to be high.

Instrument

The instrument in this study was a translation task adopted from Phoocharoensil and Simargool (2010) and Azar (2002). All participants were asked to translate Thai sentences into English. The translation task consisted of 12 translation statement items and was divided into SUB, OBJ and GEN. Each structure had four translation sentences. Thus, the total number of translation sentence was twelve. To make the translation

⁵ In this study, we combined DO, IO, and OBL together as OBJ.



sentences easy for analyzing and presenting the data set, they were classified as SUB 1, SUB 2, SUB3, and SUB 4 for the subject relative clauses. The other two structures (OBJ, GEN) followed the same pattern as the SUB.

In addition, the translation sentences were designed to reflect the PDH as well. To be more precise, in the three major structures (SUB, OBJ, GEN), each structure had four translation statements. The four translation statements consisted of two sub-structures (2 center-embedded and 2 right embedded). To paint a clearer picture how those were arranged on the test, see some sample sentences based on the SUB structure.

- SUB 1 center-embedded translation statement1
 4. เด็กผู้หญิงที่ชนะการแข่งขันมีความสุข
 The girl who won the competition is happy.
- SUB 2 right-embedded translation statement1
 5. ผมกำลังมองหาเลขานุการที่สามารถพูดภาษาอังกฤษได้ดี
 I'm looking for a secretary who can speak English well.
- SUB3 center-embedded translation statement2
 7. นิสิตคนที่นั่งข้างฉันมาจากประเทศจีน
 The student who is sitting next to me is sleeping.
- SUB4 right-embedded translation statement2
 10. ฉันขอบคุณผู้หญิงคนที่ช่วยเหลือฉัน
 I thanked the woman who helped me.

Again, the other two structures (OBJ, GEN) followed the same pattern as the SUB. As a result, the translation task reflected both NPAH and PDH models. In Table 1, all numbers refer to translation statement items on the real task. See appendix A for more details.

Table1: Structure of a translation task

	Center-embedded structure	Right-embedded structure
SUB	4, 7	5, 10
OBJ	6, 9	1, 8
GEN	2, 11	3, 12

Data collection procedure

The data collection was conducted in September 2019. Here is the data collection process. First, the researchers explained the purposes of the study to all participants in Thai to ensure that the participants clearly understood the objective of the study and how to do the task, and then, the participants completed the consent form of participation. Later, the participants were asked to translate twelve Thai sentences into English sentences with relative clause structure in the classroom. After they spent forty minutes doing the task, the researchers collected the answer sheets and did the grading.



Data Analysis

As mentioned earlier, the participants' answer sheets were graded by the researchers. As long as the students employed correct noun phrases, relative clause position, they received one point. If they did it wrong, they obtained a zero point. After the grading process, all data were run through a statistic program, namely SPSS, to find a statistically significant difference among the three major pronominal pronouns (SUB, OBJ, and GEN) to answer the first research question. In addition, a statistical calculation paved the way for answering the second research question regarding the right-embedded and the center-embedded structures. Finally, the statistical data were tabulated to reveal the production performance on the basis of NPAH and PDH.

Results

This part presents statistical findings to answer two major research questions. The first part deals with the first research question on the NPAH analysis. The second one covers the second research questions on the PDH basis.

RQ1: Based on the NPAH, which one (SUB, OBJ, GEN) do students perform the best and the worst?

According to the test, the total score was twelve. The average score from twenty-six participants was 8.62 (or 72%). However, the statistical findings mirror only an overall performance picture. To answer the first research question, three major types based on the NPAH theory are presented as follows.

Table 2: Mean score and amount of correct production of each RC type (N=26)

	Mean	Std. Deviation	Minimum	Maximum
SUB (4 items)	25.50	1.00	24	26
OBJ (4 items)	18.75	7.80	8	25
GEN (4 items)	9.50	5.06	3	14
Total	17.92	8.41	3	26

Table 2 reveals that the participants could produce the SUB ERC almost 100%; the mean score was 25.5 out of 26. Only two students missed it. In principle, the SUB ERC is considered to be easiest type of RC to acquire. In terms of OBJ ERC, the mean score of production dropped to 18.75. Surprisingly only 8 students did it correctly in the object relative clause in item 8 (*Baseball is the only kind of sports in which I am interested*). See appendix B for more details. Genitive relative clauses seem problematic to the students since the mean score was only 9.50. Some items had a very low number of students who could perform them correctly. One was item 3 regarding GEN (*Everyone tried to help the family whose house had burned down*); only 8 students could perform the sentence correctly. The other problematic structure was item 11 (*The child whose toy I broke is crying*); only a few students did it correctly.



Table 3: The F-test result on the three major types

A One-way ANOVA

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	516.16	2	258.08	8.84	.008*
Within Groups	262.75	9	29.19		
Total	778.91	11			

The F-test shows that there is a statically significant difference at .05 level ($F = 8.84; p < .05$). However, Table 3 reveals only an overall performance since the F-test reflects that at least one pair has a significant difference. The question is: Does the significant difference apply to all three pairs? Table 4 shows a multiple comparison among the three pairs.

Table 4: A Multiple Comparison

(I) type of ER	(J) ER	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound
Subject	object	6.75	3.82	.11	-1.89	15.39
	genitive	16.00	3.82	.00**	7.36	24.64
Object	subject	-6.75	3.82	.11	-15.39	1.89
	genitive	9.25	3.82	.04*	.61	17.89
Genitive	subject	-16.00	3.82	.00**	-24.64	-7.36
	object	-9.25	3.82	.04*	-17.89	-.61

Significant differences at $p < 0.01$ level are marked by “**” while those at $p < 0.05$ level are marked by “*”.

Table 4 reveals that there is no statistically significant difference between the subject relative clause and the object relative clause at level .05 ($p > .05$). Nonetheless, a statistically significant difference is found in the other two pairs. One is the subject relative clause and genitive relative clause ($p < .01$). The other is the object relative clause and genitive relative clause ($p < .05$). The statistical findings demonstrate that the participants’ ability to produce the subject and object relative clause has no difference. However, the ability to produce the subject relative clause and the genitive relative clause is different. It works the same way as the objective relative clause and the genitive one.

RQ 2: Based on the PDH, which structure (right-embedded and center-embedded ones) do students perform better?

According to Table 4, the participants did the right-embedded structure better than the center one. The mean scores in both right and center-embedded structures were 4.61 and 3.65, respectively. In addition, the SD in the right-embedded shows a better scatter score (.98). In addition, a pair t-test reveals that there is a statistically significant difference between the two types of structure. See Table 5 below.



Table 5: Statistical findings

Type of structure	Sum (26x6= 156)	Mean	SD
Right-embedded (6 items)	120	4.61	.98
Center-embedded (6 items)	95	3.65	1.23
n = 26 t = 4.40; p<.00			

Consider Table 6 to find out what items the participants performed well and which one could be an uphill task for them. In terms of easy items, students did well in items numbers 1, 4, 5, and 7. Notice that both structures received perfect scores or all participants could do it correctly. Only item 1 shows one participant that provided a wrong answer. The question then would be if the center-embedded one was truly problematic. In the center-embedded, the more difficult structures- specifically the two items (9 and 11) reveal some difficulty, and in particular item 11, in which only three participants could translate the sentence correctly. The right-embedded one also reflects some difficulty as well, as in item 3 in which only eight participants could answer correctly.

Table 6: Identification of easy and difficult items

Type of structure	Easy items	Difficult items
Right-embedded	# 1 (25), # 5 (26)	# 3 (8),
Center-embedded	# 4 (26), # 7 (26)	# 9 (8), #11 (3)

Numbers in parentheses refer to the number of participants who answered the question items correctly. It should be noted that the level of difficulty was based on the fewer than 10 participants who did the item correctly.

Let's consider some easy / difficult items in details. In the easy items, both right embedded and center embedded fall in this category. In difficult items, center-embedded seem to pose more difficulty since 2 out of the 3 items fall in to this category.

Table 7: Easy and difficult items

Easy items		Difficult items	
Item no	Translation statement	Item no	Translation statement
1	ฉันชอบเรียงความที่คุณเขียน I like the essay <u>which you wrote</u> .	3	ทุกคนพยายามช่วยครอบครัวที่บ้านของพวกเขา ถูกไฟไหม้ Everyone tried to help the family <u>whose</u> <u>house had burned down</u> .
4	เด็กผู้หญิงที่ชนะเลิศการแข่งขันมีความสุข The girl <u>who won the competition</u> is happy.	9	เพลงที่พวกเราฟังเมื่อคืนนี้ไพเราะมาก The song <u>to which we listened last night</u> was very beautiful.



Easy items		Difficult items	
Item no	Translation statement	Item no	Translation statement
5	ผมกำลังมองหาเลขานุการที่สามารถพูดภาษาอังกฤษได้ดี I'm looking for a secretary <u>who can speak English well.</u>	11	เด็กคนที่ฉันทำของเล่นพังกำลังร้องไห้ The child <u>whose toy I broke</u> is crying.
7	นิสิตคนที่นั่งข้างฉันมาจากประเทศจีน The student <u>who is sitting next to me</u> is sleeping.		

In sum, based on the PDH, the statistic findings seem congruent with the theory. However, when lowest and highest score items are taken into consideration, the type of structure does not matter in the highest items, but it becomes an issue in the lowest score items.

Discussion and Suggestion

This part clarifies the findings to find out the plausible cause of what went wrong from the two theories. This also links to what other previous studies found and how they connect to the present study.

1. ERC production based on Keenan and Comrie's (1977)

The present study pays attention to the ERC production of SUB, OBJ, and GEN ERCs. In SUB ERC, almost all students could produce them perfectly. The results correspond to the those of Phoocharoensil and Simargool (2010) which reveal that the students especially the students who had high English proficiency can translate Thai sentences into English sentences with SUB RCs perfectly. The finding fits Keenan and Comrie's (1977).

In OBJ ERC production, the number of students producing this part correctly decreases from the part of SUB ERC. The average number of students that correctly produce OBJ ERC is approximately 18.75. However, the most interesting point in this part is item 9 since only eight students could produce it correctly. The item 9 is '*The song to which we listened last night was very beautiful*' in English. The most common mistake in this item is most students often did not have a preposition "to". The other three items on OBJ ERC were not too difficult for them since the number of participants did it quite well (18, 24, 25). See appendix B for more details.

The last section is GEN. The average number of students that can produce this RC type is only 9.50. The numbers of participants who can translate into ERC in four items are 3, 8, 13, and 14, respectively. Thus, they performed poorly on GEN as Keenan and Comrie's (1977) claim. We notice that the causes of difficulty are based on not only the NPAH, but also the PDH theories. The point to be discussed in the next part is regarding Kuno's theory. In sum, the results reveal that the participants can do SUB and OBJ RC better than GEN RC which conforms to Hatch's (1971) study and meets the theory of Keenan and Comrie (1977).

In sum, the scale of difficulty from easy structure to difficult one is: SUB > OBJ > GEN.



2. Positioning ERC into the sentences based on Kuno's (1974) PDH

Table 5 demonstrates that Kuno's PDH works well with the findings of the present study. That is, Thai participants have a better performance on the right-embedded structure than the center-embedded one. The total score from 26 students on the right-embedded (120 out of 156 or 77%) is obviously higher than that on the center-embedded (95 out of 156 or 61%). The mean score and SD also are in the same direction. In other words, SD in the right-embedded one reflects more tight scattered scores than that in the center one. Additionally, the t-test shows a statistically significant difference between the two structures. The findings are compatible with those of Kimura (2015) and Termjai & Cedar's (2013). That is, the center-embedded one causes some more difficult than the counterpart to process the information. The participants felt more comfortable to handle the right-embedded structure than the center-embedded one. These then is leaning more to and correspond to Kuno's PHD. Nonetheless, Table 6 turns things around in that some right-embedded structure poses more problematic than the center-embedded, as in item 3. In order to account for this, Table 7 shows the reason for it. That is, in the three items (3, 9, 11) of a difficult category, "whose" appears in two items (3 and 11). It looks to consider only internal structure based on Kuno's PHD, which is inadequate to account for this phenomenon. GENs in items 3 and 11 are not the same. That is, one is a subject GEN (item3); the other is an object GEN (item11). We posit that the object GEN is more difficult than the subject one. Before discussing items 3 and 11, let's consider the difference between the subject and object GENs in the following sentences.

Subject GEN

People can offer their kids' old clothes. Their children are growing.

(1) People whose children are growing can offer their kids' old clothes.

Object GEN

The person will suggest a way for you to get it. You want a person's item.

(2) The person whose item you want will suggest a way for you to get it.

Based on Kuno's PHD, center-embedded structure is more difficult than the counterpart since it obstructs the flow of information. The subject GEN (1) looks easier than the object GEN (2) because the reader or hearer tends to have less difficulty getting the meaning across. In contrast, the object GEN has a double hurdle to the reader in that for one reason the structure is inserted in the middle of the sentence; the flow of information was obstructed like (1). Worse, for another reason, the object is positioned before the subject of the GEN structure (*whose item you want*).

Let's consider the findings from the present study, as in (3) and (4).

(3) Everyone tried to help the family whose house had burned down. (item 3)

(4) The child whose toy I broke is crying. (item 11)



(3) becomes a difficult structure for the participants even though it is in the right-embedded form. We are not surprised for (4) to have the lowest score on the test because it fits Kuno's model. The center-embedded structure must be more difficult than the right-embedded one. In addition, as mentioned earlier, the object GEN has an impact on the flow of information because the object in the subordinate clause appear before the subject and the predicate part of the clause. When items 4 and 7 in Table 7 are taken into account, Kuno's model might not work well with the center-embedded items with a perfect score as below.

The girl who won the competition is happy. (item 4).

The student who is sitting next to me is sleeping. (item 7)

Again, Keenan & Comrie (1977)'s concept can explain this in that as long as a particular sentence is in the SUB form, the learners should not have a problem to handle. To consider only the internal structure might not be enough.

Pedagogical implication

When EFL learners study ERCs, they are always taught to understand ERC basic structure and type of ERCs. The lecturer should employ the two theories (Keenan & Comrie, 1977 and Kuno, 1973) to strengthen the learners' understanding and be aware of certain structure. To be more specific, the lecturer should teach the learners from the least complicated structure to most complex one (SUB to OCOMP). Then, while teaching ERCs on Keenan and Comrie (1977), the lecturer can bring the internal structure (center and right-embedded structures) into the learners' consideration. The focus might pose more weight on the first theory than on the second one, particularly on SUB and OBJ. The internal structure will play a crucial role when the learners have to deal with GEN because the object GEN is more difficult and needs more awareness than the subject GEN.

Suggestions for further studies

First, since the present study is a quantitative study, some results of this study did not perfectly conform to the NPAH and PDH theories. To find out why some results do not conform to the theories, further studies should use more research tools to elicit a quantitative data set. Thus, interview can be employed in this case.

Second, in this study, OBJ ERC was correlated with three types of RC— DO, IO and OBL—based on the NPAH model. Thus, the results might be affected by this combination structure. Further studies should focus on DO, IO and OBL RC separately according to the NPAH scale so that the results of the study will be more accurate.

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Appendix A (a translation task)

1. ฉันชอบเรียงความที่คุณเขียน
I like the essay which you wrote.
2. ผู้ชายคนที่กระเป๋าสตางค์ถูกขโมยเรียกตำรวจ
The man whose wallet was stolen called the police.
3. ทุกคนพยายามช่วยครอบครัวที่บ้านของพวกเขาถูกไฟไหม้
Everyone tried to help the family whose house had burned down.
4. เด็กผู้หญิงที่ชนะการแข่งขันมีความสุข
The girl who won the competition is happy.
5. ผมกำลังมองหาเลขานุการที่สามารถพูดภาษาอังกฤษได้ดี
I'm looking for a secretary who can speak English well.
6. ผู้ชายคนที่ฉันคุยด้วยเมื่อวานนี้ใจดีมาก
The man to whom I talked yesterday was very kind.
7. นิสิตคนที่นั่งข้างฉันมาจากประเทศจีน
The student who is sitting next to me is sleeping.
8. เบสบอลเป็นกีฬาเพียงอย่างเดียวที่ฉันสนใจ
Baseball is the only kind of sports in which I am interested.
9. เพลงที่พวกเราฟังเมื่อคืนนี้ไพเราะมาก
The song to which we listened last night was very beautiful.
10. ฉันขอบคุณผู้หญิงคนที่ช่วยเหลือฉัน
I thanked the woman who helped me.
11. เด็กคนที่ฉันทำของเล่นพังกำลังร้องไห้
The child whose toy I broke is crying.
12. ฉันรู้จักผู้ชายคนที่จักรยานถูกขโมย
I know the man whose bicycle was stolen.



Appendix B (A descriptive statistics result)

	Types of relative clauses	Number of students who did it correctly	%
SUB	SU_CENTER1	26	100
	SU_CENTER2	26	100
	SU_RIGHT1	26	100
	SU_RIGHT2	24	92
OBJ	OBJ_CENTER1	18	69
	OBJ_CENTER2	8	31
	OBJ_RIGHT1	25	96
	OBJ_RIGHT2	24	92
GEN	GEN_CENTER1	14	54
	GEN_CENTER2	3	12
	GEN_RIGHT1	8	31
	GEN_RIGHT2	13	50

Total number of students who did the translation task: 26