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ปีการศึกษา 2552

**ENGLISH LANGUAGE LEARNING STRATEGIES  
EMPLOYED BY THAI PRE-UNIVERSITY STUDENTS**

**Duangporn Sriboonruang**

**A Thesis Submitted in Partial Fulfillment of the Requirements for  
the Degree of Doctor of Philosophy in English Language Studies  
Suranaree University of Technology**

**Academic Year 2009**

**ENGLISH LANGUAGE LEARNING STRATEGIES EMPLOYED  
BY THAI PRE-UNIVERSITY STUDENTS**

Suranaree University of Technology has approved this thesis submitted in partial fulfillment of the requirements for the Degree of Doctor of Philosophy.

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ดวงพร ศรีบุญเรือง: การใช้กลวิธีการเรียนภาษาอังกฤษของนักเรียนระดับก่อน  
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การวิจัยครั้งนี้มีวัตถุประสงค์เพื่อสำรวจการใช้กลวิธีการเรียนโดยรวมของนักเรียนระดับ  
ก่อนเข้ามหาวิทยาลัยในประเทศไทย และศึกษาความสัมพันธ์ระหว่างความถี่ของการใช้กลวิธีการ  
เรียนกับตัวแปร 5 ตัวแปรได้แก่ เพศ (ชายและหญิง) ประเภทโรงเรียน (โรงเรียนรัฐบาล และ  
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เรียนเสริมวิชาภาษาอังกฤษ (เรียนเสริมวิชาภาษาอังกฤษ และ ไม่ได้เรียนเสริมวิชาภาษาอังกฤษ)  
และ ระดับความสามารถด้านภาษาอังกฤษ (ระดับสูง กลาง ต่ำ) กลุ่มตัวอย่างในการวิจัยครั้งนี้  
ประกอบด้วยนักเรียนระดับก่อนเข้ามหาวิทยาลัยจำนวน 1,816 คน ได้จากการสุ่มตัวอย่างแบบหลาย  
ชั้นจากโรงเรียนมัธยมศึกษาทั่วประเทศ การเก็บข้อมูลแบ่งออกเป็น 2 ช่วง ได้แก่ ช่วงที่ 1) การเก็บ  
ข้อมูลจากการสัมภาษณ์ และช่วงที่ 2) แบบสอบถามเกี่ยวกับการใช้กลวิธีการเรียนภาษาอังกฤษ  
ซึ่งมีค่าความเชื่อมั่นของแบบสอบถามที่ระดับ .96

สถิติที่ใช้ในการวิเคราะห์ข้อมูลเพื่อศึกษาระดับการใช้กลวิธีการเรียนภาษาอังกฤษ คือ  
ค่าเฉลี่ย ส่วนเบี่ยงเบนมาตรฐาน และค่าร้อยละ ใช้การวิเคราะห์ความแปรปรวน (ANOVA) การ  
ทดสอบไคกำลังสอง ( $\chi^2$ ) และการวิเคราะห์ปัจจัย (Factor Analysis) เป็นวิธีการวิเคราะห์ทางสถิติ  
เพื่อหาความสัมพันธ์ระหว่างการใช้กลวิธีการเรียนกับตัวแปรทั้ง 5 ตัว

ผลการวิจัยครั้งนี้พบว่า โดยภาพรวมแล้วนักเรียนระดับก่อนเข้ามหาวิทยาลัยในประเทศไทย  
รายงานความถี่การใช้กลวิธีการเรียนระดับปานกลางใน 2 กลุ่มกลวิธี คือ 1) กลวิธีที่ใช้ในชั้น  
เรียน และ 2) กลวิธีที่ใช้นอกชั้นเรียน ผลจากการวิเคราะห์แสดงให้เห็นว่าความถี่ของการใช้กลวิธี  
การเรียนมีความสัมพันธ์อย่างมีนัยสำคัญกับ เพศของนักเรียน สาขาวิชาที่เรียน การเรียนเสริม  
ภาษาอังกฤษ และ ระดับความสามารถทางภาษาอังกฤษ ส่วนตัวแปรในด้านประเภทของโรงเรียน  
พบว่าไม่มีความสัมพันธ์กับการเลือกใช้กลวิธีการเรียน ส่วนการวิเคราะห์ปัจจัยพบว่า 10 ปัจจัยมี  
ความสัมพันธ์อย่างมากกับตัวแปรทั้ง 5 ตัว ได้แก่ เพศของนักเรียน ประเภทโรงเรียน สาขาวิชาที่  
ศึกษา การเรียนเสริมวิชาภาษาอังกฤษ และ ระดับความสามารถด้านภาษาอังกฤษ

สาขาวิชาภาษาอังกฤษ

ลายมือชื่อนักศึกษา \_\_\_\_\_

ปีการศึกษา 2552

ลายมือชื่ออาจารย์ที่ปรึกษา \_\_\_\_\_

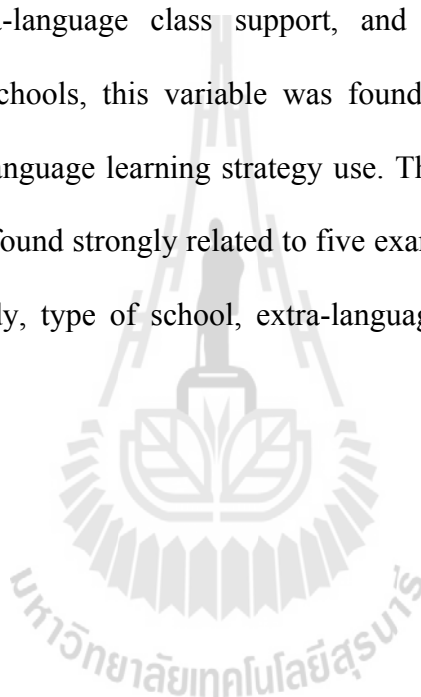
DUANGPORN SRIBOONRUANG: ENGLISH LANGUAGE LEARNING STRATEGIES EMPLOYED BY THAI PRE-UNIVERSITY STUDENTS. THESIS ADVISOR: ASSOC. PROF. CHANNARONG INTARAPRASERT, Ph.D., 284 PP.

#### LANGUAGE LEARNING STRATEGY/ THAI PRE-UNIVERSITY STUDENTS

The present investigation has been designed to explore overall language learning strategy use of Thai pre-university students, and examine the relationships as well as patterns of variations in frequency of students' reported language learning strategy use with reference to gender of students (male and female), type of schools (public and private schools), field of study (science and non-science oriented), extra-language class support (extra-language class support and non extra-language class support), and language proficiency levels (high, moderate, and low). The participants of the present study were 1,816 Thai pre-university students selected through the multi-stage sampling methods. The data for the present investigation were collected in two phases with different instruments. A semi-structured interview was used as the main method for the first phase and the language learning strategy questionnaire with the Alpha coefficient ( $\alpha$ ) .96 was used in the second phase of data collection.

The data obtained through the questionnaire were analysed with the assistance of the SPSS programme. Descriptive statistics including percentage, standard deviation, and mean scores were used to describe level of frequency of strategy use, while an Analysis of Variance (ANOVA), Chi-square tests, and Factor Analysis were used as the main statistical methods in data analysis to seek the relationship between the frequency of strategy use and the five investigated variables.

The findings of the present investigation show that Thai pre-university students, on the overall mean score, reported medium frequency of language learning strategy use in the two main categories of language learning strategies related to the purposes of language learning, namely 1) in-class strategy category and 2) out-of-class strategy category. The results of data analysis demonstrated that the frequency of students' overall reported use of strategies varied significantly in terms of gender, field of study, extra-language class support, and language proficiency levels. Regarding types of schools, this variable was found to be slightly related to the students' choices of language learning strategy use. The factor analysis results show that two factors were found strongly related to five examined variables, i.e., gender of students, field of study, type of school, extra-language class support, and level of language proficiency.



School of English

Academic year 2009

Student's signature \_\_\_\_\_

Advisor's signature \_\_\_\_\_

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# TABLE OF CONTENTS

	<b>Page</b>
ABSTRACT (Thai).....	I
ABSTRACT (English).....	II
ACKNOWLEDGEMENTS.....	IV
TABLE OF CONTENTS.....	VI
LIST OF TABLES.....	XII
LIST OF FIGURES.....	XVI
LIST OF APPENDICES.....	XVII
LIST OF ABBREVIATIONS.....	XVIII
<b>CHAPTER</b>	
<b>1. BACKGROUND TO STUDY.....</b>	<b>1</b>
1.1 Introduction and Purpose of the Chapter.....	1
1.2 Terms Used in the Present Investigation.....	4
1.3 Research Objectives.....	6
1.4 The Benefits of the Present Investigation.....	7
1.5 The Outline of the Thesis.....	8
1.6 Summary.....	10
<b>2. REVIEW OF RELATED LITURATURE AND RESEARCH</b>	
<b>    ON LANGUAGE LEARNING STRATEGIES.....</b>	<b>11</b>
2.1 Introduction and Purpose of the Chapter.....	11

## TABLE OF CONTENTS (Continued)

	<b>Page</b>
2.3 Classification of Language Learning Strategies .....	16
Stern (1975, 1992).....	17
Rubin (1975, 1981).....	19
Carver (1984).....	20
Ellis and Sinclair (1989).....	21
Oxford (1990).....	21
O'Malley and Chamot (1990).....	22
Coleman (1991).....	23
Intaraprasert (2000).....	24
Prakongchati (2007).....	27
2.4 A Review of Previous Studies Related to Language Learning Strategies Conducted in Countries other than Thailand.....	30
2.5 A Review of Previous Studies on Language Learning Strategies Conducted in Thailand.....	39
2.6 Summary.....	49
 <b>3. RESEARCH METHODOLOGY:</b>	
<b>DESIGN AND METHOD IN STRATEGY RESEARCH.....</b>	<b>50</b>
3.1 Introduction and Purpose of the Chapter.....	50
3.2 Methods in Language Learning Strategy Research.....	52
3.3 A Theoretical Framework for the Present Study.....	60
3.4 Research Questions.....	69

## TABLE OF CONTENTS (Continued)

	<b>Page</b>
3.5 Framework for Data Collection Methods for the Present Investigation.....	71
3.6 Method of Data Collection.....	72
3.7 Sampling and Rationale for Choice of Participants.....	75
3.8 Characteristics of the Research Population.....	76
3.9 Analyzing, Interpreting, and Reporting Data.....	80
3.10 Summary.....	83
<b>4. LANGUAGE LEARNING STRATEGY INVENTORY AND STRATEGY QUESTIONNAIRE FOR THE PRESENT INVESTIGATION.....</b>	<b>84</b>
4.1 Introduction and Purpose of the Chapter.....	84
4.2 The Main Stage of Student Oral Interviews.....	85
4.3 How the Preliminary Strategy Inventory was Generated .....	88
4.4 The Language Learning Strategy Inventory.....	93
4.4.1. Language Learning Strategies in the In - Class Strategy Category (IC).....	93
4.4.1.1 ICP 1: To be-well Prepared for the Lessons.....	94
4.4.1.2 ICP 2: To Understand the Lessons while Studying in Class.....	97
4.4.1.3 ICP 3: To Solve Problems Encountered in the Classroom Lessons .....	99

## TABLE OF CONTENTS (Continued)

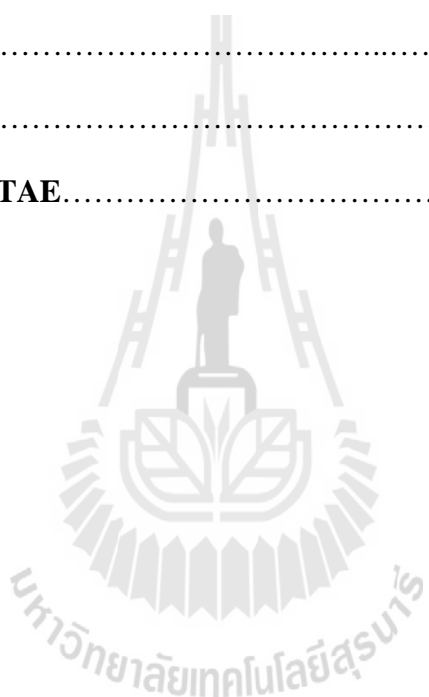
	<b>Page</b>
4.4.1.4 ICP 4: To Learn New Vocabulary in the Classroom Lessons.....	101
4.4.2. Language Learning Strategies in the Out-of-Class Strategy Category (OC).....	104
4.4.2.1 OCP 1: To Gain More Knowledge about Vocabulary.....	105
4.4.2.2 OCP 2: To Improve One’s Listening Skill.....	107
4.4.2.3 OCP 3: To Improve One’s Reading Skill.....	109
4.4.2.4 OCP 4: To Improve One’s Speaking Skill.....	111
4.4.2.5 OCP 5: To Improve One’s Writing Skill.....	114
4.5 Language Learning Strategy Questionnaire and the Validation ...	116
4.6 Summary.....	119
<b>5. DATA ANALYSIS FOR LANGUAGE LEARNING</b>	
<b>STRATEGY USE (I)</b> .....	121
5.1 Introduction and Purpose of this Section .....	121
5.2 Language Learning Strategy Use Reported by 1,816 Thai Pre-University Students.....	123
5.3 Summary.....	132
<b>6. DATA ANALYSIS FOR LANGUAGE LEARNING</b>	
<b>STRATEGY USE (II)</b> .....	135
6.1 Introduction and Purpose of the Chapter.....	135

## TABLE OF CONTENTS (Continued)

	<b>Page</b>
6.2 Variation in Students' Overall Reported	
Language Learning Strategy Use.....	137
6.3 Variation in Frequency of Students' Use of Strategies	
in the Two Main Categories: IC and OC.....	140
6.4 Variation in Use of Strategies to Achieve ICP and OCP Purposes.....	146
6.5 Variation in Use of Individual Learning Strategies.....	154
6.6 Results of Factor Analysis.....	169
6.7 Summary .....	185
<b>7. SUMMARY OF RESEARCH FINDINGS, DISCUSSIONS AND</b>	
<b>CONCLUSION .....</b>	<b>190</b>
7.1 Introduction and Purpose of the Chapter.....	190
7.2 Summary of Research Findings.....	191
7.2.1 Research Question 1.....	191
7.2.2 Research Question 2.....	194
7.2.3 Research Question 3.....	195
7.2.4 Research Question 4.....	197
7.2.5 Research Question 5.....	200
7.2.6 Research Question 6.....	201
7.2.7 Research Question 7.....	203
7.3 Discussion of Research Findings .....	206
7.4 Implications of the Research Findings for Teaching and Learning	
English for Pre-University Students.....	220

**TABLE OF CONTENTS (Continued)**

	<b>Page</b>
7.5 Contributions for the Present Investigation .....	222
7.6 Limitations of the Present Investigation and Proposals for Future Research.....	223
7.7 Summary .....	225
<b>REFERENCES</b> .....	227
<b>APPENDICES</b> .....	245
<b>CURRICULUM VETAE</b> .....	284



## LIST OF TABLES

<b>Table</b>	<b>Page</b>
2.1: Research on Language Learning Strategies Conducted in Other Countries...	31
2.2: Research on Language Learning Strategies Conducted in Thailand.....	40
4.1: The Language Learning Strategy Classification for the Present Investigation.....	91
4.2: Reliability Estimate of the Language Learning Strategy Questionnaire as a Whole and the Two Main Categories (IC and OC) and Nine Purposes.....	118
5.1: Frequency of Students' Reported Overall Strategy Use.....	124
5.2: Frequency of Use of Strategies in the IC and OC.....	124
5.3: Frequency of Use of Strategies to Achieve ICP .....	126
5.4: Frequency of Use of Strategies to Achieve OCP.....	127
5.5: Frequency of Use of Strategies to Achieve ICP Based on the Mean Score.....	128
5.6: Frequency of use of strategies to Achieve OCP Based on Mean Score.....	130
6.1: Summary of Variation in Students' Overall Reported Language Learning Strategy Use.....	138
6.2: Variation in Frequency of Students' Use of Strategies in the IC and OC, According to Gender.....	141

## LIST OF TABLES (Continued)

<b>Table</b>	<b>Page</b>
6.3: Variation in Frequency of Students' Use of Strategies in the IC and OC, According to Field of Study.....	142
6.4: Variation in Frequency of Students' Use of Strategies in the IC and OC, According to Type of School.....	143
6.5: Variation in Frequency of Students' Use of Strategies in the IC and OC, According to Extra- Class Support.....	144
6.6: Variation in Frequency of Students' Use of Strategies in the IC and OC, According to Level of Language Proficiency.....	145
6.7: Summary of Significant Variations in Frequency of Use Strategies in the IC and OC, According to the Five Variables.....	146
6.8: Variations in Students' Language Learning Strategy to Achieve the ICP and OCP, According to Gender.....	147
6.9: Variations in Students' Language Learning Strategy to Achieve the ICP and OCP, According to Field of Study.....	148
6.10: Variations in Students' Language Learning Strategy to Achieve the ICP and OCP, According to Type of School.....	149
6.11: Variations in Students' Language Learning Strategy to Achieve the ICP and OCP, According to Extra-Language Class Support.....	151
6.12: Variations in Students' Language Learning Strategy to Achieve the ICP and OCP, According to Level of Language Proficiency.....	153
6.13: Summary of Significant Variations in Use of Strategies to Achieve the ICP and OCP by the Five Variables.....	154



## LIST OF TABLES (Continued)

<b>Table</b>	<b>Page</b>
6.14: Individual Strategies Showing Significant Variation	
According to Gender.....	155
6.15: Individual Strategies Showing Significant Variation	
According to Field of Study.....	157
6.16: Individual Strategies Showing Significant Variation	
According to Type of School.....	159
6.17: Individual Strategies Showing Significant Variation	
According to Extra-Language Class Support.....	161
6.18: Individual Strategies Showing Significant Variation	
According to Level of Language Proficiency.....	163
6.19: The Sums of the Squared Factor Loadings of the Extracted	
Nine Factors.....	170
6.20: List of the Ten Extracted Factors.....	172
6.21: Factors Strongly Related to the Gender of Students.....	177
6.22: Factors Strongly Related to type of School.....	178
6.23: Factors Strongly Related to Field of Study.....	179
6.24: Factors Strongly Related to the Extra-language class support.....	180
6.25: Factors Strongly Related to Level of Language Proficiency.....	182
6.26: Summary of the Strong Relationship between	
the Factor and the Variables of the Present Investigation.....	185

## LIST OF FIGURES

<b>Figure</b>	<b>Page</b>
3.1: Theoretical Framework Based on the Empirical Research.....	61
3.2: Theoretical Framework of the Present Study.....	63
3.3: Framework of Data Collection Process.....	80
4.1: A Sample of the Language Learning Strategy Questionnaire.....	119
5.1: The Applied Measure.....	123
6.1: The Four Main Levels of Data Analysis for Language Learning Strategy Use.....	137
6.2: Example of Variation Pattern Classified as Positive.....	167
6.3: Example of Variation Pattern Classified as Mixed.....	168

## LIST OF ABBREVIATIONS

ANOVA	Analysis of Variance
B1	Number of Secondary Schools with both Male and Female Students
B2	Number of Secondary Schools with both Science-Oriented and Non Science-Oriented Students
EFL	English as a Foreign Language
EIR	Education Inspector Region
ESL	English as a Second Language
F	Female
IC	In-Class Strategy Category
ICP	In-Class Purposes
IELTS	International English Language Testing System
M	Male
MBTI	Myers-Briggs Type Indicator
MBTI-G	Myers-Briggs Type Indicator, Form G
OCP	Out-of-Class Purposes
OC	Out-of-Class Strategy Category
SICP	The Individual Language Learning Strategy Related to the In-Class Purpose for the In-Class Strategy Category
SOCP	The Individual Language Learning Strategy Related to the Out-of-Class Purpose for the Out-of-Class Strategy Category

**LIST OF ABBREVIATIONS (Cont.)**

PRS	Private Secondary Schools
PS	Public secondary school
SILL	Strategy Inventory for Language Learning
SPSS	Statistical Package for the Social Sciences program
T1	Total Number of Public Schools which offer the Regular Programme at the Upper Secondary School Level in Thailand
T2	Total Number of Public Schools which offer two Fields (science and non science-oriented) for both Genders in the Regular Programme at the Upper-Secondary School Level in Thailand
T3	Total Number of Private Schools which offer the Regular Programme at the Upper-Secondary School Level in Thailand
T4	Total Number of Private Schools which offer two Fields (science and non science-oriented) for both Gender in the Regular Programme at the Upper-Secondary School Level in Thailand
TOEFL	Test of English as a Foreign Language
TOEFL- ITP	Institutional Testing Program for English Proficiency  (An Institutional Version of the Test of English as a Foreign Language)

# **CHAPTER 1**

## **BACKGROUND TO STUDY**

### **1.1 Introduction and Purpose of the Chapter**

This chapter is an introduction to the present investigation, primarily focusing on both the background of literature in the area of language learning strategies and a context for this research. The following sections cover the rationale for the present investigation; the terms used in this research; research objectives; and finally the benefits of the present investigation. Moreover, this chapter concludes with an outline of the thesis.

Since the 1970's, many researchers in the area of language learning and teaching have placed an emphasis on the characteristics and performance of language learners. Much research focuses on how language learners deal with their target language learning. Mostly, in the previous research, language learners have been classified as 'good language learners' or 'successful language learners' and 'poor language learners' or 'unsuccessful language learners' (Ehrman and Oxford, 1989; Oxford and Ehrman, 1995; Yang, 1999; Kyungok, 2003; and Tercanlioglu, 2004). Many of the research works were conducted to investigate a relationship between factors affecting language learners and how language learners learn a target language. Through the review of available literature and research, there can be discerned a series of factors affecting how language learners acquire a target language. These factors include gender (Ehrman and Oxford, 1989; Oxford and Ehrman, 1995; Wharton,

2000; and Intaraprasert, 2000; 2002; 2003), field of study (Intaraprasert, 2002; 2003), motivation (Ehrman and Oxford, 1989; and Wharton, 2000), learner beliefs (Yang, 1999; and Intaraprasert, 2002; 2004); teaching and learning conditions (Wharton, 2000); and previous learning experiences (Wharton, 2000). The findings of these investigations have encouraged some researchers (e.g. Stern, 1975 and Rubin, 1975) to identify the characteristics of what 'good' or 'successful' language learners usually do when they learn the target language while some researchers (e.g. Porte, 1988) observe what 'poor' or 'unsuccessful' language learners do and what these learners should try to avoid.

With a review of the available literature and research, it appears that little research has been carried out with language learners learning English as a foreign language (EFL). Much research has been conducted with native speakers of English learning a foreign language and non-native speakers of English learning English as a second language (ESL). According to Intaraprasert (2000), little research has been carried out to investigate language learning strategies used by students in Thailand. A few research works have been conducted with Thai students studying at secondary schools (Phringphro, 2002) and at the tertiary level (Rattanaprucks, 1990; Lappayawichit, 1998; Ounwattana, 2000; Intaraprasert, 2000, 2002, 2003; Kaotsombut, 2003; and Prakongchati, 2007). Most Thai researchers have been focusing on the use of language learning strategies of successful and unsuccessful language learners (Rattanaprucks, 1990; Lappayawichit, 1998; and Kaotsombut, 2003).

In addition, some researchers attempt to look into the relationship of language learners strategies use and the other factors affecting language learning strategies such

as gender, field of study, and level of language proficiency ( e.g. Intaraprasert 2000; Kaotsombut, 2003; and Prakongchati, 2007), and previous language learning experience (Prakongchati, 2007). The findings of these research works help us understand how language learners acquire the target language, particularly with students at the tertiary level.

From the review of related research works, there has been only one research work carried out to investigate the language learning strategy use of Thai secondary school students (Phringphro, 2002); however, at the pre-university level, no research works have been carried out to look at the relationship between the choices of language learning strategy use of Thai pre-university students. The present investigation aims to fill this gap. It has been designed to identify and compare type and frequency use of language learning strategies by Thai pre-university students. This investigation has been designed to be conducted under the ‘research-then-theory’ as termed by Frankfort and Nachmias (1996, p.52) or ‘theory-after-research’ as termed by Punch (1998, p.16). According to Frankfort and Nachmias (1996, p. 52), ‘research-then-theory’ or Punch (1998, p.16), ‘theory-after-research’, refers to research work that ends up with a theory explained from the data the researcher collects. The present investigation does not aim to reconfirm or test any theory about language learning strategy use by language learners. Rather, it has been designed to examine the relationship between five variables: gender (male and female), type of secondary school (public and private schools), field of study (science-oriented and non science-oriented), extra-class support (extra-supported and non extra-supported), language proficiency (high, moderate, or low), and the frequency of language learning strategy used by Thai pre-university students.

In conclusion, there are many factors relevant to the use of language learning strategies such as gender, motivation, and learning styles. However, it is not possible for the researcher of this present investigation to investigate all the factors mentioned in relation to the choice of language learning strategy use by Thai pre-university students. Accordingly, a number of variations or factors in the present investigation have been carefully selected: those variables or factors which appear to be the most frequently examined by a number of researchers such as gender and language proficiency together with the variables or factors which are likely to be neglected by most researchers such as types of secondary school, field of study, and extra-class support. The theoretical framework and rationale for selecting and rejecting variables for the present investigation will be discussed in Chapter 3.

## **1.2 Terms Used in the Present Investigation**

The following terms are frequently used in this present investigation.

### **1.2.1 Language learning strategies**

In the present investigation, 'language learning strategies' have been defined as conscious behaviour or thought processes used in performing learning actions, whether observable (behaviours or techniques) or unobservable (thoughts or mental processes), that Thai pre-university students themselves generate and make use of to enhance their second language learning either directly or indirectly.

### **1.2.2 Thai pre-university students**

'Thai pre-university students' refers to students whose nationality is Thai and they were studying at the pre-university level (Mathayom Suksa 6) of Basic Education in Thailand at the time of the data being collected. The number of English learning



hours per week they take in class may vary depending on students' field of study (science or non-science oriented).

### **1.2.3 Types of secondary schools**

The schools under the jurisdiction of the Commission on Basic Education are classified into two types according to the National Education Act 2002: public schools under the educational administration are managed by 'the government, the state, or the local administration organizations'; and 'private schools' under the educational administration are managed by the private section (The Office of the National Education Commission, 2002).

### **1.2.4 Field of study**

In this study, 'field of study' refers to Science field, Language field, and Social field. It can be generally classified into two broad groups: science-oriented and non science-oriented. The Science field belongs to science-oriented group. The Language field and Social field are grouped into the non science-oriented group.

### **1.2.5 Students' Language Proficiency Levels**

'Students' language proficiency levels' refers to their language proficiency in language learning which was based on the students' test scores on the researcher selected test. The language proficiency test for the present investigation was selected from different existing tests of the standard language proficiency test for the university admissions particularly from the Ordinary National Education Test (O-NET) in English between the academic years 1999 to 2006. The participants' English language proficiency levels have been rated as 'high', 'moderate', or 'low' based on their test scores. The students' test scores have been classified into three groups: high (64 points or more); moderate (50 – 63 points); and low (49 points or less).

### **1.2.6 Extra-Class Support**

‘Extra-class support’ refers to the extra-language class studies which were on offer at many language centres or classes held by their regular teachers outside the regular class time. Any students who have studied in the extra-language class were classified as ‘extra-supported’. If they did not study or attend any extra-language class, they were classified as ‘non extra-supported’.

## **1.3 Research Objectives**

The present investigation aims at identifying what language learning strategies pre-university students in Thailand employ in learning English as a Foreign Language (EFL) and also classifying how five variables, which are students’ gender, field of study, type of school, extra-class support, and level of language proficiency, relate to such learning strategies students employ in learning the English language. To be specific, the purposes of the present investigation are:

1.3.1 To investigate types of language learning strategies which Thai pre-university students, both science-oriented and non science-oriented fields, employ;

1.3.2 To investigate the overall use of language learning strategies that Thai pre-university students employ;

1.3.3 To investigate the relationships between the frequency of students’ use of language learning strategies and these five variables: students’ gender, field of study, type of school, extra-class support, and level of language proficiency; and

1.3.4 To examine patterns of significant variation in the frequency of students’ reports of strategy use at different levels with reference to the five variables mentioned in 1.3.3 above.

## 1.4 The Benefits of the Present Investigation

In Thailand, language learning strategy research has focused on the relationship between factors (e.g., social factors, learners' individual characteristics, motivation, and an educational context, among many others) and how these factors contribute to language learners' decisions to employ their language learning strategies in acquiring the target language. Most of the studies on language learning strategies normally conducted with Thai learners of English as a foreign language (EFL), these research works mostly put the focused on how successful and unsuccessful academic language learners used strategies to learn language (Ounwattana, 2000; and Kaotsombut, 2003). Only a few studies have given attention to a variety of factors such as gender, learning style, learners' perception of the usefulness of strategies, and Field of study that can contribute to learners' language learning strategy use in relation to EFL proficiency (Intaraprasert, 2003).

It is important to work on the exploration of what language learning strategies Thai pre-university students employ in learning English as a foreign language in Thailand and clarifying how the investigated variables (gender, field of study, language proficiency, extra-class support, and types of school programs) relate to the learning strategies that students employ in learning English.

The results obtained and the conclusions may provide some implications for both language teachers and language learners at the secondary level in Thailand. For example, teachers may use the results as a guide to avoid the learning strategies that their students are or are not using, so that this may help teachers develop their teaching styles and pick up the appropriate strategies to serve their students' ways of learning. For EFL learners, the results of this study may help EFL learners to

recognize the strategies they are using and lead them to select more appropriate techniques for learning.

## **1.5 The Outline of the Thesis**

In order to achieve the research objectives, a review of the related past available research and literature about language learning strategies is a starting focus, followed by the research methodology which contributes to the present investigation. This can be found in Chapter 2.

Chapter 2 includes the review of related available literature on language learning strategies and the available research in the field of language learning strategies. This chapter also summarises how language learning strategies have been defined and classified by different researchers, both Thai researchers (e.g. Intaraprasert, 2000, 2002) and foreign researchers (e.g. Stern, 1975, 1992; Rubin, 1975, 1981; Carver, 1984; Ellis and Sinclair, 1989; Oxford, 1990; O'Malley and Chamot, 1990; and Coleman, 1991). Some available research on language learning strategies, conducted both in Thailand and in others countries, than Thailand which contributes to the present investigation is presented.

Chapter 3 focuses on research methodology in language learning strategies which provides the justification of the research methods and the instruments of data collection for the present investigation. It includes three main parts: the sampling and rationale for the choice of participants are discussed in the first part; the methods used for data generation and data collection for the present investigation in the second part; the theoretical framework for the present investigation is presented in the third part;

and the last part of chapter deals with how collected data were analyzed, interpreted, and reported.

Chapter 4 deals with the language learning strategy inventory which emerged from the data obtained through student oral interviews. This chapter starts with an explanation of how the language learning strategy inventory was generated, followed by the language learning strategy inventory with the two main categories reported being employed by Thai pre-university students. The chapter ends with the language learning strategy questionnaire and how to validate it.

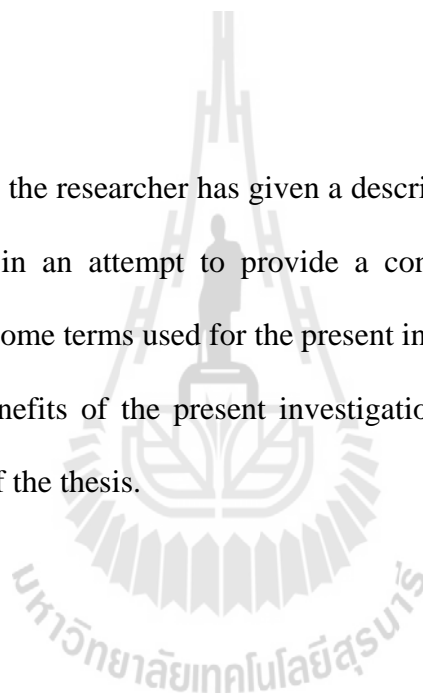
Chapter 5 describes and discusses the research finding of the present investigation at different levels of data analysis. It starts with the overall use of language learning strategies (LLS's) reportedly employed by 1,816 Thai pre-university students, followed by the use of LLS's in two main categories and nine purposes. Then an analysis of the frequency level of strategy use for the individual strategies in each of the two main and nine purposes presented with the mean frequency scores together with standard deviation.

Chapter 6 examines the relationship between language learning strategy use of Thai pre-university students and their gender, their type of school, their field of study, their extra-language class support, and their language proficiency level. This chapter explores variations in students' overall reported language learning strategy use, and students' strategy use in the two main categories. Later the chapter examines the variation of students' individual strategy use for language learning purposes. This chapter ends with the factor analysis and ten extracted factors strongly related to each variable.

Chapter 7 presents the research findings of the present investigation in response to research questions 1-7. This chapter starts with a summary of the research findings and then a discussion of the implications which emerged from the research finding for the teaching and learning of English for pre-university students in Thailand. This is followed by the contributions of the present investigation to related areas. Finally, the limitations of proposals for further research are provided.

## **1.6 Summary**

In this chapter, the researcher has given a description of the background of the present investigation in an attempt to provide a context for the study, which is, followed by defining some terms used for the present investigation. Then, the research objectives and the benefits of the present investigation are presented. This chapter ends with an outline of the thesis.



## **CHAPTER 2**

### **REVIEW OF RELATED LITERATURE AND RESEARCH ON LANGUAGE LEARNING STRATEGIES**

#### **2.1 Introduction and Purpose of the Chapter**

This chapter focuses mainly on a review of related literature in language learning strategies. It starts with a brief discussion of how previous scholars variedly defined and classified language learning strategies. This is followed by a review of related literature and research on language learning strategies that has been conducted in both Thailand and other countries in light of the focal points of the studies, participants, methods of data collection and analyses, and findings and results.

Since the mid-1970s, language learning strategies have been receiving growing attention in the areas of language teaching and learning. Many researchers have been seeking ways to help learners become successful in their efforts to learn the target language. In many of the initial studies in the area of language learning strategies in the mid-seventies, the main purpose was to identify and describe how successful or good language learners deal with their target language learning (e.g., Rubin, 1975; Stern, 1975; and Naiman, Fröhlich, Stern and Todesco, 1978). Since 1980 towards the early 2000s, many researchers in many different contexts in this area paid more attention to how language learners' characteristics relate to their performance (e.g., Ehrman and Oxford, 1989; Oxford and Ehrman, 1995; Yang, 1999; Kyungok, 2003; and Tercanlioglu, 2004).

Many researchers share the point of view that language learning strategy is one method employed to promote greater success for language learners and also to make their learning easier (e.g., Chamot, 1987; 2001; Ehrman and Oxford, 1989; Oxford, 1990). Language learning strategies are used with the explicit goal of helping learners improve their knowledge and understanding of the target language. They are conscious thoughts and behaviours used by students to facilitate language learning tasks and to personalize the language learning process.

What follows is a summary of the definition of language learning strategies which have been proposed by twelve researchers, including Stern (1983); Ellis (1985); Chamot (1987); Ehrman and Oxford (1989); O'Malley and Chamot (1990); Oxford (1990); Allwright and Bailey (1991); Nunan (1991); Richards and Lockhart (1994); Ellis (1997); Cohen (1998); and Chamot (2001).

## **2.2 Definition of Language Learning Strategies**

Learning strategies have become one of the main topics for classroom research (Gu, 2003; and Reinders, 2004). There have been several attempts to define the term 'learning strategies', since this term is mentioned in language teaching and learning. According to Ellis (1994), trying to list the main characteristics is one of the best approaches to define language learning strategies. Therefore, reviewing some of the available well known definitions of language learning strategies is one way to provide a clear understanding of this term. A list of the sample definitions is provided below:

- Stern (1983, p. 405) defines learning strategies as 'particular forms of observable learning behavior, more or less consciously employed by the learner.'



- Ellis (1985, p. 166) sees learning strategies as ‘plans for controlling the order in which a sequence of operations is to be performed.’
- Chamot (1987, p. 71) defines learning strategies as ‘techniques, approaches, or deliberate actions that students take in order to facilitate the learning and recall of both linguistic and content area information.’
- Ehrman and Oxford (1989, p. 1) offer the definition of learning strategies as ‘steps taken to facilitate acquisition, storage, retrieval, and use of information.’
- O’Malley and Chamot (1990, p. 1) see learning strategies as ‘the special thoughts or behaviors that individuals use to help them comprehend, learn, or retain new information.’
- Oxford (1990, p. 8) defines learning strategies as ‘specific actions taken by the learner to make learning easier, faster, more enjoyable, more self-directed, and more transferable to new situations.’
- Allwright and Bailey (1991, p. 141) see learning strategies as ‘action learners take to try to master the target language.’
- Nunan (1991, p. 168) offers the definition of learning strategies as ‘the mental processes which learners employ to learn and use the target language.’
- Richards and Lockhart (1994, p. 63) define learning strategies as ‘the specific procedures learners use with individual learning tasks.’
- Ellis (1997, pp. 76-77) sees learning strategies as ‘particular approaches or techniques that learners employ to try to learn L2. They can be behavioral (for example, repeating new words aloud to help you

remember them) or they can be mental (for example, using the linguistic or situational context to infer the meaning of a new word).’

- Cohen (1998, p. 25) defines learning strategies as ‘learning processes which are consciously selected by the learner. The element of choice is important here because this is what gives a strategy its special character. There are also motives which the learner is at least partially aware of, even if full attention is not being given to them.’
- Chamot (2001, p. 25) defines learning strategies as ‘the techniques or procedures that facilitate a learning task.’

The set of sample definitions of language learning strategies above indicates that the goal of using learning strategies is quite similar. Some scholars, namely, Chamot (1987, 2001), Ehrman and Oxford (1989), and Oxford (1990), see that learning strategies are used to make their learning easier. Although the rest of the scholars do not focus on learning strategies as a learning facilitator, they emphasize a similar goal, that learning strategies are used to help the learners master or use the target language. Nevertheless, the purpose of this part is to indicate some subjectivity and to highlight the difficulties in defining the term of ‘language learning strategies’ as the following:

- **Language learning strategies as observable behaviours/techniques or mental processes**

From sample definitions above, according to Intaraprasert (2000) it can be seen that there is some overlap between whether language learning strategies are perceived as observable behaviours or as mental processes that are unobservable

behaviours, or as both. For example, Chamot (1987; 2001), Ehrman and Oxford (1989), and Oxford (1990), see learning strategies as techniques that are observable behaviours, whereas Nunan (1991) sees them as mental processes that are unobservable behaviours. However, Ellis (1997) and O'Malley and Chamot (1990) see learning strategies as both techniques and mental processes.

- **Language learning strategies as conscious or unconscious**

Referring to the definitions of language learning strategies above, it can be seen that there are some different points of view as to whether language-learning strategies are conscious or unconscious. Stern (1983), Oxford (1990), Allwright and Bailey (1991), and Cohen (1998), see that language learning strategies are indicated as the specific behaviours and thoughts taken by learners and must be consciously undertaken in order to be termed to be strategies, while Nunan (1991) refers to language learning strategies as unconscious.

- **Different terms referred to as language learning strategies**

According to Intaraprasert (2000) each researcher may use different words when they refer to strategies. The term “strategies” has been used to refer both to general approaches and to specific actions or techniques used to learn a second language. For example, they have been described as ‘the special thoughts or behaviours’ (O'Malley and Chamot 1990); ‘technique’ (Chamot 2001); ‘procedures’ (Richards and Lockhart 1994; Ellis 1997; Chamot, 2001); ‘moves’ (Cohen 1998); and ‘action’ (Allwright and Bailey 1991).

To sum up, based on a review of the definitions of language learning strategies provided by other scholars, it can be concluded that the main characteristics of language learning strategies are that they:

- facilitate learning;
- are employed to learn and use the target language;
- are techniques for learning the target language;
- are either conscious or unconscious;
- are procedures, operations or steps used for learning the target language.

In conclusion, different scholars in different contexts, employing different subjects, attempt to define the term 'learning strategies' as processes which help learners to achieve the target language. Language learning strategies may refer to conscious behaviours, which lead to learning actions that can be either observable (behaviours or techniques) or unobservable (mental processes). From these definitions of language learning strategies above, it seems that there is now a greater emphasis on the processes and the characteristics of language learning strategies. At the same time, language learning strategies refer more broadly to "learners' natural, habitual, and preferred way(s) of absorbing, processing, and retaining new information and skills" (Reid, 1995, p. 8), though there appears to be an obvious relationship between one's language learning style and his or her usual or preferred language learning strategies.

### **2.3 Classifications of Language Learning Strategies**

One of the problems that researchers in the field of language learning strategy usually encounter is how to classify language learning strategies. This is because different researchers have their own criteria and systems to classify language learning strategies (Ellis, 1994 and Cohen, 1998). Some researchers make the classification of

language learning strategies based on their personal experiences (e.g. Stern, 1992), while others use reviews of the research of other researchers (e.g. Rubin, 1975, Carver, 1984, Ellis and Sinclair, 1989, and Stern, 1992) or from their own language learning strategy investigations (e.g., Stern, 1992, O'Malley and Chamot, 1990, Oxford, 1990, Intaraprasert, 2000).

What follows is a summary of the classifications of language learning strategies which have been proposed by nine researchers, including Stern (1975; 1992); Rubin (1975; 1981); Carver (1984); Ellis and Sinclair (1989); Oxford (1990); O'Malley and Chamot (1990); Coleman (1991); Intaraprasert (2000); and Prakongchati (2007).

### **2.3.1 Language Learning Strategy Classification by Stern (1975, pp. 304-318; 1992, pp. 262-266)**

Stern (1975; 1992) has drawn up a list of ten strategies of good language learners. The ten strategies of good language learners proposed by Stern (1975, pp. 304-318) are as follows:

1. Planning strategy  
e.g. a personal learning style or positive learning strategies
2. Active strategy  
e.g. an active approach to the learning task and empathy with its speakers
3. Empathetic strategy  
e.g. a tolerant and outgoing approach to the target language
4. Experimental strategy  
e.g. a methodical but flexible approach, developing the new language into an ordered system and constantly revising it

5. Formal strategy  
e.g. technical know how of how to tackle a language
6. Semantic strategy  
e.g. constant searching for meaning
7. Practice strategy  
e.g. willingness to practice
8. Communication strategy  
e.g. willingness to use the language in the real communication
9. Monitoring strategy  
e.g. self-monitoring and critical sensitivity to language use
10. Internalization strategy  
e.g. developing L2 more and more as separate reference system and learning to think in it

In 1992, Stern reclassified the list of ten strategies of good language learners into five main categories which good language learners are likely to employ in order to improve their effective language learning. The new classification includes:

1. Management and planning strategy  
e.g. learner's intention to direct one's own learning
2. Cognitive strategy  
e.g. problem solving that requires direct analysis and transformation
3. Communicative strategy  
e.g. techniques used to keep conversation going
4. Interpersonal strategy  
e.g. self-monitoring
5. Affective strategy  
e.g. influence of attitudes, emotions, and personality

### **2.3.2 Language Learning Strategy Classification by Rubin (1975, pp. 41-50; 1981, pp. 117-131)**

Rubin is one of the researchers who has proposed a classification of language learning strategies. She has divided her classification into two main parts: direct strategies and indirect strategies. The direct strategies consist of six sub-strategies which may contribute to the process of language learning directly. The indirect strategies consist of two sub-strategies; these two types of indirect strategies may contribute indirectly to the process of language learning. Her classification of strategies is based on psychological characteristics (e.g. tolerance for ambiguity and empathy among others). Moreover, it seems that most of the strategies tend to include communication strategies for both formal and informal language learning both inside and outside the classroom. A list of the sub-direct strategies and sub-indirect strategies are provided below.

1. Direct strategies consist of six sub-strategies as follows:
  - a. Classification/verification
    - e.g. asking for an example of how to use a particular word
  - b. Guessing/inductive inference
    - e.g. using clues from other items in the sentence, phrase, or key words
  - c. Deductive reasoning
    - e.g. inferring grammatical rules by analogy, or grouping words in a sentence to guess
  - d. Practice
    - e.g. experimenting with new words in isolation and context, or using mirror for practice
  - e. Memorization
    - e.g. taking notes of new items with or without texts

f. Monitoring

e.g. correcting error in own/other's pronunciation, vocabulary, spelling, and style

2. Indirect strategy consists of two sub-strategies as follows:

a. Create opportunities for practice

e.g. initiating conversation with fellow student/teacher/native speaker or creating situation with natives in order to verify/test/practice

b. Production tricks

e.g. related to communication focus/drive, opportunity for exposure, e.g. using circumlocution and paraphrase to get message across

**2.3.3 Language Learning Strategy Classification by Carver (1984, pp. 123-131)**

Carver (1984) has proposed four categories for the classification of language learning strategies based on the research work of Selinker (1978) and Tarone (1978; 1980). In his paper, Carver designates the plan strategies, or so-called specific learner strategies which learners tend to usually employed when they learn languages. His language learning classification can be divided as follows:

1. Strategies for coping with target language rules

e.g. generalization, transfer from first language and reinterpretation

2. Strategies for receiving performance

e.g. inferring from probability, checking by asking for repetition and simplification

3. Strategies for producing performance

e.g. repeating sentences or key elements oneself

4. Strategies for organising learning

e.g. contacting with teachers or peers



In addition, Carver suggests that learner strategies are either overt or covert behaviours, conscious or unconscious, arising directly from individual learning style and work habits.

#### **2.3.4 Language Learning Strategy Classification by Ellis and Sinclair (1989, pp. 151-154)**

Based on the work of O'Malley et al (1985), Ellis and Sinclair (1989) have divided their classification of language learning strategies into four categories as follows:

- a. Metacognitive strategies
  - e.g. advance organization, advance preparation, and self-reinforcement
- b. Cognitive strategies
  - e.g. repetition, translation, key word memorization, knowledge transfer, inferencing, and question for clarification
- c. Social strategies
  - e.g. cooperative learning with other students and teachers
- d. Communicative strategies
  - e.g. sharing ideas with other students and teachers

#### **2.3.5 Language Learning Strategy Classification by Oxford (1990, p. 17)**

Oxford (1990) classifies language learning strategies into two main parts: direct strategies and indirect strategies in line with Rubin's classification (1981). However, in Oxford's classification, direct and indirect strategies consist of three sub-strategies which differ from Rubin's classifications (1981). The direct strategies consist of memory strategies, which help learners to retrieve new information; cognitive strategies, which learners use to understand and to produce a language; and compensation strategies, which learners use to continue the communication when they come across knowledge gaps of the target language. The indirect strategies consist of

metacognitive strategies, which help learners to control their learning; affective strategies, which help learners to regulate their emotions, attitudes, and motivations; and social strategies, which lead learners to increase their interaction with other people in the target language. Oxford (1990) proposes the categories of language learning strategies based on questionnaire data. A list of the sub-direct strategies and sub-indirect strategies are provided below.

1. Direct strategies:
  - a. Memory strategies
    - e.g. creating mental linkages such as grouping, rhyming, associating and structured
  - b. Cognitive strategies
    - e.g. practicing such as analysing and summarizing
  - c. Compensation strategies
    - e.g. guessing intelligently such as using synonyms and gestures to convey the meaning when the precise expression is unknown
2. Indirect strategies:
  - a. Metacognitive strategies
    - e.g. centering your learning such as paying attention or consciously searching for practice opportunities
  - b. Affective strategies
    - e.g. anxiety reduction such as deep breathing
  - c. Social strategies
    - e.g. interaction with others such as asking question for clarification

### **2.3.6 Language Learning Strategy Classification by O'Malley and Chamot (1990, pp. 137-139)**

O'Malley and Chamot (1990) classify language learning strategies into three main categories: metacognitive strategies; cognitive strategies; and social/affective strategies, based on research on the use of learning strategies in second language

learning acquisition and learning. Metacognitive strategies, in which learners make use of their knowledge about cognitive processes in order to plan, monitor, and evaluate their language learning. Cognitive strategies employ the application of materials to enhance comprehension and acquisition. Social/affective strategies suggest the learners' interaction with other learners and native speakers. O'Malley and Chamot propose the three categories of language learning strategies based on the students' interview data. The three categories of language learning strategies are provided below.

- a. Metacognitive strategies
  - e.g. self-management, self-monitoring, and self-evaluation of learning
- b. Cognitive strategies
  - e.g. repetition such as repeating a key word
- c. Social/Affective strategies
  - e.g. cooperation, questioning for clarification

### **2.3.7 Language Learning Strategy Classification by Coleman (1991, pp. 48-50)**

Coleman (1991) has another way to classify language learning strategies. He classifies the learning strategies in the class setting, particularly in the setting of large classes. He proposes this classification by using preliminary data provided by his small-scale investigation. The list of strategies in his classification was provided by approximately 40 Thai university lecturers. All of these lecturers produced a list of 77 learning strategies and the obtained data were classified under 18 strategies types. These strategies were grouped into three broad categories as follows:

- 1. Strategies related to the taught programme
  - a. before the class
    - e.g. preparing the lesson before coming to class

- b. in the class
  - e.g. paying attention or asking questions
- c. after class
  - e.g. contacting the teacher and asking questions
- 2. Strategies which are extra to the class
  - e.g. mixing with English speakers or using media
- 3. Strategies which are termed as ‘bucking the system’
  - e.g. finding privileged information or sitting near bright students

### **2.3.8 Language Learning Strategy Classification by Intaraprasert (2000, pp. 233-234)**

Intaraprasert (2000) has a different way from other researchers to classify language-learning strategies. He compiles his own language learning strategy inventory according to *the purposes for which they were employed* (2002) or *their being used in order to achieve particular language learning purposes, either classroom-related or classroom independent* (2000). Intaraprasert (2000) proposed two main categories of language learning strategies: category 1, the classroom-related category, consisting of seven purposes and twenty-nine individual learning strategies that students reported trying to achieve; and category 2, the classroom-independent category, consisting of five purposes and twenty individual learning strategies that students employed to enhance and also improve their learning skills. A list of the two main categories of language learning strategies is provided as follows:

#### **1. Classroom-related category**

##### **CRP 1 To be well-prepared for the lessons**

- Study the lesson beforehand
- Try some exercise in advance
- Prepare oneself physically
- Do the revision of the previous lessons

**CRP 2 To keep up with the teacher while studying in class**

- Listen to the teacher attentively
- Attend the class
- Take notes while studying in class with teacher
- Think to oneself along the line with the teacher

**CRP 3 To get the teacher's attention in the classroom**

- Try to interact with teacher by asking or answering
- Take part in classroom activities
- Try to interact with teacher outside the class time

**CRP 4 To learn new vocabulary for the classroom lessons**

- Memory new vocabulary items with or without the vocabulary lists
- Use a dictionary to check the meaning of a new vocabulary item either in Thai or English
- Guess the meaning of a new vocabulary from the contexts
- Look at the root or the form of new vocabulary items
- Group new vocabulary items according to their similarity in meanings or spellings
- Use new vocabulary items to converse with peers

**CRP 5 To avoid being distracted while studying**

- Try to get a seat in the front row
- Try not to talk with other students while studying
- Sit next to a bright or quiet student
- Try not to pay attention to what other students are doing while studying

**CRP 6 To solve problems encountered in the classroom lessons**

- Ask the teacher in class either immediately or when appropriate
- Ask the teacher after class
- Ask a classmate or classmates either in class or outside class
- Ask people other than one's regular teacher or classmates

**CRP 7 To pass the English tests**

- Do the revision of the lessons only for the examination

- Practise tests from different sources
- Join the tutoring group
- Attend extra-classes

## **2. Classroom-independent category**

### **CIP 1 To expand one's knowledge of English vocabulary and expressions**

- Read print materials in English
- Play games in English
- Watch an English-speaking film
- Listen to English songs

### **CIP 2 To improve one's listening skill**

- Watch an English speaking film
- Listen to English songs or cassette tapes in English conversation
- Listen to a radio programme in English
- Watch TV programmes in English

### **CIP 3 To improve one's speaking skill**

- Talk to oneself
- Try to imitate a native speaker from media
- Converse in English with peers, siblings, or foreigners
- Use a computer programme like 'chat' programme
- Go to a language school

### **CIP 4 To improve one's writing skill**

- Correspond in English by electronic mail (e-mail) or letter
- Practise writing sentences or essays in English
- Practise translating from Thai to English

### **CIP 5 To acquire one's general knowledge in English**

- Seek an opportunity to be exposed to English
- Go to a language school
- Read printed materials in English
- Surf the Internet

### **2.3.9 Language Learning Strategy Classification by Prakongchati (2007, pp. 225-228)**

Apart from the language learning strategy classification systems shown previously, Prakongchati (2007) shows another way to classify learners' language learning strategies. In her study, she generated her own language learning strategy inventory derived from the result of student oral interviews. The reported strategies were classified according to the learners' reported performances and perceptions of acquiring second language learning in the classroom context and a free-time situation. As a result, the inventory includes four main language learning strategy categories, i.e. prepare oneself for classroom lesson, understanding while studying in class, improving one's language skills, and expanding one's general knowledge of English. A list of the two main categories of language learning strategies is provided as follows:

#### **I. Preparing oneself for classroom lessons**

##### **1. Before class**

- Studying the course details before hand
- Preparing oneself physically
- Attempting to attend the class
- Doing revision of the previous lessons

##### **2. After class**

- Reviewing own notes/summary
- Attempting to revise today's lessons
- Doing homework or assignments
- Personally approaching the teacher by asking the teacher for clarification of what is learnt in class
- Practicing what is learned in class with the teacher
- Discussing L2 learning problems with the teacher

## **II. Understanding while study in class**

### **1. Intra-personal interaction**

- Trying to get a seat in the front row
- Avoiding talking with other students while studying
- Taking notes while studying
- Thinking to oneself along with the teacher's instruction
- Trying to understand English by translating into Thai
- Consulting a dictionary

### **2. Inter-personal interaction**

- Asking the teacher for clarification
- Double checking what is learned with friends/classmates
- Joining a language study group
- Choosing to sit near students proficient in L2
- Participating in the classroom activities

## **III. Improving one's language skills**

### **1. Media utilization**

- Reading on-line materials (e.g. news, articles, tale stories, film scripts in English) to improve one's reading skill
- Reading printed materials such as books, magazines, newspapers in English to sharpen reading
- Reading any English-printed resources such as labels on drugs or consumer goods, computer instructions/functions in English to enrich the vocabulary and expressions apart from what one has learned in class
- Contacting with Thai or foreign friends through emails, instant messages (MSN) or SMS texts with computers or mobile phones to improve one's writing skill
- Watching English-speaking films to practice one's listening comprehension without looking at the Thai subtitles
- Watching television programs in English to help one familiar with the accents, tone of voice, and intonations



- Listening to English songs or cassette tapes of English conversations to practice one's listening skill
- Listening to radio programs in English to improve one's listening skill
- Imitating a native speaker from media such as films, songs, cassette tapes, TV shows to practice one's speaking skill

## **2. Non-media utilization**

- Practicing writing with English texts such as poems, greeting cards, or diaries etc.
- Conversing in English with teachers, peers, siblings, or foreigners
- Talking to oneself in English

## **IV. Expanding one's general knowledge of English**

### **1. Media utilization**

- Practicing English with a commercially packaged English program (e.g. TOEFL, IELTS, Follow Me)
- Playing games for vocabulary enrichment such as English crossword puzzles
- Seeking out information in English through surfing the Internet

### **2. Non-media utilization**

- Having extra tutorials (e.g. attending extra classes at private language school, having a personal tutor teaching English at home, taking short English courses abroad)
- Translating English news, song lyrics, poems, etc. into Thai
- Giving tutorials to others like junior students, peers, or siblings
- Having own language learning notebooks
- Using a dictionary for vocabulary enrichment
- Practicing general English with family members

- Joining leisure or social activities to practice and improve English (e.g. joining English Camps, entering singing contests, going to a church on Sunday, etc.)
- Taking job to practice English (e.g. being a local/young guide in the hometowns, working part-time at a restaurant, where there are many foreign customers)

In conclusion, based on the literature review and particularly on the classification above, it can be noticed that different researchers have their own way to classify their own language learning strategies. Another observation based on this classification is that language learning strategies may be grouped into two main categories: strategies related to the inside classroom setting and out-of-class strategies in both formal and informal settings. What follows is a review of related literature and research on language learning strategies that have been conducted in both Thailand and other countries.

## **2.4 A review of previous studies related to language learning strategies conducted in countries other than Thailand**

In the mid-seventies, the main purpose of research in the area of language learning strategies was to identify and describe how and in what ways successful language learners deal with their target language learning (e.g., Rubin, 1975; Stern, 1975; and Naiman, Fröhlich, Stern and Todesco, 1978). Rubin (1975) was one of the earliest researchers in this area who tried to describe types of strategies and find out what good or successful language learners do in order to make them successful language learners. Around the same time as Rubin, Stern (1975) was conducting

another research project which had a similar purpose as Rubin's. However, in his studies, he defines the term strategy in a more specific way than Rubin (1975) defines the term strategy. Naiman, Fröhlich, Stern and Todesco (1978) are also some of the pioneering researchers who tried to describe and identify what successful language learners do when they learn their target languages. The strategies reported to have been used by those good or successful language learners were suggested for poor or unsuccessful language learners to apply themselves when learning a language in order to ensure their success as language learners.

The purpose of this section is to review past research works on language learning strategy carried out by different researchers in different context. What follow are the available research works on language learning strategies conducted in countries other than Thailand.

**Table 2.1** Research on language learning strategies conducted in other countries

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
Quantitative	Ehrman and Oxford (1989)	78 mixed-level EFL students	Overall strategy use	Questionnaire	1.gender 2.career choice 3.personality 4.cognitive style
	<b>Results:</b>	Significant relationships were found between the four variables and success in language learning strategy use and language achievement, and career choice had a major effect on reported language learning strategy use.			
	Yang (1999)	505 university students	Overall strategy use	Questionnaire	Learners' beliefs
	<b>Results:</b>	<ol style="list-style-type: none"> <li>1. Language learners' self-efficacy beliefs about learning English were strongly related to their use of all types of learning strategies, especially functional practice strategies.</li> <li>2. Learners' beliefs about the value and nature of learning spoken English were closely linked to their use of formal oral-practice strategies.</li> </ol>			

**Notes:** **EFL:** stands for English as a Foreign Language; **ESL:** stands for English as a Second Language; **IELTS:** stands for International English Language Testing System; **MBTI-G:** stands for Myers-Briggs Type Indicator, Form G (Chinese version); **TOEFL:** stands for Test of English as a Foreign Language

**Table 2.1 (Cont.)** Research on language learning strategies conducted in other countries

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
Quantitative	Embi et al (2001)	400 secondary students	Overall strategy use	Questionnaire	Language performance
	<b>Results:</b> There is a positive relationship between language learning strategy use and language performance. The high achieving language learners reported greater strategy use than did low-achieving learners.				
	Griffiths (2003)	348 EFL learners at a private language school	Overall strategy use	Questionnaire	1. language proficiency 2. nationality 3. gender 4. age
	<b>Results:</b> Higher level students reported more frequent use of strategies relating to interaction with others; vocabulary, reading; the tolerance of ambiguity; language systems; the management of feelings; the management of learning; and the use of available resources than lower level students.				
	Kyungok (2003)	325 junior high school students	Overall strategy use	Questionnaire	1. gender 2. school year 3. grammar proficiency
<b>Results:</b>					
<ol style="list-style-type: none"> <li>1. The students reported most frequent use of compensation strategies and least of affective strategies.</li> <li>2. Girls showed more frequent use of all six strategy categories than boys.</li> <li>3. The third year students employed compensation and memory strategies more often, whereas first school year students employed metacognitive, cognitive, affective and social strategies more often.</li> </ol>					
El – Dib (2004)	750 college students	Overall strategy use	Questionnaire	1. language proficiency 2. gender	
<b>Results:</b>					
<ol style="list-style-type: none"> <li>1. Significant relationships were found between gender and active naturalistic language use, cognitive-compensatory strategies and repetition-revision strategies.</li> <li>2. Significant relationships were found between language level and active naturalistic strategies and affective strategies.</li> </ol>					
Tercanlioglu (2004)	184 university students	Overall strategy use	Questionnaire	Gender	
<b>Results:</b> The significant relations were found between gender and choice of language learning strategy use.					

**Table 2.1 (Cont.)** Research on language learning strategies conducted in other countries

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
	Nisbet, et al (2005)	168 third year university students	Overall strategy use	1. Questionnaire 2. TOEFL	1. language proficiency 2. gender
	<b>Results:</b> There were no significant differences found between males and females on eight measures (memory, cognitive, compensation, metacognitive, affective, social, total learning strategies, and second language proficiency) of learning strategy preferences and proficiency.				
	Khalil (2005)	378 Palestinian EFL learners	Overall strategy use	Questionnaire	1. language proficiency 2. gender
	<b>Results:</b> The language proficiency level and gender have a significant effect on overall strategy use.				
	Park (2005)	209 high school students	Overall strategy use	Questionnaire	1. language proficiency 2. motivation
Quantitative	<b>Results:</b>				
	<ol style="list-style-type: none"> <li>1. Language proficiency influenced learners' use of language learning strategies.</li> <li>2. A relationship was found between language learning strategy and motivation.</li> </ol>				
	Su (2005)	419 Taiwanese vocational college students	Overall strategy use	Questionnaire	1. language proficiency 2. Self-perceived
	<b>Results:</b> Significant differences were found between students' self-perceived English proficiency level and choice of language learning strategy use.				
	Nam and Leakell (2006)	55 high school students	Overall strategy use	Questionnaire	1. language proficiency 2. motivation
	<b>Results:</b> Students in the intermediate level reported greater use of language learning strategies than beginning and advanced levels. In addition, male students tended to use affective and social strategies less frequently than females.				

**Table 2.1 (Cont.)** Research on language learning strategies conducted in other countries

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
Quantitative	Yang (2007)	461 vocational college students	Learning strategy	Questionnaire	Self-perceived English proficiency
	<b>Results:</b>				
	<ol style="list-style-type: none"> <li>1. Language proficiency influenced learners' use of language learning strategies.</li> <li>2. Ethnicity plays a significant role in the selection of language learning strategies.</li> </ol>				
Quantitative	Qinquan et al. (2008)	184 first year university students in China	Overall strategy use	Questionnaire	Learning style
	<b>Results:</b> Successful language learning students reported more frequent use of learning strategies and used a wider range of language learning strategies than unsuccessful students.				
	<ol style="list-style-type: none"> <li>1. gender</li> <li>2. major</li> <li>3. education level</li> <li>4. English language self-image</li> <li>5. importance of English</li> <li>6. strategy awareness</li> </ol>				
Qualitative and Quantitative	Lee and Oxford (2008)	1,110 middle school, high school, and university students	Perspective on Korean EFL learners' strategy use	Questionnaire	<ol style="list-style-type: none"> <li>1. gender</li> <li>2. major</li> <li>3. education level</li> <li>4. English language self-image</li> <li>5. importance of English</li> <li>6. strategy awareness</li> </ol>
	<b>Results:</b> High proficiency students, who reported English as important and were aware of language learning strategies, employed language learning strategies more frequency than those who did not.				
	<ol style="list-style-type: none"> <li>1. Difference in strategy use</li> <li>2. Strategy used by good language learners</li> <li>3. Intensity of strategy use</li> </ol>				
Qualitative and Quantitative	Lengkanawati (2004)	170 university students and EFL students learning in Indonesia	<ol style="list-style-type: none"> <li>1. Difference in strategy use</li> <li>2. Strategy used by good language learners</li> <li>3. Intensity of strategy use</li> </ol>	<ol style="list-style-type: none"> <li>1. Interview</li> <li>2. Observation</li> <li>3. Questionnaire</li> </ol>	<ol style="list-style-type: none"> <li>1. Language proficiency</li> <li>2. Cultural background</li> </ol>
	<b>Results:</b> Memory, meta-cognitive, and affective strategies were more frequently used by EFL students in Indonesia than by IFL students in Australia.				

**Table 2.1 (Cont.)** Research on language learning strategies conducted in other countries

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
	<b>Griffiths and Jordan (2005)</b>	29 international students studying IELTS in a private tertiary institution	Overall strategy use by successful and successful in IELTS students	1. Questionnaire 2. Interview	Language achievement
		<b>Results:</b> Students who are more successful in IELTS reported more frequency of strategy use to develop their language skills than students who are less successful.			
<b>Qualitative and Quantitative</b>	<b>Woodrow (2005)</b>	275 EFL learner	Overall strategy use	1. Questionnaire 2. Interview	Language performance
		<b>Results:</b> There were three types of language learning strategies relevant to this study: cognitive, metacognitive, and social language learning strategies.			
	<b>Li and Qin (2006)</b>	187 second-year undergraduate university students	Overall strategy use	1. MBTI-G (Chinese version) 2. Questionnaire 3. Interviews	Learning style
		<b>Results:</b> The learning styles have a significant influence on learners' learning strategy choices. Learning style affected learners' learning strategy choices			

Since 1980 towards the early 2000s, many researchers paid more attention to how learner differences influence language learning strategy use and language achievement. Some of the research which has been carried out in this area mostly has an emphasis on how language learners' characteristics relate to their performance (Ehrman and Oxford, 1989; Oxford and Ehrman, 1995; Yang, 1999; Kyungok, 2003; and Tercanlioglu, 2004). However, some language researchers continuously work on the achievement of successful language learners (O'Malley et al, 1985; Embi, 2001;

Griffiths, 2003; Woodrow, 2005; Nisbet et al, 2005; and Griffiths and Jordan, 2005), and have attempted to investigate the relationship between language learning strategies and success in language development by speakers of other languages. For example, the study from O'Malley et al (1985) discovered that higher-level students reported greater use of metacognitive strategies, leading the researchers to conclude that the more successful students are probably able to exercise greater metacognitive control over their learning.

In 2001, Embi, Long, and Hamzah used a self-report Strategy Questionnaire developed by Embi (1996) to investigate the relationship between language learning success and language learning strategy use by 400 secondary students who study at fourth level (form 4) from three secondary schools in Selangor in Malaysia. The results of this study indicated that there is a positive relationship between language learning strategy use and language performance. The more successful language learners (i.e. high achievers) reported greater strategy use than did less successful learners (i.e. low-achievers).

Griffiths (2003) also studies a correlation between course level and reported frequency of language learning strategy use by 348 students in a private language school in New Zealand. In the study, Griffiths found that language learning strategies were reportedly used significantly more frequently by advanced students than by elementary students. According to the examination of the patterns of language learning strategy use which emerged from the data, higher level students reported highly frequent use of strategies relating to interaction with others; vocabulary, reading; the tolerance of ambiguity; language systems; the management of feelings; the management of learning; and the use of available resources than lower level students.



In 2005, Woodrow used Schmidt and Watanabe's (2001) language learning strategies subscales and short semi-structured interview to investigate the relationship between language learning strategies and English language performance of 275 students studying advanced English for academic purposes at a language center in Australia. With the result that researchers indicated that there are three types of language learning strategies relevant to this study; cognitive, metacognitive, and social language learning strategies. The results from the study mentioned that a Likert-type scale is not appropriate for measuring language learning strategies.

Another study carried out by Nisbet, Tindall, and Arroyo (2005), used Oxford's Strategy Inventory for Language Learning (SILL) and an Institutional Version of the Test of English as a Foreign Language (Institutional Testing Program for English Proficiency (TOEFL-ITP)) to investigate the relationship between language learning strategies preferences and English proficiency of 168 third year English major students at Henan University in Kaifeng, China. The results indicated no significant differences between males and females on eight measures (memory, cognitive, compensation, metacognitive, affective, social, total learning strategies, and second language proficiency) of learning strategy preferences and proficiency.

Griffiths and Jordan (2005) used two research instruments: a questionnaire by Oxford (1990) and Cohen and Chi (2002) and also includes items suggested by students in the course of the study by Griffiths (2003b) and an interview schedule, to investigate the strategies used by 29 international students studying in IELTS preparation classes in a private tertiary institution in Auckland, New Zealand in the process of developing the language skills needed in order to be successful in international examinations. The results indicated that students who were more

successful in IELTS reported more frequency of strategy use to develop their language skills than students who were less successful.

In 2006, Nam and Leavell, used Oxford's Strategy Inventory for Language Learning (SILL) and an Individual Background Questionnaire to investigate the relationship between language learning strategy use and second language proficiency of 55 ESL students, focusing on differences in strategy use across gender and nationality. The results indicated that students in the intermediate level reported more use of language learning strategies than beginning and advanced levels. Also male students tended to use affective and social strategies less frequency than females.

Another study carried out by Qingquan, Chatupote, and Teo (2008), was conducted quantitatively to look at the differences in the frequency of language learning strategy used by successful and unsuccessful first-year students in a Chinese University. To collect the data in this study, The Oxford's Strategy Inventory for Language Learning (SILL, version 7.0) was adopted by researchers. The findings showed that successful language learning students reported more frequency use of learning strategies and used a wider range of language learning strategy than unsuccessful students.

In 2008, Lee and Oxford used Oxford's Strategy Inventory for Language Learning (SILL) and an Individual Background Questionnaire to look at the main effects or interactions of gender, major, education level, English learning self-image, importance of English, and strategy awareness on strategy use. The results indicated that high proficiency students who reported English as important and were aware of language learning strategy employed language learning strategies more frequency than those who did not.

It is commonly found that researchers have paid more attention to good language learners, but other researchers have also been aware that there is much to be learnt by observation of what unsuccessful language learners do and recommendations of what unsuccessful learners should try to avoid. For example, an observation made by Porte (1988) who studied the analysis of structured interviews of fifteen under-achieving learners in private language schools in London. After interviewing, Porte came to a quite interesting conclusion that these under-achieving students in fact used very similar strategies to those used by successful language learners. The difference seemed to be not so much in which strategies were used, but in the fact that they reveal a less appropriate response to a particular activity.

## **2.5 A review of previous studies on language learning strategies conducted in Thailand**

In Thailand, studies on language learning strategies mostly put the focus on how successful and unsuccessful language learners use strategies to learn language (Ounwattana, 2000; and Kaotsombut, 2003). Few studies focus on the relationship between factors such as English language ability levels, gender, field of study, and English language experience and language learners' use of language learning strategies (Intaraprasert, 2000). Many Thai researchers use only quantitative data collection methods on their studies (Rattanaprucks, 1990; Lappayawichit, 1998; Ounwattana, 2000; Phringphro, 2002; and Intaraprasert, 2003), while others used both quantitative and qualitative (Intaraprasert, 2000; and Kaotsombut, 2003). What follow are the available research works on language learning strategies conducted in Thailand.

**Table 2.2** Research on language learning strategies conducted in Thailand

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
	<b>Rattanaprucks (1990)</b>	3 outstanding medical students	Strategy use by good language learner	1. Interview 2. Questionnaire	Language proficiency
	<b>Results:</b> Medical students reported a high frequency of use of certain strategies such as ask teacher or classmates to solve the problems encountered in the classroom lessons, guess the meaning of unknown word from the context and check the answers which provided by the teacher.				
	<b>Lappayawichit (1998)</b>	140 university students	Strategy use by good and poor language learner	Questionnaire	Language proficiency
	<b>Results:</b> High English achievement students used language-learning strategies more frequently than low achievement students.				
<b>Quantitative</b>		186 undergraduate students majoring in accounting for a certificate of vocational education	Speaking and writing strategies	Questionnaire	Speaking and writing proficiency
	<b>Ounwattana (2000)</b>				
	<b>Results:</b> Significant relationship found in her participants' English speaking and writing abilities.				
	<b>Phringphro (2002)</b>	10 lower secondary school students	Type of learning strategy and writing strategies	1. a behavioral observation form 2. a checklist	Students in English classes with task-based controlled writing activities
	<b>Results:</b> The strategies most employed by students were self-control monitoring, cooperating with other students, and asking for correction. Literal translation, repetition, and language transfer were reported as the most employed in writing strategies.				

**Table 2.2 (Cont.)** Research on language learning strategies conducted in Thailand

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
Quantitative	Intaraprasert (2003)	488 university students	Overall strategy use	Questionnaire	1. gender
					2. field of study
Quantitative	Intaraprasert (2000)	570 university students	Overall strategy use by good and poor language learner	1. Interview 2. Questionnaire	3. English learning experience
					4. English proficiency
Quantitative and Qualitative	Kaotsombut (2003)	39 university students	Strategy use by good and poor language learner	1. Interview 2. Questionnaire	5. Location of institution
					English Proficiency
<p><b>Results:</b></p> <ol style="list-style-type: none"> <li>1. These language learners reported medium frequency of use of out of class language learning strategies.</li> <li>2. The frequency of overall use of individual out of class language learning strategies varied significantly with reference to students' perception of English language ability levels.</li> </ol>					
<p><b>Results:</b></p> <ol style="list-style-type: none"> <li>1. Thai engineering students, on the whole, reported medium frequency of strategy use.</li> <li>2. The frequency of students' overall reported use of strategies varied significantly with reference to type of institution and language proficiency levels.</li> </ol>					
<p><b>Results:</b> The participants in this study, on the whole, agreed that they used all six different types of language learning strategies: compensation, metacognitive, social, affective, and memory strategies according to the Oxford's (1990) classification.</p>					

**Table 2.2 (Cont.)** Research on language learning strategies conducted in Thailand

Data Collection Method(s)	Researcher(s)	Participant(s)	Study Focus(es)	Instrument(s)	Investigated Variable(s)
Quantitative and Qualitative	Prakongchati (2007)	1,134 Thai public university students	Overall strategy use	1. Interview 2. Questionnaire	1. gender 2. self-rated proficiency levels 3. language learning experiences 4. field of study 5. type of academic programs
<p><b>Results:</b> The frequency of students' overall reported use of strategies varied significantly with reference to language, gender, language learning experiences, field of study, type of academic programs, and proficiency levels.</p>					

At the beginning of 1990s, Rattanaprucks (1990) used a quantitative data collection method (questionnaire) to investigate the use of language learning strategies of medical students at Chulalongkhon University. The findings revealed that medical students reported a high frequency of use of certain strategies such as ask teacher or classmates, guess the meaning of unknown word from the context and check the answers which provided by the teacher. These were high frequency of use strategies for the problems encountered in the classroom.

In 1998, Lappayawichit studied language-learning strategies used by successful and unsuccessful first year arts students at Chulalongkorn University. Quantitative data were gathered by a learning strategy questionnaire, which was adapted from Oxford's 80 item Strategy Inventory for Language Learning (SILL). The results indicated that high English achievement students used language-learning strategies more frequently than low achievement students.

Another study was carried out at the beginning of the 2000s by Ounwattana (2000), who used a quantitative data collection method to investigate the language learning strategies employed by 186 successful and unsuccessful undergraduate students majoring in accounting for a certificate of vocational education. This study mainly focused on the relationships between English productive skills such as language speaking and writing abilities and the choice of language learning strategies. Two research instruments were employed to collect the data: Oxford's 80-item Strategy Inventory for Language Learning (SILL) (Oxford, 1990) and the English Language speaking and writing tests constructed by the researcher. With her findings, she reported that significant relationship found in her participants' English speaking and writing abilities.

Intaraprasert (2000) used both quantitative and qualitative data collection methods, interview and questionnaire as the main instruments. The study aimed to classify the relationships between factors (English language ability levels, gender, class size, type of institution, and location of institution) and language learners' use of language learning strategies. To collect the data in his study, he designed his own questionnaire and distributed the questionnaire to 570 engineering students. According to his results, Thai engineering students reported medium frequency of strategy use. The results of data analysis also demonstrated that the frequency of students' overall reported use of strategies varied significantly with reference to type of institution and language proficiency levels.

Two years later, Phringphro (2002), conducted a study aimed to investigate the types of learning and writing strategies developed by 10 lower secondary school students in English classes with task-based controlled writing activities. The subjects

were selected through a purposive random sampling method. In this research work, parallel and descriptive writing tasks were used as teaching models. To collect the data, two research instruments were employed: a behavioral observation form was put to use to gather students' learning strategies during the experiment; and a checklist was used in investigating students' writing strategies. With his findings, he reported that students were motivated to employ nine learning strategies during parallel writing tasks and seven learning strategies in descriptive tasks. The strategies most employed by students were self-control monitoring, cooperating with other students, and asking for correction. Literal translation, repetition, and language transfer were reported as the most employed in writing strategies.

In 2003, Intarapraserit conducted a quantitative study to look into the relationships between factors (English language ability levels, gender, field of study, and English language learning experiences) and language learners' use of language learning strategies by 488 students undertaking English for Science and Technology course at Suranaree University of Technology. To collect the data in his study, he employed his own questionnaire and distributed the questionnaire to 488 students who studied various fields: engineering, agriculture, public health, and information technology. The findings showed that these language learners reported medium frequency of use of out of class language learning strategies. The results of data analysis demonstrated that frequency of overall use of individual out of class language learning strategies varied significantly with reference to students' perception of English language ability levels.



Kaotsombut (2003) also used both qualitative and quantitative data methods to integrate the language learning strategies used by 39 successful and unsuccessful graduate students majoring in Microbiology and Biology at Mahidol University. The results from the Placement Test Version II developed by Oxford University (2001) were used to divide the participants into two groups: high English language ability learners and low English language ability learners (all of the participants were required to take the Placement Test Version II). To collect the data, SILL (Oxford, 1990) was distributed to both groups of learners. After that all learners were requested to participate in face-to-face interviews with researcher. With the results, researcher reported that the participants, on the whole, agreed that they used all six different types of language learning strategies: compensation, metacognitive, social, affective, and memory strategies according to the Oxford's (1990) classification.

Prakongchati's (2007) used both quantitative and qualitative data collection methods, interview and questionnaire, as the main instruments to explore overall language learning strategy use of Thai public university freshmen, and to examine the relationships as well as the patterns of variations in the frequency of students' reported language learning strategy use with reference to language proficiency levels, gender, language learning experiences, field of study, and type of academic programs. The results of data analysis also demonstrated that the frequency of students' overall reported use of strategies varied significantly with reference to language, gender, language learning experiences, field of study, type of academic programs, and proficiency levels.

From the literature review of the previous studies on language learning strategies, it can be seen that many Thai researchers used only quantitative data collection methods on their studies (Rattanaprucks, 1990; Lappayawichit, 1998; Ounwattana, 2000; Phringphro, 2002; and Intaraprasert, 2003), while a few researchers used both quantitative and qualitative (Intaraprasert, 2000; and Kaotsombut, 2003). Most of the studies conducted in Thailand have been carried out with university students (Rattanaprucks, 1990; Lappayawichit, 1998; Ounwattana, 2000; Intaraprasert, 2000; Intaraprasert, 2003; Kaotsombut, 2003; and Prakongchati, 2007), while only few studies have completed with students at lower level than university levels (Phringphro, 2002). These studies mainly focus on language learning strategies used by successful and unsuccessful learners. The research instrument used for data collection was a strategy questionnaire (both researchers designed their own questionnaire and the adopted SILL questionnaire from Oxford (1990)) and classroom observation.

In summary, Tables 2.1 and 2.2 shown summarise the analysis of research works on language learning strategies ranging from 1989 up to 2008. These available research works are mainly discussed with regard to the purpose(s) of study, participants of the study, investigated variable(s), instrument(s), and the finding(s). Through an extensive review of the available research works, how the previous researchers conducted the research works on language learning strategies has been presented.

Regarding the participants of the study, the past researchers classified the participants of their investigation into two groups, according to their language they learn, as native speakers of English and non-native speakers of English. The native

speakers of English learn others languages as a foreign language (e.g. Naiman et al., 1978). The non-native speakers of English learn English as a second language (e.g., O'Malley et al., 1985, and Ehrman and Oxford, 1989) or foreign language (e.g., Palestinian (Khalil, 2005); Taiwanese (Yang, 1999); Chinese (Li and Qin, 2006); and Korean (Kyungok, 2003, Park, 2005); Thai (Rattanaprucks, 1990; Lappayawichit, 1998; Ounwattana, 2000; Phringphro, 2002; Intaraprasert 2000, 2003; and Kaotsombut, 2003). The participants of the research studies could also be classified as young learners, adult learners, lower and upper secondary school students, college students, and tertiary level students.

Regarding the research focal point of study can be classified as follows:

- An investigation of the overall strategy use
- An investigation of the strategy use by successful language learners
- An investigation of the strategy use by unsuccessful language learners
- An investigation of other related variables which influence language learning strategies.

Although the research into language learning strategies used by successful and unsuccessful language learners has produced some interesting insights, an alternative approach used by researchers has been to study some of the various factors, such as gender (Ehrman and Oxford, 1989; Ehrman and Oxford, 1990; El – Dib, 2004; Tercanlioglu, 2004; Intaraprasert, 2000; and Prakongchati, 2007), level of learners' proficiency (Liu, 2004; Khalil, 2005; Aiqun, 2005; Rattanaprucks, 1990; Lappayawichit, 1998; Intaraprasert 2000, 2003; Kaotsombut, 2003; and Prakongchati, 2007), different cultural backgrounds (Lengkanawati, 2004), learning style (Ehrman

and Oxford, 1995; and Li and Qin, 2006) and belief about language learning (Yang, 1999) which influence individual students in their choice of learning strategies. However, no research work in this area has been carried out to investigate students' use of language learning strategies in relation to types of schools and types of schools programs (field of study).

With regard to the method of data collection of the previous research works, questionnaires, interviews, and classroom observation were found to be employed as the main instruments in data collection. Some researchers, such as Ehrman and Oxford (1989); Yang(1999); Embi et al (2001); Griffiths (2003); Kyungok (2003); El-Dib (2004); Tercanlioglu (2004); Nisbet, et al (2005); Khalil(2005); Park(2005); Su(2005); Nam and Leakell (2006); Yang (2007); Qinquan et al. (2008); Lee and Oxford (2008), have made use of language learning strategy questionnaire for their data collection. Some researchers, Griffiths and Jordan (2005); Woodrow (2005); Li and Qin (2006); Intaraprasert (2000); Kaotsombut (2003); and Prakongchati (2007), have made use of language learning strategy questionnaire and interview for their data collection. Lengkanawati (2004) employed three instruments (language learning strategy questionnaire, interview, and classroom observation) in his study as the methods of data collection.

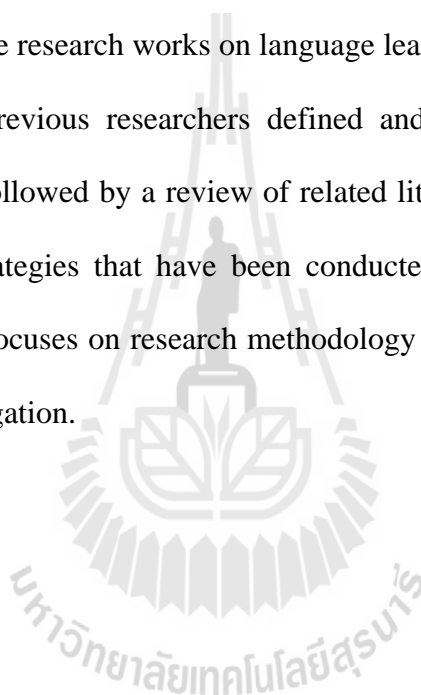
In terms of the data analysis, the Statistical Package for the Social Sciences program (SPSS) was used to analyse the reliability coefficients, descriptive statistics (including means and standard deviations), Pearson correlations, factor analysis, Chi-square and ANOVA.

To sum up, from the review of those studies in the field of language learning strategies, most of the research, but not all, has been done in an academic setting, and

mainly focused on the relationships between language learning strategies. A study of other related factors in different groups of participants, such as at upper secondary school, is needed.

## **2.6 Summary**

This chapter has mainly examined significant aspects of language learning strategies and available research works on language learning strategies. It starts with a discussion on how previous researchers defined and classified language learning strategies. This was followed by a review of related literature and research works on language learning strategies that have been conducted in both Thailand and other countries. Chapter 3 focuses on research methodology and the theoretical framework for the present investigation.



## **CHAPTER 3**

### **RESEARCH METHODOLOGY:**

#### **DESIGN AND METHOD IN STRATEGY RESEARCH**

##### **3.1 Introduction and Purpose of the Chapter**

This chapter comes in four main parts. The background of research methodology in language learning strategies is discussed in the first part. The second part deals with the methods used for data generation and data collection for the present investigation. Then, the theoretical framework for the present investigation is presented. The last part of this paper deals with how data collected were analyzed, interpreted, and reported.

According to Cohen and Manion (2002), and Robson (2002) research purposes and questions are important for researchers to consider before setting a research design. This is because both the research purposes and research questions determine the methodology and design of the research. Regarding the type of research, Robson (1993, p. 42) has proposed three types of research as follows:

- Experiment is appropriate for explanatory studies with the ‘how and why’ type of research question. It concerns the control of variables and events. In this type of research, hypothesis testing is always involved.
- Surveys are appropriate for descriptive studies with the ‘who, what, where, how many, and how much’ type of research question. This type of research is used for collecting data from several groups of people, usually employing questionnaires or interviews.

- Case studies are appropriate for exploratory work with the ‘how and why’ type of research question. This type of research is used for developing detailed, intensive knowledge about a single case or a small number of related cases.

The present study was designed to examine: 1) the overall use of language learning strategies that Thai pre-university students employ; 2) the pattern of the use of language learning strategies employed by Thai pre-university students of different language proficiency i.e. high, moderate, or low; and 3) how the investigated variables including gender, field of study (science and non science-oriented), extra-class support, and types of school (public and private schools) relate to the self-reported use of language learning strategies, if any. According to the characteristics above, the survey study was the most appropriate for the present investigation.

According to Robson (1993; 2002) the purposes of research work may help researchers in selecting the research strategies used. Robson’s (2002, pp. 59-60) classification of the purposes of research work falls into three categories:

- 1) explanatory with “Why....?”, tries to discover why things happen in the way they do,
- 2) exploratory with “How....” is concerned with discovering insights and understanding about how some situations ‘work’, and
- 3) descriptive with “What...?” is to discover, quantify and describe ‘fact’ about some group of people or situation.

According to the characteristics above, the purpose of the present investigation was to look into language learning strategies reported as being employed by Thai students learning English at the pre-university level. It can be classified as exploratory and descriptive. The research design of the present study is basically both qualitative and quantitative. The qualitative research design is appropriate to answer the ‘how’ and ‘why’ research questions, and used for developing detailed, intensive knowledge about a single case. This kind of research design usually employs interviews and/or observations (Robson 1993; 2002). The quantitative research design is appropriate with ‘who’, ‘what’, ‘where’, ‘how many’, and ‘how much’ research questions and used for collecting information in standardized form from groups of people. It usually employs experiments and/or questionnaires (Robson, 1993: 2002).

### **3.2 Methods in language learning strategy research**

When conducting research, the research method is critical. As Robson (1993, p. 38) notes: “the general principle is that the research strategy or strategies, and the methods or techniques employed must be appropriate for the questions you want to answer”. There are many ways which a researcher can use to gather data on what strategies learners reportedly use and also on how learning strategies are employed by language learners (Robson, 1993). The main research methods for language learning strategies include interview, questionnaire, classroom observation, think-aloud, and diaries, however, there is no single research method perfect for gathering data in the field of language learning strategy (Cohen and Scott, 1996) because each research method in this field has both pros and cons (Robson, 1993).



In this section, the main research methods used to gather data on language learning strategies will be discussed. This is followed by the framework of methods for data collection for the present investigation. The main research methods for language learning strategies include: 1) Interview; 2) Questionnaire; 3) Classroom observation; 4) Think-aloud; and 5) Diary studies.

### **1. Interview**

The interview technique has been widely recognized among language practitioner researchers as a means of collecting data for language studies especially in qualitative social research. An interview is selected when interpersonal contact is important and when opportunities for follow up of interesting comments are desired. The interview technique can be considered to be a more acceptable or proper method for speech data collection because it can reflect how respondents will perform in real situations (Nunkoosing, 2005). According to Ellis (1994) interview is one way that researchers can use to investigate students' language learning strategies by asking students to explain and describe what language learning strategies they use and how they use them when dealing with language learning. A student interview calls for retrospective accounts of strategies they have employed.

The use of interviews as a data collection method begins with the assumption that the participants' perspectives are meaningful, knowable, and able to be made explicit, and that their perspectives affect the success of the task (Chamot, 2001). According to Nunan (1992) interviews can be placed on a continuum ranging from unstructured interviews through semi-structured interview to structured interview. In an unstructured interview, researchers exercise little or non control to the interviewee over the interview. In the unstructured interview, the questions asked will be more

likely to be open-ended, with the interviewee providing responses in their own words. The main difficulties with unstructured interviews are that they are time consuming, and also the data collected from different respondents will be different, and therefore not always comparable, and unpredictable (Stimson et al., 2003). In a semi-structured interview, the interviewer has a general idea of what should come out from the interview. Semi-structured interviews are often considered too intensive and demanding to carry out with large numbers of respondents. In a semi-structured interview, the interviewer will have a written set of questions to ensure that the interview covers each of these questions. However, the interviewers do not enter the interview with a lot of planned questions. Structured interviews are used when an interviewer wants more control over the topics and the format of an interview. The interview agenda is planned by the interviewers who ask specific questions in a particular order. Structured interviews work well when the assessment goals are clear (Stimson et al., 2003).

Intaraprasert (2000) states that researchers should consider the nature of the research and the degree of control that they wish to exert before they choose what type of interview will be used as a data collection method. As suggested by Nunan (1992, p. 149), of the three types of interviews, semi-structured seems to be most commonly used among researchers "...because of its flexibility, the semi-structured interview has found favour with many researchers, particularly those working within an interpretative research tradition".

## 2) Questionnaire

“Questionnaires are any written instruments that present respondents with a series of questions or statements to which they are to react either by writing out their answers or selecting from among existing answers” (Dörnyei, 2003, p. 6). In addition, according to Cohen and Scott (1996), written questionnaires are used to elicit learner responses to a set of questions and they require researchers to make choices regarding question format and research procedures. Oxford and Crookall (1989) point out that informants have little or no freedom in providing their own responses to the questions as choices for responses are normally provided. Question items in written questionnaire can be range from those asking ‘yes’ or ‘no’ responses or indications of frequency (e.g. Likert scales) to less structured questionnaire items asking respondents to describe and/or to discuss language learning strategies they employed in more detail.

Oppenheim (1992) states that questionnaires loosely cover postal questionnaires, group or self-administered questionnaires and structured or standard interview schedules (including telephone interviews). It is a self-rating questionnaire in the way of written form. The type of written questionnaire can be an unstructured questionnaire (open-ended form), or a structured questionnaire (closed-ended form) (Nunan 1989). Normally, a closed-ended form of written questionnaire is widely used to collect data because it provides respondents’ convenience and time saving (McKerman, 1996).

Questionnaires can yield three types of data about respondents: factual questions, behavioral questions, attitudinal questions like opinions, beliefs, interests, and values. They are efficient in terms of researcher time, researcher effort and

financial resources (Dörnyei, 2003). In second language research, they have been used mainly in studies of learning styles and strategies, and in research on learners' beliefs, attitudes, and perceptions about second language learning/acquisition (Matsumoto, 1993). Nunan (1992) mentions the advantage of written questionnaire that they enable researchers to collect data in the field setting and the data obtained are more amenable to qualification than those collected through free form field notes, participant observation journals or transcripts of oral language.

However, Dörnyei (2003, pp. 10-14) points out some disadvantages of written questionnaires as follows:

- 1) simplicity and superficiality of answers,
- 2) unreliable and unmotivated respondents,
- 3) respondent literacy problems,
- 4) little or no opportunity to correct the respondents' mistakes,
- 5) social desirability (or prestige) bias,
- 6) self-deception,
- 7) acquiescence bias,
- 8) Halo effect, and
- 9) fatigue effects.

### **3) Classroom observation**

Classroom observation is an important tool in the social sciences (Lofland and Lofland, 1994; and Atkinson and Hammersly, 2003). Classroom observation techniques are methods whereby an observer gathers firsthand data on programs, processes, or behaviors being studied which attempt to identify different language learning strategies by observing learners performing a variety of tasks, normally in

classroom setting (Ellis, 1994). Ellis (1994) also points out that classroom observation method works well with young language learners whose behaviour serves as a good indicator of their mental activity.

Robson (2002) mentions that classroom observations are characterized by the degree of participation and the amount of structure imposed by the researchers. The degree of observer's participation can be classified into four main types: 1) complete observer, not actively involved in what's going on; 2) observer as participant, presents what is being observed, however in this type of observation the observer tries not to influence what is happening; 3) participant as observer, events and interactions become a part of what being observed; and 4) complete participant, full and complete member of the events and interactions being studied. For the amount of researcher control, observation can be divided into two main groups: 1) structured observation, the observers have a schedule of some sort which determines the kinds of events and interactions to be recorded; and 2) unstructured observation, the observers have no predetermined plan of what will be observed or recorded.

Some researchers in the field of language learning strategy study found that classroom observation can identify learning strategies (e.g. Chamot, 2001; Rubin, 1981), while others found that this method cannot provide much information about what language learning strategies that language learners employ (Naiman et al., 1978). In addition, Rubin (1975), Oxford (1990), and Chamot (2001) support Naiman et al. in their thinking that this method is not productive to provide sufficient information about students' use of language learning strategies, especially regarding the information on mental operations.

#### **4) Think-aloud protocols**

Chamot (2001) states that think-aloud protocols involve a one-on-one interview, and Matsumoto (1993, p. 34) defined it as “a verbal-report method of producing concurrent verbalization, think-aloud procedures ask subjects/informants to tell researchers what they are thinking and doing (i.e., everything that comes to mind) while performing a task”. This method has both merits and shortcomings (Faerch and Kasper, 1987; Mann, 1982). The indisputable merit of introspective data is that there is no other way to access learners’ thoughts and perceptions, leaving researchers to only speculate about learners’ mental activities. However, introspective data may be unreliable, as learners vary in their ability both to introspect and to report their thoughts. They also vary in their willingness to do so (Paribakht and Wesche, 1999; de Bot et al., 1997). Because of the above shortcomings, think aloud as a research protocol has been widely criticized (Roskams, 1998).

Therefore, think-aloud protocols method offer more detailed information of the participants while they are doing tasks, but Oxford (1990) points out that this type of method is basically used with one-to-one, takes a great deal of time, reflects strategies related to the task at hand, and learners may not have time to look back on the task and evaluate their performance when the task is complete.

#### **5) Diary studies**

Nunan (1992, p. 118) asserts that descriptive and interpretive research is particularly suited for 'investigating behaviour in context', he also points out that “diaries, logs and journals are important introspective tools in language research,” (1992, p. 118). According to Robson’s (1993, p. 254; 2002, p. 258) definition, a diary, “is a kind of self-administered questionnaire”, it appear to provide the means of

generating data with minimal amount of effort on the part of the enquirer. Diaries can be used in situations where researchers want to capture detailed information about events in people's daily lives or a diary might be used as part of a measurement strategy in an evaluation comparing students' experiences and reactions in a traditional classroom (lecture style) with those in a non-traditional classroom (hands-on, active learning). By keeping a diary, they will capture their experiences in real-time, as opposed to being surveyed at the end of the school year. Porter et al. (1990) point out that a diary in pedagogical perspective, is a valuable pedagogical instrument in itself, for example, "*when teachers ask students to introspect about learning, comment on the class, and communicate about what they are learning, students get more involved in the course and make connections between themselves and the course materials*" (Porter et al. 1990, p. 227) .

However, diaries could be used to supplement other data collection such as a self-report checklist or observation, when participants are asked to keep track of a specific set of activities or events. According to Robson (1993, 2002) combining a diary data collection method with other research methods helps people to notice the specific events that they consider to be important.

Based on the review of the different methods of data collection in the field of language learning strategies, it may be concluded that each researcher has the freedom to choose the method that is suitable for their research purposes as stated in Creswell (2003, p. 12) "individual researchers have a freedom of choice. They are "free" to choose the methods, techniques, and procedures of research that best suit their needs and purposes".

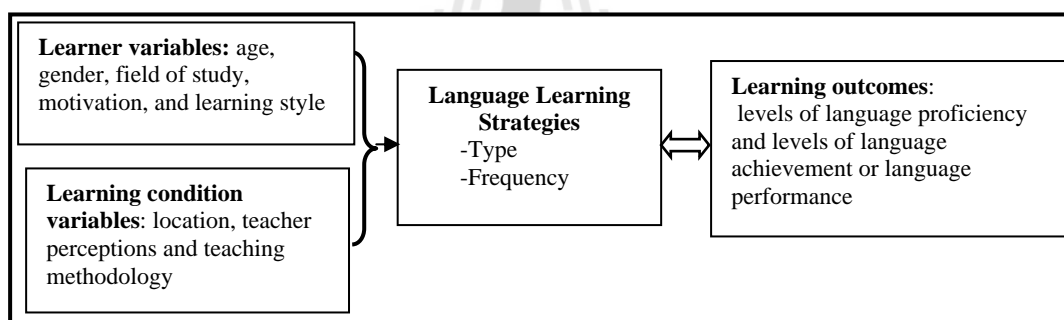
The present investigation aimed to examine what type of language learning strategies were reported being employed by Thai pre-university students. The semi-structured interview and the written language learning strategy questionnaire were adopted for methods of data collection. For the present investigation, the semi-structured interview was used to explore what language learning strategies Thai pre-university students use with reference to the present investigated variables. The reason was that the semi-structured interview is flexible (Nunan, 1992). The written questionnaire has been found to be a useful instrument to collect the data in the survey research and the responses from the questionnaire are easy to analyse (Nunan, 1992). For the present investigation, the questionnaire was used to elicit language learners' responses to a set of questions in order to describe the overall and the pattern of language learning strategies Thai pre-university students use with reference to the investigated variables.

### **3.3 The theoretical framework for the present study**

The main purpose of the previous review of the available research work on language learning strategies in chapter 2 was to find an evidence which would help the researcher develop a theoretical framework, thereby locating the present study in the context of past research. As suggested in Intaraprasert (2000) that the review of the related research work, literature, and other materials in the area of language learning strategies helps researchers to develop their own theoretical framework, locating the present study in the context of past research and the opinion of other researchers, and also creating rationale variables for the study.



The main point of this present investigation focuses on how five independent variables: (gender of students, types of schools, field of study, extra-class support, and levels of language proficiency) related to the students' use of language learning strategies. Before proposing the theoretical framework of the present study in which language learning strategy is examined as a dependent variable influenced by the five independent variables which mentioned before, the theoretical framework based on the empirical past research studies on language learning strategies is presented in order to give a clear picture about what variables affect language learning strategies. Figure 3.1 below shows the theoretical framework based on the empirical research.



(Source: Adapted from Ellis 1994, p. 530)

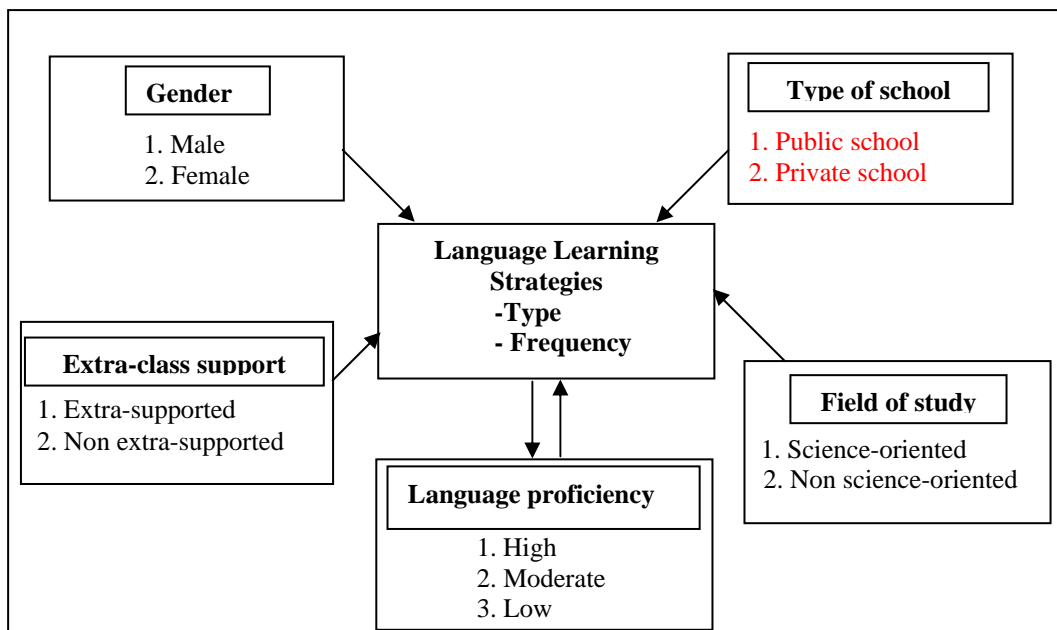
**Figure 3.1** Theoretical Framework based on the empirical research

The theoretical framework, which is based on the related research work, literature, and other materials in the area of language learning strategies, reveals that type of language learning strategies and learners' frequency of language learning strategy use have been hypothesized to be influenced by two main sets of variables: 1) learner variables (e.g., age, gender, field of study, motivation, and learning style); and 2) learning condition variables (e.g., location, teacher perceptions and teaching methodology) in a single-directional relationship. Regarding learning outcomes (i.e.

levels of language proficiency and levels of language achievement), there is a two-directional relationship between learners' language strategy use and the learning outcomes. It can be said that more active use of strategies may indeed be responsible for raising language proficiency levels. In other word, learning strategy use results from learners' language proficiency or learners' language proficiency is results in learning strategy use.

The review of research work on the areas of language learning strategy reveals that there is a variety of variables which are related to learners' use of strategies, and some of these have been investigated by researchers, such as age, gender, motivation, learning style, levels of language proficiency, and levels of language achievement.

As its focus, the present study aims at examining variation in the use of overall strategy use and by looking individually at patterns of variation by gender, extra-class support, type of school, field of study, and language proficiency of Thai pre-university students. From this focus a diagram can be drawn to illuminate the theoretical framework for the present investigation. Figure 3.2 below shows the theoretical framework of the present study.



(Source: Adapted from Intaraprasert 2000, p. 59)

**Figure 3.2** Theoretical Framework of the present study

According to the framework for the present investigation, there are five types of variables (gender, extra-class support, type of school, field of study, and language proficiency) which will be investigated as the variables of learner's choice of language learning strategies in this study. The five types of variables shown in the framework of the present investigation are probably linked with one another as a source of language learning and teaching to take place, and language performance, as stated in Intaraprasert (2000, p. 60), "*is the product which is equally interactive with language learning strategies as a result of the teaching and learning process*". However, some of the variables which have been investigated by other researchers will be investigated again in this present study (e.g. gender, and level of language proficiency) because even using the same variable to investigate the same thing, the results may differ in a different context of investigation. Intaraprasert (2000) points

out that the variables which have been reported as positive relationship, or negative or none relationship with learners' use of strategies, depend on the context. However, there are some variables which do not seem to have been investigated in previous research (e.g. field of study, and type of secondary schools). These kinds of variables were explored in order to find out whether they are related to learners' choice of language learning strategies.

What follow is the discussion of the basic assumptions about the relationship between learners' strategy use and the five variables, based on the theoretical framework, related to literature, and other researchers' point of view, and my justification of the selected variables in the present investigation.

### **3.3.1 Studies investigating factors affecting strategy choice**

This part is a discussion about the relationships between learner's language learning strategy use and the five variables, based on the literature review above. There are two main sections in this part: the variables found to be related to learners' use of language learning strategies in the literature review and the variables not found in the literature review.

#### **3.3.1.1 The variables found to be related to learners' use of language learning strategies in the literature review**

Based on the reviewed literature in the field of language learning strategies, it appears that there is a variety of variables found to be related to learners' language learning strategies use in previous studies as follows:

- 1. Studies which have examined gender as one of the factors in language learning strategy use.**

Studies which have examined the relationship between gender and strategy use have also come to mixed conclusions. Ehrman and Oxford (1989) discovered distinct gender differences in strategy use. Ehrman and Oxford's (1990) study, however, failed to discover any evidence of differing language learning strategy use between the genders. It might be concluded, perhaps, that, although males and females do not always demonstrate differences in language learning strategy use, where differences are found females tend to use more language learning strategies than their male counterparts.

Kyungok (2003) used the Korean translation of the SILL (Oxford's 1990) questionnaire to investigate the relationship between gender, school year, grammar proficiency and the use of language learning strategies of 325 junior high school students in Pusan, Korea. The results of the study indicated that gender of junior high school students had a significant effect on their use of language learning strategies.

One year later, El – Dib (2004) used the Arabic translation of the SILL (Oxford's 1990) questionnaire to investigate the relationship between gender, language level and the use of language learning strategies of 750 students from four segregated colleges: Business, Basic Education, Technology, and Health Sciences of the second leading educational in Kuwait. The results of the study indicated that there were no relationships between gender in using the six a priori categories of the SILL: memory, cognitive, metacognitive, compensatory, affective, and social strategies. The results also indicated that active naturalistic language use was the most variable factor in the SILL.

In 2004, Tercanlioglu also conducted a quantitative study to find out the gender differences in language learning strategies used by 184 EFL university

students in a Turkish University. To collect the data, the participants were asked to complete the Strategy Inventory for Language Learning (SILL), which was only one research instrument in this study. The results of the qualitative data demonstrated significant gender differences, favouring males, in students' language learning strategy use. Male students reported higher use in five of the six scales (remembering more effectively; using all your mental processes; compensating for missing knowledge; organizing and evaluating your learning; and learning with others) while female students reported higher use only one of the six scales (managing your emotions).

## **2. Studies which have examined the level of language proficiency as one of the factors in language learning strategy use**

In 2004, Liu used a Chinese translation of Oxford's (1990) SILL version 7 questionnaires to investigate the effect of proficiency level and gender on frequency of strategy use by 379 EFL English majors at Nanyang Institute of Technology (China). The results of this study indicated that females reported more frequent EFL learning strategy use than males did and all participants reported having medium to high frequency use of each of the six categories of strategy (metacognitive strategies, memory strategies, cognitive strategies, affective strategies, cognitive strategies and social strategies). For the proficiency level, the results indicated that participants who are high proficient learners reported statistically more frequent strategy use than low proficient learners did.

Another study was carried out by Khalil (2005), used an Arabic translation of Oxford's (1990) SILL version 7 questionnaire to investigate language learning strategy use and to explore the effect of proficiency level and gender on frequency of

strategy use by 378 Palestinian EFL learners. The results indicated that learner proficiency level and gender have an effect on frequency of overall strategy use. The researcher reported that gender has an effect on two categories: memory and metacognitive. On the other hand, proficiency level has an effect on memory, compensatory, cognitive, metacognitive, and social strategies. For the individual strategies, the researcher reported that proficiency level and gender have an effect on the individual strategies.

Park (2005) used a Korean translation of Oxford's (1990) SILL questionnaire, motivation survey, and background questionnaire to investigate the relationship between the use of language learning strategies and English language learning motivation and English language proficiency and the use of language learning strategies of 209 high school students in South Korea. The results indicated that motivation and language proficiency level had a significant effect on overall strategy use by Korean high school students. In other words, there is a relationship between motivation and language strategy use and also language proficiency and language learning strategy use.

Aiqun (2005), used a Chinese translation of Oxford's (1990) SILL questionnaire to investigate language learning strategies used by 221 Chinese students and to examine these students' use of strategies in relation to their perceived areas of difficulty in learning English. The results of this study indicated that there are some significant differences between proficiency level and the memory, cognitive and affective categories, and between gender and the compensation category. In addition, students who perceived listening, speaking and vocabulary skills as most difficult reported a lower use of strategies, with the social category showing significant

variation in relation to speaking and listening skills and the memory category showing significant variation in relation to vocabulary learning.

### **3.3.1.2 The variables hypothesised to be related to learners' use of language learning strategies but not found in the past research.**

Through the review of literature and research work on the areas of language learning strategy, it is revealed that there are some variables which do not seem to be examined to find out whether they are related to learners' choice of language learning strategies in previous studies as follows:

#### **1. Students' use of language learning strategies and extra-class support**

In this study, the researcher attempts to identify Thai pre-university learners' use of language learning strategies and extra-class support in terms of extra language learning out of a normal classroom setting, together with the relationship between learners' use of language learning strategies and extra-class support. The present study has been carried out to see whether or not learners who have extra-class support employ differently language learning strategies than learners who do not have extra-class support.

#### **2. Students' use of language learning strategies and field of study in upper secondary school levels**

Areas of study in upper secondary school level in the formal system of basic educational offered by both types of secondary schools: (public schools and private schools) can be classified into two types: science and non-science oriented. The different learning conditions of these two areas may be a basic distinction relating to the choice of learner's language learning strategy use. There has been no research work carried out in order to examine the relationship between this variable and



learner's use of language learning strategies. Therefore, the present study has been carried out to see whether or not this difference has an effect on students' use of language learning strategy.

### **3. Students' use of language learning strategies and type of secondary schools**

In Thailand, secondary schools can be classified into two main types: public schools under the educational ministration and management by the state or the local administration organizations, and private schools under the educational administration and management by the private section.

In this study, the researcher attempts to identify Thai pre-university learners' use of language learning strategies and their type of secondary school, together with the relationship between learners' use of language learning strategies and their type of secondary school. The present study has been carried out to see whether or not this difference has an effect on students' use of language learning strategy.

#### **3.4 Research questions**

According to the research purposes mentioned in the introductory part (Section 3.1), this study focuses on examining the relationship of language learners' learning strategy use and certain related factors including 1) gender, 2) field of study, 3) types of schools, 4) extra-class support, and 5) language proficiency. To frame this study, the relationship among the investigated variables is posed in terms of research questions as follows:

1. What are the types of language learning strategies reported to be employed by Thai pre-university students learning English as a foreign language in Thailand?
2. What is the frequency with which these language learning strategies are reported to be used by these students?
3. Do students' choices of language learning strategies vary significantly with their gender? If they do, what are the main patterns of variation?
4. Do students' choices of language learning strategies vary significantly according to the field of study? If they do, what are the main patterns of variation?
5. Do students' choices of language learning strategies vary significantly according to the types of school? If they do, what are the main patterns of variation?
6. Do students' choices of language learning strategies related to their extra-class support for language learning? If they do, what are the main patterns of variation?
7. Do students' choices of language learning strategies vary significantly according to the language proficiency? If they do, what are the main patterns of variation?

### **3.5 Framework of data collection methods for the present**

#### **investigation**

‘There is no rule that says that only one method must be used in an investigation. Using more than one method in an investigation can have substantial advantages, even though it almost inevitably adds to the time investment required. One important benefit of multiple methods is in the reduction of inappropriate uncertainty. Using a single method and finding a pretty clear-cut result may delude investigators into believing that they have found the right answers’ (Robson, 1993, p. 290).

Creswell (2003, p. 12) states that different researchers have a freedom of choice to choose the methods, techniques, and procedures of research that are more appropriate to their purposes and their needs. In the context of the present investigation, the researcher has carefully decided to use mixed methods of data collection and analysis, termed by researchers as triangulation which is the use of two or more data collection methods to study complex issues and to increase the validity of research findings, as stated in Metz (2000) and Merriam (2002). Based on the idea of triangulation, Creswell (2003) points out that the sequential procedures of strategies associated with the mix methods approach may begin with a qualitative method for exploratory purposes, and follow up quantitatively with a large sample so that results can be generalized to a population.

For the present investigation, two different qualitative and quantitative data collection methods were implemented to gather data: focus group interviews and written questionnaires. Both interviews and questionnaires serve the purposes of this present investigation as they provided a great deal of information about language learning strategies. According to Ellis (1994, p. 534) “a method that has been found to be more successful involves the use of structured interviews and questionnaires, both of which call for retrospective accounts of the strategies learners employ”.

O'Malley and Chamot (1990, p. 88) affirm that questionnaires and guided interviews are used to draw out language learners' broadest range of coverage for strategy use. Focus group interviews, according to Morgan (1997), are unique in that they explicitly call for respondents to interact with one another in formulating responses to interviewers' questions. A potential benefit of the focus group interview is that interviewees may feel greater confidence in a group setting, which may encourage them to offer comments and discuss matters they wouldn't in a one-on-one interview.

Since the present study aimed to explore, describe, and explain types and frequency of use of language learning strategies by Thai pre-university students, the two data collection methods: interview and questionnaire were appropriate for the present investigation.

### **3.6 Methods for data collection**

In collecting data for the present investigation, the focus group interview and written language learning strategy questionnaire were used as the main instruments. Two types of data collection methods were conducted with EFL students in the pre-university level in Thailand. Focus group interviews were conducted in the first phase, and then the language learning strategy questionnaire was used in the second phase of data collection.

#### **3.6.1 Focus group interview**

The focus group interview was used as the main instrument for data collection in the first phase to give access to 'fact' about language learning strategies employed by pre-university students in Thailand. A potential benefit of focus group interview is that interviewees may feel greater confidence in a group setting, which may

encourage them to offer comments and discuss matters they wouldn't in a one-on-one interview. Interviewees may also support or challenge the answers of other members (Morgan, 1997). Further, it helps interviewers to assess interviewees' opinions and enable researchers to have access to the opinions, viewpoints, attitudes, and experiences of individuals (Madriz 2000). The focus group interviews were conducted to provide an opportunity for participants to exchange information among themselves concerning language learning strategies they use in learning EFL both inside and outside classroom.

The data obtained from the focus group interview section was used to generate the language learning strategy questionnaire in order to examine the overall use and patterns of language learning strategy that pre-university students employ in general. The data obtained from the focus group interview could provide information in order to see what type of language learning strategies and how frequently of these language learning strategies were reportedly being used by pre-university students both inside and outside language classes and also to see whether or not variables investigated related to students' self-reported use of language learning strategies and their levels of language proficiency.

Interview questions were generated from the review of research studies that carried out in the field of language learning strategies (e.g. Ehrman and Oxford, 1995; Wharton, 2000; and Intaraprasert, 2000). For this present study, interview questions were selected according to the research purposes and research questions. The questions for the group interviews comprised two parts: background knowledge information, which was intended to build a good relationship between interviewer and interviewees and also reduce the interviewees' embarrassment. The second part was

used to find out about the students' language learning strategies they employ when learning a language (see Appendix 3 for the interview questions).

The interview questions were piloted with students who were from the target population, but not participating in the present investigation, in order to see whether all questions were clear for the interviewees. The interview questions were translated from English into Thai in order to reduce the possibility of being misinterpreted and misunderstood by the participants. With the comments from those participating for example, wording in the pilot interview and a discussion with my supervisors, the interview questions were re-worded and re-arranged before their actual use. To facilitate maximum comprehension, Thai was used during the interview.

Each group of interviewees was arranged at a different time to allow interviewees to select the time that was convenient for them to participate in the interview. Basically, each group interview was approximately thirty minutes or one hour. The interviews were tape-recorded and transcribed later rather than taking notes while the interview was being conducted. It is because, according to Intaraprasert (2000, p. 79), "taking notes while conducting the interview can interrupt the interview process and eventually it could result in the failure of the interview".

### **3.6.2. Written questionnaire**

In the second phase of data collection, the language learning strategy questionnaire was administered to Thai pre-university students in order to elicit what types of language learning strategies they use and the frequency of the strategy use. The items in the questionnaire were generated from the self-report information obtained through the focus group interviews. The language learning strategy questionnaires were conducted in Thai, in order to maximize the ease of

administration and ensure greater accuracy of results. The questionnaire used to assess the degree to which Thai pre-university students employ language learning strategies used a 4-point rating scale. The scale was valued 1, 2, 3, or 4.

<b>1 = Never</b>
<b>2 = Sometimes</b>
<b>3 = Often</b>
<b>4 = Always</b>

In addition, according to Bialysok (1981) the advantage of using a questionnaire is that it can easily be administered to a large group of participants, scoring and data compilation are relatively simple, and more importantly, precise quantitative measures can be derived (see Appendix 5 (Thai version) and Appendix 6 (English version) for the full version of the questionnaire).

### **3.7 Sampling and rationale for choice of participants**

According to Robson (2002), the sample is a part of a population. The sample is selected according to the needs and purposes of the study. Dörnyei (2003, pp. 70-71) defines 'sample' as 'the group of people or the subset of the population which is representative of the whole population'. As mentioned by Cohen and Manion (1985, p. 10), 'the correct sample size depends on the purpose of the study and the nature of the population under scrutiny'. Selecting the sample to be the subject of the research is more important, it is because no study can include everything, as Miles and Huberman (1994, p. 27) point out, 'you cannot study everyone, everywhere, doing everything'.

Moreover, in selecting the number of subjects for the present study, many points is questioned by novice researchers, for example, how many subjects the sample shall consist of, or how many subjects should be in the study, etc. Bell (1999) suggests that the numbers of subjects in the study will necessarily depend on the time researchers have for the study. However, Locke et al. (1998) point out that the size of sample should not too big or too small, but it should be reasonable to believe that the results of the research would hold for any situation or group of people.

Based on the Robson's (1993; 2002) classification of the purposes of research, the present study can be classified as broadly exploratory research. This means that in this present study, the samples must be good representatives of the entire population to some extent; that is, they are good representatives for pre-university students learning English as a foreign language in Thailand. Dörnyei (2003) points out that a good sample should be similar to the target language population in general characteristics such as age, gender, and educational background. What follows is an explanation of the characteristic of the population for the present investigation.

### **3.8 Characteristics of the research population**

This part focuses on characteristics of the research population. In selecting the samples, the following investigated factors are taken into consideration as follows:

#### **1. Type of school**

There are two types of secondary schools in the Basic Education setting, according to the Office of the National Education Commissions (2002), National Education Act 2002: the public schools and the private schools. But, not all of those schools offer classes at the upper secondary school level. According to the Ministry of



Education (2001), three programs have recently been offered at the upper secondary levels at public schools (regular, international, and bilingual programs) and four programs offered at private schools (regular, international, bilingual, and a combination of Islam and regular programs). However, this study only focuses on the regular program from both public schools and the private schools. There are 1782 public schools and 128 private schools which offer the regular program at the upper secondary school level in Thailand. Each type of school in the regular program had to be sampled.

## **2. The selection of students**

In this study, pre-university students (Matthayom Suksa 6) in both science and non-science oriented fields from public and private schools at secondary schools had to be sampled based on their gender (male and female).

## **3. Field of study**

'Field of study' in this study has been classified into broad groups: science-oriented and non science-oriented. The science oriented refers to science studies. The non science-oriented refers to Language and Social studies. Each field of study had to be sampled.

## **4. Extra-Class Support**

'Extra-class support' in this study has been classified into two broad groups: extra-supported and non extra-supported. 'Extra-supported' refers to students who studied the extra language class outside the regular class time. 'Non extra-supported' refers to students who did not attend an extra language class. Each group had to be sampled.

## **5. Level of language proficiency**

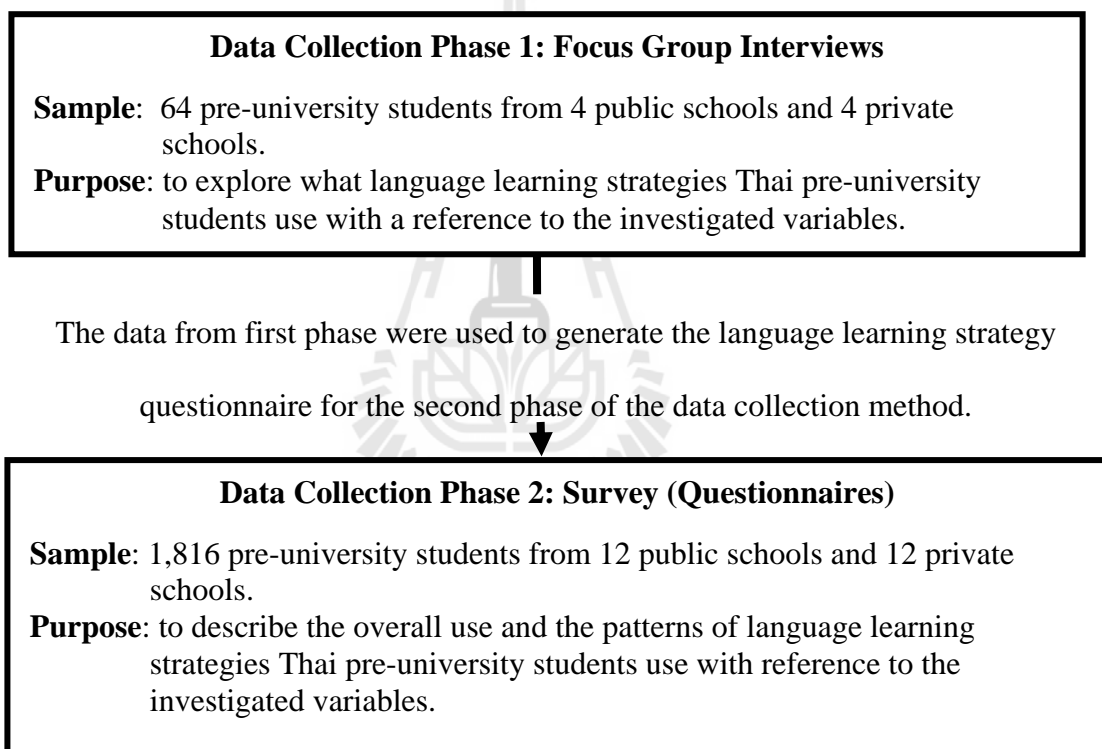
'Level of language proficiency' in this study refers to students' language proficiency levels, which were determined by the students' test scores obtained through the English language proficiency test, with a total of 60 items. The test consists of three main parts: writing (15 items), speaking (15 items), and reading comprehension (30 items). The participants' English language proficiency levels were rated as 'high', 'moderate', or 'low' based on their test scores. Any students who get 80 percent or more of the total test scores (64 raw scores or more) were classified as 'high language proficiency level'. Any students who get 65 percent of the total test scores, but less than 80 percent (50 – 63 raw scores), were classified as 'moderate language proficiency level' and any students who get 64 percent of the total test scores or less (49 raw scores or less), were classified as 'low language proficiency level'. Each level of students' language proficiency has to be sampled.

Since the research questions of the present investigation emphasize the relationship between language learning strategy and the five variables, the sampling must cover all the key aspects of the variables. These five factors were deliberately selected to serve the particular purposes of the present investigation to examine whether the five variables, which include gender (male and female), extra-class support (extra-supported and non extra-supported), type of schools (public and private school), the field of study (science-oriented and non science-oriented), and language proficiency levels (low, moderate, and high) affect language learning strategies used by Thai pre-university students. According to Robson (2002, pp. 264-265) using the researcher's judgment to achieve a particular purpose is sometimes called 'purposive sampling'. Purposive sampling is more appropriate in order to select the sample to

study any relationships between variables. As stated in Punch (2005) purposive sampling makes sense to select the sample in the way that there is maximum chance for any relationship to be observed. At the present, there are 1,782 public schools and 128 private schools which offer both science and non-science fields for both genders (male and female) at the upper-secondary school level in Thailand. The multi-stage random sampling technique was used in the present investigation in order to select public and private school samples. First, the stratified cluster sampling technique was used, and there were altogether 32 schools to participate in this study. Then, the simple random sampling was used to select the public and private schools to take part in the first phase and the second phase.

In the present investigation, 8 secondary schools (4 from public schools and 4 from private secondary schools) participate in the first phase (the focus group interview). The four public schools were obtained by simple random sampling (one in Chiang Rai, one in Saraburi, one in Kalasin, and one in Chumphon). Four private schools also obtained by simple random sampling to participate in this phase (one in Nakhon Sawan, one in Prachuap Khiri Khan, one in Prachinburi, and one in Khon Kaen). There were 64 pre-university students (32 students from public schools and 32 students from private schools) who took part in the focus group interview. These students' characteristics covered all the selected variables: 1) 'gender': male, female; 2) 'field of study': science-oriented, non science-oriented; 3) 'type of school': public schools and private schools; 4) 'extra-class supported': extra-supported, non extra-supported; and 5) 'students' levels of language proficiency': low, moderate, high. The data obtained from 64 pre-university students in the focus group interview in the first phase provided information to generate the language learning strategy questionnaire

which was used in the second phase of data collection. The stratified cluster sampling used to select subjects, which took part in the second phase, including 12 from public schools and 12 from private schools. The simple random sampling was used to select student in each of 24 schools at the pre-university level to participate in the second phase. What follows is a framework of the data collection process for the present study.



**Figure 3.3** Framework of Data Collection Process

### 3.9 Analyzing, interpreting, and reporting data

The data obtained through the two phases of data collection were analyzed to answer the research questions of the present study. The data obtained in the first was self-report information from the focus group interviews and the second phase of data

collection yielded self-report information from the language learning strategy questionnaires.

### **3.9.1 Focus group interview**

The focus group interview data was transcribed to identify language learning strategies used by Thai EFL learners. The interviews data were analyzed by using Strauss and Corbin's (1990) coding which used to identify general categories from participants' responses. Coding was the process of developing categories of concepts and themes emerging from the data in order to group the differences and similarities between the language learning strategies in which students reported to have used.

### **3.9.2 Language Learning Strategy Questionnaire**

Data from questionnaires were analyzed with the assistance of the SPSS for windows program to answer the research questions which include:

#### **1. Frequency of strategy use**

This method was used to compare the degree to which strategies were reported to be used frequently or infrequently by students in general, there are three levels of strategy use: 'high use', 'medium use', and 'low use' based on the holistic mean scores of frequency of strategy use (Intaraprasert 2000; 2002).

#### **2. Analysis of variance (ANOVA)**

According to Nunan (1989) ANOVA is used to test the significance differences among the means of two or more groups on a variable to see whether the variation is greater than predicted. The independent variables are usually nominal, and the dependent variable is usually an interval. This method was used to determine the relationship between learners' overall reported strategy use and 1) gender (male or female), 2) types of school (public schools or private schools), 3) field of study

(science-oriented or non science-oriented), 4) extra-class support (extra-supported or non extra-supported, and 5) levels of language proficiency (high, moderate, or low).

### **3. The post-hoc Scheffé test**

This method is used to examine the significant differences as the result of ANOVA where the variable has more than two groups. This test is used to indicate which pair of the groups under such a variable contributes to the overall differences. In the present investigation, the post-hoc Scheffé test was used to test the significance of differences of students' levels of language proficiency (high, moderate, or low).

### **4. Chi-square Tests**

This method is used to determine the significant variation patterns in the students' reported strategy use at the individual item level. These tests were employed to check all the strategy items for significant variations by 1) gender (male or female), 2) types of school (public schools or private schools), 3) field of study (science-oriented or non science-oriented), 4) extra-class support (extra-supported or non extra-supported, and 5) levels of language proficiency (high, moderate, or low). This test were used to compare the actual frequencies with which students give different responses on the 4-point rating scale, a method of analysis closer to the raw data based on average responses for each item. For the Chi-square test, responses of 1 and 2 were consolidated into a single "low strategy use" category and responses of 3 and 4 were combined into a single "high strategy use" category. According to Green and Oxford (1995, p. 271), the purpose of consolidating the four response levels into two categories of strategy use is to obtain cell sizes with expected values high enough to ensure a valid analysis.

## **5. Factor Analysis**

According to Cohen and Manion (1994) factor analysis is used to determine the underlying patterns among a large number. This technique is used to explore which variables in a set of data are related to each other. For this present investigation, the researcher emphasised finding the underlying patterns of language learning strategies which were emerge from such analysis as well as the variation patterns which were strongly related to each of the independent variables.

### **3.10 Summary**

In this chapter, a background of research methodology in language learning strategies which includes research design, type of research, and the purposes of research works have been presented. This chapter has also looked into the methods in language learning strategies; the theoretical framework for data collection method; sampling and rationales for the choice of subjects; and the characteristics of the population. The last part of this chapter deals with how data collected were analyzed, interpreted, and reported.

# **CHAPTER 4**

## **LANGUAGE LEARNING STRATEGY INVENTORY AND THE STRATEGY QUESTIONNAIRE FOR THE PRESENT INVESTIGATION**

### **4.1. Introduction and Purpose of the Chapter**

This chapter deals with the language learning strategy inventory which emerged from the data obtained through student oral interviews conducted with 64 Thai pre-university students at different types of secondary schools in Thailand. This chapter begins with the procedure of eliciting information from 64 Thai pre-university students in the first phase of data collection. This is followed by a description of how the preliminary strategy inventory was generated based on the interview data. Then, the results of language learning strategy inventory emerged from the interview data obtained in the first phase of data collection are presented. The last part of this chapter ends with the language learning strategy questionnaire and how to validate it.

Based on the related literature review of language learning strategies in Chapter 2, it is not wrong to conclude that different researchers have offered different ways of defining and classifying language learning strategies based on researchers' own justifications for their research works. The language learning strategy classification system which is accepted as a suitable way for a researcher to use to elicit one group of students' language learning strategy use may not be



another (Intaraprasert, 2000). For the present investigation, it would be practical to use of the information reported by Thai pre-university students themselves to develop an effective way to elicit their language learning strategy use, rather than borrow other researchers' classifications. What follow are the procedures of how to generate the language learning strategy inventory and language learning strategy questionnaire for the present investigation.

#### **4.2. The Main Stage of Student Oral Interviews**

The first phase of data collection was a semi-structured oral interview of the students conducted with 64 Thai pre-university students in two types of secondary schools in Thailand from the middle of May to the end of June 2007. The purpose of the student oral interviews was to elicit students' use of language learning strategies in both in-class and out-of class, as well as to find out how they improved their English language skills in general. The questions posed for the students dealt with the language learning strategies they employed in both in-class and out-of-class, and also included a question about what they found difficult in learning English. The content of the questions partly emerged from available research related to the field of investigation and partly through the researcher's personal experience with language learning strategies. The questions can be summarised as follows:

- Q1: a general introduction question including the interviewee's name
- Q2: an investigation of the field of study which each student is studying
- Q3: an investigation of the number of English courses each student is studying for this semester

- Q4-Q6: an elicitation of the informants language learning strategies in a regular classroom setting (before, during, and after class) and what they did in order to help them understand their lessons.
- Q7 : the number of students studying English in extra-classes
- Q8-Q10: an elicitation of the informants language learning strategies outside of a regular classroom setting (before, during, and after class) and what they did in order to help them understand their lessons.
- Q11: an investigation of each student's opinion about studying English in extra-class
- Q12: an elicitation of each student's improvement strategies

The procedure started by the researcher getting official letters asking for co-operation from eight secondary schools chosen to be the subjects in the first phase. The letters requested permission for the researcher to conduct the data collection with eight students (four from science-oriented and four from non science-oriented fields) from each secondary school, and also included the interview schedule for each secondary school. The selection of sixty-four students at different types of secondary schools which were the subjects of study was to ensure there would be enough information to generate a strategy questionnaire to be used in the second phase of data collection.

Siyaphai School was the first secondary school where the researcher started to interview students. It was not too difficult to get co-operation from both the school and the students. The school arranged time for the researcher to interview their students as requested. The process of oral interview started by explaining and informing the students what the purposes of the interview were. The students were

informed of what they would be required to do in the interview. The researcher ensured that the interview would be conducted in Thai because some students seemed to be worried with the language used in the interview. After that, the interview questions were also given to students, as suggested by Intaraprasert (2000), because giving an interview questions to students in advance has been found to be helpful for students in terms of preparation for the responses to the questions. A similar process was conducted at the other seven secondary schools.

Having a good relationship between the interviewer and interviewee is also important, as suggested by Intaraprasert (2000) knowing and calling the interviewee's name is helpful in building a good relationship between the interviewer and interviewees because they do not feel frustrated when being interviewed. Therefore, the researcher followed his suggestion by addressing the students by their first name or nickname based on their preference. Moreover, the researcher also followed the suggestion by Robson (2002) that the interviewer should listen to the interviewee more than speak; should not give the cues which can lead the interviewees to respond in particular way; should put the question in a straightforward and clear; and the interviewer should make the interviewees feel that they will be understanding and easy to talk to.

In summary, the first phase of data collection was carried out as scheduled. After the interview, the transcription of each interview recording was made as soon as possible. After the transcription of all interviews, the data were analysed to look for language learning strategies reported to be employed by these sixty-four secondary school students. The transcription of each interview recording was translated from Thai to English by the researcher. The interview translated-version was checked by

the supervisor of the researcher and university lecturers who have taught English for at least 5 years. The overall processes of the interview data collection were time-consuming. They took the researcher almost three months to finish the transcription and the translation. The subsequent data analysis was used to generate the language learning strategy inventory and the language learning strategy questionnaire for the second phase of data collection.

### **4.3 How the Preliminary Strategy Inventory was Generated**

The researcher started generating the preliminary language learning strategy inventory as follows:

1. The researcher looked through the interview data provided by 64 students to get the whole picture of what the students reported doing to help them understand their English lessons better.
2. The researcher looked at each interview script and noted what could be regarded as learning strategies which they reported doing to help them understand their English lessons.
3. From the list, the researcher started to look at the similarities and differences among the reported statements and then grouped the similar statements together according to the situation in which students reported using to achieve learning purposes. In this case, the researcher decided to classify these reported statements based on the reported purpose of strategy use. It was found that the purposes could be classified into two main categories. These purposes were determined based on classroom usage. The appropriate two main categories were identified as the

strategies related to in-class purposes and the strategies related to out-of-class purposes.

4. Then, the researcher started to look at the most appropriate words to describe the strategies students reported trying to use to achieve learning purposes, as suggested by Intaraprasert (2000), the researcher had to interpret and look for the suitable words to describe the purpose students reported trying to achieve because students did not use the precise words for the purpose. The next step was to match the reported strategies with the purpose and put them in the appropriate category.
5. At this stage, the researcher started to match the reported strategies and the purpose with the two main categories. This stage was another difficult step because the researcher had to ensure that each strategy was matched with the appropriate purpose and each purpose was matched with the appropriate main category. Finally, the proposed language learning strategy inventory for the present investigation came into being. The in-class category comprises four purposes, and the out-of-class category comprises five purposes. Abbreviations have been used in order to apply a structure and reference system to the data as follows:
  - The main category 1 In-Class strategy category has been abbreviated to **IC**; and
  - The main category 2 Out-of-Class strategy category has been abbreviated to **OC**.

Each individual purpose which students reported employing in order to try to achieve is assigned a number within each main category as follows:

- The in-class strategy purpose 1 is abbreviated to **ICP 1**; and
- The out-of-class strategy purpose 1 is abbreviated to **OCP 1**.

Each individual strategy for each purpose which students reported employing to achieve is assigned a number within each main category as follows:

- The strategy for in-class purpose is abbreviated to **SICP 1.1**; and
- The strategy for out-of-class purpose is abbreviated to **SOCP 1.1**.

The resulting references for the present inventory run from **SICP 1.1 to SICP 4.6** and are the individual language learning strategies which students reported employing to achieve the in-class purpose. **SOCP 1.1 to SOCP 5.4** are the individual language learning strategies which students reportedly employed to achieve the out-of-class purpose in the strategy inventory.

In classifying language learning strategies for the present investigation, it was remarkable that the language learning strategies in both in-class and out-of-class categories were supportive of each other. That is, the strategies which students reported employing in order to solve their language learning in classroom lessons may help them improve their language skills in general. In the same effect, the out-of-class strategies which students reported employing to improve their language learning in general may also help them in terms of language learning in classroom lessons.

In conclusion, the researcher looked through the transcriptions of 43 translated interviews recording with an attempt to find out the common characteristics of the reported statement. It was found that most of the statements which could be regarded as 'language learning strategies' were reported in order to achieve a particular

language learning purpose. These statements were classified into two main categories based on the classification, i.e. in-class strategies and out-of-class strategies. For ease of understanding, Figure 4.1 below summarises the language learning strategy inventory which emerged from the data analysis obtained through student oral interviews for the present investigation.

**Table 4.1** The Language Learning Strategy Classification for the Present investigation

Main Categories	Purpose to be Achieved	Individual Strategy
In - Class	<b>ICP 1: To be well-prepared for the lessons</b>	<b>SICP 1.1:</b> Study the lessons in advance <b>SICP 1.2:</b> Study the vocabulary in advance <b>SICP 1.3:</b> Try some exercises in advance <b>SICP 1.4:</b> Do the revision of the previous lessons either by oneself or with classmates <b>SICP 1.5:</b> Attend extra-classes
	<b>ICP 2: To understand the lessons while studying in class</b>	<b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to teacher <b>SICP 2.2:</b> Take notes while studying in class with a teacher <b>SICP 2.3:</b> Try to get a seat in the front row <b>SICP 2.4:</b> Try not to talk with other students while studying
	<b>ICP 3: To solve problems encountered in the classroom lessons</b>	<b>SICP 3.1:</b> Ask the teacher in class either immediately or when appropriate <b>SICP 3.2:</b> Ask teacher after class <b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class <b>SICP 3.4:</b> Ask people other than one's teacher or classmates <b>SICP 3.5:</b> Study by oneself
	<b>ICP 4: To learn new vocabulary in the classroom lessons</b>	<b>SICP 4.1:</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English <b>SICP 4.2:</b> Make lists of new vocabulary with their meaning <b>SICP 4.3:</b> Look at the root of a new vocabulary <b>SICP 4.4:</b> Memorize new words with or without a list <b>SICP 4.5:</b> Guess the meaning of new vocabulary items from the context <b>SICP 4.6:</b> Group new vocabulary items according to their similarity in meaning

**Table 4.1(Cont.)** The Language Learning Strategy Classification for the Present investigation

Main Categories	Purpose to be Achieved	Individual Strategy
Out-of-Class	<b>OCP 1: To gain more knowledge about vocabulary</b>	<b>SOCP 1.1:</b> Play games in English such as computer games
		<b>SOCP 1.2:</b> Read printed materials in English such as newspapers, magazines, and leaflets
		<b>SOCP 1.3:</b> Watch English-speaking films
		<b>SOCP 1.4:</b> Listen to English songs
		<b>SOCP 1.5:</b> Attend extra-class
Out-of-Class	<b>OCP 2: To improve one's listening skill</b>	<b>SOCP 2.1:</b> Watch English-speaking films
		<b>SOCP 2.2:</b> Listen to English songs
		<b>SOCP 2.3:</b> Listen to English conversation from CD
		<b>SOCP 2.4:</b> Watch television programs in English
Out-of-Class	<b>OCP 3: To improve one's reading skill</b>	<b>SOCP 3.1:</b> Watch English-speaking films
		<b>SOCP 3.2:</b> Listen to English songs
		<b>SOCP 3.3:</b> Listen to English conversation from CD
		<b>SOCP 3.4:</b> Watch television programs in English
		<b>SOCP 3.5:</b> Read printed materials in English such as newspapers, magazines, and leaflets
Out-of-Class	<b>OCP 4: To improve one's speaking skill</b>	<b>SOCP 4.1:</b> Try to speak English either to oneself or to other Thai people
		<b>SOCP 4.2:</b> Try to speak to foreigners, either teachers or other foreigners
		<b>SOCP 4.3:</b> Use computer programs such as a chat program
		<b>SOCP 4.4:</b> Try to imitate a native speaker from media such as English film or CD
		<b>SOCP 4.5:</b> Attend extra-class
Out-of-Class	<b>OCP 5: To improve one's writing skill</b>	<b>SOCP 5.1:</b> Correspond in English by letter or email
		<b>SOCP 5.2:</b> Practice writing in English such as writing diary
		<b>SOCP 5.3:</b> Use computer program such as chat a program
		<b>SOCP 5.4:</b> Attend extra-class

**Notes:** **ICP:** stands for in-class purpose; **OCP:** out-of-class purpose; **SICP:** individual strategy for in-class purpose; and **SOCP:** individual strategy for out-of class purpose.



## 4.4 The Language Learning Strategy Inventory

The language learning strategy inventory for the present investigation emerged from the data obtained in the first phase of data collection. The researcher analysed the data and classified the reported strategies according to their use in order to achieve particular language learning purposes, either in-class or out-of-class.

The name of each interviewee was included in the interview for the purpose of creating trust and friendliness between the interviewer and the interviewee. However, each student as an informant was labeled as according to the type of school at which he or she was studying. For example, **PS 1** means that the interviewee was studying at a public school, and he or she was the first student who was interviewed. **PRS 1** was used to label those studying at a private school.

### 4.4.1. Language Learning Strategies in the In-Class Strategy

#### Category (IC)

The language learning strategies under this main category were reported being employed by 64 students in order to improve and enhance their language learning in the classroom setting with their teacher. Some strategies may be reported to be employed before class; some while studying in class; and others after class. This depends in part upon what purpose students are trying to achieve. The four in-class purposes (ICP) in this main category which students reported trying to achieve include:

- ICP 1: To be well-prepared for the lessons
- ICP 2: To understand the lessons while studying in class
- ICP 3: To solve the problems encountered in the classroom lessons
- ICP 4: To learn new vocabulary in the classroom lessons

#### 4.4.1.1 ICP 1: To be well-prepared for the lessons

Many students reported that they found it very helpful to be well-prepared before coming to the classroom. They hope that being prepared when coming to class may help them to better understand more of the classroom material presented by their teacher. The individual strategies which students reported employing in order to achieve this in-class strategy include:

- **SICP 1.1: Study the lessons in advance (such as the subject content)**

As mentioned above, some students reported that they found it very useful for them to be well-prepared before coming to class. Different students reported different ways of achieving this classroom learning purpose. These students reported employing this learning strategy as follows:

PS 1: ..... before coming to class, I will look at what we are going to study tomorrow. It helps me to be prepared for the lesson.

PRS 7: ..... I will look at what we are going to study next class then I will read that topic beforehand. This technique helps me understand the topic for the next lesson better.

PRS 12: ..... I will study on the topic that we are going to study because it will help me to understand more on that topic.

PRS 13: ..... I will read that topic that teachers are going to learn beforehand. This can help me understand the topic for the next lesson better.

PS 18: ..... I will read the topic that we are going to learn beforehand. It helps me to be prepared for the next lesson.

PRS 31: ..... I will look at what we are going to study then I will read the topic beforehand because it will help me to understand better on that topic.

- **SICP 1.2: Study the vocabulary in advance**

According to the information obtained through the student interviews, vocabulary learning seems to be given as a main concern for Thai pre-university

students in learning English because many of them reported that they found it useful if they knew new vocabulary on the topic that they are going to study before going to class. This helps them to be well-prepared for their classroom lesson:

- PS 1: ..... I will look up the meaning of the word that I don't know before going to study in the next lesson because if we know the meaning of those words, it helps me to understand more about the topic.
- PS 14: ..... I don't know much vocabulary. It would be better if I look at the meaning of the words before coming to class.
- PS 16: ..... I will look up the meaning of the words on that we are going to study topic in next lesson.
- PS 22: ..... I will look up the meaning of words before class in order to make me more understand when I have to study in the next lesson.
- PRS 24: ..... I will study on vocabulary about topic beforehand to make me more understand on the topic when I have study in class.
- PRS 26: ..... I will look at the meaning of words before class because if I know the meaning of the words, it helps me to understand more about the topic.
- PRS 27: ..... I will try to study the difficult words by looking for their meaning before next lesson.

- **SICP 1.3: Try some exercises in advance**

Besides reading or studying the subject, or learning objectives in advance, some students reported trying some exercises in order to be well-prepared for the classroom lessons as follows:

- PS 16: ..... I will try to do some exercises in advance because it can help me understand the next lesson better.
- PS 22: ..... I will try to do new exercises before coming to the class because it will help me to understand the lesson better.
- PRS 3: ..... I will try to do the exercise in advance. If I don't do it, I will not understand the lesson.
- PRS 31: ..... before going to the next class, I will try new exercises. This can help me more understand when studying with teacher in class.

- **SICP 1.4: Revise of the previous lessons either by oneself or with classmates**

Some students feel that revision of the previous lessons may be helpful for them to be well-prepared before coming to classroom lessons:

PRS 2: ..... I'll look at the notes I took in class and read the textbook again to make me understand more about it.

PS 12: ..... I do my homework by myself. It can help me to review what I have learned.

PS 7: ..... I do my homework by myself. It can help me to review what I have learned.

PS 24: ..... I'll look at the notes I took in class and read the textbook again to make me understand more about it.

PS 27: ..... I do the revision of the previous lesson by doing the exercise that I have done it in class. This can help me to review my understanding about the lesson.

PS 28: ..... I do the revision of the previous lesson by doing the exercises, and then I will check the answers with my classmate. This can help me to understand the lesson better.

- **SICP 1.5: Attend extra-classes**

Some students reported that attending extra-classes may be helpful for them to be well-prepared before coming to classroom lessons:

PS 26: ..... study at extra class can help me to review what I have learned in the class again. This can help me to understand the lesson better.

PS 30: ..... study at extra class can help me to review the topic I have learned again. It also helps me to be prepared for a new topic that I will learn in the next lesson with teacher at school.

PRS 9: ..... study at extra class can help me to review what I have learned in the class again.

PRS 12: ..... study at extra class can help me to understand more on the lesson because we have to study the same topic again.

PRS 19: ..... study at extra class can help me to understand more on the lesson because I could revise what I have learned in the class again.

#### 4.4.1.2 ICP 2: To understand the lessons while studying in class

Some students reported that it is important to pay attention to the teacher and the lessons, and sometimes they need to concentrate more on the lesson in order to improve their understanding of the lesson. They need to avoid distractions caused by their classmates. The list of learning strategies reported being used by students includes:

- **SICP 2.1: Listen to the teacher attentively and pay attention to teacher**

Most students reported paying attention to the teacher or listening to the teacher while studying in class. It helps them to understand more during the lesson:

PRS 11: ..... I have to pay attention to the teacher while studying in class because if I talk, I can't concentrate on what I am doing.

PS 29: ..... If I want to understand the lesson, I have to listen to the teacher attentively. I pay attention to her while studying in class.

PS 32: ..... I have to listen to the teacher attentively. That helps me understand the lesson.

PRS 12: ..... I have to listen to the teacher attentively to understand the lesson.

PRS 29: ..... Listen to teacher while studying helps me understand the lesson better.

- **SICP 2.2: Take notes while studying in class with the teacher**

Some students reported that taking notes may help them to keep up with the teacher while studying in class:

PS 11: ..... I take notes of what the teacher says is important because this can help me keep up with the teacher in class.

PS 13: ..... I take notes of what the teacher is teaching.....

PRS 24: ..... while studying in class, I like to take notes of what the teacher says and I think it is important.

PRS 26: ..... I like to take notes of what the teacher is teaching because this can help keep up with the teacher.

PRS 31: ..... I take notes of what the teacher is teaching or something in the lesson which I don't understand. This can help me keep up with teacher.

- **SICP 2.3: Try to get the seat in the front row**

It was reported by some students that distraction while studying in class may be a barrier for them in learning. Some students' concentration can be improved by their choice of position or seating in class.

PS 22: ..... I try to sit in the front row because I hear the teacher clearly.....

PRS 31: ..... I have to sit in the front row because I can see the board and hear the teacher clearly

PS 17: ..... I try to sit in the front row. I don't like to sit in the back because my friends keep talking to me. I can't concentrate on what I am studying.

PRS 2: ..... I can see the board and hear the teacher clearly if I set in the front row.

PRS 14: ..... I try to sit in the front row. If I sit in the back row of classroom, I can't concentrate on what I am studying.

- **SICP 2.4: Try not to talk with other students while studying**

Some students reported that trying not to talk with other students while studying helps them to understand more during the lesson:

PRS 23: ..... I don't talk or play with my classmates while studying. I try to keep up with the teacher's instructions....

PS 29: ..... I don't talk with classmates while the teacher is teaching because if I talk, I can't concentrate on what the teacher is teaching.

PS 7: ..... I don't talk with my friends while studying in class because I have to pay attention to what teacher is teaching.

PRS 14: ..... I try not to talk or play with my classmates while studying because I want to concentrate on what the teacher is teaching.

PRS 27: ..... I try not to talk or play with my classmates while studying because I want to pay attention to the lesson.

#### 4.4.1.3 ICP 3: To solve the problems encountered in the classroom lessons

When studying in class, some students reported that very often when studying in class, they fail to understand what the teacher is teaching. They have reported several ways to deal with these problems in the class time. The strategies that are reported to be employed by these students include:

- **SICP 3.1: Ask the teacher in class either immediately or when appropriate**

Asking the teacher in class was reported to be used by some students in order to solve the problems which they encountered while studying in class:

- PRS 1: ..... if I don't understand the lesson, I will ask the teacher immediately to explain.....
- PRS 2: ..... if I don't understand the lesson, I will ask the teacher immediately...
- PRS 13: ..... if I don't understand the lesson, I will ask the teacher immediately because if I leave it then I will forget it...
- PS 17: ..... sometimes, the teacher gives us an exercise and I don't understand how to do or what to do, I will ask the teacher immediately.....
- PRS 27: ..... if I have questions about the lesson, I will ask the teacher before the class finishes.....

- **SICP 3.2: Ask teacher after class**

Some students reported that asking the teacher after class may help them to solve the problems which he or she has experienced in the classroom:

- PS 11: ..... I ask the teacher when I have a question about the lesson after class
- PS 29: ..... I ask the teacher after class when I don't understand the lesson.
- PRS 2: ..... I ask the teacher when I have a question about the lesson after class because I don't want to bother my classmates during the lesson .....
- PRS 25: ..... after I revised the lesson and I still don't understand about it. I'll keep the problems to ask the teacher after class .....
- PRS 28: ..... when I don't understand the lesson, I ask the teacher after class...

- **SICP 3.3: Ask a classmate or classmates either in class or outside class**

Asking their classmate or classmates was reported to be used by some students as a way to help solve the problems about the lesson which they have experienced in the classroom:

PS 7: ..... if I have any questions about the lesson, I'll ask my friends to explain it for me.

PS 19: ..... if I have any questions about the lesson, I prefer to ask my friends not my teacher.....

PS 26: ..... if I have any questions about the lesson, I prefer to ask my friends who are sitting next to me.....

PRS 6: ..... if I don't understand the lesson, I'll ask my friends because I find that my friends can explain better than the teacher.....

PRS 23: ..... if I don't understand what the teacher is teaching while studying in class, I'll ask my friends to explain it for me.

- **ICP 3.4: Ask people other than teachers or classmates**

A few students reported that asking other people who know English rather than their teacher or classmates may be helpful for them in terms of solving the problems experienced in the classroom:

PS 4: ..... If I have a problem about the lesson, I'll ask the tutor in the private language school for help....

PS 24: ..... when I have a problem about the lesson, I'll ask a foreigner for help....

PRS 23: ..... when I have a problem about the lesson, I will ask anyone that I think knows English and they can help me solve the problem.....

PRS 27: ..... If I have a problem about the lesson, I will ask anyone that I think knows English.....

PRS 32: ..... If I have a problem about the lesson, I will ask anyone for help....

- **ICP 3.5: Study by oneself**

Studying by themselves was reported to be used by some students as a way to



help them solve the problems which he or she has experienced in classroom:

PS 2: ..... if I don't understand the lesson, I'll go to the library to find books on that topic to read again....

PS 18: ..... if I don't understand the lesson, I'll go to find books on that topic to read ....

PS 30: ..... if I don't understand the lesson, I'll go to the library to find books on that topic to read again....

PRS 1: ..... if I don't understand the lesson, I'll buy CD on that topic to study again.....

PRS 3: ..... I'll find some more books to read in order to understand more about the lesson.....

#### **4.4.1.4 ICP 4: To learn new vocabulary items in the classroom lessons**

According to the information obtained through the student interviews, vocabulary learning seems to be given as a main concern for Thai pre-university students in learning English because many of them reported that they believed that their English would be better if they knew or could remember the vocabulary as much as possible. Thai pre-university students reported different ways of dealing with new vocabulary items in classrooms. The individual strategies which students reported employing include:

- **SICP 4.1: Use a dictionary or electronic dictionary to check the meaning of new vocabulary items, either in Thai or in English**

Some students reported that using a dictionary to check the meaning of new vocabulary may be very helpful for them to learn new vocabulary items in a classroom lesson:

PRS 10: ..... If I don't know the meaning of the words, I will look up their meanings in a dictionary.....

- PS 14: ..... I don't know much vocabulary. It will be better if I look up the meaning of the words before coming to class.
- PS 14: ..... It will be better if I look up the meaning of the words before coming to class.
- PS 23: ..... If I have never seen the word before and I don't know its meaning, I will look it up their meaning in a dictionary.
- PRS 24: ..... If I don't know the meaning of the words, I will look it up in a dictionary.

- **SICP 4.2: Make lists of new vocabulary with their meaning**

Some students reported that making lists of new vocabulary together with their meaning may be very helpful for them to learn new vocabulary in a classroom lesson:

- PRS 10: ..... If I don't know the meaning of the words, I will look up their meaning in a dictionary and then I will write it in my vocabulary book.
- PS 18: ..... I will write down the words and their meanings that teacher has mentioned in my book.
- PRS 12: ..... If I don't know the meaning of the words, I will write down the words and their meanings on a piece of paper....
- PRS 26: ..... If I don't know the meaning of words, I will write down the words and their meanings in my book.
- PRS 28: ..... If I don't know the meaning of the words, I will look up their meaning in a dictionary and then I will write it in my book.

- **SICP 4.3: Look at the root of new vocabulary items**

Looking at the root of new words was one of the ways that students reported as being helpful for them in learning vocabulary in the classroom lesson:

- PS 26: ..... the words I rarely see, I have to look at their root.... This can help me guess the meaning of the words.
- PRS 7: ..... I guess the meaning of a word by considering the root of a word....
- PRS 12: ..... If I don't know the meaning of a word, I try to guess the meaning by considering the root of a word.....

PRS 15: ..... I try to guess the meaning by considering the root of a word.....

PRS 12: ..... If I don't know the meaning of the words, I have to look at their root to guess their meaning. This can help me guess the meaning of words.

- **SICP 4.4: Memorise new words with or without lists**

Most students reported that memorising new words may be very helpful for them to learn new vocabulary in a classroom lesson. It was reported that students may memorise new vocabulary with or without a list:

PS 3: ..... I try to memorise new words by writing them on a vocabulary book. This can help me when I see these words in the lesson; I can understand the lesson better.....

PS 3: ..... I write new words and their meanings on my notebook. Then I try to memorise them.. This can help me retain the meaning of words.

PS 3: ..... I try to memorise new words by writing them on a vocabulary book. I think if I know more vocabulary, I'll understand the lesson better.

PRS 26: ..... I write new words and their meaning in my notebook and then memorise them.... This technique makes me retain the meaning of words.

PRS 31: ..... If I know more vocabulary, I think I can understand the lesson better. I memorise words by trying to remember at least 10 – 20 words per day....

- **SICP 4.5: Guess the meaning of a new vocabulary item from the context**

Guessing the meaning of a new vocabulary item from the context was reported to enable a student to learn new words during their classroom lesson:

PS 27: ..... If I don't know the meaning of words in the passage, I will try to look at the sentence that comes before or after that word to guess the meaning .....

PS 14: ..... I try to guess the meaning of new words through context by looking at the sentence that comes before or after

PS 21: ..... If I have a problem about vocabulary, I'll look for the clues in the context.

PRS 2: ..... If I don't know the meaning of words in a passage, I'll look for the clues in the context.

PRS 13: ..... I try to guess the meaning of new words through context by looking at the clues in the context.

- **SICP 4.6: Group new vocabulary items according to their similarity in meaning**

Grouping new vocabulary items according to their similarity in meaning was also reported to be used by students in the classroom lesson:

PS 1: ..... If I don't know the meaning of words, I will look at their meanings then I will group the words which have the same or different meaning.....

PS 13: ..... I group vocabulary items by looking at the words which share similar meaning.....

PRS 10: ..... I learn new vocabulary by grouping words which are of the same meaning.....

PRS 20: ..... I learn new vocabulary by grouping words according to the similar meaning.....

PRS 28: ..... I learn new vocabulary by grouping words which are of the same or different meaning.....

#### **4.4.2. Language Learning Strategies in the Out-of-Class Strategy**

##### **Category (OC)**

The language learning strategies under this main category were those which Thai pre-university students reported to be employed by 64 students in order to enhance their language learning skills in general. This may indirectly be supportive to their English language learning for their classroom setting to some extent. This may also help students to expand their knowledge of English in different aspects such as vocabulary. The five out-of-class purposes (OCP) in this main category which students reported trying to achieve include:

- OCP 1: To gain more knowledge about vocabulary
- OCP 2: To improve one's listening skill
- OCP 3: To improve one's reading skill
- OCP 4: To improve one's speaking skill
- OCP 5: To improve one's writing skill

#### **4.4.2.1 OCP 1: To gain more knowledge about vocabulary**

As reported in the interviews, some Thai pre-university students believe that vocabulary is more important for language learning. Many of them reported that they believed that their English would be better if they knew or could remember the vocabulary as much as possible. From this perspective, Thai pre-university students reported various ways to expand their knowledge of vocabulary. The strategies which students reported employing include:

- **SOCP 1.1: Play games in English such as computer games**

Some students reported that playing games in English such as computer games may help them to gain more vocabulary:

PS 9: ..... I play computer games. I can learn a lot of new words from game....

PS 21: ..... I can learn a lot of new words from game

PRS 2: ..... I can learn new words from computer games...

PRS 20: ..... I play games in English, I can learn new words from those games...

PRS 24: ..... I can learn a lot of new words from computer online game

- **SOCP 1.2: Read printed material in English such as newspapers, magazines, and leaflets**

Most students reported that reading printed material in English may help them to gain more vocabulary:

- PS 7: ..... I read English books. I can learn new words....
- PS 11: ..... I read an English magazine. I can learn new words from it.....
- PRS 18: ..... I read an English newspaper 'Student Weekly'. I can learn new words from it...
- PRS 25: ..... I can learn new words from English newspaper.
- PRS 27: ..... I read an English cartoon books. I can learn new words from it...

- **OCP 1.3: Watch English-speaking films**

Some students reported that watching English-speaking films may help them to learn more vocabulary:

- PS 7: ..... I try to watch English-films with Thai subtitle and I can learn new words and their meaning....
- PS 14: ..... I can learn new words and their meaning by watching English-speaking films....
- PRS 14: ..... I can learn new words by watching English-speaking films...
- PRS 19: ..... I try to watch English-speaking films I can learn new words and their meaning.
- PRS 30: ..... I try to watch English-speaking films. I can learn new words from it....

- **SOCP 1.4: Listen to English songs**

Some students reported that listening to English songs may help them to gain more vocabulary:

- PS 1: ..... I like to listen to English songs. I can learn a lot of new words...
- PS 22: ..... I listen to English songs. I can learn new words.....
- PS 31: ..... I listen to English songs. It helps me a lot to learn new words.....
- PRS 3: ..... I can learn new words by listening to English songs.
- PRS 9: ..... I listen to English songs. I can learn a lot of new words and their meaning ...

- **SOCP 1.5: Attend extra-classes**

Some students reported that attending extra-classes may help them to learn more vocabulary:

PS 6: ..... I can learn a lot of new words from my extra class....

PS 9: ..... I have learned a lot of new words when I study my extra-class at the language school center....

PRS 1: ..... I can learn a lot of new words and their meaning from my extra-class....

PRS 19: ..... I have learned a lot of new words when I study at my extra-class....

PRS 20: ..... I think I have learned a lot of new words from my extra-class....

#### 4.4.2.2 OCP 2: To improve one's listening skill

Some students reported that they attempted to find better ways to improve their listening skill. They have reported several ways to improve their listening skill. The strategies that were reported to be employed by these students include:

- **SOCP 2.1: Watch English-speaking films**

Some students reported that watching English-speaking films may help them to improve their listening skill:

PS 8: ..... I try to practice my listening as well as my reading by watching English-speaking films....

PS 15: ..... I try to solve my listening problem by watching English-speaking films...

PRS 3: ..... I watch English-speaking films. I can listen to their accent....

PRS 13: ..... I try to practice my listening by watching English-speaking films...

PRS 29: ..... I watch English-speaking films. I can practice my listening....

- **SOCP 2.2: Listen to English songs**

Some students reported that listening to English songs may help them improving listening skill:

PS 8: ..... when listening to English songs, I try to listen to the accent to practice my listening.

PS 13: ..... I like to listen to English songs and I try to imitate the accent.... to practice my listening.

PRS 3: ..... I like to listen to English songs. This can help me to improve my listening skill...

PRS 14: ..... I like to listen to English songs to improve my listening.

PRS 27: ..... I listen to English songs. It helps me to improve my listening.....

- **SOCP 2.3: Listen to English conversation from a CD**

Some students reported that listening to English conversation from a CD may help them improving listening skill:

PS 1: ..... when listening to the cassette or a CD, I try to listen to the accent to practice my listening.

PS 17: ..... I try to listen to the accent from CDs to practice my listening.

PRS 13: ..... I like to listen to English conversation from a CD. This can help me to improve my listening skill...

PRS 22: ..... I like to listen to English conversation from a CD to improve my listening.

PRS 31: ..... I listen to English conversation from a CD. It helps me to improve my listening.....

- **SOCP 2.4: Watch television programs in English**

Some students reported that watching television programs in English may help them to improve their listening skill:



- PS 2: ..... I watch TV programs in English to improve my listening ....
- PS 18: ..... I try to watch TV programs in English to improve my listening ....
- PS 27: ..... I watch the English programs from Cable TV to improve my listening  
.....
- PRS 2: ..... I watch True Vision on English channels. I can hear their accent.....  
to improve my listening....
- PRS 18: ..... I watch an English program on TV to improve my listening ....

#### 4.4.2.3 OCP 3: To improve their reading skill

Some students reported that reading is one of the most important skills for them in learning language. They have to deal with reading skill both inside and outside class. They have reported several ways to improve their reading skill. The strategies that were reported to be employed by these students include:

- **SOCP 3.1: Watch English-speaking films**

Some students reported that watching English-speaking films may help them to improve their reading skill:

- PS 8: ..... I try to practice my listening as well as my reading by watching English-speaking films.....
- PS 17: ..... When I watch English-speaking films, I try to read English subtitle to improve my reading....
- PS 32: ..... I read English subtitle while I am watching English-speaking films to improve my reading....
- PS 7: ..... When I watch English-speaking films, I also read English subtitle to improve my reading....
- PRS 30: ..... I try to read English subtitle while I am watching English-speaking films to improve my reading....

- **SOCP 3.2: Listen to English songs**

Some students reported that listening to English songs with English lyric may help them improve their reading skill:

- PS 31: ..... I listen to English songs and read their lyric. This helps me in reading.....
- PRS 1: ..... When I listen to English songs, I try to read their lyric to improve my reading....
- PRS 8: ..... I listen to English songs and read their lyric. This helps me to practice my reading.....
- PRS 25: ..... I can improve my reading by reading the songs' lyric while listening to the English songs.
- PRS 24: ..... I can practice my reading skill by reading the songs' lyric while listening to the English songs.

- **SOCP 3.3: Listen to English conversation from a CD**

Some students reported that listening to English conversation from a CD with a conversation script may help them to improve their reading skill:

- PS 3: ..... I also read the conversation script while listening to CD to improve my reading skill....
- PRS 30: ..... I read the conversation script while listening to CD to improve my reading skill....
- PRS 30: ..... I try to practice my reading as well as my listening by reading the conversation script while listen to CD.
- PRS 30: ..... I try to read the conversation script while listening to CD. It helps me improve my reading skill....
- PRS 31: .... I read the conversation script while listening to CD to improve my reading skill...

- **SOCP 3.4: Watch television programs in English**

Some students reported that watching television program in English with subtitles may help them to improve their reading skill:

- PS 16: ..... I watch TV programs in English. There is a subtitle in that program, I can read it to improve my reading...
- PS 13: ..... I watch TV programs in English. Some programs I can read their subtitle to improve my reading...

- PS 27: ..... I watch TV program in English which has subtitle. I can improve my reading by reading it.
- PRS 2: ..... I watch True Vision on English channels..... Some programs I can read their subtitles..... to improve my reading....
- PRS 17: ..... I like to watch television programs on Cable TV. Some of their programs, they have subtitles which I can read to improve my reading.

- **SOCP 3.5: Read printed materials in English such as newspapers, magazines, and Leaflets**

Most students reported that reading printed materials in English may help them to improve their reading skill:

- PS 8: ..... I like to read cartoon books. I try to read English cartoon books to practice my reading...
- PS 25: ..... I try to read lots of English books to practice my reading skill....
- PS 28: ..... I read an English newspaper to practice my reading...
- PRS 30: ..... I try to read lots of English books to improve my reading skill....
- PRS 32: ..... I like to read English sport news to practice my reading.

#### 4.4.2.4 OCP 4: To improve one's speaking skill

Some students reported that they attempted to find better ways to improve their speaking skill. They have many ways to improve their speaking skill.

The strategies that were reported to be employed by these students include:

- **SOCP 4.1: Try to speak English either to yourself or to other Thai people**

Trying to speak English either to themselves or to other Thai people was reported to be one of the strategies used by students to improve their speaking skill:

- PS 4: ..... I try to speak English with myself to improve my speaking skills....
- PS 19: ..... I try to speak English with my friends outside class to practice my speaking skill.

PS 31: ..... I like to speak English with my friends in class to practice my speaking skill.

PRS 9: ..... I try to speak English with my friends to improve my speaking skills....

PRS 30: ..... I try to speak English with my friends either in class or out of class to improve my speaking skills....

- **SOCP 4.2: Try to speak to foreign teachers or other foreigners**

Some students reported that tried to speak to foreign teachers or other foreigners as much as possible may be helpful in improving their speaking skill:

PRS 2: ..... I try to speak English with my teacher who is native speaker to improve my speaking...

PS 31: ..... I try to speak English with a native speaker to practice my conversation...

PRS 22: ..... I try to speak English with my foreign teachers to practice my conversation and improve my speaking.

PRS 26: ..... I like to speak English with my teacher who is native speaker to improve my speaking...

PRS 32: ..... I try to speak English with a native speaker to practice my speaking...

- **SOCP 4.3: Use the computer program such as chat program**

Some students reported that using the computer program such as 'chat' program may be helpful to improve their speaking skill:

PS 9: ..... I use internet to chat with foreigners...though I don't speak, I can practice my conversation...

PS 13: ..... I use MSN to chat with my friends or foreigners I can practice my conversation...

PS 17: ..... I use MSN to practice my conversation without speaking.

PRS 12: ..... I use the internet program to chat with foreigners, I can practice my conversation...

PRS 20: ..... I use MSN to chat with foreigners. I can practice my conversation without speaking.

- **SOCP 4.4: Try to imitate a native speaker from the media such as an English film or CD**

Some students reported that they trying to imitate a native speaker from the media such as an English film or CD, as this may be helpful in improving their speaking skill:

PS 1: ..... when listening to a tape or CD, I try to..... practice speaking after tape or CD....

PS 18: ..... while watching the English film, I try to speak after the sentences....

PS 20: ..... when listening to a tape or CD, I try to speak after the sentences. This is the way I improve my speaking skill.

PRS 8: ..... I try to follow their accent after listening to CD to practice my speaking.

PRS 27: ..... when listening to a tape or CD, I try to follow their accent. This is the way I improve my speaking skill.

- **SOCP 4.5: Attend extra-classes**

Attending extra-classes was also reported to be helpful for some students to improve their speaking skill:

PS 12: ..... I attend the extra-language class to practice my speaking with native speaker.

PS 26: ..... I attend extra class in order to learn to speak English.....

PS 31: ..... I usually go the language center to practice my speaking with native speaker.

PRS 25: ..... I can practice my speaking at extra language class.....

PRS 7: ..... I go to the extra-language class to practice my speaking with native speaker.

#### 4.4.2.5 OCP 5: To improve their writing skill

Some students reported that they attempted to find ways to improve their writing skill. They have many ways to improve their writing skill. The strategies that were reported to be employed by these students include:

- **SOCP 5.1: Correspond in English by letter or email**

Some students reported that corresponding in English by a letter or electronic mail (e-mail) may enable them to improve their writing skill:

PS 13: ..... I try to write the letter to my teacher and my friends in English to practice my writing.

PS 25: ..... I try to write e-mail to my friends in English to practice my writing.

PS 31: ..... I try to contact my teacher or my friends through e-mail in English to practice my writing.

PRS 29: ..... I try to write the letter to my friends in English to practice my writing.

PRS 32: ..... I try to contact my teacher and my friends through e-mail in English to practice my writing.

- **SOCP 5.2: Practice writing in English such as writing in a diary in English**

A few students reported that writing a diary in English is also helpful for them to improve their writing skill:

PS 6: ..... I try to write my diary in English to practice my writing...

PS 31: ..... I practice writing diary in English to improve my writing skill....

PRS 3: ..... I write my diary in English everyday to practice my writing...

PRS 4: ..... I usually write diary in English. This is the way I practice my writing skill.

PRS 27: ..... I practice my writing by writing my diary in English everyday.

- **SOCP 5.3: Use computer program such as chat program**

Some students reported using a computer programs like ‘chat’ program or ‘MSN’ program to improve their writing skill:

PS 3: ..... I use the Internet to chat with friends. I try to write in English to practice my writing...

PS 17: ..... I use the Internet to chat with friends. I try to write in English to them to practice my writing...

PS 32: ..... I use chat program to chat with foreigners, I can practice my writing.

PRS 11: ..... I use the Internet to chat with foreigners. I have to type in English. I can improve my writing skill.

PRS 21 ..... I use MSN to chat with foreigners, I can practice my writing because I have to type it in English.

- **SOCP 5.4: Attend extra-class**

Attending extra-classes was also reported to be helpful for some students to improve their writing skill:

PS 2: ..... I attend an extra-class at a private language school to learn writing...

PS 32: ..... I have a problem about writing; I’m going to a language school to practice my writing.

PRS 3: ..... I attend an extra-class at language school to learn writing...

PS 12: ..... I’m going to a language school to attend the writing course to improve my writing.

PRS 13 ..... I attend an extra-class at a private language school to practice my writing...

In summary, the language learning inventory for the present investigation was based on the data obtained through the student oral interviews which were provided by 64 Thai pre-university students from two different types of schools. Forty-three individual strategies emerged from the interview data. These forty-three language learning strategies have been classified based on the two purposes which students

reported trying to achieve. The purposes to be achieved were grouped into two main categories, i.e. in-class and out-of-class strategies. In-class strategies consist of twenty individual language learning strategies and out-of-class strategies consist of twenty-three individual language learning strategies. These two categories of language learning strategies were used to generate the strategy questionnaire which was used to elicit information about frequency of learning strategies employed by Thai pre-university students.

#### **4.5 Language Learning Strategy Questionnaire and Validation**

The next step was to generate the language learning strategy questionnaire to be used as the main instrument in the second phase for the data collection. The questionnaire was conducted in both Thai and English versions. The Thai version was used for the purpose of data collection with Thai students in order to avoid any misunderstanding of the questionnaire by the students, while the English version was used for discussion purposes of the study. After the language learning strategy inventory was generated, checking the validity was carried out with four university teachers of English. The purpose of validation was to check the content and the wording of the questionnaire. According to Denscombe (2003), the wording of the questionnaire is important to get right. The Thai version was checked for the correct language usage by the supervisor of the researcher and three Thai native speaking university teachers who have been teaching Thai for years at a university. The English version of language learning strategy questionnaire was given to the supervisor of the researcher and three Thai native teachers who have been teaching English more than ten years at the universities.



The language learning strategy questionnaire was designed to elicit the frequency of students' language learning strategy use. There were two main parts in the questionnaire: 1) students' personal information which included students' gender, type of school, field of study, and extra-language class support background; and 2) the language learning strategy use. The language learning strategy questionnaire has been divided into nine sections according to the purposes to be achieved in their language learning. Each section of the questionnaire started by asking whether the students tried to achieve the stated purpose in learning an English language or not, and then they indicated the appropriate frequency of language learning strategy use from the range 'never', 'sometimes', 'often', or 'always or almost always'. If there were some other strategies not included in the language learning strategy questionnaire, there was an open-ended choice at the end of each section in the form of 'other (please specify)' for students to fill in. However, if the response of the students was 'no', the student was asked to skip to the next section.

After the language learning strategy questionnaire was checked for the validation, the piloting of the questionnaire was conducted in order to identify the problems or gross errors within the questionnaire such as the statement items and the layout of the questionnaire so that any problems which occurred in the questionnaire could be corrected before the data collection stage took place. According to Oppenheim (1992), the pilot stage test is necessary to establish the content of validity of an instrument and also to measure of the reliability to improve the questionnaire (Cronbach, 1951, cited in Pole and Lampard, 2002).

Alpha Coefficient ( $\alpha$ ) was used in order to check the internal consistency of the questionnaire. According to Franenkel and Wallen (1993), Alpha Coefficient ( $\alpha$ )

was appropriate for calculating the reliability of the items. The reliability coefficient of .70 is acceptable as a useful rule of the thumb for research purposes. According to Wiersma and Jurs (2005) reliability coefficient measure varies from 0 to 1. If a reliability coefficient were 0, there would be no 'true' component in the observed score. On the other hand, if the reliability coefficient were 1, the observed score would contain no error, it would consist completely of the true score. A test with a reliability of 1 is one which gives precisely the same results for a particular set of candidates regardless of when it happened to be administered. What follows is the reliability estimate based on the responses from 61 students in the piloting stage.

**Table 4.2** Reliability Estimate of the Language Learning Strategy Questionnaire as a Whole and the Two Main Categories (IC and OC) and Nine Purposes

Language Learning Strategy Category	Strategy Questionnaire As a Whole	In-Class Strategy Category (IC)				Out-of-Class Strategy Category (OC)				
		ICP 1	ICP 2	ICP 3	ICP 4	OCP 1	OCP 2	OCP 3	OCP 4	OCP 5
		.93				.91				
Reliability Estimate(Alpha Coefficient $\alpha$ )	.96	.76	.72	.76	.72	.71	.78	.76	.71	.72

As seen in Table 4.2 above, the figures of reliability estimates of the language learning strategy questionnaire for the present investigation are high when compared with the acceptable reliability coefficient of .70. This can be concluded that the reliability estimates of language learning strategy questionnaire for the present investigation are acceptable. Figure 4.1 below shows a sample of the questionnaire used as the main instrument for the last phase of data collection.

1. Do you try to prepare yourself before the lessons?

Yes.

No.

If 'No', proceed to 2. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Study the lessons in advance	√			
2. Study the vocabulary in advance	√			
3. Try some exercises in advance		√		

**Figure 4.1** A Sample of the Language Learning Strategy Questionnaire

#### 4.6 Summary

This chapter has dealt with the process involved in designing the language learning strategy questionnaire which was used as the main instrument for the second phase of data collection. The chapter starts with the explanation of how the language learning strategy questionnaire was generated. The proposed language learning strategy inventory resulted from the student focus-group interviews. The results showed two main categories of language learning strategies: 1) the language learning strategies for in-class purposes; and 2) the strategies for out-of-class purposes. The first category consists of four purposes with a total of twenty individual language learning strategies. The second category consists of five purposes with a total of twenty-three individual language learning strategies.

As mentioned in Chapter 2, researchers have their own different ways to classify or categorize language learning strategies, depending on their study or their

review of literature in related areas. Although the classification systems of each researcher were different, some common characteristics exist. In other words, there were some similar language learning strategies in many researchers' strategy classifications although they are called by different names. Similar to the present investigation, the researcher categorized the language learning strategies according to the learning strategies reported from the interviewees who are now learning English in the context of Thailand. These language learning strategies were used to generate the language learning strategies questionnaire which was used to elicit pre-university student's frequency of language learning strategy use on a large scale, together with information from the background questionnaire.

The language learning strategy questionnaire used to collect the data was conducted in Thai in order to make sure that the respondents would not misunderstand each individual item of language learning strategies. There are two main parts in the language learning strategy questionnaire: the personal information and the language learning strategy use. The personal information of the respondents' part helped the researcher investigate some certain learner-related factors, i.e. gender; type of school; field of study; and English language class support. However, the only factor for the present investigation which could not be obtained through this part of the questionnaire is English language proficiency level. To examine the students' level of language proficiency, a selection of existing tests for admission entrance was used, particularly from the Ordinary National Education Test (O-NET) in English between the academic years 1999 to 2006.

# **CHAPTER 5**

## **DATA ANALYSIS FOR LANGUAGE**

### **LEARNING STRATEGY USE (I)**

#### **5.1. Introduction and Purpose of the Chapter**

The purpose of this chapter is to describe and discuss the research findings of the present investigation at different levels of data analysis. It starts with the overall use of language learning strategies (LLS's) reportedly employed by 1,816 Thai pre-university students. This is followed by the use of LLS's in two main categories and nine sub-categories. Finally, levels of use for the individual strategies the two main categories are presented in mean frequency scores together with the standard deviation.

Language learning strategies (LLS's) for the present investigation have been defined as “conscious behaviour or thought processes used in performing learning actions, whether observable (behaviours or techniques) or unobservable (thoughts or mental processes), that Thai pre-university students themselves generate and make use of to enhance their second language learning either directly or indirectly”.

Regarding the review of related literature in Chapter 2, that there are many variables which may affect the language learner's use of LLS's. These variables include gender (Ehrman and Oxford, 1989; Ehrman and Oxford, 1990; El – Dib, 2004; and Tercanlioglu, 2004), level of learners' proficiency (Liu, 2004; Khalil, 2005; and Aiqun, 2005), different cultural background (Lengkanawati, 2004),

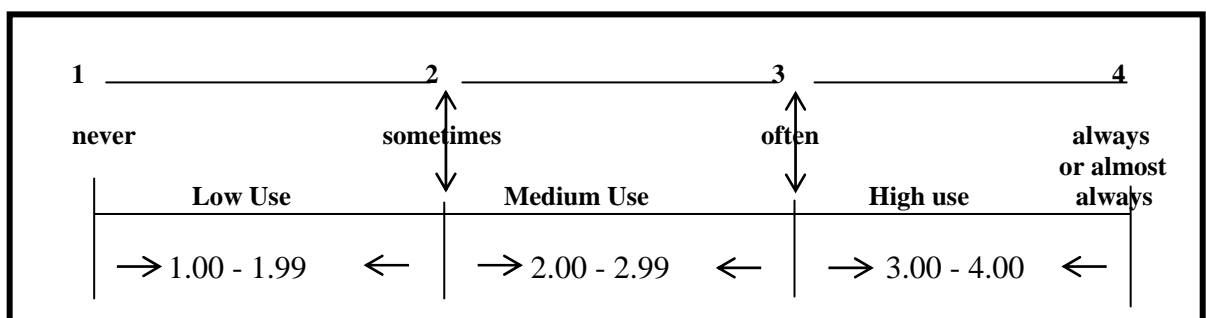
learning style (Ehrman and Oxford, 1995; and Li and Qin, 2006) and beliefs about language learning (Yang, 1999). However, it is difficult for the researcher to study all of the variables mentioned. From the review of the available studies in the field of language learning strategies in Chapter 2, most of the research, if not all, in the field of language learning strategies has been done in an academic setting, and mainly focuses on the relationships between language learning strategies and gender, level of learners' proficiency, different cultural background, and belief about language learning. In the aforementioned studies in the field of language learning strategies (mentioned in Chapter 2), to collect data, the questionnaire was most frequently-used instrument by the past researchers.

In this chapter, the frequency of overall strategy use reported by 1,816 Thai pre-university students will be explored. Then, the frequency of LLS's used for the purposes of language learning in the two categories (the in-class and out-of-class categories) and nine purposes: ICP 1: to be well-prepared for the lessons; ICP 2: to understand the lessons while studying in class; ICP 3: to solve the problems encountered in the classroom lesson; ICP 4: to learn new vocabulary in the classroom lessons; OCP 1: to gain more knowledge about vocabulary; OCP 2: to improve one's listening skill; OCP 3: to improve one's reading skill; OCP 4: to improve one's speaking skill; and OCP 5: to improve one's writing skill. Finally, the levels of use for the 43 individual strategies will be presented in mean frequency scores together with the standard deviation.

## 5.2 Language Learning Strategy Use Reported by 1,816 Thai

### Pre-University-Students

This section involves a discussion of simple statistical practices used to analyze the data from 1,816 Thai pre-university students through the language learning strategy questionnaire (LLSQ) with no significant variation patterns. Relating to the written questionnaire, the frequency of students' LLS use has been categorised into 3 categories as 'high', 'medium', and 'low' use. This is determined by students' responses to the strategy questionnaire, where the frequency of strategy use is indicated on a four-point rating scale, ranging from 'never' which is valued as 1, 'sometimes' valued as 2, 'often' valued as 3, and 'always or almost always' values as 4. According to the four scale rating point, the average value of frequency of strategy use can be valued from 1.00 to 4.00. The mid-point of the minimum and maximum values for the four-point scale is 2.50. In examining the responses to the questionnaire, the mean frequency score of strategy use for each category or item, the 'low use' level is considered to be from 1.00 to 1.99, from 2.00 to 2.99 is considered 'medium use' and 'high use' is considered to be from 3.00 to 4.00. Figure 5.1 below shows the applied measure.



(Source: Adapted from Intaraprasert 2000, p. 167)

**Figure 5.1** The applied measure

### 5.2.1 The frequency of students' overall strategy use

Table 5.1 below reveals the results of the holistic mean frequency score across the language learning strategy questionnaire responded to by 1,816 Thai pre-university students located in different geographical regions in Thailand.

**Table 5.1** Frequency of students' reported overall strategy use

Students Reported Strategy Use	Number of Students	Mean Frequency Score ( $\bar{x}$ )	Standard Deviation (S.D.)	Frequency Category
Overall Strategy Use	1,816	2.21	.50	Medium use

The mean frequency score of 2.21 in Table 5.1 indicates that as a whole, Thai pre-university students reported using language learning strategies with moderate frequency in their language learning. However, there are certain language learning strategies which fall into high use or low use categories as reported by these students, and these strategies will be presented later.

### 5.2.2 Frequency of language learning strategy use in the two main categories

For the present investigation, the language learning strategies have been grouped into two main categories. These two main categories are: 1) the in-class strategy category (IC) and the out-of-class strategy category (OC). What follows is the frequency of use of strategies in both categories.

**Table 5.2** Frequency of language learning strategy use in the IC and OC

Strategy Main Category	Number of Students	Mean Frequency Score ( $\bar{x}$ )	Standard Deviation (S.D.)	Frequency Category
1. IC	1,816	2.24	.49	Medium use
2. OC	1,816	2.19	.60	Medium use



Table 5.2 above reveals that 1,816 Thai pre-university students reported medium frequency of LLS use in both categories. In comparison, the mean frequency scores show that Thai pre-university students reported slightly more frequent use of strategies for their language learning in the in-class setting rather than the out-of-class setting. Among the use of strategies which both related to both in-class strategies and out-of-class strategies, students also reported using certain strategies to achieve certain purposes more than others. These differences in use of strategies to achieve both purposes will be discussed in the next section.

#### **5.2.2.1 Frequency of language learning strategy use to achieve in-class and out-of-class purposes (ICP and OCP)**

The previous section presented the overall of frequency of use of language learning strategies in both the in-class and out-of-class category. This section will focus more on the details of each of the language learning categories which 1,816 Thai pre-university students' reportedly use language learning strategies to achieve their purposes. For the present investigation, there are two main categories and nine purposes of language learning strategies which relate to the purposes of language learning. Four of these for in-class purposes (ICP) are in the in-class strategy category (IC) and are referred to as ICPs 1-4. Five are out-of-class purposes (OCP) and are referred to as OCPs 1-5. The nine purposes of language learning strategy use are:

- ICP 1: To be well-prepared for the lessons
- ICP 2: To understand the lessons while studying in class
- ICP 3: To solve the problems encountered in the classroom lessons
- ICP 4: To learn new vocabulary in the classroom lessons
- OCP 1: To gain more knowledge about vocabulary
- OCP 2: To improve one's listening skill
- OCP 3: To improve one's reading skill
- OCP 4: To improve one's speaking skill
- OCP 5: To improve one's writing skill

The frequency of the use of strategies to achieve the in-class purposes, as well as out-of-class purposes shows that 1,816 Thai pre-university students reported more frequent use of strategies to achieve the in-class purposes than to achieve their out-of-class purposes. Tables 5.3 and 5.4 below present mean frequency scores together with standard deviation for each purpose which students reported employing to achieve in the order of highest to lowest mean frequency scores of the use of strategies. Table 5.3 presents the strategies to achieve the in-class purposes (ICP), and Table 5.4 presents the strategies to achieve the out-of-class purposes (OCP).

**Table 5.3** Frequency of strategy use to achieve in-class purposes (ICP)

In-Class purposes	Mean ( $\bar{x}$ ) (n = 1,816)	S.D.	Frequency Category
1. ICP 2: To understand the lessons while studying in class	2.82	.67	Medium use
2. ICP 3: To solve problems encountered in the classroom lessons	2.33	.60	Medium use
3. ICP 4: To learn new vocabulary in the classroom lessons	2.22	.65	Medium use
4. ICP 1: To be well-prepared for the lessons	1.71	.70	Low use

Table 5.3 presents a picture of students' reported use of strategies to achieve the in-class purposes. Of the four in-class purposes, it shows that Thai pre-university students reported medium frequency of use of strategies in these purposes in order to understand the lessons while studying in class, solve problems encountered in the classroom lessons, and learn new vocabulary in the classroom lessons. However, these students did not seem to prepare themselves in advance for the lessons. This can be seen from their reporting low frequency of use of strategies to achieve in-class purposes.

**Table 5.4** Frequency of strategy use to achieve out-of-class purposes (OCP)

<b>Out-of-Class purposes</b>	<b>Mean (<math>\bar{x}</math>) (n = 1,816)</b>	<b>S.D.</b>	<b>Frequency Category</b>
<b>1. OCP 1:</b> To gain more knowledge about vocabulary	<b>2.34</b>	<b>.77</b>	<b>Medium use</b>
<b>2. OCP 2:</b> To improve one's listening skill	<b>2.31</b>	<b>.73</b>	<b>Medium use</b>
<b>3. OCP 3:</b> To improve one's reading skill	<b>2.28</b>	<b>.71</b>	<b>Medium use</b>
<b>4. OCP 4:</b> To improve one's speaking skill	<b>2.09</b>	<b>.70</b>	<b>Medium use</b>
<b>5. OCP 5:</b> To improve one's writing skill	<b>1.88</b>	<b>.69</b>	<b>Low use</b>

Table 5.4 above reveals that 1,816 Thai pre-university students' reported use of strategies to achieve the out-of-class purposes. Of the five out-of-class purposes, it shows that Thai pre-university students reported medium use of strategies in these purposes in order to gain more knowledge about vocabulary, improve one's listening skill, improve one's reading skill, and improve one's speaking skill. However, Table 5.4 above also reveals that these students did not pay as much attention to improving their writing skill as to the other three skills (listening, reading, and speaking). The next section will discuss in more detail which individual language learning strategies have been reported more frequently than others.

### **5.2.3 Frequency of individual language learning strategy use for language learning**

This section concentrates on the details of the 43 individual language learning strategies (LLSs) in which 1,816 Thai pre-university students reported employing to achieve their language learning purposes as well as language learning improvement in general. These strategies were reportedly employed for language learning not only in the normal classroom setting but also the outside classroom setting. To give a clearer picture of students' use of language learning strategies to achieve their language

learning purposes in the normal classroom setting and the outside classroom setting in order to improve their language learning in general, all 43 individual language learning strategies are presented. Tables 5.5 and 5.6 below present mean frequency scores together with standard deviation of each language learning strategy which students reported employing to achieve purposes in the order of their mean frequency scores, ranging from the highest to lowest. The greater the mean frequency score of strategy use implies that students claim to employ that strategy more frequently. Likewise, the lesser the mean frequency score of strategy use implies that students claim to employ that strategy infrequently.

### 5.2.3.1 Frequency of individual strategy use related to in-class purposes

Table 5.5 below shows the frequency of individual language learning strategy use in the in-class strategy category which contains 20 individual language learning strategies (LLS's) reportedly employed by 1,816 Thai pre-university students under the present investigation in order to understand in the classroom lessons better.

**Table 5.5** Frequency of strategy use to achieve in-class purposes based on the mean score

In-class strategies	Mean ( $\bar{x}$ )	S.D.	Frequency Category
1. <b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	3.12	.78	High use
2. <b>SICP 2.2:</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	2.97	.86	Medium use
3. <b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons	2.80	.86	Medium use
4. <b>SICP 2.4:</b> Try not to talk with other students while studying to understand while studying in class	2.64	.79	Medium use
5. <b>SICP 4.1:</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	2.64	.93	Medium use
6. <b>SICP 2.3:</b> Try to get a seat in the front row to understand the lessons while studying in class	2.57	1.01	Medium use

**Table 5.5** (Cont.) Frequency of strategy use to achieve in-class purposes based on the mean score

<b>In-class strategies</b>	<b>Mean <math>\bar{x}</math></b>	<b>S.D.</b>	<b>Frequency Category</b>
<b>7. SICP 4.5:</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	<b>2.46</b>	<b>.90</b>	<b>Medium use</b>
<b>8. SICP 3.5:</b> Study by oneself to solve the problems encountered in the classroom lessons	<b>2.28</b>	<b>.80</b>	<b>Medium use</b>
<b>9. SICP 3.4:</b> Ask people other than one's teacher or classmates to solve the problems encountered in the classroom lessons	<b>2.26</b>	<b>.85</b>	<b>Medium use</b>
<b>10. SICP 3.1:</b> Ask the teacher in class either immediately or when appropriate to solve the problems encountered in the classroom lessons	<b>2.26</b>	<b>.79</b>	<b>Medium use</b>
<b>11. SICP 4.3:</b> Look at the root of a new vocabulary to learn new vocabulary in classroom lessons	<b>2.13</b>	<b>.83</b>	<b>Medium use</b>
<b>12. SICP 4.4:</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	<b>2.10</b>	<b>.78</b>	<b>Medium use</b>
<b>13. SICP 4.2:</b> Make lists of a new vocabulary with their meaning to learn new vocabulary in the classroom lessons	<b>2.09</b>	<b>.84</b>	<b>Medium use</b>
<b>14. SICP 3.2:</b> Ask teachers after class to solve the problems encountered in the classroom lessons	<b>2.09</b>	<b>.76</b>	<b>Medium use</b>
<b>15. SICP 4.6:</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	<b>1.96</b>	<b>.79</b>	<b>Low use</b>
<b>16. SICP 1.4:</b> Do the revision of the previous lessons either by oneself or with classmates to be well-prepared for the lessons	<b>1.79</b>	<b>.83</b>	<b>Low use</b>
<b>17. SICP 1.2:</b> Study the vocabulary in advance to be well-prepared for the lessons	<b>1.73</b>	<b>.78</b>	<b>Low use</b>
<b>18. SICP 1.5:</b> Attend extra classes to be well-prepared for the lessons	<b>1.72</b>	<b>1.01</b>	<b>Low use</b>
<b>19. SICP 1.1:</b> Study the lessons in advance to be well-prepared for the lessons	<b>1.67</b>	<b>.72</b>	<b>Low use</b>
<b>20. SICP 1.3:</b> Try some exercises in advance to be well-prepared for the lessons	<b>1.63</b>	<b>.72</b>	<b>Low use</b>

Based on the mean frequency score, Table 5.5 reveals that 1,816 Thai pre-university students' reported use of 20 individual language learning strategies in order to help them understand the lessons better in a normal classroom. However, it is apparently evidenced that, the only SICP students reported employing is at the high frequency level is SICP 2.2 listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class. On the other hand, six of the SICPs in this category that students reported employing at the low level are SICPs 1.1-1.5, and 4.6. The rest of the individual language learning strategies are reportedly being employed at medium use for in-class purposes.

A closer look at the frequency level of strategy use in IC as a whole reveals that, five in six of the strategies which appear to be reported 'low use' are those dealing with preparing themselves for classroom lessons in advance (e.g. study the lessons in advance to be well-prepared for the lessons). It can be shown that students do not pay much attention to preparing for the next lesson.

### 5.2.3.2 Frequency of individual strategy use related to out-of-class purposes

Table 5.6 below shows the frequency of individual language learning strategy use in the OC which contains 23 individual language learning strategies (LLS's) reportedly employed by 1,816 Thai pre-university students under the present investigation in order to improve language skills in general (e.g. to gain more knowledge about vocabulary and to improve speaking skill).

**Table 5.6** Frequency of strategy use to achieve out-of-class purposes based on mean score

<b>Out-of-class strategies</b>	<b>Mean <math>\bar{x}</math></b>	<b>S.D.</b>	<b>Frequency Category</b>
<b>1. SOCP 1.4:</b> Listen to English songs to gain more knowledge about vocabulary	<b>2.59</b>	<b>.98</b>	<b>Medium use</b>
<b>2. SOCP 2.2:</b> Listen to English songs to improve one's listening skill	<b>2.57</b>	<b>.95</b>	<b>Medium use</b>
<b>3. SOCP 1.1:</b> Play games in English such as computer games to gain more knowledge about vocabulary	<b>2.47</b>	<b>1.01</b>	<b>Medium use</b>
<b>4. SOCP 3.2.:</b> listen to English songs to improve one's reading skill	<b>2.47</b>	<b>.91</b>	<b>Medium use</b>
<b>5. SOCP 2.1:</b> Watch English-speaking films with or without English subtitles in order to improve one's listening skill	<b>2.38</b>	<b>.88</b>	<b>Medium use</b>
<b>6. SOCP 3.1:</b> Watch English-speaking films to improve one's reading skill	<b>2.37</b>	<b>.89</b>	<b>Medium use</b>
<b>7. SOCP 1.3:</b> Watch English speaking films to gain more knowledge about vocabulary	<b>2.33</b>	<b>.94</b>	<b>Medium use</b>
<b>8. SOCP 4.4:</b> Try to imitate a native speaker from the media such as English films or CDs to improve one's speaking skill	<b>2.29</b>	<b>.93</b>	<b>Medium use</b>
<b>9. SOCP 2.4:</b> Watch television programs in English to improve one's listening skill	<b>2.28</b>	<b>.87</b>	<b>Medium use</b>

**Table 5.6** (Cont.) Frequency of strategy use to achieve out-of-class purposes based on mean score

<b>Out-of-class strategies</b>	<b>Mean (<math>\bar{x}</math>)</b>	<b>S.D.</b>	<b>Frequency Category</b>
<b>1. SOCP 1.4:</b> Listen to English songs to gain more knowledge about vocabulary	<b>2.59</b>	<b>.98</b>	<b>Medium use</b>
<b>2. SOCP 2.2:</b> Listen to English songs to improve one's listening skill	<b>2.57</b>	<b>.95</b>	<b>Medium use</b>
<b>3. SOCP 1.1:</b> Play games in English such as computer games to gain more knowledge about vocabulary	<b>2.47</b>	<b>1.01</b>	<b>Medium use</b>
<b>4. SOCP 3.2.:</b> listen to English songs to improve one's reading skill	<b>2.47</b>	<b>.91</b>	<b>Medium use</b>
<b>5. SOCP 2.1:</b> Watch English-speaking films with or without English subtitles in order to improve one's listening skill	<b>2.38</b>	<b>.88</b>	<b>Medium use</b>
<b>6. SOCP 3.1:</b> Watch English-speaking films to improve one's reading skill	<b>2.37</b>	<b>.89</b>	<b>Medium use</b>
<b>7. SOCP 1.3:</b> Watch English speaking films to gain more knowledge about vocabulary	<b>2.33</b>	<b>.94</b>	<b>Medium use</b>
<b>8. SOCP 4.4:</b> Try to imitate a native speaker from the media such as English films or CDs to improve one's speaking skill	<b>2.29</b>	<b>.93</b>	<b>Medium use</b>
<b>9. SOCP 2.4:</b> Watch television programs in English to improve one's listening skill	<b>2.28</b>	<b>.87</b>	<b>Medium use</b>
<b>10. SOCP 3.5:</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	<b>2.26</b>	<b>.84</b>	<b>Medium use</b>
<b>11. SOCP 3.4:</b> Watch television programs in English to improve one's reading skill	<b>2.24</b>	<b>.84</b>	<b>Medium use</b>
<b>12. SOCP 4.1:</b> Try to speak English either to oneself or to other Thai people to improve one's speaking skill	<b>2.23</b>	<b>.85</b>	<b>Medium use</b>
<b>13. SOCP 1.2:</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	<b>2.20</b>	<b>.86</b>	<b>Medium use</b>
<b>14. SOCP 1.5:</b> Attend extra-classes to gain more knowledge about vocabulary	<b>2.14</b>	<b>1.12</b>	<b>Medium use</b>
<b>15. SOCP 3.3:</b> Listen to English conversation from CD to improve one's reading skill	<b>2.06</b>	<b>.83</b>	<b>Medium use</b>
<b>16. SOCP 4.2:</b> Try to speak to foreigners, either teachers or other foreigners to improve one's speaking skill	<b>2.05</b>	<b>.82</b>	<b>Medium use</b>
<b>17. SOCP 2.3:</b> Listen to English conversation from CD to improve one's listening skill	<b>2.04</b>	<b>.84</b>	<b>Medium use</b>
<b>18. SOCP 4.5:</b> Attend extra-classes to improve one's speaking skill	<b>2.02</b>	<b>1.06</b>	<b>Medium use</b>
<b>19. SOCP 5.4:</b> Attend extra-classes to improve one's writing skill	<b>2.01</b>	<b>1.07</b>	<b>Medium use</b>
<b>20. SOCP 5.1:</b> Correspond in English by letter or email to improve one's writing skill	<b>1.92</b>	<b>.89</b>	<b>Low use</b>
<b>21. SOCP 5.3:</b> Use a computer programs such as a chat program improve one's writing skill	<b>1.88</b>	<b>.91</b>	<b>Low use</b>
<b>22. SOCP 4.3:</b> Use the computer programs such as a chat program to improve one's speaking skill	<b>1.88</b>	<b>.91</b>	<b>Low use</b>
<b>23. SOCP 5.2:</b> Practice writing in English such as writing diary to improve one's writing skill	<b>1.73</b>	<b>.79</b>	<b>Low use</b>

Table 5.6 reveals that 1,816 Thai pre-university students' reported use of 23 individual language learning strategies in order to help them improve their language abilities in general. Based on the mean frequency score, the students reported employing four individual strategies at the low frequency level. These strategies mainly are those dealing with writing skill. To be more specific, students reported low frequency use of these strategies to improve the writing skill (SOCPs 5.1-5.3). Students also reported SOCP 4.3 at the low frequency level. It can be shown that students did not improve their speaking skill by the using computer programs such as chat programs. When considering the reported frequency of use of the other strategies in OC, we can see that more than half of the strategies in OC were reported at medium frequency use. However, there was no any individual strategy in this category which was found to be reported at high frequency use by these Thai pre-university students.

### **5.3 Summary**

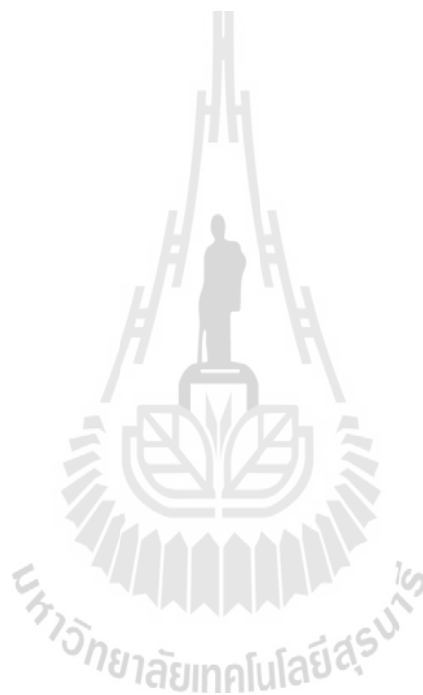
This chapter demonstrates frequency of language learning strategy use at different levels reported by 1,816 Thai pre-university students. The description of frequency of language learning strategy use started first with an overall picture of strategy use, followed by language learning strategies in two main categories: IC and OC. Moreover, the frequency level of 43 individual language learning strategy use based on the mean score that students reported employing to achieve the particular purposes of language learning was analyzed and presented. What follows is a highlight of the findings of the present investigation.

1. 1,816 Thai pre-university students reported employing language learning strategies with medium frequency of use in the overall view of language learning strategy use.



2. Students reported medium frequency of language learning strategy use in both categories. In comparing, the mean frequency scores show that Thai pre-university students reported slightly more frequent use of strategies for their language learning in the classroom setting rather than the outside classroom setting.
3. In terms of using strategies to achieve in-class purposes, students reported employing strategies at the medium frequency level of use in SICPs 2-4. For SICP 1, students reported this strategy at the low frequency level of use.
4. In terms of using strategies to achieve out-of-class purposes, students reported employing strategies at the medium frequency level of use in SOCPs 1-4. Students reported SOCP 5 at the low frequency level of use.
5. In terms of using individual in-class strategies, based on the mean frequency score, language learning strategy use at the high frequency level in the in-class category is SICP 2.1-‘listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class’. The low frequency level in the in-class category is SICP 1.3-‘try some exercises in advance to be well-prepared for the lessons’.
6. In terms of using individual out-of-class strategies, based of the mean frequency score, language learning strategy use at the high frequency level in the out-of-class category is SOCP 1.4-‘listen to English songs to gain more knowledge about vocabulary’. The low frequency level in the out-of-class category is OCP 5.2-‘practice writing in English such as writing a diary to improve one's writing skill’.

This chapter has examined the frequency level of strategy use reportedly employing by 1,816 Thai pre-university students as a whole, the frequency level of strategy use in two main categories and nine purposes. Finally, an analysis of frequency level of strategy use for the individual strategy in each of the two main and nine purposes was presented in the mean frequency scores together with the standard deviation, ranging from the highest to the lowest.



# **CHAPTER 6**

## **DATA ANALYSIS FOR LANGUAGE**

### **LEARNING STRATEGY USE (II)**

#### **6.1 Introduction and Purpose of the Chapter**

Chapter 6 revealed the students' reported strategy use for language learning, which is divided into four different levels, including the overall language learning strategy use; use of two main strategy categories; use of strategies to achieve nine purposes of IC or OC; and use of 43 individual language learning strategies. This chapter is dedicated to examining significant variations and patterns of variation in frequency of language learning strategy use at each of the four different levels reportedly employed by 1,816 Thai pre-university students and five examined variables.

The primary purpose of this chapter is to investigate the relationship between the language learning strategy use of 1,816 Thai pre-university students and the five variables, namely:

1. The students' gender (male and female)
2. The students' field of study (science-oriented and non science-oriented)
3. The type of the school (public school and private school)
4. The extra-language learning class (extra-class support and non extra-class support)
5. The students' language proficiency levels (high, moderate, and low)

In order to present the results of data analysis in this chapter, it starts with variations (OC). Then, students' use of both in-class and out-of class strategies, which students reported employing to achieve both in-class and out-of class purposes. Finally, students' use of individual language learning strategies by the five variables will be presented. The main data analyses carried out for this section is an analysis of variance (ANOVA), the chi-square test, and a factor analysis:

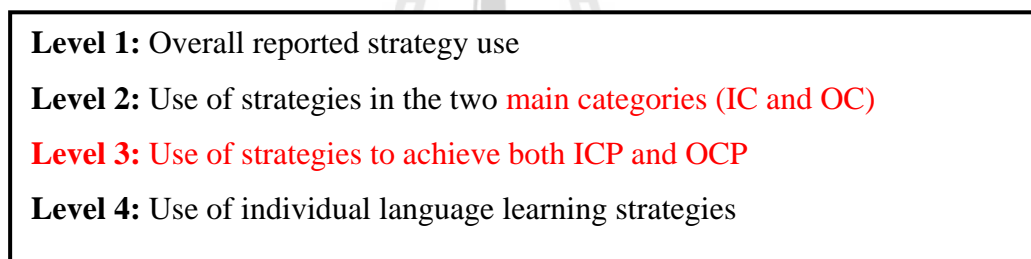
1.) An analysis of variance (ANOVA), is a statistical method used to determine patterns of variation in students' overall reported strategy use, and use of strategies to achieve both in-class and out-of class purposes, in relation to the five variables. If there is a significant overall difference occurring in students' language proficiency levels as a result of ANOVA, the post-hoc Scheffé test is used to identify which differences between particular pairs of means contribute to the overall difference.

2.) The chi-square test ( $\chi^2$ ), is a statistical method used to determine and check the significant variation patterns in frequency of students' reported strategy use of the 43 individual strategies in relationship with students' gender, students' field of study, type of the school, the extra-language learning class, and students' language proficiency levels. This test compares the frequencies with which students reported different responses on the 4-point rating scale ('never' (1), 'sometimes' (2), 'often' (3) and 'always or almost always' (4)). In the chi-square test for the present investigation, the responses of 'never' (1) and 'sometimes' (2) were consolidated into a 'low strategy use' category whereas 'often' (3) and 'always or almost always' (4) were merged into a 'high strategy use' category. This is because, according to Green and Oxford (1995), the purpose of consolidating the four response levels into two

categories of strategy use is to obtain cell sizes with expected values high enough to ensure a valid analysis.

3.) Factor analysis was used in order to find out the underlying patterns of language learning strategies which emerge from such analysis as well as the patterns of variation which are strongly related to each of the five variables of the present investigation (students' gender, students' field of study, type of the school, extra-language learning class, and students' language proficiency levels).

The Figure 6.1 below presents the four main levels of data analysis for students' reported language learning strategy use in order to give a clear picture of how the data of the present investigation are analysed.



**Figure 6.1** The four main levels of data analysis for language learning strategy use

## **6.2 Variation in students' overall reported language learning strategy use**

This section involves variation in students' reported strategy use as a whole for language learning based on the analysis of variation (ANOVA). This statistical method demonstrates significant variation according to the gender of student, field of study, type of school, extra-class support, and level of language proficiency. The ANOVA results are summarized in Table 6.1 below. Each table consists of the

independent variable, mean frequency score of strategy use ( $\bar{x}$ ), standard deviation (S.D.), level of significance, and pattern of variation in frequency of students' strategy use (if a significant variation exists).

**Table 6.1** A summary of variation in students' overall reported language learning strategy use

Gender	Male (n=643)		Female (n=1173)		Comments			
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation		
Overall Strategy Use	2.16	.53	2.25	.48	p < .001	Female > Male		
Field of Study	Science (n=1027)		Non-Science (n=789)		Comments			
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation		
Overall Strategy Use	2.23	.49	2.19	.51	N.S.	-		
Type of School	Public School (n=985)		Private School (n=831)		Comments			
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation		
Overall Strategy Use	2.20	.52	2.22	.48	N.S.	-		
Extra-Language Class	Extra-Class Support (n=837)		Non Extra-Class Support (n=979)		Comments			
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation		
Overall Strategy Use	2.34	.52	2.11	.46	p < .01	Extra-Class Support > Non Extra-Class support		
Proficiency Level	Low (n=1388)		Moderate (n=358)		High (n=70)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
Overall Strategy Use	2.16	.49	2.35	.46	2.61	.67	p < .01	High > Moderate > Low

According to Table 6.1 the ANOVA results show that the frequency of students' overall strategy use as a whole varied significantly according to their gender ( $p < .001$ ), extra-class support, and students' language proficiency levels ( $p < .01$ ).

In terms of students' gender, the results from the analysis of variance (ANOVA) show significant differences between male and female students. The mean frequency scores of male and female were 2.16 and 2.25 respectively. This shows that, as a whole, female students reported employing language learning strategies significantly more frequently than male students.

According to the extra-class support, the results from ANOVA show that there were significant differences between students who study the extra-language classes and students who did not study or attend any extra-language classes. The mean frequency scores from Table 6.1 above shows that students who have studied or attended any the extra-language classes reported employing overall language learning strategies significantly more frequently than those who did not study or attend any extra-language classes.

With regard to student's level of language proficiency for the present investigation, students' language proficiency levels were determined according to their scores obtained through the test in English Language Proficiency Test for Pre-University Students which was selected from different existing tests by the researcher. The "post-hoc Scheffé Test" shows significant differences among the students with high-moderate-low language proficiency levels. The mean frequency scores were 2.61 and 2.35 and 2.16 respectively. This indicates that the high language proficiency level students reported greater overall strategy use of language learning strategies than the moderate and low language proficiency level students. Likewise, the mean frequency

scores between the moderate and low language proficiency level students which were 2.35 and 2.17 showed that there was significant difference between these two groups of the student's level of language proficiency. In other words, the higher the students' language proficiency level was, the higher their frequency use was. What follow are the ANOVA results for the use of strategies in the two main categories.

### **6.3 Variation in frequency of students' use of strategies in the two main categories: IC and OC**

The language learning strategies for the present investigation have been grouped into two main categories, i.e. In-Class Strategy Category (IC) and Out-Of-Class Strategy Category (OC). The results of ANOVA reveal that the frequency of students' reported use of language learning strategies in the IC varied significantly according to their gender, field of study, extra-language class support, and level of language proficiency, but did not vary according to type of school. Significant variations in frequency of students' reported use of language learning strategies in the OC were found in relation to the extra-language class support, and level of language proficiency, but did not vary according to gender, type of school, or field of study. The ANOVA results showing the frequency of students' use of strategies in the two main categories according to the five variables are presented in Table 6.2 below.

#### **6.3.1 Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to gender**

Based on the results of ANOVA, Table 6.2 below demonstrates variations in students' language learning strategy use in the two main categories according to their gender.



**Table 6.2** Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to gender

Strategy Category	Male (n=643)		Female (n=1173)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
IC	2.16	.52	2.29	.47	p < .01	Female > Male
OC	2.15	.63	2.21	.57	p < .05	Female > Male

The results of ANOVA in Table 6.2 above show significant differences in the use of language learning strategies in order to understand the classroom lessons better and to expand and improve their language skills in general, with female students reportedly employing the strategies significantly more frequently than their male counterparts. The mean frequency scores for the IC were 2.16 and 2.29, and those for OC were 2.15 and 2.21 respectively, all of which are considered 'medium' frequency of language learning strategy use according to the criteria mentioned in Chapter 5. What follows is the variation in frequency of students' use of strategies in IC and OC according to field of study.

### **6.3.2 Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to field of study**

The results of ANOVA in Table 6.3 below show variations in students' language learning strategy use in the two main categories: IC and OC, according to their field of study.

**Table 6.3** Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to field of study

Strategy Category	Science (n=1027)		Non Science (n=789)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
IC	2.27	.48	2.22	.51	P<.05	Science > Non science
OC	2.20	.60	2.17	.59	N.S.	-

As seen in Table 6.3 above, based on the results of ANOVA, significant difference was found in the use of language learning strategies in order to understand the classroom lessons better, with science-oriented students reportedly employing the strategies significantly more frequently than non science-oriented students. However, no significant difference was found in the use of strategies to expand and improve their language skills in general according to the field of study. The mean frequency scores for the IC were 2.27 and 2.22, and those for OC were 2.20 and 2.17 respectively, all of which are considered 'medium' frequency of language learning strategy use according to the criteria mentioned in Chapter 5. What follows is the variation in frequency of students' use of strategies in IC and OC according to type of school.

### **6.3.3 Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to type of school**

The results of ANOVA in Table 6.4 below show variations in students' language learning strategy use in the two main categories: IC and OC, according to their type of school.

**Table 6.4** Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to type of school

Strategy Category	Public School (n=985)		Private School (n=831)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
IC	2.22	.51	2.26	.46	N.S.	-
OC	2.19	.60	2.19	.59	N.S.	-

The ANOVA results shown in Table 6.4 above demonstrate no significant differences in the use of language learning strategies in order to understand the classroom lessons better and to expand and improve their language skills in general according to type of schools. Though no significant differences in such use of language learning strategies have been found in this investigation, students studying in different types of schools reported a 'medium' frequency of language learning strategy use according to the criteria mentioned in Chapter 5. To put it simply, the results of ANOVA reveal that students studying in both types of schools did not differ in terms of their employment of learning strategies in either IC or OC. What follows is the variation in frequency of students' use of strategies in IC and OC according to extra-language class support.

#### **6.3.4 Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to extra-language class support**

The results of ANOVA in Table 6.5 below show variations in students' language learning strategy use in the two main categories: IC and OC, according to their extra-language class support.

**Table 6.5** Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to extra-language class support

Strategy Category	Extra-Class Support (n=837)		Non Extra-Class Support (n=979)		Significance Level	Comments
	$\bar{x}$	S.D.	$\bar{x}$	S.D.		
IC	2.32	.52	2.17	.45	P < .01	Extra-class support > Non extra-class support
OC	2.35	.61	2.06	.55	P < .01	Extra-class support > Non extra-class support

The results of ANOVA in Table 6.5 above show significant differences in the use of language learning strategies in order to understand the classroom lessons better and to expand and improve their language skills in general, with students who attended extra-language classes outside the regular class time reportedly employing the strategies significantly more frequently than those who did not. The mean frequency scores for the IC were 2.32 and 2.17, and those for OC were 2.35 and 2.06 respectively, all of which are considered 'medium' frequency of language learning strategy use according to the criteria mentioned in Chapter 5. What follows is the variation in frequency of students' use of strategies in IC and OC according to level of language proficiency.

### **6.3.5 Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to level of language proficiency**

The results of ANOVA in Table 6.6 below show variations in students' language learning strategy use in the two main categories: IC and OC, according to their level of language proficiency. The results of ANOVA show significant differences in the use of language learning strategies in order to understand the classroom lessons better and to expand and improve their language skills in general,

with higher language proficiency level students reportedly employing the strategies significantly more frequently than either moderate or lower language proficiency level students. The mean frequency scores for the IC were 2.58, 2.36 and 2.20, and those for OC were 2.63, 2.34 and 2.13 respectively, all of which are considered 'medium' frequency of language learning strategy use according to the criteria mentioned in Chapter 5.

**Table 6.6** Variation in frequency of students' use of strategies in the two main categories: (IC and OC) according to level of language proficiency

Strategy Category	High (n=70)		Moderate (n=358)		Low (n=1388)		Significance Level	Comments Pattern of Variation
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	$\bar{x}$	S.D.		
IC	2.58	.73	2.36	.46	2.20	.48	P < .01	High > Moderate > Low
OC	2.63	.70	2.34	.55	2.13	.59	P < .01	High > Moderate > Low

In summary, based on the results of ANOVA, the use of strategies in IC, the gender of students, the field of study, the extra-language class support, and the language proficiency levels of students seemed to have a relationship with students' choices of strategy employment. However, the type of school did not seem to have much relationship with students' choices of strategy employment. Students studying at public schools or private schools reported employing strategies in more or less the same way when dealing with language learning in the classroom to understand lessons better.

In terms of the use of strategies in OC, the field of study and the type of school did not seem to have a significant relationship with students' choices of strategy employment. Science-oriented and non science-oriented students studying at public or private schools reported employing strategies in quite the same way in order to

expand and improve their language skills in general. However, the gender of students, the extra-language class support, and the language proficiency levels of students still seemed to have a relationship with students' choices of strategy employment. Below is a summary of significant variations in frequency of use strategies in the IC and OC according to the five variables.

**Table 6.7** A summary of significant variations in frequency of use strategies in the IC and OC according to the five variables

Strategy Category	Gender	Field of Study	Type of School	Extra-Language Class Support	Language Proficiency Levels
IC	YES	YES	N.S.	YES	YES
OC	YES	N.S.	N.S.	YES	YES

**Note:** A significant variation is specified with 'Yes' and non-significant is specified with 'N.S.'

#### 6.4 Variation in use of strategies to achieve in-class and out-of-class purposes

The strategy inventory for the present investigation has been classified according to the students' reported employment of strategies to achieve language learning purposes. There are nine purposes classified under two main categories, i.e. IC and OC (see Chapter 5, Section 5.2.2.1 for details of the purposes). Four purposes were classified as strategies to achieve in-class purposes (ICP), and five were classified as strategies to achieve out-of-class purposes (OCP).

In this section, the ANOVA results for use of strategies to achieve the in-class purposes, together with those for use of strategies to achieve the out-of-class purposes by the five variables are presented in Tables 6.8 - 6.12.

#### 6.4.1 Variation in use of strategies to achieve the in-class purposes and the out-of-class purposes according to gender

The results of ANOVA in Table 6.8 below show variations in students' language learning strategy use to achieve the in-class purposes and the out-of-class purposes, according to their gender.

**Table 6.8** Variations in students' language learning strategy to achieve the in- class purposes and the out-of-class purposes, according to their gender

Strategy Category	Male (n=643)		Female (n=1173)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
<b>ICP 1</b>	1.69	.69	1.72	.71	N.S.	-
<b>ICP 2</b>	2.64	.70	2.93	.64	P < .01	Female > Male
<b>ICP 3</b>	2.25	.65	2.39	.58	P < .01	Female > Male
<b>ICP 4</b>	2.18	.68	2.26	.63	P < .05	Female > Male
<b>OCP 1</b>	2.31	.82	2.36	.75	N.S.	-
<b>OCP 2</b>	2.26	.76	2.35	.72	P < .05	Female > Male
<b>OCP 3</b>	2.20	.75	2.32	.69	P < .01	Female > Male
<b>OCP 4</b>	2.05	.73	2.12	.69	P < .05	Female > Male
<b>OCP 5</b>	1.91	.74	1.87	.67	N.S.	-

The results of ANOVA in Table 6.8 above show significant variations by gender in frequency of use of strategies to achieve three in-class purposes and three out-of-class purposes. Female students reported use of in-class strategies to achieve three in-class purposes significantly more frequently than male students did. The only one in-class purpose that was not reported to have a significant difference by gender in the use of language learning strategy to achieve in-class purposes was ICP 1: to be well-prepared for the lessons. For the out-of-class purposes, like in-class purposes, female students also reported use of in-class strategies to achieve three out-of-class purposes significantly more frequently than male students did. However, two out-of-class purposes were found to have no significant differences by gender in the use of

strategies to achieve out-of-class purposes, namely OCP 1: to gain more knowledge about vocabulary, and OCP 5: to improve one's writing skill.

In the overall picture, female students reported higher frequency use of strategies to achieve both in-class and out-of-class purposes than male students did. What follows is the variation in use of strategies to achieve the in-class and the out-of-class purposes according to field of study.

#### 6.4.2 Variation in use of strategies to achieve the in-class purposes and the out-of-class purposes according to field of study

The results of ANOVA in Table 6.9 below show variations in students' language learning strategy use to achieve the in-class purposes and the out-of-class purposes, according to their field of study.

**Table 6.9** Variations in students' language learning strategy to achieve the in-class purposes and the out-of-class purposes, according to field of study

Strategy Category	Science (n=1027)		Non Science (n=789)		Significance Level	Comments Pattern of Variation
	$\bar{x}$	S.D.	$\bar{x}$	S.D.		
ICP 1	1.71	.71	1.70	.70	N.S.	-
ICP 2	2.87	.63	2.76	.72	P < .01	Science > Non science
ICP 3	2.37	.60	2.30	.61	P < .05	Science > Non science
ICP 4	2.24	.65	2.21	.65	N.S.	-
OCP 1	2.37	.77	2.31	.78	N.S.	-
OCP 2	2.30	.72	2.33	.75	N.S.	-
OCP 3	2.28	.70	2.29	.73	N.S.	-
OCP 4	2.10	.72	2.08	.70	N.S.	-
OCP 5	1.91	.71	1.85	.68	N.S.	-

The results of ANOVA in Table 6.9 above reveal that only the frequency with which students use in-class strategies aimed at understanding the lessons while studying in class (ICP 2) and solving the problems encountered in the classroom lessons (ICP 3) show significant variation. In this case, private school students



reported more frequent use of strategies to achieve this purpose than public school students did.

The overall picture of students' reported strategy use in order to achieve both in-class and out-of-class purposes reveal that both public school and private school students appeared to report a similar level of frequency of strategy use. When we look at the mean frequency scores of use of strategies, we can see that private school students reported slightly less frequent use of strategies in order to achieve almost every purpose except preparing themselves for the coming lessons and learning new vocabulary in the classroom lesson, where public school students reported slightly lower use of strategies in order to achieve these purposes than private school students did. What follows is the variation in use of strategies to achieve the in-class and the out-of-class purposes according to extra-language class support.

#### 6.4.3 Variation in use of strategies to achieve the in-class purposes and the out-of-class purposes according to type of school

The results of ANOVA in Table 6.10 below show variations in students' language learning strategy use to achieve the in-class purposes and the out-of-class purposes, according to their school type.

**Table 6.10** Variations in students' language learning strategy to achieve the in-class purposes and the out-of-class purposes, according to type of school

Strategy Category	Public School (n=985)		Private School (n=831)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
ICP 1	1.70	.73	1.72	.67	N.S.	-
ICP 2	2.75	.68	2.91	.66	P < .01	Private > Public
ICP 3	2.35	.62	2.33	.60	N.S.	-
ICP 4	2.23	.66	2.23	.65	N.S.	-
OCP 1	2.35	.79	2.34	.76	N.S.	-
OCP 2	2.32	.75	2.32	.71	N.S.	-

**Table 6.10** (Cont.) Variations in students' language learning strategy to achieve the in-class purposes and the out-of-class purposes, according to type of school

Strategy Category	Public School (n=985)		Private School (n=831)		Comments	
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	Significance Level	Pattern of Variation
<b>OCP 3</b>	2.29	.72	2.28	.71	N.S.	-
<b>OCP 4</b>	2.10	.72	2.09	.69	N.S.	-
<b>OCP 5</b>	1.87	.69	1.09	.70	N.S.	-

The results of ANOVA in Table 6.10 above reveal that only the frequency with which students use in-class strategies aimed at understanding the lessons while studying in class (ICP 2) shows significant variation. In this case, private school students reported more frequent use of strategies to achieve this purpose than public school students did.

The overall picture of students' reported strategy use in order to achieve both in-class and out-of-class purposes reveal that both public school and private school students appeared to report a similar level of frequency of strategy use. When we look at the mean frequency scores of use of strategies, we can see that private school students reported slightly less frequent use of strategies in order to achieve almost every purpose except preparing themselves for the coming lessons and learning new vocabulary in the classroom lesson, where public school students reported slightly lower use of strategies in order to achieve these purposes than private school students did. What follows is the variation in use of strategies to achieve the in-class and the out-of-class purposes according to extra-language class support.

#### 6.4.4 Variation in use of strategies to achieve the in-class purposes and the out-of-class purposes according to extra-language class support

The results of ANOVA in Table 6.11 below show variations in students' language learning strategy use to achieve the in-class purposes and the out-of-class purposes, according to their extra-language class support.

**Table 6.11** Variations in students' language learning strategy to achieve the in-class purposes and the out-of-class purposes, according to extra- language class support

Strategy Category	Extra-Class Support (n=837)		Non Extra-Class Support (n=979)		Significance Level	Comments Pattern of Variation
	$\bar{x}$	S.D.	$\bar{x}$	S.D.		
ICP 1	1.84	.78	1.60	.61	P < .01	Extra-class support > Non extra-class support
ICP 2	2.88	.69	2.78	.67	P < .01	Extra-class support > Non extra-class support
ICP 3	2.39	.63	2.30	.58	P < .01	Extra-class support > Non extra-class support
ICP 4	2.32	.66	2.16	.64	P < .01	Extra-class support > Non extra-class support
OCP 1	2.59	.78	2.13	.72	P < .01	Extra-class support > Non extra-class support
OCP 2	2.41	.74	2.24	.72	P < .01	Extra-class support > Non extra-class support
OCP 3	2.37	.72	2.21	.70	P < .01	Extra-class support > Non extra-class support
OCP 4	2.27	.74	1.94	.64	P < .01	Extra-class support > Non extra-class support
OCP 5	2.08	.72	1.72	.64	P < .01	Extra-class support > Non extra-class support

The results of ANOVA in Table 6.11 above show significant variations due to extra-language class support in frequency of use of strategies to achieve all of the in-class purposes and out-of-class purposes. This means that extra-language class support seems to have strong relationship with their employment of strategies to achieve either in-class or out-of-class purposes. Based on the mean frequency scores

of use of strategies, we can see that extra-language class support students reported slightly more frequent use of strategies in order to achieve all purposes in both in-class or out-of-class purposes. What follows is the variation in use of strategies to achieve the in-class and the out-of-class purposes according to level of language proficiency.

#### **6.4.5 Variation in use of strategies to achieve the in-class purposes and the out-of-class purposes according to level of language proficiency**

The results of ANOVA in Table 6.12 below show variations in students' language learning strategy use to achieve the in-class purposes and the out-of-class purposes, according to level of language proficiency. Based on the results, significant differences were found in frequency of use of strategies to achieve all of the in-class purposes and out-of-class purposes according to level of language proficiency. This means that level of language proficiency seems to be related to their employment of strategies to achieve either in-class or out-of-class purposes. Based on the mean frequency scores of use of strategies, we can see that high level language proficiency level students reported slightly more frequent use of strategies in order to achieve almost every purpose except to understand the lessons while studying in class, where moderate language proficiency level students reported slightly more frequent use of strategies in order to achieve this purpose than high and low level language proficiency students.

**Table 6.12** Variations in students' language learning strategy to achieve the in-class purposes and the out-of-class purposes, according to level of language proficiency

Strategy Category	Low (n=1388)		Moderate (n=358)		High (n=70)		Significance Level	Comments
	$\bar{x}$	S.D.	$\bar{x}$	S.D.	$\bar{x}$	S.D.		
<b>ICP 1</b>	1.68	.68	1.70	.68	2.28	1.01	P < .01	High > Moderate High > Low
<b>ICP 2</b>	2.79	.68	2.95	.62	2.88	.83	P < .01	Moderate > Low Moderate > High
<b>ICP 3</b>	2.30	.60	2.45	.59	2.60	.75	P < .01	High > Low Moderate > Low
<b>ICP 4</b>	2.16	.63	2.44	.64	2.63	.77	P < .01	High > Low Moderate > Low
<b>OCP 1</b>	2.25	.78	2.60	.69	2.89	.74	P < .05	High > Moderate > Low
<b>OCP 2</b>	2.26	.72	2.46	.72	2.73	.76	P < .05	High > Moderate > Low
<b>OCP 3</b>	2.22	.71	2.44	.67	2.67	.77	P < .05	High > Moderate > Low
<b>OCP 4</b>	2.05	.70	2.19	.69	2.47	.87	P < .05	High > Moderate > Low
<b>OCP 5</b>	1.85	.69	1.94	.65	2.35	.88	P < .01	High > Low High > Moderate

Table 6.13 below is a summary of students' frequency of strategy use in order to achieve the in-class and out-of-class purposes in association with the five variables for the present investigation. It reveals that strategy use to achieve six purposes varied significantly with regards to gender of students, two purposes according to field of study, one purpose relating to type of school, and nine purposes were found to vary significantly according to extra-language class support and students' levels of language proficiency.

**Table 6.13** summary of significant variations in use of strategies to achieve in-class and out-of-class purposes by the five variables

Strategy Category	Gender of Students	Field of study	Type of School	Extra-language class support	Language Proficiency Level
ICP 1	N.S.	N.S.	N.S.	Yes	Yes
ICP 2	Yes	Yes	Yes	Yes	Yes
ICP 3	Yes	Yes	N.S.	Yes	Yes
ICP 4	Yes	N.S.	N.S.	Yes	Yes
OCP 1	N.S.	N.S.	N.S.	Yes	Yes
OCP 2	Yes	N.S.	N.S.	Yes	Yes
OCP 3	Yes	N.S.	N.S.	Yes	Yes
OCP 4	Yes	N.S.	N.S.	Yes	Yes
OCP 5	N.S.	N.S.	N.S.	Yes	Yes

**Note:** A significant variation is specified with 'Yes' and non-significant is specified with 'N.S.'

## 6.5 Variation in use of individual learning strategies

Sections 6.2-6.4 discussed significant variations in frequency of students' overall strategy use as a whole, together with the use of strategies in the two main categories, and use of strategies to achieve the in-class and out-of-class purposes. This section explores the results of chi-square tests ( $\chi^2$ ) which were employed to determine patterns of the significant variations in students reported strategy use at the individual strategy item level. This statistical method was used to check or examine all of the individual strategy items for significant variations with the five variables. The percentage of students' reported high use of language learning strategy in each variable (3 or 4 in the language learning strategy questionnaire), and the observed chi-square ( $\chi^2$ ) value are used in order to demonstrate a significant variation in each individual strategy. What is presented next are the patterns of significant variations in students' use of language learning strategies relating to the five variables together with a brief discussion of each of the variables.

### 6.5.1 Variation in students' reported use of individual learning strategies according to gender

As mentioned in the previous sections (Sections 6.2-6.4), significant variations in frequency of students' overall strategy use, language learning strategy use in the IC and OC, and six purposes of strategy use (three purposes from IC and three from OC), varied significantly with regards to gender of students. In this section, the individual language learning strategies are emphasised according to the variations in frequency as well as the patterns of variation of language learning strategy use. The results of chi-square tests ( $x^2$ ) demonstrate that almost half of all language learning strategies in this strategy inventory (19 out of 43) varied significantly according to gender.

**Table 6.14** Individual strategies showing significant variation according to gender

Individual Learning Strategies (Used more by female students – 15 strategies )	% of High Use (3or 4)		Observed $x^2$
	Female	Male	
<b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	85.6	75.4	$x^2 = 29.07^*$
<b>SICP 2.2:</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	77.3	58.8	$x^2 = 68.97^*$
<b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons	76.0	56.1	$x^2 = 76.90^*$
<b>SICP 4.1:</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	58.0	49.8	$x^2 = 11.30^*$
<b>SICP 2.4:</b> Try not to talk with other students while studying to understand while studying in class	57.3	52.3	$x^2 = 4.26^{**}$
<b>SICP 2.3:</b> Try to get a seat in the front row to understand the lessons while studying in class	55.3	37.2	$x^2 = 54.81^*$
<b>SOCP 3.2:</b> Listen to English songs to improve one's reading skill	49.1	43.5	$x^2 = 5.15^{**}$
<b>SOCP 4.4:</b> Try to imitate a native speaker from the media such as English file or CD to improve one's speaking skill	41.9	34.8	$x^2 = 8.78^{**}$
<b>SOCP 1.5:</b> Attend extra-class to gain more knowledge about vocabulary	41.3	27.1	$x^2 = 36.25^*$
<b>SICP 3.4:</b> Ask other people than one's teacher or classmate to solve the problems encountered in the classroom lessons	38.8	33.3	$x^2 = 5.41^{**}$

**Table 6.14** (Cont.) Individual strategies showing significant variation according to gender

Individual Learning Strategies (Used more by female students – 15 strategies )	% of High Use (3 or 4)		Observed $x^2$
	Female	Male	
<b>SOCP 3.4:</b> Watch television programs in English to improve one's reading skill	36.1	29.7	$x^2 = 7.70^*$
<b>SOCP 4.5:</b> Attend extra-class to improve one's speaking skill	35.0	24.6	$x^2 = 20.82^*$
<b>SOCP 5.4:</b> Attend extra-class to improve one's writing skill	34.0	25.3	$x^2 = 14.60^*$
<b>SICP 4.2:</b> Make lists of a new vocabulary with their meaning to learn new vocabulary in the classroom lessons	28.7	24.3	$x^2 = 4.19^{**}$
<b>SICP 1.5:</b> Attend extra-classes to be well-prepared for the lessons	26.3	17.6	$x^2 = 17.59^*$
Individual Learning Strategies (Used more by male students - 4 strategies )	% of High Use (3 or 4)		
	Male	Female	
<b>SOCP 1.1:</b> Play games in English such as computer games to gain more knowledge about vocabulary	55.4	44.2	$x^2 = 20.89^*$
<b>SOCP 5.3:</b> Use the computer programs such as chat program to improve one's writing skill	31.3	18.8	$x^2 = 35.91^*$
<b>SOCP 5.1:</b> Correspond in English by letter or email to improve one's writing skill	29.7	19.0	$x^2 = 26.98^*$
<b>SOCP 4.3:</b> Use the computer programs such as chat program to improve one's speaking skill	28.9	20.7	$x^2 = 15.52^*$

**Note:** \*  $p < 0.01$ ; \*\*  $p < 0.05$

The results of the chi-square tests in Table 6.14 reveal significant variations in use of individual learning strategies in terms of gender, with a greater percentage of female students reporting high use of 15 language learning strategies than male students, while male students reported higher use of four language learning strategies than did female students. 9 out of 15 are strategies employed by female students in order to understand the lessons while studying in class, e.g. listen to the teacher attentively and pay attention to teacher 85.6 per cent (SICP 2.1), taking notes while studying in class with a teacher, 77.3 per cent (SICP 2.2), and ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons, 76 per cent (SICP 3.3). However, the only four strategies that those male students reported employing a higher level of use than female students



were those for out-of-class purposes i.e. playing English games to gain more knowledge about vocabulary (SOCP 1.1), using chatting program to improve writing (SOCP 5.3) and speaking skills (SOCP 5.1), and writing a letter or email in English (SOCP 4.3).

### 6.5.2 Variation in students reported use of individual learning strategies according to field of study

The findings presented in Table 6.15 below indicate that science-oriented students differ from non science-oriented students using language learning strategies in order to achieve the in-class purposes. The chi-square results show significant variations in frequency of use of 11 language learning strategies according to field of study.

**Table 6.15** Individual strategies showing significant variation according to field of study

Individual Learning Strategies (Used more by science-oriented students – 10 strategies )	% of High Use (3or 4)		Observed $\chi^2$
	SC	NSC	
<b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	84.9	78.2	$\chi^2 = 13.60^*$
<b>SICP 2.2:</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	74.4	66.0	$\chi^2 = 15.07^*$
<b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class to solve the problems with lessons	71.8	65.4	$\chi^2 = 8.45^*$
<b>SICP 2.4:</b> Try not to talk with other students while to understand while studying in class	57.8	52.5	$\chi^2 = 5.20^{**}$
<b>SICP 4.5:</b> Guess the meaning of new vocabulary item from the context to learn new vocabulary in the classroom lessons	51.4	45.4	$\chi^2 = 6.55^*$
<b>SOCP 1.5:</b> Attend extra-class to gain more knowledge about vocabulary	40.7	30.4	$\chi^2 = 20.42^*$
<b>SOCP 5.4:</b> Attend extra-class to improve one's writing skill	35.1	25.6	$\chi^2 = 18.65^*$
<b>SOCP 4.5:</b> Attend extra-class to improve one's speaking skill	35.0	26.5	$\chi^2 = 14.88^*$
<b>SICP 3.2:</b> Ask teachers after class to solve the problems encountered in the classroom lessons	26.7	21.3	$\chi^2 = 7.03^*$
<b>SICP 4.6:</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	23.5	18.5	$\chi^2 = 6.55^*$

**Table 6.15** (Cont.) Individual strategies showing significant variation according to field of study

Individual Learning Strategies (Used more by non science-oriented students-1 strategy)	% of High Use (3 or 4)		Observed $\chi^2$
	NSC	SC	
<b>SICP 1.2:</b> Study the vocabulary in advance to be well-prepared for the lessons	19.5	14.0	$\chi^2 = 9.83^*$

**Note:** \*  $p < 0.01$ ; \*\*  $p < 0.05$

The results of the chi-square tests above show that science-oriented students reported a greater percentage of high use of 10 out of 11 language learning strategies from the strategy questionnaire than did non science-oriented students. The results show that strategies which most science-oriented students reported employing at high use level were those for in-class purposes, e.g. listen to the teacher attentively and pay attention to teacher, 84.9 per cent (SICP 2.1), taking notes while studying in class with a teacher, 74.4 per cent (SICP 2.2), and ask a classmate or classmates either in class or outside class in order to solve the problems encountered, 71.8 per cent (SICP 3.3). In only three strategies out of ten, science-oriented students reported employing at high use level for out-of-class purposes, e.g. attending an extra class to gain more knowledge about vocabulary, 40.7 per cent (SOCP 1.5) and improving writing skill, 35.1 per cent (SOCP 5.4) and speaking skill, 35.0 per cent (SOCP 4.5). However, the only strategy that those non science-oriented students reported employing higher use level than science-oriented students was studying vocabulary before coming to class (SICP 1.2).

### 6.5.3 Variation in students' reported use of individual learning strategies according to type of school

In the ANOVA results mentioned earlier (Section 6.4.3) only one purpose shows significant variation in frequency in students' use of strategies in relation to type of school. However, at the individual language learning strategy level, the chi-square tests show significant variations in use of nine out of forty-three strategies across the strategy inventory.

**Table 6.16** Individual strategies showing significant variation according to type of school

Individual Learning Strategies (Used more by public school students - 4 strategies )	% of High Use (3 or 4)		Observed $\chi^2$
	PS	PRS	
<b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons	71.6	65.9	$\chi^2 = 6.68^{**}$
<b>SOCP 1.5:</b> Attend extra-class to gain more knowledge about vocabulary	39.2	32.7	$\chi^2 = 8.13^*$
<b>SICP 3.5:</b> Study by oneself in order to solve the problems encountered in the classroom lessons	37.8	29.7	$\chi^2 = 12.98^*$
<b>SOCP 4.5:</b> Attend extra class to improve one's speaking skill	33.4	28.8	$\chi^2 = 4.52^{**}$
(Used more by private school students -5 strategies )	PRS	PS	
<b>SICP 2.2:</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	80.3	62.7	$\chi^2 = 66.90^*$
<b>SICP 4.1:</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	57.9	52.7	$\chi^2 = 4.91^{**}$
<b>SICP 2.3:</b> Try to get a seat in the front row to understand the lessons while studying in class	51.5	46.7	$\chi^2 = 4.16^{**}$
<b>SOCP 5.3:</b> Use the computer program such as a chat program to improve one's writing skill	25.5	21.3	$\chi^2 = 4.44^{**}$
<b>SOCP 5.1:</b> Correspond in English by letter or email to improve one's writing skill	24.9	21.0	$\chi^2 = 3.88^{**}$

**Note:** \*  $p < 0.01$ ; \*\*  $p < 0.05$

The chi-square results reveal that public school students reported a greater percentage of high use of four out of nine language learning strategies across the strategy questionnaire than private school students did. Two out of four strategies employed by public school students to solve their learning problems in order to understand the lessons better, e.g. asking a classmate or classmates either in class or

outside class, 71.6 per cent (SICP 3.3) and studying by oneself, 37.8 per cent (SICP 3.5). Two others were also strategies employed by public school students to improve their speaking skill (SOCP 1.5) and gain more knowledge about vocabulary (SOCP 4.5) by attending extra-language classes.

However, the results also show that three individual strategies for in-class purposes were reported with high frequency of use by more than 50 per cent of the private school students. The five strategies that those private school students reported employing at a higher use level than public school students were three for in-class purposes, i.e. taking notes while studying in class, 80.3 per cent (SICP 2.2), using dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons, 57.9 per cent (SICP 4.1), trying to sit in the front row while studying in class, 51.5 per cent (SICP 2.3); and two strategies for out-of-class purposes, especially the individual strategies which are related to improving one's writing skills, i.e. using a chatting program (SOCP 5.3) and writing a letter or email in English (SOCP 5.1).

#### **6.5.4 Variation in students' reported use of individual learning strategies according to extra-language class support**

The ANOVA results mentioned earlier (Section 6.4.4) all of nine purposes of language learning strategy show significant variation in frequency in students' use of strategies in relation to extra-language class support. At the individual language learning strategy level, the chi-square tests show significant variations in the use of 31 out of forty-three strategies across the strategy inventory according to this variable.

**Table 6.17** Individual strategies showing significant variation according to  
extra-language class support

Individual Learning Strategies (Used more by extra-language classes support students - 31 strategies )	% of High Use (3or 4)		Observed $\chi^2$
	ECS	NECS	
<b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to the teacher to understand the lessons while studying in class	85.1	79.4	$\chi^2 = 9.93^*$
<b>SOCP 1.5:</b> Attend extra-classes to gain more knowledge about vocabulary	69.2	8.1	$\chi^2 = 7.29^*$
<b>SOCP 1.4:</b> Listen to English songs to gain more knowledge about vocabulary	61.4	50.7	$\chi^2 = 21.11^*$
<b>SOCP 2.2:</b> Listen to English songs to improve one's listening skill	58.1	48.0	$\chi^2 = 18.30^*$
<b>SOCP 4.5:</b> Attend extra-classes to improve one's speaking skill	57.2	9.1	$\chi^2 = 4.86^*$
<b>SOCP 5.4:</b> Attend extra-classes to improve one's writing skill	56.3	9.3	$\chi^2 = 4.66^*$
<b>SICP 4.5:</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	55.3	43.2	$\chi^2 = 26.48^*$
<b>SICP 2.3:</b> Try to get a seat in the front row to understand the lessons while studying in class	53.2	45.3	$\chi^2 = 11.32^*$
<b>SOCP 3.2:</b> Listen to English songs to improve one's reading skill	51.7	43.2	$\chi^2 = 13.16^*$
<b>SOCP 1.1:</b> Play games in English such as computer games to gain more knowledge about vocabulary	51.1	45.6	$\chi^2 = 5.62^{**}$
<b>SOCP 2.1:</b> Watch English-speaking films to improve one's listening skill	45.5	36.0	$\chi^2 = 17.15^*$
<b>SOCP 1.3:</b> Watch English-speaking films to gain more knowledge about vocabulary	45.4	34.8	$\chi^2 = 21.05^*$
<b>SOCP 3.1:</b> Watch English-speaking films to improve one's reading skill	44.3	36.4	$\chi^2 = 11.91^*$
<b>SOCP 4.4:</b> Try to imitate a native speaker from media such as English file or CD to improve one's speaking skill	43.7	35.8	$\chi^2 = 12.02^*$
<b>SICP 1.5:</b> Attend extra-classes to be well-prepared for the lessons	42.3	6.8	$\chi^2 = 3.18^*$
<b>SOCP 2.4:</b> Watch television programs in English to improve one's listening skill	40.9	31.7	$\chi^2 = 16.58^*$
<b>SOCP 3.5:</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	40.4	30.3	$\chi^2 = 20.02^*$
<b>SICP 3.4:</b> Ask other people than one's teachers or classmates solve the problems encountered in the classroom lessons	39.3	34.7	$\chi^2 = 4.06^{**}$
<b>SICP 3.5:</b> Study by oneself in order to solve the problems encountered in the classroom lessons	38.6	30.2	$\chi^2 = 14.02^*$
<b>SOCP 1.2:</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	38.1	26.5	$\chi^2 = 28.26^*$
<b>SOCP 3.4:</b> Watch television programs in English to improve one's reading skill	37.8	30.5	$\chi^2 = 10.48^*$
<b>SICP 4.3:</b> Look at the root of new vocabulary to learn new vocabulary in classroom lessons	34.5	24.9	$\chi^2 = 20.07^*$
<b>SICP 4.4:</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	31.5	23.3	$\chi^2 = 15.56^*$

**Table 6.17** (cont.) Individual strategies showing significant variation according to extra- language class support

Individual Learning Strategies (Used more by extra-language classes support students - 31 strategies )	% of High Use (3or 4)		Observed $\chi^2$
	ECS	NECS	
<b>SICP 4.2:</b> Make lists of new vocabulary with their meaning to learn new vocabulary in the classroom lessons	30.3	24.4	$\chi^2 = 8.03^*$
<b>SOCP 3.3:</b> Listen to English conversation from CD to improve one's reading skill	29.0	21.6	$\chi^2 = 13.46^*$
<b>SOCP 2.3:</b> Listen to English conversation from CD to improve one's listening skill	29.0	20.0	$\chi^2 = 19.99^*$
<b>SOCP 4.2:</b> Try to speak to foreigners either teachers or other foreigners to improve one's speaking skill	28.1	21.6	$\chi^2 = 10.37^*$
<b>SICP 3.2:</b> Ask teachers after class in order to solve the problems encountered in the classroom lessons	28.1	21.1	$\chi^2 = 11.78^*$
<b>SICP 4.6:</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	26.5	16.9	$\chi^2 = 25.16^*$
<b>SICP 1.3:</b> Try some exercises to be well-prepared for the lessons	14.7	8.5	$\chi^2 = 17.34^*$
<b>SICP 1.1:</b> Study the lessons in advance to be well-prepared for the lessons	12.9	9.5	$\chi^2 = 5.31^{**}$

**Note:** \*  $p < 0.01$ ; \*\*  $p < 0.05$

The chi-square results demonstrate the significant variations in students' use of individual language learning strategies according to extra-language class support. The students who had extra-language class support reported a greater use of 31 out of 43 individual language learning strategies across the strategy than those who did not have extra-language class support. Of the 31 strategies with significant differences in this variation, ten were reported with high percentage of use by more than 50 per cent of extra-language class support.

The results of the chi-square tests also indicate that more than half of students with extra-language class support reportedly employing various strategies at high use level vary, with 85.1 per cent reportedly employing strategy in order to achieve in-class purposes by listening to the teacher attentively and paying attention to the teacher, 55.3 per cent by guessing the meaning of a new vocabulary item from the

context and 53.2 per cent trying to sit in the front row. In order to achieve out-of-class purposes, seven out of ten individual strategies with extra-language class support reportedly employed at more than 50 per cent were attending extra-language class, listening to an English song, playing games in English to gain more knowledge about vocabulary and to improve writing and speaking skills, and listen to an English song with or without English script to improve their reading and listening skills.

### 6.5.5 Variation in students' reported use of individual learning strategies according to level of language proficiency

In the ANOVA results mentioned earlier (Section 6.4.5) most of the purposes show significant variation in frequency of students' use of strategies in relation to level of language proficiency. However, at the individual language learning strategy level, the chi-square tests show the significant variations in use of forty out of forty-three strategies across the strategy inventory according to this variable.

**Table 6.18** Individual strategies showing significant variation according to level of language proficiency

Individual Learning Strategies Positive (Used more by high > moderate > low proficiency students - 32 strategies)	% of High Use (3 or 4)			Observed $\chi^2$
	High	Moderate	Low	
<b>SOCP 1.4:</b> Listen to English songs to gain more knowledge about vocabulary	80.0	63.4	52.4	$\chi^2 = 31.56^*$
<b>SICP 4.5:</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	72.9	71.5	41.7	$\chi^2 = 118.0^*$
<b>SOCP 2.2:</b> Listen to English songs to improve one's listening skill	71.4	64.2	48.7	$\chi^2 = 37.88^*$
<b>SOCP 1.5:</b> Attend extra-class to gain more knowledge about vocabulary	70.0	55.9	29.5	$\chi^2 = 122.0^*$
<b>SOCP 1.3:</b> Watch English-speaking films to gain more knowledge about vocabulary	68.6	46.6	36.5	$\chi^2 = 37.70^*$
<b>SOCP 2.1:</b> Watch English-speaking films to improve one's listening skill	67.1	48.0	37.0	$\chi^2 = 36.03^*$
<b>SOCP 1.2:</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	67.1	41.1	27.7	$\chi^2 = 65.38^*$

**Table 6.18 (Cont.)** Individual strategies showing significant variation according to level of language proficiency

Individual Learning Strategies Positive (Used more by high > moderate > low proficiency students - 32 strategies)	% of High Use (3or 4)			Observed $\chi^2$
	High	Moderate	Low	
<b>SICP 4.1:</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	65.7	60.6	53.1	$\chi^2 = 9.84^{**}$
<b>SICP 2.3:</b> Try to get a seat in the front row to understand the lessons while studying in class	65.7	53.1	47.0	$\chi^2 = 12.48^*$
<b>SOCP 3.2:</b> Listen to English songs to improve one's reading skill	64.3	57.0	43.7	$\chi^2 = 28.65^*$
<b>SOCP 3.5:</b> Study by oneself to solve the problems encountered in the classroom lessons	64.3	47.5	29.1	$\chi^2 = 72.34^*$
<b>SICP 3.5:</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	64.3	46.1	30.6	$\chi^2 = 57.47^*$
<b>SICP 2.4:</b> Try not to talk with other students while studying to understand while studying in class	62.9	62.8	53.2	$\chi^2 = 12.22^*$
<b>SOCP 3.1:</b> Watch English speaking films to improve one's reading skill	61.4	48.0	36.9	$\chi^2 = 28.64^*$
<b>SOCP 4.4:</b> Try to imitate a native speaker from media such as English file or CD to improve one's speaking skill	60.0	45.8	36.7	$\chi^2 = 22.70^*$
<b>SOCP 1.1:</b> Play games in English such as computer games to gain more knowledge about vocabulary	58.6	53.6	46.2	$\chi^2 = 9.51^*$
<b>SOCP 2.4:</b> Watch television programs in English to improve one's listening skill	57.1	38.5	34.1	$\chi^2 = 16.66^*$
<b>SICP 4.4:</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	55.7	36.9	23.1	$\chi^2 = 57.42^*$
<b>SICP 1.5:</b> Attend-extra classes to be well-prepared for the lessons	55.7	29.9	19.8	$\chi^2 = 59.49^*$
<b>SOCP 4.5:</b> Attend extra class to improve one's speaking skill	54.3	43.0	27.1	$\chi^2 = 51.52^*$
<b>SICP 4.3:</b> Look at the root of a new vocabulary to learn new vocabulary in classroom lessons	54.3	39.4	25.5	$\chi^2 = 48.28^*$
<b>SICP 3.1:</b> Ask the teacher in class either immediately or when appropriate to solve the problems encountered in the classroom lessons	54.3	39.1	30.1	$\chi^2 = 25.65^*$
<b>SOCP 3.4:</b> Watch television programs in English to improve one's reading skill	54.3	38.0	31.8	$\chi^2 = 18.47^*$
<b>SOCP 4.2:</b> Try to speak to foreigner either teachers or other foreigners to improve one's speaking skill	51.4	28.8	22.1	$\chi^2 = 35.17^*$
<b>SOCP 5.4:</b> Attend extra-class to improve one's writing skill	50.0	42.5	27.0	$\chi^2 = 44.12^*$
<b>SOCP 2.3:</b> Listen to English conversation from CD to improve one's listening skill	47.1	27.9	22.0	$\chi^2 = 26.34^*$



**Table 6.18** (Cont.) Individual strategies showing significant variation according to level of language proficiency

Individual Learning Strategies Positive (Used more by high > moderate > low proficiency students - 32 strategies)	% of High Use (3or 4)			Observed $\chi^2$
	High	Moderate	Low	
<b>SICP 3.2:</b> Ask teachers after class in order to solve the problems encountered in the classroom lessons	45.7	28.2	22.3	$\chi^2 = 23.54^*$
<b>SOCP 3.3:</b> Listen to English conversation from CD to improve one's reading skill	45.7	25.7	23.8	$\chi^2 = 17.22^*$
<b>SOCP 5.1:</b> Correspond in English by letter or email to improve one's writing skill	44.3	22.3	21.8	$\chi^2 = 19.14^*$
<b>SICP 4.6:</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	42.9	31.8	17.5	$\chi^2 = 55.04^*$
<b>SICP 4.2:</b> Make lists of new vocabulary with their meaning to learn new vocabulary in the classroom lessons	42.9	29.1	25.9	$\chi^2 = 10.55^{**}$
<b>SOCP 4.3:</b> Use the computer programs such as a chat program to improve one's speaking skill	41.4	22.9	22.8	$\chi^2 = 12.79^*$
Mixed (Used more by high > low > moderate proficiency students - 6 strategies )	High	Low	Moderate	
<b>SICP 1.3:</b> Try some exercises in advance to be well-prepared for the lessons	44.3	10.2	9.5	$\chi^2 = 78.69^*$
<b>SICP 1.2:</b> Study the vocabulary in advance to be well-prepared for the lessons	42.9	15.5	14.8	$\chi^2 = 37.22^*$
<b>SOCP 5.2:</b> Practice writing in English such as writing diary to improve one's writing skill	42.9	14.7	12.6	$\chi^2 = 43.32^*$
<b>SICP 1.1:</b> Study the lessons in advance to be well-prepared for the lessons	42.9	10.2	8.4	$\chi^2 = 75.66^*$
<b>SICP 1.4:</b> Do the revision of the previous lessons either by oneself or with classmates to be well-prepared for the lessons	41.4	20.2	20.1	$\chi^2 = 18.23^*$
<b>SOCP 5.3:</b> Use the computer program such as a chat program to improve one's writing skill	40.0	22.9	21.2	$\chi^2 = 11.92^*$
Mixed (Used more by moderate > low > high proficiency students - 2 strategies )	Moderate	Low	High	
<b>SICP 2.1:</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	88.0	80.6	78.6	$\chi^2 = 11.05^{**}$
<b>SICP 3.3:</b> Ask a classmate or classmates either in class or outside class to solve the problems with lessons	75.1	67.5	67.1	$\chi^2 = 7.87^{**}$

**Note:** \*  $p < 0.01$ ; \*\*  $p < 0.05$

The chi-square results reveal significant variations in students' use of individual language learning strategies according to level of language proficiency. As suggested in Oxford and Green (1995), the pattern of variation in students' use of the individual strategies could be positive (used more by high language proficiency

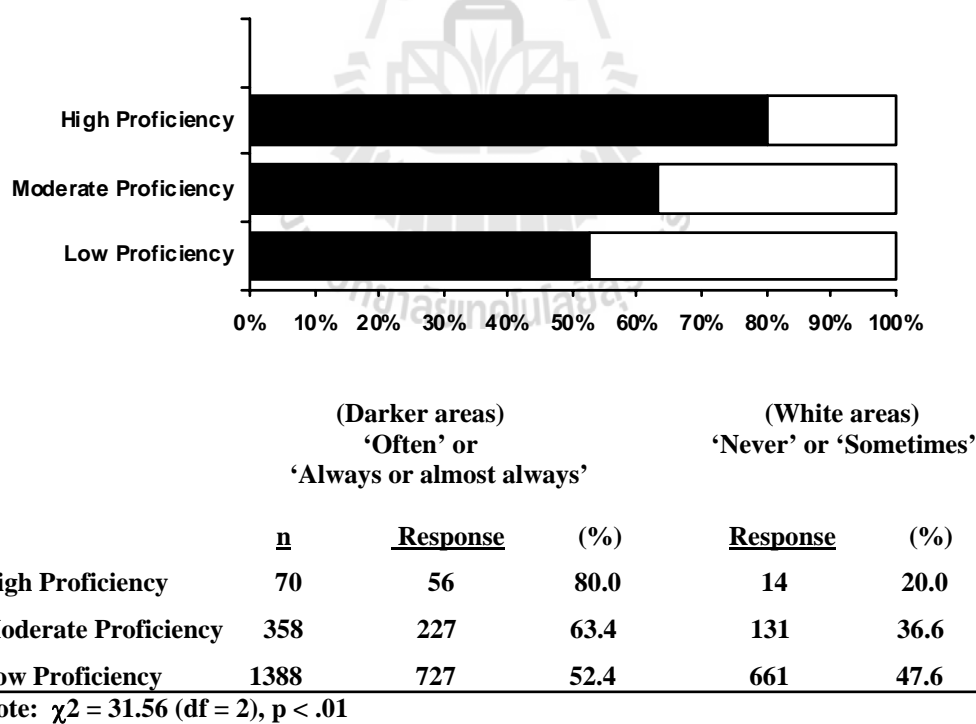
students) or negative (used more by low proficiency students) or mixed (used more by high and low language proficiency students or used more by moderate and low proficiency students). The significant variations in students' use of 40 individual language learning strategies in this investigation which were found according to this variable could be classified as positive (high > moderate > low) or mixed (moderate > low > high) or (high > low > moderate) patterns of variation.

The results show that 32 individual language learning strategies could be classified as a positive pattern, while eight individual language learning strategies were in the mixed pattern of variation; moderate > low > high or high > low > moderate. These eight individual strategies include strategies employed to learn new vocabulary in the classroom lessons (SICP 4.1 and SICPs 4.3-4.5), to be well-prepared for classroom lessons (SICP 1.5), to understand the lesson while studying in class (SICP 2.3 and SICP 2.4), and to solve the problems encountered in the classroom lesson (SICPs 3.1 and 3.5). No individual language learning strategies show a negative pattern of variation.

The positive pattern of variation in students' individual language learning strategies with high proficiency of use according to levels of proficiency reveals that the high language proficiency students reported employing 32 individual language learning strategies significantly more frequently than did moderate and low students. The results of the chi-square tests also indicate that more than half of high language proficiency students reported employing strategies in order to achieve in-class purposes, mainly to learn new vocabulary in the classroom lessons (SICPs 4.1, 4.3-4.5), to understand the lesson while studying (SICPs 2.3-2.4), to solve the problems encountered in the classroom lessons (SICPs 3.1 and 3.5), and to be well-prepared for the next lessons (SICP 1.5).

In order to achieve out-of-class purposes, sixteen out of twenty individual strategies with high language proficiency level reported employing more than 50 per cent more than did both moderate and low language proficiency students. These strategies include gaining more knowledge about vocabulary (SOCPs 1.1-1.5), improving language learning skills in general, i.e., listening skill (SOCPs 2.1-2.2 and 2.4), reading skill (SOCPs 3.1-3.2, 3.4, and 3.5), speaking skill (SOCPs 4.2-4.4), and writing skill (SOCPs 5.4). For a closer look at the pattern of variation of individual strategies, the stacked bar chart in Figure 6.2 shows an example of positive a pattern of variation, and Figure 6.3 demonstrates an example of a mixed pattern of variation.

**SOCP 1.4** Listen to English songs to gain more knowledge about vocabulary



**Figure 6.2** Example of variation pattern classified as positive

Figure 6.2 above shows that 80.0 per cent of high proficiency students reported high frequency of use of SOCP 1.4, listen to English songs to gain more knowledge about vocabulary; whereas 63.4 and 52.4 per cent of moderate and low proficiency students reported high frequency of use of this language learning strategy.

Another example below reveals the stacked bar chart of mixed patterns of variation. As shown in Figure 6.3 below, 88.0 percent of moderate proficiency students reported high frequency of use of SICP 2.1, listen to the teacher attentively and pay attention to the teacher while studying in class; whereas 80.6 and 78.6 per cent of low and high proficiency students reported high frequency of use of this language learning strategy.

**SICP 2.1** Listen to the teacher attentively and pay attention to the teacher to understand the lessons while studying in class



	<u>n</u>	(Darker areas) 'Often' or 'Always or almost always'		(White areas) 'Never' or 'Sometimes'	
		<u>Response</u>	(%)	<u>Response</u>	(%)
High Proficiency	70	55	78.6	15	21.4
Moderate Proficiency	358	315	88.0	43	12.0
Low Proficiency	1388	1119	80.6	269	19.4

Note:  $\chi^2 = 11.05$  (df = 2),  $p < .05$

**Figure 6.3** Example of variation pattern classified as mixed

The results of ANOVA and chi-square tests explained in the previous section provide us a clear picture of significant variations in frequency use of strategies ranging from students' overall strategy use of individual language learning strategies in relation to the five variables. What follow are the results of a factor analysis which will give another perspective of underlying structure of language learning in the strategy inventory for the present investigation.

## **6.6 Results of factor analysis**

Factor analysis is a mathematically complex procedure which reduces a correlation matrix containing many variables into a smaller number of factors (Howitt and Cramer 2000). Factor analysis is another approach for a researcher to understand a large number of correlations between variables by reducing them to a smaller number of factors which account for many of the original variables (Robson 2002). Many researchers (Richards et al., 1992; Cohen and Manion, 1994; and Howitt and Cramer 2000) affirm that factor analysis can be beneficial and appropriate to deal with data on many variables by reducing attribute space from a large number of variables to a smaller number of variables.

Furthermore, Cohen and Manion (1994) and Howitt and Cramer (2000) state that factor analysis is appropriate in exploratory research where the researcher aims to impose an orderly implication on a number of interrelated measures. However, Howitt and Cramer (2000) comment that factor analysis is more subjective and judgmental than most statistical techniques. This is not only because of the subjectivity of interpreting the meaning of factors, but also because there are many variants of factors analysis.

Before proceeding with a detailed discussion of the factor analysis, it should be noted that the factor analysis for the present investigation is aimed to be exploratory rather than confirmatory. This is because the researcher does not have clear ideas about what the factor structure might be or want to confirm any factors that may be extracted from the strategy inventory.

In seeking the underlying structure of the language learning strategies across the strategy inventory, a principal component factor analysis, and then varimax rotation was conducted on the correlations of the forty-three language learning strategies, which varied significantly in relation to the five variables. Initially, nine factors were extracted with eigenvalues equal to or greater than 1.00. The eigenvalues or the sums of the squared factor loadings of the extracted nine factors are presented in Table 7.19 below.

**Table 6.19** The Sums of the squared factor loadings of the initial nine factors

Component	Extraction Sums of Squared Loadings (Eigenvalues)		
	Total	% of Variance	Cumulative %
1	14.446	33.595	33.595
2	3.227	7.505	41.100
3	2.469	5.741	46.841
4	2.065	4.803	51.664
5	1.748	4.065	55.709
6	1.549	3.603	59.312
7	1.354	3.148	62.460
8	1.228	2.857	65.317
9	1.049	2.441	67.758

As showed in Table 6.19, the nine factors accounted for 67.76 % of the variability among 43 language learning strategies which were discovered to vary significantly in relation to the five variables as mentioned earlier. The percentage of variance in Table 6.19 suggested that more than 50 per cent of the total variation between the frequency of strategy use can be explained by the first five principal components. In other words, the 55.71 per cent figure means that slightly less than

half of the variability was unexplained by the five factors; thus, other influences may also make a difference in strategy use. However, instead of making use of the initial nine extracted factors, the researcher decided to explore further by reducing the number of factors to four, five, six, and eight. The results of the varimax rotation show different grouping of strategies between four, five, six, and eight factors and it were difficult to interpret. The researcher decided to explore further by increasing the number of factors to ten and eleven. The results of the varimax rotation show obviously different grouping of strategies with the extracted ten factors. Having taken the factor interpretation into consideration, the researcher found that it would be more straightforward to interpret the extracted ten factors rather than nine factors. Then the individual language learning strategies were sorted or ordered according to their loading on the first factor.

The factor loadings indicate the degree or level of relationship or the level of correlation between the factors and the different variables used in the analysis (Seliger and Shohamy, 1990). According to Howitt and Cramer (2000), the factor loadings vary from -1.00 through 0.00 to +1.00. The factor loadings with values below 0.30 have not been reported because they are too low to be important. The language learning strategies which have the highest loadings with the first factor are used to define the factor, i.e. the language learning strategies which are highly loaded are grouped together in order of their loading on the first factor. This grouping helps interpretation of the factor since the high loading strategy items are ones which primarily help researcher to decide what factor they might be (Howitt and Cramer, 2000). With the factor analysis, researchers may describe differently in interpretation of the factors which emerge. The language learning strategies as identified in the

strategy inventory and the ten factors resulting from the factor analysis were not expected to be identical, rather, to be mutually supportive.

In the present investigation, each factor is described in terms of the content or the relationship of the majority of the language learning strategy items which appear to share common characteristics under the same factor. The ten extracted factors, the factor loadings on each strategy item, and the percentage of variance accounted for each of factors are presented in Table 6.20 below.

**Table 6.20** List of the Ten Extracted Factors

<b>Factor 1: Strategies for the Classroom Preparation</b>	<b>Factor Loading</b>	<b>% of Variance</b>
<b>SICP 1.2)</b> Study the vocabulary in advance to be well-prepared for the lessons	.88	33.60
<b>SICP 1.1)</b> Study the lessons in advance to be well-prepared for the lessons	.88	
<b>SICP 1.4)</b> Do the revision of the previous lessons either by oneself or with classmates in order to be well-prepared for the lessons	.86	
<b>SICP 1.3)</b> Try some exercises in advance to be well-prepared for the lessons	.86	
<b>SICP 1.5)</b> Attend extra-classes in order to be well-prepared for the lessons	.61	
<b>Factor 2: Strategies for Understanding New Vocabulary in the Classroom Lessons</b>		
<b>SICP 4.3)</b> Look at the root of a new vocabulary to learn new vocabulary in classroom lessons	.73	7.51
<b>SICP 4.4)</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	.72	
<b>SICP 4.6)</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	.69	
<b>SICP 4.2)</b> Make lists of a new vocabulary with their meaning to learn new vocabulary in the classroom lessons	.68	
<b>SICP 4.5)</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	.66	
<b>SICP 4.1)</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	.62	
<b>Factor 3: Strategies for Reading Skill Improvement</b>		
<b>SOCP 3.4)</b> Watch television programs in English improve one's reading skill	.76	5.74
<b>SOCP 3.5)</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	.68	
<b>SOCP 3.3)</b> Listen to English conversation from CDs to improve one's reading skill	.66	
<b>SOCP 3.1)</b> Watch English-speaking films to improve one's reading skill	.60	
<b>SOCP 3.2)</b> listen to English songs to improve one's reading skill	.56	



**Table 6.20** (Cont.) List of the Ten Extracted Factors

<b>Factor 4: Strategies for Vocabulary Expansion</b>	<b>Factor Loading</b>	<b>% of Variance</b>
<b>SOCP 1.1)</b> Play games in English such as computer games to gain more knowledge about vocabulary	.77	4.80
<b>SOCP 1.4)</b> Listen to English songs to gain more knowledge about vocabulary	.75	
<b>SOCP 1.3)</b> Watch English-speaking films to gain more knowledge about vocabulary	.71	
<b>SOCP 1.2)</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	.64	
<b>Factor 5: Strategies for Extra-Tutorial Support</b>		
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	4.07
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	
<b>Factor 6: Strategies for Solving Classroom Problems</b>		
<b>SICP 3.3)</b> Ask a classmate or classmates either in class or outside class solve the problems encountered in the classroom lessons	.72	3.60
<b>SICP 3.4)</b> Ask other people than one's teacher or classmate to solve the problems encountered in the classroom lessons	.69	
<b>SICP 3.2)</b> Ask teachers after class to solve the problems encountered in the classroom lessons	.68	
<b>SICP 3.1)</b> Ask the teacher in class either immediately or when appropriate to solve the problems encountered in the classroom lessons	.65	
<b>SICP 3.5)</b> Study by oneself to solve the problems encountered in the classroom lessons	.57	
<b>Factor 7: Strategies for Productive Skills Improvement</b>		
<b>SOCP 5.3)</b> Use the computer programs such as a chat program to improve one's writing skill	.85	3.15
<b>SOCP 5.1)</b> Correspond in English by letter or email to improve one's writing skill	.75	
<b>SOCP 4.3)</b> Use the computer programs such as a chat program to improve one's speaking skill	.69	
<b>SOCP 5.2)</b> Practice writing in English such as writing diary to improve one's writing skill	.55	
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	2.86
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	

**Table 6.20** (Cont.) List of the Ten Extracted Factors

<b>Factor 9: Strategies for Skills Improvement through Media Utilization</b>	<b>Factor Loading</b>	<b>% of Variance</b>
<b>SOCP 2.1)</b> Watch English-speaking films to improve one's listening skill	.69	
<b>SOCP 2.2)</b> Listen to English songs to improve one's listening skill	.66	
<b>SOCP 2.4)</b> Watch television programs in English to improve one's listening skill	.58	2.44
<b>SOCP 2.3)</b> Listen to English conversation from CDs to improve one's listening skill	.58	
<b>Factor 10: Strategies for Oral Skills Improvement</b>		
<b>SOCP 4.1)</b> Try to speak English either to oneself or to other Thai people to improve one's speaking skill	.76	
<b>SOCP 4.2)</b> Try to speak to foreigner either teachers or other foreigners to improve one's speaking skill	.72	2.02
<b>SOCP 4.4)</b> Try to imitate a native speaker from media such as English film or CD to improve one's speaking skill	.69	

As seen in Table 6.20, the results of the factor analysis, i.e. the varimax rotation method, reveal the ten extracted factors which include:

Factor 1, which is renamed as 'Strategies for strategies for the classroom preparation' accounted for 33.60 per cent of variance among the language learning strategies in the strategy questionnaire for the present investigation. This factor comprises five of the in-class strategies reported to be employed by students in order to be well-prepared for classroom lessons.

Factor 2, which is renamed as 'Strategies for understanding new vocabulary in the classroom lessons' accounted for 7.51 per cent of variance of the strategy items. This factor comprises six of the in-class strategies reported to be employed by students in order to learn new vocabulary in the classroom lessons.

Factor 3, which is renamed as 'Strategies for reading skill improvement' accounted for 5.74 per cent of variance among the language learning strategies in the strategy questionnaire for the present investigation. This factor comprises five of the

out-of-class strategies reported to be employed by students in order to improve one's reading skill.

Factor 4, which is renamed as 'Strategies for vocabulary expansion' accounted for 4.80 per cent of the whole strategy variance. This factor comprises four of the out-of-class strategies reported to be employed by students in order to gain more knowledge about vocabulary.

Factor 5, which is renamed as 'Strategies for extra-tutorial support' accounted for 4.07 per cent of variance among the language learning strategies in the strategy questionnaire for the present investigation. This factor comprises three of the out-of-class strategies reported to be employed by students in order to improve productive skills and to gain more knowledge about vocabulary by attending the extra-language classes.

Factor 6, which is renamed as 'Strategies for solving classroom problems' accounted for 3.60 per cent of variance of the strategy items. This factor comprises five of the in-class strategies reported to be employed by students in order to solve the problems encountered in the classroom lesson

Factor 7, which is renamed as 'Strategies for productive skills improvement' accounted for 3.15 per cent of variance among the language learning strategies in the strategy questionnaire for the present investigation. This factor comprises four of the out-of-class strategies reported to be employed by students in order to improve productive skills.

Factor 8, which is renamed as 'Strategies for concentrating while studying in class' accounted for 2.86 per cent of the whole strategy variance. This factor comprises four of the in-class strategies reported to be employed by students in order to understand the lessons while studying in class.

Factor 9, which is renamed as 'Strategies for skills improvement through media utilization' accounted for 2.44 per cent of the whole strategy variance. This factor comprises four of the out-of-class strategies reported to be employed by students in order to improve one's listening skill.

Factor 10, which is renamed as 'Strategies for oral skills improvement' accounted for 2.02 per cent of variance among the language learning strategies in the strategy questionnaire for the present investigation. This factor comprises two of the out-of-class strategies reported to be employed by students in order to improve one's speaking skill.

The underlying factors of the language strategies, the percentage of variance of each factor, and the factor loading for each strategy item have been described above. The following is an examination of the relationship between these factors and each of the five investigated variables: the gender of students; type of school; field of study; extra-language class support; and language proficiency levels.

In determining such a relationship, factors which strongly related to a particular variable are emphasized. For the purpose of discussion of the factor analysis results in the following section, the criteria for strong relation between the factors and each of the variables suggested by Seliger and Shohamy (1990) have been adopted, i.e. a factor is considered to be strongly related to a variable if half or more of the learning strategies in the particular factor have a loading of .50 or more, showing a significant variation in relation to that variable. In the present investigation, the results of the varimax rotation show that four extracted factors were found to be strongly related to gender of students, three to types of school, two to fields of study, nine to the extra-language classes support, and ten to students' language proficiency levels.

### 6.6.1 Factors strongly related to students' gender

As the results of ANOVA, as reported in the previous sections, show significant variations in frequency of strategy use according to this variable. The results of the factors analysis reveal that three factors (Factors 5, 7, and 8) were found to be strongly related to students' gender. These deal with strategies used to achieve both in-class and out-of-class purposes. The relationship between the three factors and students' gender is presented in Table 6.21 below.

**Table 6.21** Factors with strong relation to 'gender of students'

<b>Factor 5: Strategies for Extra-Tutorial Support</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	Female > Male
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	Female > Male
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	Female > Male
<b>Factor 7: Strategies for Productive Skills Improvement</b>		
<b>SOCP 5.3)</b> Use the computer programs such as a chat program to improve one's writing skill	.85	Male > Female
<b>SOCP 5.1)</b> Correspond in English by letter or email to improve one's writing skill	.75	Male > Female
<b>SOCP 4.3)</b> Use the computer programs such as a chat program to improve one's speaking skill	.69	Male > Female
<b>SOCP 5.2)</b> Practice writing in English such as writing diary to improve one's writing skill	.55	N.S.
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	Female > Male
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	Female > Male
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	Female > Male
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	Female > Male

**Note:** **Female > Male** means female students reported employing that particular strategy significantly more frequently than did male students; **N.S.** means no statistical significance was found in use of that particular strategy.

### 6.6.2 Factors strongly related to type of school

The results of the factors analysis reveal that three factors (Factors 5, 7, and 8) were found to be strongly related to type of school. The results also show significant

variations in students' reported use of language learning strategies mainly to achieve both in-class (to understand the lessons while studying in class) and out-of-class purposes (to gain more knowledge about vocabulary and to improve productive skills either individually or by attending extra-language classes). Table 6.22 below demonstrates the three factors strongly related to this variable.

**Table 6.22** Factors with strong relation to 'type of school'

<b>Factor 5: Strategies for Extra-Tutorial Support</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	N.S.
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	Public > Private
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	Public > Private
<b>Factor 7: Strategies for Productive Skills Improvement</b>		
<b>SOCP 5.3)</b> Use the computer programs such as a chat to improve one's writing skill	.85	Private > Public
<b>SOCP 5.1)</b> Correspond in English by letter or email to improve one's writing skill	.75	Private > Public
<b>SOCP 4.3)</b> Use the computer programs such as a chat program to improve one's speaking skill	.69	N.S.
<b>SOCP 5.2)</b> Practice writing in English such as writing diary to improve one's writing skill	.55	N.S.
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	N.S.
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	Private > Public
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	N.S.
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	Private > Public

**Note:** **Public > Private** means public school students reported employing that particular strategy significantly more frequently than did private school students; **Private > Public** means private school students reported employing that particular strategy significantly more frequently than did public school students; **N.S.** means no statistical significance was found in use of that particular strategy.

### 6.6.3 Factors strongly related to field of study

Two factors (Factors 5 and 8) were found to be strongly related to this variable. The results of the factors analysis show significant variations in students reported use of language learning strategies mainly to achieve both in-class (to

understand the lessons while studying in class) and out-of-class purposes (to gain more knowledge about vocabulary and to improve productive skills by attending extra-language classes). The relationship between the two factors and field of study is presented in Table 6.23 below.

**Table 6.23** Factors with strong relation to ‘field of study’

<b>Factor 5: Strategies for Extra-Tutorial Support</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	SC > NSC
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	SC > NSC
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	SC > NSC
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	SC > NSC
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	SC > NSC
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	SC > NSC
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	N.S.

**Note:** SC > NSC means science-oriented students reported employing that particular strategy significantly more frequently than did non science-oriented students; N.S. means no statistical significance was found in use of that particular strategy.

#### 6.6.4 Factors strongly related to extra-language class support

The results of ANOVA, as reported in the previous sections, show significant variations in frequency of strategy use according to this variable. The results of the factors analysis reveal that nine factors (Factors 1, 2, 3, 4, 5, 6, 8, 9, and 10) were found to be strongly related to extra-language class support. They deal with strategies used for achieving both in-class and out-of-class purposes. Table 6.24 below demonstrates the nine factors strongly related to this variable.

**Table 6.24** Factors with strong relation to ‘extra-language class support’

<b>Factor 1: Strategies for the Classroom Preparation</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SICP 1.2)</b> Study the vocabulary in advance to be well-prepared for the lessons	.88	N.S.
<b>SICP 1.1)</b> Study in advance to be well-prepared for the lessons	.88	ECS > NECS
<b>SICP 1.4)</b> Do the revision of the previous lessons either by oneself or with classmates to be well-prepared for the lessons	.86	N.S.
<b>SICP 1.3)</b> Try some exercises in advance to be well-prepared for the lessons	.86	ECS > NECS
<b>SICP 1.5)</b> Attend extra-classes to be well-prepared for the lessons	.61	ECS > NECS
<b>Factor 2: Strategies for Understanding New Vocabulary in the Classroom Lessons</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SICP 4.3)</b> Look at the root of a new vocabulary to learn new vocabulary in classroom lessons	.73	ECS > NECS
<b>SICP 4.4)</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	.72	ECS > NECS
<b>SICP 4.6)</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	.69	ECS > NECS
<b>SICP 4.2)</b> Make lists of a new vocabulary with their meaning to learn new vocabulary in the classroom lessons	.68	ECS > NECS
<b>SICP 4.5)</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	.66	ECS > NECS
<b>SICP 4.1)</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	.62	N.S.
<b>Factor 3: Strategies for Reading Skill Improvement</b>		
<b>SOCP 3.4)</b> Watch television programs in English to improve one's reading skill	.76	ECS > NECS
<b>SOCP 3.5)</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	.68	ECS > NECS
<b>SOCP 3.3)</b> Listen to English conversation from CDs to improve one's reading skill	.66	ECS > NECS
<b>SOCP 3.1)</b> Watch English-speaking films to improve one's reading skill	.60	ECS > NECS
<b>SOCP 3.2)</b> listen to English songs to improve one's reading skill	.56	ECS > NECS
<b>Factor 4: Strategies for Vocabulary Expansion</b>		
<b>SOCP 1.1)</b> Play games in English such as computer games to gain more knowledge about vocabulary	.77	ECS > NECS
<b>SOCP 1.4)</b> Listen to English songs to gain more knowledge about vocabulary	.75	ECS > NECS
<b>SOCP 1.3)</b> Watch English-speaking films to gain more knowledge about vocabulary	.71	ECS > NECS
<b>SOCP 1.2)</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	.64	ECS > NECS



**Table 6.24** (Cont.) Factors with strong relation to ‘extra-language class support’

<b>Factor 5: Strategies for Extra-Tutorial Support</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	ECS > NECS
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	ECS > NECS
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	ECS > NECS
<b>Factor 6: Strategies for Solving Classroom Problems</b>		
<b>SICP 3.3)</b> Ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons	.72	N.S.
<b>SICP 3.4)</b> Ask other people than one's teacher or classmate to solve the problems encountered in the classroom lessons	.69	ECS > NECS
<b>SICP 3.2)</b> Ask teachers after class to solve the problems encountered in the classroom lessons	.68	ECS > NECS
<b>SICP 3.1)</b> Ask the teacher in class either immediately or when appropriate to solve the problems encountered in the classroom lessons	.65	N.S.
<b>SICP 3.5)</b> Study by oneself to solve the problems encountered in the classroom lessons	.57	ECS > NECS
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	ECS > NECS
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	N.S.
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	N.S.
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	ECS > NECS
<b>Factor 9: Strategies for Skills Improvement through Media Utilization</b>		
<b>SOCP 2.1)</b> Watch English-speaking films to improve one's listening skill	.69	ECS > NECS
<b>SOCP 2.2)</b> listen to English songs to improve one's listening skill	.66	ECS > NECS
<b>SOCP 2.4)</b> Watch television programs in English to improve one's listening skill	.58	ECS > NECS
<b>SOCP 2.3)</b> Listen to English conversation from CDs to improve one's listening skill	.58	ECS > NECS
<b>Factor 10: Strategies for Oral Skills Improvement</b>		
<b>SOCP 4.1)</b> Try to speak English either to oneself or to other Thai people to improve one's speaking skill	.76	N.S.
<b>SOCP 4.2)</b> Try to speak to foreigner either teachers or other foreigners to improve one's speaking skill	.72	ECS > NECS
<b>SOCP 4.4)</b> Try to imitate a native speaker from media such as English film or CD to improve one's speaking skill	.69	ECS > NECS

**Note:** ECS > NECS means extra-language class support students reported employing that particular strategy significantly more frequently than did non extra-language class support students; N.S. means no statistical significance was found in use of that particular strategy.

### 6.6.5 Factors strongly related to level of language proficiency

The results of ANOVA, as presented in the previous sections, show significant variations in frequency of strategy use according to this variable. The results of the factors analysis have confirmed the ANOVA results, revealing that all ten factors which were found to be strongly related to levels of language proficiency, are dealing with strategies used to achieve both in-class and out-of-class purposes. In addition, as suggested in Oxford and Green (1995), the pattern of variation in students' use of the individual strategies could be positive or negative or mixed. For the present investigation, the pattern of variation can be classified as positive (High > Moderate > Low) and mixed (Moderate > Low > High) or (High > Low > Moderate). There were no negative patterns found relating to this variable. The relationship between the ten factors and level of language proficiency is presented in Table 6.25 below.

**Table 6.25** Factors with strong relation to 'level of language proficiency'

<b>Factor 1: Strategies for the Classroom Preparation</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SICP 1.2)</b> Study the vocabulary in advance to be well-prepared for the lessons	.88	Mixed
<b>SICP 1.1)</b> Study the lessons in advance to be well-prepared for the lessons	.88	Mixed
<b>SICP 1.4)</b> Do the revision of the previous lessons either by oneself or with classmates to be well-prepared for the lessons	.86	Mixed
<b>SICP 1.3)</b> Try some exercises in advance to be well-prepared for the lessons	.86	Mixed
<b>SICP 1.5)</b> Attend extra-classes to be well-prepared for the lessons	.61	Positive
<b>Factor 2: Strategies for Understanding New Vocabulary in the Classroom Lessons</b>		
<b>SICP 4.3)</b> Look at the root of a new vocabulary to learn new vocabulary in classroom lessons	.73	Positive
<b>SICP 4.4)</b> Memorize new words with or without a list to learn new vocabulary in the classroom lessons	.72	Positive
<b>SICP 4.6)</b> Group new vocabulary items according to their similarity in meaning to learn new vocabulary in the classroom lessons	.69	Positive
<b>SICP 4.2)</b> Make lists of a new vocabulary with their meaning to learn new vocabulary in the classroom lessons	.68	Positive
<b>SICP 4.5)</b> Guess the meaning of a new vocabulary item from the context to learn new vocabulary in the classroom lessons	.66	Positive
<b>SICP 4.1)</b> Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English to learn new vocabulary in the classroom lessons	.62	Positive

**Table 6.25** (Cont.) Factors with strong relation to ‘level of language proficiency’

<b>Factor 3: Strategies for Reading Skill Improvement</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 3.4)</b> Watch television programs in English to improve one's reading skill	.76	Positive
<b>SOCP 3.5)</b> Read printed materials in English such as newspapers, magazines, and leaflets to improve one's reading skill	.68	Positive
<b>SOCP 3.3)</b> Listen to English conversation from CDs to improve one's reading skill	.66	Positive
<b>SOCP 3.1)</b> Watch English-speaking films to improve one's reading skill	.60	Positive
<b>SOCP 3.2)</b> listen to English songs to improve one's reading skill	.56	Positive
<b>Factor 4: Strategies for Vocabulary Expansion</b>		
<b>SOCP 1.1)</b> Play games in English such as computer games to gain more knowledge about vocabulary	.77	Positive
<b>SOCP 1.4)</b> Listen to English songs to gain more knowledge about vocabulary	.75	Positive
<b>SOCP 1.3)</b> Watch English-speaking films to gain more knowledge about vocabulary	.71	Positive
<b>SOCP 1.2)</b> Read printed materials in English such as newspapers, magazines, and leaflets to gain more knowledge about vocabulary	.64	Positive
<b>Factor 5: Strategies for Extra-Tutorial Support</b>		
<b>SOCP 5.4)</b> Attend extra-class to improve one's writing skill	.86	Positive
<b>SOCP 1.5)</b> Attend extra-class to gain more knowledge about vocabulary	.84	Positive
<b>SOCP 4.5)</b> Attend extra-class to improve one's speaking skill	.84	Positive
<b>Factor 6: Strategies for Solving Classroom Problems</b>		
<b>SICP 3.3)</b> Ask a classmate or classmates either in class or outside class to solve the problems encountered in the classroom lessons	.72	Mixed
<b>SICP 3.4)</b> Ask other people than one's teacher or classmate to solve the problems encountered in the classroom lessons	.69	N.S.
<b>SICP 3.2)</b> Ask teachers after class to solve the problems encountered in the classroom lessons	.68	Positive
<b>SICP 3.1)</b> Ask the teacher in class either immediately or when appropriate to solve the problems encountered in the classroom lessons	.65	Positive
<b>SICP 3.5)</b> Study by oneself to solve the problems encountered in the classroom lessons	.57	Positive
<b>Factor 7: Strategies for Productive Skills Improvement</b>		
<b>SOCP 5.3)</b> Use the computer programs such as a chat program to improve one's writing skill	.85	Mixed
<b>SOCP 5.1)</b> Correspond in English by letter or email to improve one's writing skill	.75	Positive

**Note:** **Positive** means the pattern of language proficiency which high language proficiency levels students reported employing the particular strategy significantly more frequently than did those with moderate and low levels of language proficiency; **Mixed** means the pattern of language proficiency which high and low levels of language proficiency students reported employing the particular strategy significantly more frequently than did those with moderate levels of language proficiency or moderate levels of language proficiency students reported employing the particular strategy significantly more frequently than did those with low and high levels of language proficiency; **N.S.** means no statistical significance was found in use of that particular strategy.

**Table 6.25 (Cont.) Factors with strong relation to ‘level of language proficiency’**

<b>Factor 7 (Cont.): Strategies for Productive Skills Improvement</b>	<b>Factor Loading</b>	<b>Comment</b>
<b>SOCP 4.3)</b> Use the computer programs such as a chat program improve one's speaking skill	.69	Positive
<b>SOCP 5.2)</b> Practice writing in English such as writing diary to improve one's writing skill	.55	Mixed
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>		
<b>SICP 2.1)</b> Listen to the teacher attentively and pay attention to teacher to understand the lessons while studying in class	.76	Mixed
<b>SICP 2.2)</b> Take notes while studying in class with a teacher to understand the lessons while studying in class	.74	N.S.
<b>SICP 2.4)</b> Try not to talk with other students while studying to understand while studying in class	.73	Positive
<b>SICP 2.3)</b> Try to get a seat in the front row to understand the lessons while studying in class	.69	Positive
<b>Factor 9: Strategies for Skills Improvement through Media Utilization</b>		
<b>SOCP 2.1)</b> Watch English-speaking films to improve one's listening skill	.69	Positive
<b>SOCP 2.2)</b> listen to English songs to improve one's listening skill	.66	Positive
<b>SOCP 2.4)</b> Watch television programs in English to improve one's listening skill	.58	Positive
<b>SOCP 2.3)</b> Listen to English conversation from CDs to improve one's listening skill	.58	Positive
<b>Factor 10: Strategies for Oral Skills Improvement</b>		
<b>SOCP 4.1)</b> Try to speak English either to oneself or to other Thai people to improve one's speaking skill	.76	N.S.
<b>SOCP 4.2)</b> Try to speak to foreigner either teachers or other foreigners to improve one's speaking skill	.72	Positive
<b>SOCP 4.4)</b> Try to imitate a native speaker from media such as English film or CD to improve one's speaking skill	.69	Positive

In conclusion, ten factors were extracted as the results of a factor analysis. All factors were found to be strongly related to students' language proficiency levels. Factors 5, 7, and 8 were found to be strongly related to gender of students. Factors 5, 7, and 8 were found to be strongly related to type of school. Factors 5 and 8 were found to be strongly related to field of study. Factors 1- 6 and 8-9 were found to be strongly related to extra-language class support. In addition, factors 5 and 8 were found to be strongly related to all five investigated variables. Table 6.26 below summarizes the strong relationship between the factors and the variables of the present investigation.

**Table 6.26** Summary of factors with strong relationship with different variables

Factors	Gender	Schools	Fields	Extra	Levels
<b>Factor 1: Strategies for the Classroom Preparation</b>	NO	NO	NO	YES	YES
<b>Factor 2: Strategies for Understanding New Vocabulary in the Classroom Lessons</b>	NO	NO	NO	YES	YES
<b>Factor 3: Strategies for Reading Skill Improvement</b>	NO	NO	NO	YES	YES
<b>Factor 4: Strategies for Vocabulary Expansion</b>	NO	NO	NO	YES	YES
<b>Factor 5: Strategies for Extra- Tutorial Support</b>	YES	YES	YES	YES	YES
<b>Factor 6: Strategies for Solving Classroom Problems</b>	NO	NO	NO	YES	YES
<b>Factor 7: Strategies for Productive Skills Improvement</b>	YES	YES	NO	NO	YES
<b>Factor 8: Strategies for Concentrating while Studying in Class</b>	YES	YES	YES	YES	YES
<b>Factor 9: Strategies for Skills Improvement through Media Utilization</b>	NO	NO	NO	YES	YES
<b>Factor 10: Strategies for Oral Skills Improvement</b>	NO	NO	NO	YES	YES

**Note:** A significant variation is specified with ‘Yes’ and non-significant is specified with ‘NO.’

## 6.7 Summary

In this chapter, the process of data analysis for language learning strategy use is presented with systematically examined variations in frequency of students’ overall use, use of strategies in the two main categories, and use of individual learning strategies by five independent variables: gender of students, type of school, field of study, extra-language class support, and language proficiency levels. Data were collected through the use of the language learning strategy questionnaire with a total of 43 individual language learning strategies. Analysis of variance, chi-square tests and a factor analysis were the three forms of analysis carried out on the data.

The research findings and discussions have demonstrated or implied a number of points outlined in a summary below. Each focal point of discussion will contribute to the understanding of the reader about language learning strategy in a new perspective, as well as the relationships between the use of language learning

strategies at different levels and the factors which are the main factors for the present investigation. The main points of research findings can be summarized as follows:

- 1) Based on the findings of the analysis of variance (ANOVA), significant variations in frequency of students' overall strategy use were found in relation to student's gender, extra-language class support, and language proficiency levels.
  - 1.1) In terms of gender of students, female students reported employing overall language learning strategies significantly more frequency than did male students.
  - 1.2) Extra-language class support students reported employing overall language learning strategies significantly more frequently than did those non extra-language class support students.
  - 1.3) In respect of the student's level of language proficiency, high language proficiency students reported employing overall language learning strategies significantly more frequency than did those with moderate and low language proficiency.
- 2) Based on the findings of the analysis of variance (ANOVA), significant variations in frequency of strategy use of in-class strategies were found in relation to gender of students, field of study, extra-language class support, and language proficiency levels.
  - 2.1 In terms of gender of students, female students reported more frequent use of these strategies than did male students.

- 2.2 With respect to the student's field of study, science-oriented students reported more frequent use of these strategies than non science-oriented students.
- 2.3 Extra-language class support students reported more frequent use of these language learning strategies than did non extra-language class support students.
- 2.4 With respect to the student's level of language proficiency, high language proficiency students reported employing these language learning strategies significantly more frequently than did those with moderate and low language proficiency.
- 3) Based on the findings of the analysis of variance (ANOVA), significant variations in frequency of strategy use of out-of-class strategies were found in relation to gender of students, extra-language class support, and language proficiency levels.
- 3.1 In terms of gender of students, female students reported employing these language learning strategies significantly more frequently than did male students.
- 3.2 Extra-language class support students reported more frequent use of these language learning strategies than did non extra-language class support students.
- 3.3 with respect to the student's level of language proficiency, high language proficiency students reported employing these language learning strategies significantly more frequently than did those with moderate and low language proficiency.

- 4) Based on the results of chi-square tests ( $\chi^2$ ), significant variations in frequency of strategy use of out-of-class strategies were found in relation to all five variables:
- 4.1 Regarding gender of students, female students reported more frequent use of individual language learning strategies than did male students.
  - 4.2 In terms of type of school, private school students reported more frequent use of individual language learning strategies than did public school students.
  - 4.3 With respect to the student's field of study, science-oriented students reported more frequent use of these strategies than did non science-oriented students.
  - 4.4 Extra-language class support students reported more frequent use of these language learning strategies than did non extra-language class support students.
  - 4.5 With respect to the student's level of language proficiency, high language proficiency students reported employing these language learning strategies significantly more frequently than did those with moderate and low language proficiency.
- 5) Based on the results of factor analysis, ten factors (Factors 1-10) were extracted. The results of factor analysis reveal that language proficiency levels show the strongest relationship to students' use of language learning strategies, while the field of study shows the least relationship to students' use of language learning strategies.



- 5.1 Factor 5 ‘Strategies for Extra-Tutorial Support’, Factor 7 ‘Strategies for Productive Skills Improvement’, and Factor 8 ‘Strategies for Concentrating while Studying in Class’ were found to be strongly related to students’ gender.
- 5.2 Factor 5 ‘Strategies for Extra-Tutorial Support’, Factor 7 ‘Strategies for Productive Skills Improvement’, and Factor 8 ‘Strategies for Concentrating while Studying in Class’ were found to be strongly related to type of school.
- 5.3 Factor 5 ‘Strategies for Extra-Tutorial Support’ and Factor 8 ‘Strategies for Concentrating while Studying in Class’ were found to be strongly related to the field of study.
- 5.4 Almost all factors were found to be strongly related to extra-language class support except Factor 7, ‘Strategies for Productive Skills Improvement’. Factors 1 - 10 were found to be strongly related to language proficiency levels.

The research findings for the present investigation have provided the researcher with useful information on another perspective of research in the area of language learning strategies. In the next chapter, summarizes the research findings in response to the research questions posed in Chapter 3, together with the discussions, implications, contributions, limitations and conclusions of the present investigation.

# **CHAPTER 7**

## **SUMMARY OF RESEARCH FINDINGS, DISCUSSION AND CONCLUSION**

### **7.1 Introduction and Purpose of the Chapter**

The previous chapter (Chapter 6) revealed significant variations and patterns of variation in frequency of language learning strategy use at each of the four different levels reportedly employed by 1,816 Thai pre-university students and five examined variables. The main purpose of this last chapter is to present the main findings of the present investigation in response to research questions 1 to 7 posed earlier in Chapter 3. This is followed by a discussion of the implications which emerged from the research for the teaching and learning of English for pre-university students in both state-run and private-run schools in Thailand, and the contributions of the present investigation to related areas. Finally, the limitations of proposals for further research are also provided.

In Chapters 5 and 6, through an implication of the strategy questionnaire, the researcher has systematically identified types of language learning strategies and the reported frequency of use of these language learning strategies by 1,816 pre-university students studying English at pre-university level in both public and private secondary schools in Thailand. Chapter 6 presents significant variations and patterns of variation in frequency of language learning strategy use, especially the relationship between students' reported frequency use of language learning strategies and different independent variables, i.e. gender, field of study, type of school, extra-language

learning class, and language proficiency levels. For a better understanding of certain patterns of significant variations in strategy use and other apparently significant differences in association with each variable, the researcher will suggest explanations reasons for them in the following discussion section (Section 7.3).

## **7.2 Summary of Research Findings**

The present investigation has reported the research findings of students' reported language learning strategy use. These findings also form responses to the research questions and spur further discussion. The findings are presented as follows:

### **7.2.1 Research Question 1: What are the types of language learning strategies reported to be employed by Thai pre-university students learning English as a foreign language in Thailand?**

#### **7.2.1.1 Findings**

In response to Research Question 1, the research findings demonstrate that a total of 43 individual language learning strategies were reported by Thai pre-university students. These 43 individual language learning strategies were classified according to their purposes for language learning. As a result, nine purposes of language learning strategy use emerged and these purposes were grouped into two main categories. These include Category 1: the in-class strategy category (IC), comprising four purposes (ICP) and twenty individual language learning strategies; and Category 2: the out-of-class strategy category (OC), comprising five purposes (OCP) and twenty-three individual language learning strategies. What follows is the strategy inventory for the present investigation:

### **Category 1: The In-Class Strategy Category (IC)**

#### **ICP 1: To be well-prepared for the lessons**

- SICP 1.1:** Study the lessons in advance
- SICP 1.2:** Study the vocabulary in advance
- SICP 1.3:** Try some exercises in advance
- SICP 1.4:** Do the revision of the previous lessons either by yourself or with a classmate
- SICP 1.5:** Attend extra-classes in order to be well-prepared for the lessons

#### **ICP 2: To understand the lessons while studying in class**

- SICP 2.1:** Listen to the teacher attentively and pay attention to the teacher
- SICP 2.2:** Take notes while studying in class with a teacher
- SICP 2.3:** Try to get a seat in the front row
- SICP 2.4:** Try not to talk with other students while studying

#### **ICP 3: To solve problems encountered in the classroom lessons**

- SICP 3.1:** Ask the teacher in class either immediately or when appropriate
- SICP 3.2:** Ask teachers after class
- SICP 3.3:** Ask a classmate or classmates either in class or outside class
- SICP 3.4:** Ask people other than your teachers or classmates
- SICP 3.5:** Study by oneself

#### **ICP 4: To learn new vocabulary in the classroom lessons**

- SICP 4.1:** Use a dictionary or electronic dictionary to check the meaning of new vocabulary items either in Thai or in English
- SICP 4.2:** Make a list of the new vocabulary with their meaning
- SICP 4.3:** Look at the root of the new vocabulary
- SICP 4.4:** Memorize new words with or without lists
- SICP 4.5:** Guess the meaning of the new vocabulary item from the context
- SICP 4.6:** Group new vocabulary items according to their similarity in meaning

### **Category 2: The Out-of-Class Strategy Category (OC)**

#### **OCP 1: To gain more knowledge about vocabulary**

- SOCP 1.1:** Play games in English such as computer games
- SOCP 1.2:** Read printed materials in English such as newspapers, magazines, and leaflets

**SOCP 1.3:** Watch English-speaking films

**SOCP 1.4:** Listen to English songs

**SOCP 1.5:** Attend extra-classes

**OCP 2: To improve one's listening skill**

**SOCP 2.1:** Watch English-speaking films

**SOCP 2.2:** Listen to English songs

**SOCP 2.3:** Listen to English conversation from CDs

**SOCP 2.4:** Watch television programs in English

**OCP 3: To improve one's reading skill**

**SOCP 3.1:** Watch English-speaking films

**SOCP 3.2:** Listen to English songs

**SOCP 3.3:** Listen to English conversation from CD

**SOCP 3.4:** Watch television programs in English

**SOCP 3.5:** Read printed materials in English such as newspapers, magazines, and leaflets

**OCP 4: To improve one's speaking skill**

**SOCP 4.1:** Try to speak English either to oneself or to other Thai people

**SOCP 4.2:** Try to speak to foreigners, either teachers or other foreigners

**SOCP 4.3:** Use a computer programs such as a chat program

**SOCP 4.4:** Try to imitate a native speaker from media such as an English file or CDs

**SOCP 4.5:** Attend extra-classes

**OCP 5: To improve one's writing skill**

**SOCP 5.1:** Correspond in English by letter or email

**SOCP 5.2:** Practice writing in English such as writing a diary

**SOCP 5.3:** Use a computer programs such as a chat program

**SOCP 5.4:** Attend extra-classes

### **7.2.2 Research Question 2: What is the frequency with which these language learning strategies are reported to be used by these students?**

In response to Research Question 2, the research findings reveal that the students' reported overall use of these language learning strategies based on a holistic mean score of medium frequency according to the measure explained previously in Chapter 5 (Section 5.2). The mean score was 2.21. A similar frequency of use of these language learning strategies can be seen in the two main categories as well. The mean frequency scores for IC and OC were 2.24 (medium frequency use) and 2.19 (medium frequency use) respectively. When the reported frequencies of use of strategies in the two main categories were determined, no high frequency of strategy use or low frequency of strategy use was found in these two main categories.

The strategies related to the purposes of language learning for both in-class and out-of-class found that students reported medium frequency use of strategies to achieve three in-class and four out-of-class purposes. The three in-class purposes include: ICP 2: 'to understand the lessons while studying in class', ICP 3: 'to solve problems encountered in the classroom lessons', and ICP 4: 'to learn new vocabulary in the classroom lessons'. The four out-of-class purposes include: OCP 1: 'to gain more knowledge about vocabulary', OCP 2: 'to improve one's listening skill', OCP 3: 'to improve one's reading skill', and OCP 4: 'to improve one's speaking skill'. Lastly, students reported low proficiency of use of strategies to achieve one in-class and one out-of-class purposes include: ICP 1: 'to be well-prepared for the lessons and OCP 5: 'to improve one's writing skill'. The mean frequency scores were 1.71 and 1.88 respectively.

At the individual strategy level, it was found that students reported high frequency of use of only one individual language learning strategy which is SICP 2.1:

'listen to the teacher attentively and pay attention to the teacher to understand the lessons while studying in class. The mean frequency score was 3.12. Besides, students reported medium frequency of use of 32 individual strategies (13 from individual in-class and 19 individual out-of-class strategies) and low frequency of use of 10 individual language learning strategies (6 from individual in-class and 4 individual out-of-class). The five individual strategies which were found to be reported less frequently than other strategies include: SICP 1.3: try some exercises in advance to be well-prepared for the lessons, SICP 1.1: study the lessons in advance to be well-prepared for the lessons, SICP 1.5: attend extra classes in order to be well-prepared for the lessons, SICP 1.2: study the vocabulary in advance to be well-prepared for the lessons, and SOCP 5.2: practice writing in English such as writing a diary to improve one's writing skill. The mean frequency scores were 1.63, 1.67, 1.72, 1.73, and 1.73 respectively.

### **7.2.3 Research Question 3: Do students' choices of language learning strategies vary significantly with their gender? If they do, what are the main patterns of variation?**

In response to Research Question 3, an attempt to examine variation in use of language learning strategies as well as patterns of variation was reported in Chapter 6. As discovered in the strategy questionnaire reported by 1,816 pre-university students learning English at the secondary school level in Thailand, the findings at the four different levels of data analysis and the results of a factor analysis in relation to gender of students can be summarized as follows:

- **Overall Strategy Use**

The results of ANOVA revealed that there was significant variation in students' reported overall strategy use in relation to gender of students. The

significant variations show that female students generally reported more frequent overall strategy use than did their male students.

- **Use of strategies in the IC and OC**

The results based on ANOVA showed that there was a significant variation in students' reported strategy use both IC and OC that was found to be related to the gender of students, with female students reporting more frequent use of both IC and OC than did their male students counterparts.

- **Use of Strategies to Achieve ICP and OCP**

The results of ANOVA revealed that significant variations in reported frequency of use of strategies to achieve three in-class purposes, and three out-of-class purposes were found in relation to gender. These purposes are ICP 2: to understand the lessons while studying in class; ICP 3: to solve problems encountered in the classroom lessons; ICP 4: to learn new vocabulary in the classroom lessons; OCP 2: to improve one's listening skill; OCP 3: to improve one's reading skill; and OCP 4: to improve one's speaking skill. The significant variation indicates that female students reported more frequent use of these strategies than male students.

- **Use of Individual Language Learning Strategies**

The Chi-square tests showed that the use of 19 out of 43 individual language learning strategies (44.19%) varied significantly according to gender of students. The two main variation patterns were: Female > Male and Male > Female. The former pattern indicates that female students reported more frequent use of individual strategies than those male students, while the latter pattern indicates that male students reported more frequent use of individual strategies than did female students. The former pattern includes fifteen individual strategies such as 'listen to the teacher



attentively and pay attention to the teacher’, ‘take notes while studying in class with a teacher’, ‘ask a classmate or classmates either in class or outside class’ and ‘use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English’. The latter pattern includes four individual strategies such as ‘use a computer program such as a chat program in order to improve one's speaking and writing skills’, ‘correspond in English by letter or email in order to improve one's writing skill’, and ‘play games in English such as computer games in order to gain more knowledge about vocabulary’.

- **Factor Analysis**

The results of a factor analysis showed that four factors were found to be strongly related to gender of students. This included Factor 5 ‘Strategies for extra-tutorial support’, Factor 7 ‘Strategies for productive skills improvement’, and Factor 8, ‘Strategies for concentrating while studying in class’.

#### **7.2.4 Research Question 4: Do students’ choices of language learning strategies vary significantly according to field of study? If they do, what are the main patterns of variation?**

In response to the fourth research question, an attempt to examine variation in use of language learning strategies as well as patterns of variation was reported in Chapter 6. As discovered in the strategy questionnaire reported by 1,816 pre-university students learning English at the secondary school level in Thailand, the findings at the four different levels of data analysis and the results of ANOVA revealed that no significant variations in relation to field of study in students’ reported overall strategy use. However, the results at the other three different levels of data analysis showed that there were significant variations in students’ reported strategy

use in relation to this variable. The findings at the three different levels of data analysis and the results of factor analysis in relation to field of study can be summarized as follows:

- **Use of strategies in the IC and OC**

The results based on ANOVA showed that significant variations in students' reported strategy use in IC were found in relation to field of study, with science-oriented students reporting more frequent use of IC than did their non science-oriented student counterparts. No significant variations in use of language learning strategies were found between science-oriented students and those non science-oriented students in OC.

- **Use of Strategies to Achieve ICP and OCP**

The results of ANOVA revealed that significant variations in reported frequency of use of strategies to achieve two in-class purposes were found in relation to field of study. These purposes are ICP 2, which is to understand the lessons while studying in class and ICP 3: to solve the problems encountered in the classroom lessons. The significant variation indicates that science-oriented students reported more frequent use of these strategies than those non science-oriented students. No significant variations were found in the use of strategies to achieve out-of-class purposes.

- **Use of Individual Language Learning Strategies**

The Chi-square tests showed that the use of 11 out of 43 individual language learning strategies (25.58%) varied significantly according to field of study. The two main variation patterns were: SC > NSC students and NSC students > SC students. The former patterns indicates that science-oriented students reported more frequent

use of individual strategies than non science-oriented students, while the latter pattern indicates that non science-oriented students reported more frequent use of individual strategies than did science-oriented students. The former pattern includes ten individual strategies such as ‘listen to the teacher attentively and pay attention to the teacher’, ‘take notes while studying in class with a teacher’, ‘ask a classmate or classmates either in class or outside class’, ‘try not to talk with other students while studying’, ‘guess the meaning of new vocabulary items from the context’, ‘attend extra classes in order to gain more knowledge about vocabulary, and to improve writing and speaking skills’, ‘ask the teacher after class’, and group new vocabulary items according to their similarity in meaning’. The latter pattern includes one individual strategy which is ‘study the vocabulary in order to be well-prepared for the lessons’

- **Factor Analysis**

The results of a factor analysis showed that two factors were found to be strongly related to field of study. These include Factor 5 ‘Strategies for extra-tutorial support’, and Factor 8, ‘Strategies for concentrating while studying in class’.

**7.2.5 Research Question 5: Do students’ choices of language learning strategies vary significantly according to the type of school? If they do, what are the main patterns of variation?**

In response to the fifth research question, an attempt to examine variation in use of language learning strategies as well as patterns of variation was reported in Chapter 6. As detected in the strategy questionnaire reported by 1,816 pre-university students learning English at the secondary school level in Thailand, the findings at the four different levels of data analysis, the results of ANOVA revealed that no

significant variations in relation to type of school in students' reported overall strategy use and use of strategies in the two main categories. However, the results at two other different levels of data analysis showed that there was significant variation in students' reported strategy use in relation to this variable. The findings at the three different levels of data analysis and the results of factor analysis in relation to field of study can be summarized as follows:

- **Use of Strategies to Achieve ICP and OCP**

The results of ANOVA revealed that significant variations in reported frequency of use of strategies to achieve one in-class related purpose was found in relation to type of school. This purpose is ICP 2, which is to understand the lessons while studying in class.

- **Use of Individual Language Learning Strategies**

The Chi-square tests showed that the use of 9 out of 43 individual language learning strategies (20.93%) varied significantly according to type of school. The two main variation patterns were: PS > PRS students and PRS > PS students. The former patterns indicates that public school students reported more frequent use of individual strategies than private school students, while the latter pattern indicates that private school students reported more frequent use of individual strategies than did public school students. The former pattern includes four individual strategies such as 'ask a classmate or classmates either in class or outside class', 'attend extra classes in order to gain more knowledge about vocabulary', 'Study by oneself to solve the problems encountered in the classroom lesson', and 'attend extra classes in order to improve one's speaking skill'. The latter pattern includes five individual strategies which are 'take notes while studying in class with a teacher', 'use a dictionary or electronic

dictionary to check the meaning of new vocabulary either in Thai or in English’, ‘try to get the seat in the front row’, ‘use computer programs such as chat programs to improve one's writing skill’, and ‘correspond in English by letter or email to improve one's writing skill’.

- **Factor Analysis**

The results of a factor analysis showed that three factors were found to be strongly related to type of school. These include Factor 5 ‘Strategies for extra-tutorial support’, Factor 7 ‘Strategies for productive skills improvement’, and Factor 8, ‘Strategies for concentrating while studying in class’.

**7.2.6 Research Question 6: Do students’ choices of language learning strategies vary significantly according to the extra-language class support? If they do, what are the main patterns of variation?**

In response to Research Question 6, an attempt to examine variation in use of language learning strategies as well as patterns of variation was reported in Chapter 6. As discovered in the strategy questionnaire reported by 1,816 pre-university students learning English in secondary school level in Thailand, the findings at the four different levels of data analysis and the results of a factor analysis in relation to extra-language class support can be summarized as follows:

- **Overall Strategy Use**

The results of ANOVA revealed that there was significant variation in students’ reported overall strategy use in relation to extra-language class support. The significant variations show that extra-language class support students generally reported more frequent overall strategy use than did non extra-language class support students.

- **Use of strategies in the IC and OC**

Results based on ANOVA showed that significant variation in students' reported strategy use both IC and OC were found in relation to extra-language class support with extra-language class support students reporting more frequent use of both IC and OC than their non extra-language class support student counterparts.

- **Use of Strategies to Achieve ICP and OCP**

The results based on ANOVA revealed that significant variations in reported frequency of use of strategies to achieve four in-class purposes, and five out-of-class purposes were found in relation to extra-language class support. These purposes are ICP 1, which is to be well-prepared for the lessons; ICP 2: to understand the lessons while studying in class; ICP 3: to solve problems encountered in the classroom lessons; ICP 4: to learn new vocabulary in the classroom lessons; OCP 1: to gain more knowledge about vocabulary; OCP 2: to improve one's listening skill; OCP 3: to improve one's reading skill; OCP 4: to improve one's speaking skill; and OCP 5: to improve one's writing skill. The significant variation indicates that extra-language class support students reported more frequent use of these strategies than non extra-language class support students.

- **Use of Individual Language Learning Strategies**

The Chi-square tests showed that the use of 31 out of 43 individual language learning strategies (72.09%) varied significantly according to extra-language class support. The main variation pattern was: ECS > NECS. This pattern indicates that extra-language class support students reported more frequent use of individual strategies than those non extra-language class support students. This pattern includes 'listening to English songs in order to gain more knowledge about vocabulary',

‘listening to English songs with or without English script in order to improve one's listening skill’, ‘attend extra classes in order to improve one's speaking skill or one's writing skill’ and ‘guess the meaning of a new vocabulary items from the context’.

- **Factor Analysis**

The results of a factor analysis showed that nine factors were found to be strongly related to extra-language class support. This includes Factor 1 ‘Strategies for classroom preparation’, Factor 2 ‘Strategies for understanding new vocabulary in the classroom lessons’, Factor 3 ‘Strategies for reading skill improvement’, Factor 4 ‘Strategies for vocabulary expansion’, Factor 5, ‘Strategies for extra-tutorial support’, Factor 6 ‘Strategies for solving classroom problems’, Factor 8, ‘Strategies for concentrating while studying in class’, Factor 9 ‘Strategies for skills improvement through media utilization’, and Factor 10, ‘Strategies for oral skills improvement’.

**7.2.7 Research Question 7: Do students’ choices of language learning strategies vary significantly according to language proficiency levels? If they do, what are the main patterns of variation?**

In response to the seventh research question, an attempt to examine variation in use of language learning strategies as well as patterns of variation was reported in Chapter 6. As discovered in the strategy questionnaire reported by 1,816 pre-university students learning English at the secondary school level in Thailand, the findings at the four different levels of data analysis and the results of a factor analysis in relation to language proficiency levels can be summarized as follows:

- **Overall Strategy Use**

The results of ANOVA revealed that significant variation in students’ reported overall strategy use were found in relation to students’ language proficiency levels.

The results of the post-hoc Sheffe' Test showed that high proficiency students reported greater overall strategy use than moderate and low proficiency students.

- **Use of strategies in the IC and OC**

The results of ANOVA revealed that significant variations in students' reported strategy use both IC and OC were found in relation to students' language proficiency levels. The results of post-hoc Sheffe' Test carried out after ANOVA shows high proficiency students reported more frequent use of both IC and OC than those moderate proficiency and low proficiency students.

- **Use of Strategies to Achieve ICP and OCP**

The results of ANOVA revealed that significant variations in reported frequency of use of strategies to achieve four in-class related purposes, and five out-of-class related purposes were found in relation to this variable. These purposes are ICP 1, which is to be well-prepared for the lessons; ICP 2: to understand the lessons while studying in class; ICP 3: to solve problems encountered in the classroom lessons; ICP 4: to learn new vocabulary in the classroom lessons; OCP 1: to gain more knowledge about vocabulary; OCP 2: to improve one's listening skill; OCP 3: to improve one's reading skill; OCP 4: to improve one's speaking skill; and OCP 5: to improve one's writing skill. Based on the results of post-hoc Sheffe' Test carried out after ANOVA, the main significant variations of strategy use in relation to this variable are as follows:

1. High proficiency students reported more frequent use of strategies to achieve in-class purposes ICP 1, and out-of-class purposes OCP 1, OCP 2, OCP 3, OCP 4, and OCP 5 than moderate proficiency and low proficiency students.



2. High proficiency students reported more frequent use of strategies to achieve in-class purposes ICPs 2, 3, and 4 than low proficiency students.
3. Moderate proficiency students reported more frequent use of strategies to achieve in-class purposes ICP 2 than high proficiency and low proficiency students.
4. Moderate proficiency students reported more frequent use of strategies to achieve in-class purposes ICP 3 and ICP 4 than low proficiency students.

- **Use of Individual Language Learning Strategies**

The Chi-square tests showed that the use of 40 out of 43 individual language learning strategies (93.02%) varied significantly according to students' proficiency levels. The two main variation patterns were: positive and mixed. The former pattern indicates that high proficiency students reported more frequent use of individual strategies than moderate proficiency and low proficiency students. The latter pattern indicates that high proficiency and low proficiency students reported more frequent use of individual strategies than moderate proficiency students or moderate proficiency and low proficiency students reported more frequent use of individual strategies than high proficiency students. The former pattern includes thirty-two individual strategies such as 'listen to English songs in order to gain more knowledge about vocabulary', 'guess the meaning of a new vocabulary item from the context', 'listen to English songs with or without English script in order to improve one's listening skill', and 'attend extra classes in order to gain more knowledge about vocabulary'. The latter pattern includes eight individual strategies which are 'try some exercises', 'study the vocabulary in order to be well-prepared for the lessons',

'practice writing in English such as writing a diary in order to improve one's writing skill', and 'listen to the teacher attentively and pay attention to the teacher'.

- **Factor Analysis**

The results of a factor analysis showed that all factors were found to be strongly related to students' language proficiency levels. This includes Factor 1 'Strategies for the classroom preparation', Factor 2 'Strategies for understanding new vocabulary in the classroom lessons', Factor 3 'Strategies for reading skill improvement', Factor 4 'Strategies for vocabulary expansion', Factor 5, 'Strategies for extra-tutorial support', Factor 6 'Strategies for solving classroom problems', Factor 7 'Strategies for productive skills improvement', Factor 8, 'Strategies for concentrating while studying in class', Factor 9 'Strategies for skills improvement through media utilization', and Factor 10, 'Strategies for oral skills improvement'. What follows are discussions of the research findings in association with the variables investigation.

### **7.3 Discussion of the Research Findings**

Based on the research findings, the language learning strategies reported by Thai pre-university students were classified into nine broad groups according to their language purposes; i.e. to be well-prepared for the lessons, to understand the lessons while studying in class, to solve problems encountered in the classroom lessons, to learn new vocabulary in the classroom lessons, to gain more knowledge about vocabulary, to improve one's listening skill, to improve one's reading skill, to improve one's speaking skill and to improve one's writing skill. If we take a closer look at each proposed language learning strategy category which Thai pre-university students

reportedly employed, we will see that 20 out of 43 individual language learning strategies deal with in-class language learning strategies in order to achieve the classroom based purposes and success. While 23 out of 43 individual language learning strategies deal with out-of-class language learning strategies in order to improve their language learning in general through both mass media and non-mass media utilization. Generally, this means that the importance of language learning strategy use in the Thai context for Thai pre-university students is not only for language learners to understand what is learned in the classroom lessons, but also to improve their language skills and expand their language knowledge outside the classroom.

In response to the research questions, the relationships of language learning strategy use at different levels by 1,816 Thai pre-university students to the five variables have been ascertained. The discussion is presented with respect to the possible explanations for what has been discovered. This section will present possible reasons hypothesized by the researcher for where significant differences in certain strategy use with reference to each variable become apparent. It is important to point out that this section may not compare language learning strategy use by students in the very detailed manner of previous studies. This is because the present investigation has a different way of classifying language learning strategies as well as a different way of employing data analysis. What follows are discussion of the findings in relation to the five variables.

### **7.3.1 Use of Language Learning Strategies and Gender of Students**

In previous research studies in the field of language learning strategies in which the gender of students was taken into account, female students reported

employing certain language learning strategies significantly more frequently than their male counterparts (e.g. Ehrman and Oxford, 1989; 1990; Oxford and Nyikos, 1989; and Prakongchati, 2007), especially social strategies (e.g. Tercanlioglu, 2004; Ok, 2005). The major findings of the present investigation were consistent with the results of the past research which showed a strong relationship between the gender of students and their choices of strategy use.

However, some researchers have argued that there were no significant differences between females and males in learning a language strategy (Carroll, 1967 and Walker and Perry 1978). In Thailand, Intaraprasert's (2000) study also revealed a slight relationship between gender of students and their choices of strategy use. However, he did find a minor significant difference in use of individual strategies between female and male students with female students employing certain strategies significantly more frequently than male students did.

With a support of the previous empirical research, a factor which could possibly be an explanation for such significant differences was learner self-regulation. Schunk and Zimmerman (1994, p. 284) pointed out that 'learners' dependent or independent characteristics could be explained under the dimension of students' academic help seeking, which varied according to the degree of their maturity and autonomy in L2 learning'. From this study, in order to improve language learning skills, female students were likely to be more independent than male students, they relied on themselves rather than learning with teachers in the classroom setting, such as listening to English songs with English lyrics, watching television programs in English with English subtitles to improve their reading skill, and trying to imitate a native speaker from media such as English CDs to improve their speaking skill.

Language learning style preferences were another factor which could be a possible explanation for such significant differences. As seen in the study of Ehrman and Oxford (1989; 1990); Oxford and Nyikos (1989), females appeared to employ more social learning strategies both in interaction in the classroom and outside the classroom, for example, asking questions to obtain clarification or explanation, while male students appeared to employ computer programs or software packages in English as a source to input the target language (Intaraprasert, 2000). In this study, female students employed more social language learning strategies, in both in-class settings and in out-of-class settings, such as asking classmate(s) either in class or outside class or asking people other than teacher(s) or classmate(s) to solve the problems encountered in the classroom lesson, while male students employed more technology, such as using computer programs, for example, a chat program or use of e-mail to improve their writing skills.

Moreover, another factor which could possibly be an explanation for such significant differences was students' level of language proficiency. A number of previous studies on students' level of language proficiency in the field of second language learning or foreign language learning found that higher proficiency students appeared to employ a wider range of language learning strategies more frequently than lower proficiency students (Green and Oxford, 1995; Bremner, 1999; Wharton, 2000; Peacock and Ho, 2003; and Qingquan et al., 2008). However, few research studies focused on the relationship between gender and language proficiency of students (Qingquan et al., 2008). For example, in the studying by Green and Oxford (1995) and Peacock (2001), they found a greater use of learning strategies among more successful learners and higher levels of strategy use by women than by men.

However, there was a minor significant difference in the use of some individual language learning strategies in the present study which male students reported using more frequently than female counterparts. With a support of the previous empirical research, a factor which could possibly explain such significant differences was the difference in the attitude of female and male students regarding computers in the practice of learning a language. A number of previous studies on students' use of ICT (Information and Communication Technology) in the field of second language learning or foreign language learning found that male students had a more positive computer attitude than female students (Volman, 1997; and Huber and Schofield, 1998). This also was supported by the Mitra et al. (2001) study, which found that male students held a highly positive view of computers and use them more often than female students. The same result was found in the Colley and Camber (2003) study and the Volman et al. (2005) study, that female students had less interest and less self confidence in using computers than male students.

### **7.3.2 Use of Language Learning Strategies and Field of Study**

There are a number of research studies that have explored language learning strategies used by students from different fields of study (e.g. Politzer and McGroarty, 1985; Mochizuki, 1999; Peacock and Ho, 2003). In the Thai context, a number of research projects have been carried out in order to examine the relationship between this variable and learner's use of language learning strategies (e.g. Prakongchati, 2007). These works focus on comparing language learning strategies used by students studying English as a major and students studying other majors. The results of the studies reported that English major students used significantly more language learning strategies than did those studying in other majors.

The two different fields of study providing for Thai pre-university students in this investigation have been defined as: science-oriented and non science-oriented. In the Thai context, there has been no research work carried out to explore the difference in language learning strategies used by Thai pre-university students from different fields of study. The findings of the present investigation show that the overall strategy use of students studying in the science field is significantly higher than those studying in the non-science field. In fact, the only individual language strategy that the non science students reported employing more than science students was studying vocabulary before coming to class.

A factor which could possibly be drawn out to explain such significant differences as hypothesized by the researcher is the learning style. Gardner and Miller (1999, p. 157) consider learning styles as 'the ways learners like or dislike learning a language'. In this regard, looking at overall findings of these two groups of field of study, the findings reflect the fact that science students take more seriously the need to practice by employing a wider range of strategies to learn English than non science ones. It maybe because some courses taught in the science field at the university level may use English as the main language of instruction and in this case, science students might need more English than non science students.

### **7.3.3 Use of Language Learning Strategies and Type of School**

Two different types of schools are located in the country. The institutions in this investigation have been defined as: public schools and private schools. The findings of the present investigation showed no strong relation between the types of school and their choices of strategy use. To date, there is no any research work

conducted to find out whether school type in secondary level is related to learners' choice of language learning strategy use.

The findings suggest that Thai pre-university students employ learning strategies in order to achieve their language learning purposes, both in-class and out-of-class, in more or less the same degree, irrespective of their type of school. However, for the individual language learning strategy items, there is a minor significant difference in the use of individual strategy items which public school student reported using significantly more frequently than their private school students counterparts. These language learning strategies are to either ask a classmate or study by themselves to solve the problems encountered in the classroom, attend extra-language classes to gain more knowledge about vocabulary, and to improve their speaking skill.

On the other hand, there were individual language learning strategy items which private school students reported using significantly more frequently than their public school students counterparts. These language learning strategies are: take notes while studying in class; use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English; try to get a seat in the front row; and use computer programs such as chat programs or correspond in English by e-mail to improve their writing skill.

However, as mentioned earlier, no research work in the field of language learning strategies has been carried out to support the findings about relationships. Therefore, a possible factor which could be drawn out to explain such significant differences as hypothesized by the researcher is the students' learning style. Cohen (1998, p. 15) defines learning styles as 'general approaches to learning'; Gardner and



Miller (1999, p. 157) see the language learning style as ‘the ways learners like or dislike learning a language’.

When looking closely at the purpose of the use of the language learning strategy in the individual strategy item level, students from both public schools and private schools reported more or less the same language learning strategy use to achieve the learning purposes, i.e. using language learning strategies to help them understand the English lessons better while studying in class, to solve the problems encountered in the classroom lesson, to learn new vocabulary in the classroom lessons, and also to improve their general knowledge of the English language such as vocabulary, speaking, and writing skills. Interestingly, using the language learning strategies to prepare themselves in advance is the only purpose in the in-class strategy category that these students in both types of schools did not report trying to achieve in order to help them understand the lesson better.

These findings could imply that the learning styles among the students from public schools and the students from the private schools lead them to be collaborative students in classrooms, but not to be well-prepared for the classroom. In other words, the students from both types of schools prefer to go to the classroom in order to have classroom participation with their teachers and their friends, rather than preparing themselves for the classroom lessons.

Another factor which could possibly be employed to explain such significant differences as hypothesized by the researcher is the provision of facilities such as computers. At the individual strategy level, students from private schools reported using the language learning strategies which were based on using a computer to improve their writing skills significantly more frequently than those studying at other

types of schools. The private schools may be able to afford and provide useful facilities such as computers for the students in greater numbers than public schools. It may be easy for the private school students to gain access to a computer which they can use to improve their language learning outside of regular classroom learning.

### **7.3.4 Use of Language Learning Strategies and Extra-Language Class**

#### **Support**

Particularly, in this study, 'Extra-language class support' is classified into two groups: extra-language class support (students who attend an extra-language class out of their normal classroom setting at a language centre or with their teachers outside the regular class time); and non extra-language class support (students who do not attend any extra-language class out of the normal classroom setting).

The findings of the present study reveal that students with extra-language class support reported employing both overall and individual language learning strategies significantly higher than those with non extra-language class support in two main categories. However, up to date, no previous empirical research works in the field of language learning strategies have been carried out to support the findings or confirm a relationship. Consequently, the factor which could possibly be drawn out to explain such significant differences as hypothesized by the researcher is the students' socio-economic background. As is generally known, students need to pay extra money for courses in order to attend extra-language classes at language centers or with their teachers outside the regular class time. Generally speaking, most of extra-language class supported students may come from a family of mid to high socio-economic status. In the interviews, most extra-language class supported students reported that they had opportunities to use language learning strategies when they were attending

their extra-language classroom lessons. As a result, it is probably easier for extra-language class supported students to find more opportunities in order to use more language learning strategies than non extra-language class supported ones.

Staff members were another factor which could be a possible explanation for such significant differences. Many language centers can afford to attract foreigners to work as members of the teaching staff at their language centers. Accordingly, it is probably easier for extra-language class supported students to practice English with native English speaking teachers. Therefore, foreign teachers may be seen as a factor which could encourage students studying at language centre to understand the lessons better and improve their language learning skills in general.

### **7.3.5 Use of Language Learning Strategies and Level of English Language Proficiency**

Previous research works in the field of language learning strategies carried out to investigate the use of language learning strategies by students with different levels of language proficiency have concluded that higher-proficiency students generally reported employing language learning strategies significantly more frequently than did lower proficiency students (Oxford and Nyikos, 1989; Green and Oxford 1995; Bremner, 1999; Wharton, 2000; Intaraprasert, 2000; Peacock and Ho, 2003). This investigation also reveals the similar results as previously shown that higher-proficiency students generally reported employing learning strategies significantly more frequency than did lower-proficiency students.

Based on the findings of the present investigation, higher-proficiency students reported greater use of overall language learning strategies than did lower proficiency students. The findings show significant differences among the students with different

proficiency levels in the two main categories (IC and OC). The findings revealed significant differences among the students with different English language proficiency levels in the use of in-class strategies and the use of out-of-class strategies.

With a support of the previous empirical research, one possible explanation for the conclusion that might be drawn from this study for the relationship between use of language learning strategies and students' levels of language proficiency is learner self-regulation. Schunk and Zimmerman (1994, p. 284) pointed out that 'learners' dependent or independent characteristics could be explained under the dimension of students' academic help-seeking, which varied according to the degree of their maturity and autonomy in L2 learning'. From this study, in order to improve their vocabulary, higher proficiency students were likely to be more independent than moderate and lower proficiency students, they relied on themselves rather than learning with teachers in the classroom setting, such as trying to gain more knowledge about vocabulary, trying to improve their language learning skills, and trying to prepare themselves before coming to the class.

The research findings further showed that moderate and low proficiency students reported using learning strategies to achieve SICP 2.1: listen to the teacher attentively and pay attention to the teacher in order to understand the lessons while studying in class, and SICP 3.3: ask classmate (s) either in class or outside class in order to solve the problems encountered in the classroom lesson, significantly more frequently than high proficiency students. This may be because high proficiency students are good at managing themselves while studying in class. They may not have to try to avoid being distracted by other students as easily as the moderate and low proficiency students. Moreover, the moderate and low proficiency students relied on

their classmates rather than themselves in order to solve their language learning problems.

In addition, with a support of the previous empirical research, a factor which could possibly explain such significant differences in terms of gender differences, field of study, extra-language class support, and level of language proficiency was students' motivation. Gardner (1985, p. 10) defines motivation as 'the combination of effort plus desire to achieve the goal of learning the language plus favourable attitudes toward learning the language'. Ellis (1994, p. 715) also defines motivation as 'the effort which learners put into learning an L2 as a result of their need or desire to learn it'.

In terms of students' gender, a number of previous studies on students' motivation in the field of second language learning or foreign language learning found that female students had more motivation and a more positive attitude towards the study of a foreign language than did male students (Bacon and Finneman, 1992; Zammit, 1993; Sung and Padilla, 1998; and Kiziltepe, 1999). This was supported by Ozek's (2000) study, he found that male students had lower language self-concept and they had less interest in learning the language than did female students. The same result was found in Williams et al's (2002) study, they revealed that females seemed to be more motivated and more inclined to put effort into learning a language than males.

Regarding field of study, up to date, no previous empirical research works in the field of language learning strategies have been carried out to support the findings or confirm a relationship. However, at overall findings of the two groups of field of study, the findings reflect the fact that science students are more motivated to learn English than non science ones. It could be suggested that the science students might

be interested in English and enjoy learning English more than non science students. Due to the order of frequency, science students seem to either need English or they simply enjoy the language. In addition, science students need more input and practice than they receive in the classroom, so they, seek other opportunities to expose themselves to extra English practice out-of-classroom such as use of media utilization, e.g. English speaking films or songs.

In terms of extra-language class support, the findings reflect the fact that extra-language class supported students not only are better motivated to learn English than non extra-language class supported ones, but also take more seriously the need to practice by employing a wider range of strategies. It could be suggested that the extra-language class supported students might be more interested in English and enjoy learning English more than non extra-language class supported students.

Regarding to level of language proficiency, Yule (1996, p. 195) comments that students who experience success in language learning are among the highest motivated to learn and 'motivation may be as much a result of success as a cause'. The findings of the present investigation suggest that higher English language proficiency students may be highly motivated to find opportunities for understanding the lessons better and also to find opportunities to expose themselves to English outside of the classroom setting. This means that the effort which high proficiency level students put into their language learning may enable them to employ a wider range of language learning strategies. Similarly, their employment of out-of-class strategies may make them become more high proficiency students. In addition, high proficiency students might be more interested in English and enjoy learning English more than moderate and low language proficiency students. Moreover, high language

proficiency students may be better at managing themselves by performing language tasks more effectively than those moderate and low language proficiency students. As suggested in Chamot (1987), effective learners and ineffective learners are different. The effective learners are able to use strategies appropriately, while the ineffective learners also use a number of strategies but inappropriately.

In conclusion, the findings of the present investigation reveal similar results to a few previous studies, as demonstrated in Chapter 2 in terms of students' gender, where female students reported a higher frequency of strategy use than did their male counterparts. The findings of the present investigation suggest that student's gender has a relationship to students' choices of strategies used in language learning. Similar levels of language proficiency have been found in association with students' choices of strategy use. Regarding to the relationship between field of study, type of school, and extra-language class support and students' choices of strategy use, to date, no previous research has been conducted to investigate such a relationship.

However, the findings of the present investigation suggest that field of study has a relationship with students' choices of employment of language learning strategies in the in-class strategy category and that extra-language class support has an association with students' employment of both in-class and out-of-class strategy categories. Surprisingly, only type of school showed no strong relationship with students' employment of both in-class and out-of-class strategy categories. All in all, when taking all variables into account, we may come to the conclusion that the relationship between students' choice of language learning strategy use and gender of students, field of study, type of school, extra-language class support seems to be one-directional as presented in Chapter 3. However, the relationship between students'

choices of strategy use and level of English language proficiency is still complex because it is bi-directional, and it cannot be clearly determined whether language learning strategy use is a result of the students' English language proficiency.

#### **7.4 Implications of the Research Findings for Teaching and Learning English for Pre-University Students**

The research findings summarized in the previous section in response to the research questions demonstrate that there is a relationship between gender of students, types of schools, fields of study, extra-language classes support, and language learning proficiency levels, and students' use of language learning strategies. Some implications for the teaching and learning of English for Thai pre-university students may be drawn as follows:

1. Arising out of the research findings, high proficiency students reported using different types of media in English as an input source in order to improve their language in general. These media include English songs, English speaking films, television programs, CDs in English. These students also reported reading printed materials in English such as newspaper, magazines and leaflets in order to gain more knowledge about vocabulary. It is recommended that language teachers provide these media and materials in as many different forms as possible and encourage students to make maximum use of them as an alternative means of language learning.

2. The findings reveal that the greatest number of students with different gender, type of school, field of study, extra-language class support, and level of language proficiency, reported employing the strategies to achieve in-class purposes rather than strategies to achieve out-of-class purposes. In this respect, English



language teachers should be able to introduce autonomous learning to their students and also teach them or train them to be autonomous learners. According to Brown (1993) teachers can help their students to become empowered learners and to take responsibility for their own success by providing them with a sense of what a strategy is and how they can develop their own strategies. However, it is important for teachers to understand that certain language learning strategies may work with some learners, but not with other learners (Cohen, 1990)

3. A workshop among the teaching staff should be held. These teaching staff should be taught how to introduce language learning strategies to their students in the classroom lessons. They will be also asked to examine the strategy inventory and think of what should be introduced so that the strategy inventory will be more comprehensive and offer a wider selection for students when teachers use this strategy inventory as a guide for samples of language learning strategies.

4. A mini-seminar about language learning strategies could be held for students, especially at the beginning of new semesters before they start their English lessons. This can encourage and help students to become aware of the importance of language learning strategies. The seminar can be held in two separate sections with respect for types of language learning strategies, i.e. the strategies for in-class purposes, and the strategies for out-of-class purposes. During the seminar, students may also be asked to examine the already-identified language learning strategies based on the strategy inventory for the present study, providing feedback on what they think about these strategies in terms of usefulness and workability. They may add to the list some strategies which they think are missing. Furthermore, informal talks with students about language learning strategies can be held occasionally.

## 7.5 Contributions of the Present Investigation

The present investigation has made some significant contributions to the field of language learning strategies. These contributions based on the findings of the present investigation can be characterized as follows:

1. As mentioned earlier in Chapter 2, very little research on language learning strategies has been carried out with Thai students, and the focus of most of the research has generally been limited to examining the relationship between strategy use and students' language proficiency levels. The present investigation has widened the focus of study through a variety of investigated variables: gender of students; type of schools; field of study; extra-language class support; and students' language proficiency levels.
2. Apart from the variable investigation, the researcher for the present investigation has systematically produced a language learning strategy inventory as shown in Chapter 4, which has been compiled from students' self reported data obtained through focus-group interviews. This language learning strategy inventory has been used as the instrument to elicit the strategy use of Thai pre-university students in detail.
3. In measuring students' language proficiency, the researcher for the present investigation has systematically selected from the existing tests for the university admissions particularly from the Ordinary National Education Test (O-NET) in English between the academic years 1999 to 2006. This test was screened rigorously to serve the particular purposes of the present investigation. This test has been found to be effective in terms of reliability

and validity. If the content of the English language proficiency test is not suitable for other groups of subjects, the processes of the test selection may serve other researchers as a guide to select their own language proficiency test.

4. Qualitative and quantitative methods were used together to elicit information about language learning strategies used by Thai pre-university students. In terms of data analysis, different types of statistical methods were employed, including an analysis of variance (ANOVA), Chi-square tests ( $\chi^2$ ), and factor analysis. This data analysis can be a guide for other researchers to apply in similar types of reported data.

## **7.6 Limitations of the Present Investigation and Proposals for Future Research**

The present investigation has been valid and valuable in addressing the primary research questions, which are to describe types of language learning strategies reportedly employed by Thai pre-university students as well as to examine variation patterns and to explore the relationship between frequency of students' reported use of strategies at different levels with reference to gender, field of study, type of school, extra-language class support, and level of English language proficiency. However, in conducting this research work, certain limitations have appeared, and the areas for possible future research works should take these limitations into consideration;

1. Cohen and Aphek (1981) and Graham (1997) comment that classroom observation is not a productive method of data collection to reveal

students' learning strategies. The researcher realized that classroom observation should have been included as the method of data collection for the present investigation. This method may help researchers to find out other classroom aspects, such as the interaction between teacher and students while they are in class, students' classroom participation, and how language teachers manage their language class. The research findings in the present investigation show that Thai pre-university students with different gender, field of study, and level of language proficiency reported significant differences in use of language learning strategies. Consequently, classroom observation might have revealed what caused such significant differences in English language classrooms.

2. The research population from each group: gender, type of school, field of study, extra-language class support, and level of language proficiency, should have comprised approximately the same number of students.
3. Some existing language learning strategy questionnaires offered by other researchers should have been included in the strategy questionnaire for the present investigation in order to provide a wider range of language strategies for students to choose from.

In spite of the limitations, the researcher acknowledges that some areas might justify further research works. These areas could include the following:

1. As we have seen in the related literature review in Chapter 2, a large body of research works in language learning strategies has been carried out with native speakers of English learning a foreign language and with non-native

speakers of English learning English as a second language. More research works in these areas need to be conducted with a wider range of the population in different contexts, i.e. non-native speakers of English learning English as a foreign language.

2. Based on the related literature review, to date, no researchers in the field of language learning strategies have taken type of school, field of study, or extra-language class support of Thai pre-university students into consideration. Other aspects which should be further explored include students' socio-economic background, attitude towards language learning, and class size.
3. As we have seen in the related literature review in Chapter 3, the researchers of the previous works on language learning strategies have made use of the language learning strategy questionnaire as the most common instrument for data collection. There should be a variety of instruments employed in order to elicit students' language learning strategy use, such as classroom observation.
4. A comparison of teaching styles, teaching methods of different type of school and teachers' expectations may be made in order to understand language learning strategy better.

## **7.7 Summary**

The present investigation has contributed to the field of language learning strategy in terms of language learning strategy classification, the variables investigated, and students' language proficiency measurement. One of the major

contributions of the present investigation has been the classification system of language learning strategies which Thai pre-university students learning English in Thailand reported employing in dealing with language learning. The language learning strategies have been classified according to learning purposes, i.e. in-class strategy purposes and out-of-class purposes, as reported by the research population. Of the variables investigated three variables, i.e. type of school, field of study, and extra-language class support, have rarely or never been taken into consideration by any former researchers in this area.

Finally, the researcher for the present investigation has suggested some implications arising out of the research findings for the English language teaching and learning to Thai pre-university students. In addition, limitations of the present investigation and some proposals for the future research have been provided. The researcher believes that with a careful research design such as that presented in Chapter 3, as well as appropriate instruments for eliciting language learning strategies, a researcher can gain further insights into how students cope with their language learning, as well as how learning strategies are employed by different students in different contexts.

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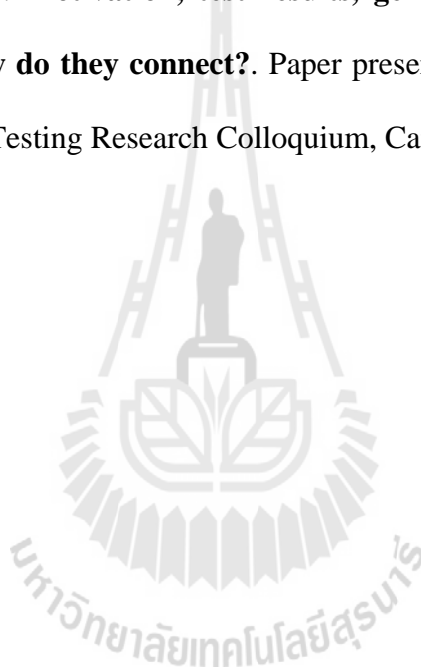
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## APPENDIX A

The number of public schools and private schools which offer the regular programme at the upper-secondary school level in Thailand

Provinces	Number of public (PS) and private (PRS) secondary schools															
	Public secondary schools						Private secondary schools						T4			
	T1	Gender		Field of study			T2	T3	Gender		Field of study					
		M	F	B1	SC	NC			B2	M	F	B1		SC	NC	B2
Chiang Mai	34			34			34	34	13	1	2	10				10
Chiang Rai	41			41			41	41	1			1			1	1
Lampang	31			31			31	31	8	2		6			6	6
Lamphun	16			16			16	16	2	1		1			1	1
Mae Hong Son	8			8			8	8								
Nan	30			30	2	2	26	26	1			1			1	1
Phayao	18			18			18	18	1			1			1	1
Phrae	17			17		3	14	14								
Tak	20			20	2	3	15	15								
Phitsanulok	41			41	1	5	35	35	1			1			1	1
Phetchabun	40			40	6		34	34	1			1			1	1
Sukhothai	27			27	4	3	20	20								
Uttaradit	19			19	4	1	14	14	1			1			1	1
Kamphaeng Phet	32			32	4		28	28								
Nakhon Sawan	38			38	7	2	29	29	4			4			4	4
Phichit	31			31	6	1	24	24								
Uthai Thani	21			21	2		19	19								
Nonthaburi	19	1		18		2	16	16	4		1	3			3	3
Prathumtani	22			22		1	21	21								
Ayutthaya	29	1		28	2	5	21	21								
Ang Thong	14			14	2	3	9	9	1			1			1	1
Chainat	14			14	1		13	13								
Lopburi	25			25	1	4	20	20	3			3			3	3
Saraburi	21			21	3		18	18								
Sing Buri	12			12	1	1	10	10								
Kanchanaburi	30			30	2	2	26	26	1			1			1	1
Nakhon Pathom	29	1		28	2	2	24	24	6	1		5			5	5
Ratchaburi	26			26		3	23	23	6	1	3	2			2	2
Suphanburi	32			32	3		29	29								
Prachuap Khiri Khan	19			19	1	2	16	16	2			2			2	2
Phetchaburi	22			22	1	5	16	16	1			1			1	1
Samut Sakhon	11			11		2	9	9								
Samut Songkhram	9			9	4		5	5	1			1			1	1
Bangkok	115	10	10	95		2	93	93	37	3	10	24			24	24
Chachoengsao	31		1	30	6	3	21	21	2			2			2	2
Nakhon Nayok	11			11	3		8	8								
Prachinburi	25			25	8	1	16	16	2			2			2	2
Samut Prakan	23			23		1	22	22	4		2	2			2	2
Srakaeo	21			21		1	20	20								
Chanthaburi	23			23	4	2	17	17	1			1			1	1



The number of public schools and private schools which offer the regular programme at the upper-secondary school level in Thailand

Provinces	Number of public (PS) and private (PRS) secondary schools														
	Public secondary schools							Private secondary schools							
	T1	Gender		Field of study			T2	T3	Gender		Field of study			T4	
		M	F	B1	SC	NC			B2	M	F	B1	SC		NC
Chonburi	33			33	2		31	31	5		1	4		4	4
Rayong	19			19	3		16	16	1			1		1	1
Trat	15		1	14	9	1	4	4							
Nong Khai	56			56	26	2	28	28							
Nongbua Lamphu	21			21	7	1	13	13	1			1		1	1
Udon Thani	70			70	30	1	39	39	2		1	1		1	1
Loei	32			32	6	3	23	23							
Nakhon Phanom	51			51	27		24	24							
Kalasin	67			67	36	1	30	30	1			1		1	
Mukdahan	30			30	22		8	8							
Sakon Nakhon	51			51	21	3	27	27	1			1		1	1
Khon Kaen	101			101	56	1	44	44	2			2		2	2
Maha Sarakham	55			55	36	1	18	18	2			2		2	2
Roi Et	63			63	18		45	45	1			1		1	1
Chaiyaphum	63			63	23	3	37	37							
Nakhon Ratchasima	108		1	107	28		79	79	3			3		3	3
Buriram	68			68	23	2	43	43							
Surin	85			85	33	3	49	49							
Yasothon	28			28	12		16	16	1			1		1	1
Amnat Charoen	22			22	18		4	4	1			1		1	1
Ubon Ratchathani	73		1	72	31	1	40	40	8			8		8	8
Sisaket	91			91	52	4	35	35	2			2		2	2
Chumphon	22			22	2	3	17	17							
Ranong	7			7	3	2	2	2							
Surat Thani	45			45	2	8	35	35	1			1		1	1
Trang	28			28	4	1	23	23	3			3		3	3
Nakhon Si Thammarat	72			72	20		52	52	16			16		16	16
Phattalung	28			28		6	22	22							
Krabi	16			16	1	1	14	14							
Phang Nga	13			13	1	3	9	9							
Phuket	7			7		1	6	6	1			1		1	1
Narathiwat	17			17	1	2	14	14							
Pattani	17			17		8	9	9							
Yala	10			10		2	8	8							
Satun	12			12	2		10	10							
Songkhla	42			42	6	7	29	29	4	1	1	2		2	2
<b>Total</b>	<b>2585</b>	<b>11</b>	<b>16</b>	<b>2558</b>	<b>643</b>	<b>133</b>	<b>1782</b>	<b>1782</b>	<b>170</b>	<b>10</b>	<b>21</b>	<b>129</b>	<b>1</b>	<b>128</b>	<b>128</b>

(Source: Commission on Basic Education (Academic year 2005))

**Notes:** **M:** stands for male; **F:** stands for female; **B1:** stands for number of secondary schools on offer for both male and female students; **SC:** stands for science-oriented; **NC:** stands for non science-oriented field; **B2:** stands for number of secondary schools which offer both science-oriented and non science-oriented; **T1:** stands for total number of public schools which offer the regular programme at the upper-secondary school level in Thailand; **T2:** stands for total number of public schools which offer two fields (science and non science-oriented) for both genders in the regular programme at the upper-secondary school level in Thailand; **T3:** stands for total number of private schools which offer the regular programme at the upper-secondary school level in Thailand; and **T4:** stands for total number of private schools which offer two fields (science and non science-oriented) for both genders in the regular programme at the upper-secondary school level in Thailand.



The number of students participating in the present investigation both in the first and second phase

EIR	Provinces	Phase 1		Phase 2		Number of Students			
		Public (PS) and private (PRS) schools		Public (PS) and private (PRS) schools		Phase 1		Phase 2	
		PS	PRS	PS	PRS	PS	PRS	PS	PRS
EIR 12	Khon Kaen Maha Sarakham Roi Et		x	x	x		8	56	40
EIR 13	Chaiyaphum Nakhon Ratchasima Buriram Surin			x	x			69	111
EIR 14	Yasothon Amnat Charoen Ubon Ratchathani Sisaket			x	x			82	97
EIR 15	Chumphon Ranong Surat Thani	x					8		
EIR 16	Trang Nakhon Si Thammarat Phattalung			x	x			90	110
EIR 17	Krabi Phang Nga Phuket			x				92	24
EIR 18	Narathiwat Pattani Yala								
EIR 19	Satun Songkhla			x	x			58	74
<b>Total</b>		<b>4</b>	<b>4</b>	<b>12</b>	<b>12</b>	<b>32</b>	<b>32</b>	<b>985</b>	<b>831</b>

(Source: Commission on Basic Education (Academic year 2005))

**Notes:** EIR: Education Inspector Region; EIC: Education Inspector Centre; PS: Stands for public secondary schools; and PRS: stands for private secondary schools.

## **APPENDIX C**

### **The semi-structured interview guide on language learning strategies**

1. What is your name?
2. What is your field of study?
3. How often do you study English in a formal school setting?
4. Do you do anything to help you understand the lesson before studying English in the classroom?
5. Do you do anything to help you understand the lesson while studying English in the classroom?
6. Do you do anything to help you understand the lesson after studying English in the classroom?
7. Do you have an extra-English class after school?
8. How often do you study English in your extra-English class after school?
9. If so, do you do anything to help you understand the lesson before studying extra-English class?
10. Do you do anything to help you understand the lesson while studying in the extra-English in class?
11. Do you do anything to help you understand the lesson after studying extra-English in class?
12. Do you think study extra-English classes help you study English better?
13. Do you have any particular learning techniques that help you in your learning?

## APPENDIX D

### A Sample Interview Script (The translated version)

Interviewer: Duangporn Sriboonruang  
Interviewees: PS1-PS4  
Date: 13<sup>th</sup> March 2007  
Time: 11.00 a.m.  
Place: Sriyapai School, Chumphon, Thailand

.....

Me: Good morning.  
PS1-4: Good morning.  
Me: Please take a seat.  
PS1-4: Thank you.  
Me: How are you today?  
PS1: I'm okay, thank you.  
PS2: I'm okay too, thank you.  
PS3: I'm fine, thank you.  
PS4: I'm fine, thank you. And you?  
Me: Very well, thanks. My name is.....**Q1: What is your name, please?**  
PS1: My name is Nam. It's my nickname. I'm study at Mathayom Suksa 6 room 1.  
Me: Ok. You are a Mathayom Suksa 6, room 1, student. And your name is Nam, right?  
PS1: Yes.  
Me: How about you (SR2)? What is your name, please?  
PS2: Hello, please call me Mean. I'm study in the same level and same class with Nam.  
Me: Ok. I will call you Mean. How about you (SR3)? What is your name, please?  
PS3: Hello, you can call me, Beebee. It's my nickname. I'm Nam and Mean's friend. We study in the same class.  
Me: Ok. I will call you Beebee. How about the last person? What is your name, please?  
PS4: Hi, my name is Kwan. I am also studying in the same class with them.  
Me: Okay. **Q2: What is your field of study?**  
PS2: We are all studying in Science-Math (Science-oriented).  
Me: **Q3: How often do you study English in formal school setting?**  
PS1: Five hours a week.  
PS4: Three hours with Thai teacher and 2 hours with foreign teachers.  
Me: Where does your foreign teacher come from?  
PS3: One from Australia and one from America.

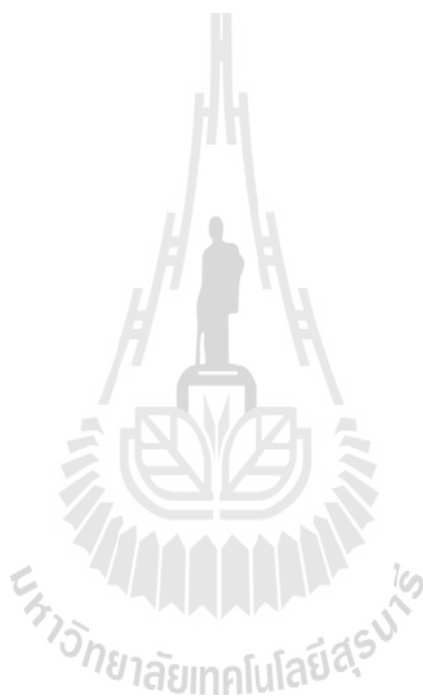
- Me: Do you have any problems when are you studying with both Thai and foreign teachers.
- PS1-4: Yes. We have a lot.
- Me: Can you give me some examples of the problems?
- PS2: Yes. Sometime we don't understand what the teacher tries to explain to us.
- Me: What did you do to solve that problem?
- PS2: I asked him to explain more about that.
- Me: **Q4: Do you do anything to help you understand the lesson before studying English in classroom?** Let start with Nam, ok?
- PS1: Yes, for me, I study beforehand and do the revision.
- Me: Anything else?
- PS1: No.
- Me: How about you, Mean?
- PS2: I will see where we were the last time and study in advance.
- Me: Anything else?
- PS2: No.
- Me: How about you, Beebee?
- PS3: I study beforehand and look up the meaning of new words which are listed at the end of each chapter.
- Me: Anything else?
- PS3: Yes. I also do exercises in the past lessons and then the next one.
- Me: Anything else?
- PS3: No.
- Me: How about you, Kwan?
- PS4: I also do the revision and study beforehand.
- Me: Anything else?
- PS4: Yes. I find the meaning of the new words in dictionary for the next chapter.
- Me: Anything else?
- PS4: No.
- Me: **Q5: Do you do anything to help you understand the lesson while studying English in classroom?**
- PS3: I listen to the teacher.
- PS2: I listen to the teacher and take note of new words.
- PS1: If I don't understand, I will ask teacher immediately.
- PS4: But I will ask teacher after class.
- Me: Is there anything else that you like to do while you are studying in class?
- PS2: If the teacher teaches too fast, I will put a tick over or underline what I can't understand or catch up with. And maybe I will ask my classmates.
- PS1: I will pay attention to the teacher.
- PS4: I will not talk or play with my classmate while teacher is teaching.
- Me: Anything else?
- PS1-4: No.

- Me: **Q6: Do you do anything to help you understand the lesson after studying English in classroom?** Who will start first?
- PS3: Me.
- Me: Okay, Beebee, do you do anything to help you understand the lesson after studying English in classroom?
- PS3: I do the exercises from the last lesson and also do the exercises for the next lesson. I also review vocabulary words which I learnt from the last lesson and look at the new vocabulary words for the next lesson too. That's all
- Me: How about you, Kwan?
- PS4: I am doing the same thing as Beebee. I also do the revision of the last lesson for the whole too.
- PS1: Me too. I also do the same as my friends.
- PS2: I write down vocabularies which I learnt today to my vocabulary book and I start looking at new vocabulary and the meaning of the next lesson.
- PS1: Me too. I do that too.
- Me: Anything else?
- PS1-4: No.
- Me: **Q7: Do you have extra-English class after school, Mean?**
- PS2: Yes. We all study in the same language centre.
- Me: Okay, **Q8: How often do you study English in extra-English class after school?**
- PS4: Two hours a day. We study two days a week.
- PS1: We have to study another subject too. We can't study only English because the entrance examination does have other subjects too.
- Me: **Q9: Do you do anything to help you understand the lesson before going to your extra-English class?**
- PS1: Actually, we have no time to prepare anything before going to language centre, because we have to go directly from the school, I mean after school time, to the language centre.
- PS2-4: Yes. We have no time.
- Me: **Q10: Do you do anything to help you understand the lesson while studying in your extra-English in class?**
- PS2: I listen to the teacher and take note of new words.
- PS1: I will ask teacher immediately if I don't understand.
- Me: Is there anything else that you like to do while you studying in class?
- PS3: I will underline what I can't understand and I will ask my classmates or teacher after class.
- PS4: I will pay attention to the teacher.
- Me: Anything else?
- PS1-4: No.
- Me: **Q11: Do you do anything to help you understand the lesson after studying extra-English in class?**
- PS3: I do the exercises for the next lesson. I also review vocabulary words which I learnt from the last lesson.
- Me: How about you, Kwan?

- PS4: I do the revision of the last lesson.
- PS2: I do the revision too.
- PS1: Me too. I also do the exercises for the next lesson.
- Me: Anything else?
- PS1-4: No.
- Me: **Q12: Do you think study extra-English classes help improve your English?**
- PS1-4: Yes.
- Me: How?
- PS1: In the language centre, the teacher teaches easy ways to remember vocabulary and how to find the main ideas or the information we want in the reading passage.
- PS2: They do the revision for us.
- Me: What do you mean by doing the revision for us?
- PS2: The teacher summarizes the lesson that we are learning in school time for us. Sometimes, we don't need to do the revision of the lesson because we have already done it when we studied in the language centre.
- PS3: The teacher is friendlier than the teacher in the school setting. I feel relaxed when I study in the language centre.
- PS4: Yes. I agree.
- Me: What do you mean the teacher at the language centre is friendlier than the teacher at your school?
- PS4: Maybe because they don't have any scores that affect our grades in the language school. We feel relaxed because we don't need to worry about that.
- PS3: Yes. If the teacher asks some questions, we aren't afraid if we answer incorrectly. They have no effect on our score.
- Me: Anything else?
- PS1-4: No.
- Me: **Q13: Do you have any particular learning techniques that help you in your learning?**
- PS1: I read English magazines or English newspapers.
- Me: Why?
- PS1: I want to improve my reading and vocabulary skills. I think if I know more vocabulary, I will understand the lesson better.
- PS4: I do that too. I also watch English films or listen to English songs to improve my listening skill.
- PS1: Yes. I also look for the lyrics of songs, because I can learn some new vocabulary words and improve my reading at the same time.
- PS3: I listen to English conversation from CDs to improve my speaking skill.
- PS2: I write in my diary in English to improve my writing skills.
- Me: Anything else?
- PS2: I make lists of new vocabulary then group them according to their meaning.
- PS3: When teacher is teaching, I try not to talk and play with my



- classmates. When I go back home, I will do the revision.
- PS4: I think study before going to class help me understand the lesson better.
- PS3: I think doing the revisions also help to understand the lesson.
- PS1: I read the extra-book which is related to the lesson. It helps me to understand more about the lesson.
- Me: Anything else?
- PS1-4: That's all.
- Me: Thank you very much for the useful and valuable information about your language learning. Thank you.
- PS1-4: You're welcome.



# APPENDIX E

## A Strategy Questionnaire (Thai Version)

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### แบบสอบถามเพื่อการวิจัย

### วิธีการเรียนภาษาอังกฤษของนักเรียนชั้นมัธยมศึกษาปีที่ 6 ปีการศึกษา 2550

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คำชี้แจง: จุดประสงค์ของแบบสอบถามนี้สร้างขึ้นเพื่อรวบรวมข้อมูลเกี่ยวกับการใช้กลวิธีการเรียนภาษาอังกฤษของนักเรียนชั้นมัธยมศึกษาปีที่ 6 โปรดอ่านและพิจารณาว่านักเรียนใช้กลวิธีการเรียนภาษาอังกฤษในแต่ละข้อนี้หรือไม่ โดยเลือกคำตอบว่า “ใช่” หรือ “ไม่ใช่” ถ้าคำตอบคือ “ไม่ใช่” ให้นักเรียนข้ามไปทำในข้อต่อไปตามคำชี้แจงที่ให้มา ถ้าคำตอบคือ “ใช่” ให้นักเรียนพิจารณาเลือกกลวิธีการเรียนภาษาอังกฤษเหล่านี้ให้สอดคล้องกับความเป็นจริงที่นักเรียนใช้ โดยการกาเครื่องหมายถูก (✓) ลงในช่องว่างที่นักเรียนคิดว่าเหมาะสมที่สุดตามเกณฑ์ต่อไปนี้คือ

- ทุกครั้งหรือเกือบทุกครั้ง หมายถึง นักเรียนใช้กลวิธีการเรียนนั้นๆเป็นประจำ หรือเกือบเป็นประจำ คือ มากกว่าสามในสี่ของเวลาทั้งหมดที่ใช้กลวิธีการเรียน
- บ่อยครั้ง หมายถึง นักเรียนใช้กลวิธีการเรียนนั้นๆบ่อยครั้งหรือเกินกว่าครึ่งหนึ่งของเวลาทั้งหมดที่ใช้กลวิธีการเรียน
- บางครั้ง หมายถึง นักเรียนใช้กลวิธีการเรียนนั้นๆแค่บางครั้งหรือน้อยกว่าครึ่งของเวลาทั้งหมดที่ใช้กลวิธีการเรียน
- ไม่เคย หมายถึง นักเรียนไม่เคยใช้ หรือเกือบจะไม่เคยใช้ กลวิธีการเรียนนั้นๆเลย

#### ตัวอย่าง

0. นักเรียนเตรียมตัวล่วงหน้าก่อนเรียน
- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อที่ 2.

ถ้า “ใช่” นักเรียนเตรียมตัวล่วงหน้าก่อนเรียน โดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ศึกษาเนื้อหาบทเรียนของแต่ละ บทเรียนมาล่วงหน้า	✓			

ในกรณีที่นักเรียนต้องการเปลี่ยนคำตอบระดับในการใช้กลวิธีการเรียนนั้นให้ทำดังต่อไปนี้

#### ตัวอย่าง

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ศึกษาเนื้อหาบทเรียนของแต่ละ บทเรียนมาล่วงหน้า	✗			✓

ข้อมูลทั่วไปของผู้ทำแบบทดสอบวัดความสามารถทางภาษาอังกฤษ

สำหรับนักเรียนชั้นมัธยมศึกษาปีที่ 6

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\* คำชี้แจง โปรดทำเครื่องหมาย (✓) หรือ กรอกข้อความที่ตรงกับข้อมูลของตัวนักเรียน \*

\* 1. โรงเรียน \_\_\_\_\_ \*

\* จังหวัด \_\_\_\_\_ \*

\* 2. เพศ  ชาย  หญิง \*

\* 3. ประเภทโรงเรียน  รัฐบาล  เอกชน \*

\* 4. สายวิชา  วิทยาศาสตร์ \*

\*  ศิลป์-คำนวณ ศิลป์-ภาษา ศิลป์-สังคม และอื่นๆ \*

\* 5. นักเรียนเรียนพิเศษวิชาภาษาอังกฤษเพิ่มเติมนอกเหนือจากการเรียนในชั้นเรียนหรือไม่ \*

\*  เรียน \*

\*  ไม่ได้เรียน \*

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\*\*\*\*\*

\* สำหรับผู้วิจัยเท่านั้น \*

\* เพศ  1  2 \*

\* ประเภทโรงเรียน  1  2 \*

\* สายวิชา  1  2 \*

\* เรียนพิเศษ  1  2 \*

\*\*\*\*\*

1. นักเรียนพยายามเตรียมตัวให้พร้อมที่จะเรียนก่อนจะถึงชั่วโมงเรียนวิชาภาษาอังกฤษในแต่ละครั้ง

ใช่

ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 2

ถ้า “ใช่” นักเรียนมีวิธีการเตรียมตัวล่วงหน้าก่อนเรียนโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ศึกษาเนื้อหาบทเรียนของแต่ละบทเรียนมาล่วงหน้า				
2. ศึกษาคำศัพท์ที่เกี่ยวข้องกับเนื้อหาบทเรียนล่วงหน้า				
3. ลองทำแบบฝึกหัดของแต่ละบทเรียนมาล่วงหน้า				
4. ทบทวนเนื้อหาบทเรียนที่เรียนผ่านมา				
5. เรียนพิเศษ				
6. อื่นๆ (โปรดระบุ)..... .....				

2. นักเรียนพยายามเข้าใจบทเรียนขณะเรียนในชั่วโมงเรียน

ใช่

ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 3

ถ้า “ใช่” นักเรียนมีวิธีช่วยในการทำความเข้าใจบทเรียนขณะเรียนโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. สนใจและตั้งใจฟังอาจารย์ผู้สอน				
2. จดบันทึกบทเรียนในขณะที่เรียน				
3. พยายามที่จะนั่งแถวหน้าๆ				
4. พยายามที่จะไม่คุยเล่น กับเพื่อนๆ ในขณะที่เรียน				
5. อื่นๆ (โปรดระบุ)..... .....				

3. นักเรียนพยายามที่จะแก้ปัญหาเกี่ยวกับบทเรียน เพื่อช่วยให้ตนเองเข้าใจบทเรียนมากขึ้น

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 4

ถ้า “ใช่” นักเรียนมีวิธีช่วยแก้ปัญหาเกี่ยวกับบทเรียนโดยใช้วิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ถามอาจารย์ผู้สอนทันที หรือเมื่อถึงเวลาที่เหมาะสม				
2. ถามอาจารย์ผู้สอนหลังจากหมดคาบเรียนแล้ว				
3. ถามเพื่อนๆ ร่วมชั้นในร่วมเรียนหรือนอกชั้นเรียน				
4. ถามคนอื่นๆ นอกจากอาจารย์ผู้สอนหรือเพื่อนร่วมชั้นเรียน				
5. ศึกษาเพิ่มเติมด้วยตนเอง				
6. อื่นๆ (โปรดระบุ)..... .....				

4. นักเรียนพยายามเรียนรู้คำศัพท์ใหม่ในชั่วโมงเรียน

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 5

ถ้า “ใช่” นักเรียนมีวิธีช่วยในการเรียนรู้คำศัพท์ใหม่ในชั่วโมงเรียน โดยใช้วิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ใช้พจนานุกรมทั้งที่เป็นภาษาไทยหรือภาษาอังกฤษในการค้นคว้าหาความหมายของคำศัพท์ใหม่				
2. ทำรายการคำศัพท์ของศัพท์ใหม่พร้อมทั้งความหมาย				
3. หาความหมายของคำศัพท์ใหม่โดยดูจากรากศัพท์				
4. ท่องคำศัพท์ใหม่โดยใช้หรือไม่ใช้รายการคำศัพท์				
5. เดาความหมายของคำศัพท์ใหม่จากบริบท				
6. จัดกลุ่มคำศัพท์ใหม่ตามความเหมือนของความหมาย				
7. อื่นๆ (โปรดระบุ)..... .....				

5. นักเรียนพยายามเรียนรู้คำศัพท์ใหม่นอกเหนือจากในชั่วโมงเรียน

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 6

ถ้า “ใช่” นักเรียนมีวิธีช่วยในการเรียนรู้คำศัพท์เพิ่มโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. เล่นเกมส์ต่างๆที่เป็นภาษาอังกฤษ เช่น คอมพิวเตอร์เกมส์				
2. อ่านสิ่งพิมพ์ต่างๆที่เป็นภาษาอังกฤษ เช่น หนังสือพิมพ์ ภาษาอังกฤษ นิตยสารภาษาอังกฤษ และ ใบปลิวต่างๆ				
3. ดูภาพยนตร์ที่สนทนาเป็นภาษาอังกฤษ				
4. ฟังเพลงภาษาอังกฤษ				
5. เรียนพิเศษ				
6. อื่นๆ (โปรดระบุ)..... .....				

6. นักเรียนพยายามพัฒนาทักษะการเรียนรู้ด้านการฟัง

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 7

ถ้า “ใช่” นักเรียนมีวิธีการช่วยในการพัฒนาทักษะด้านการฟังโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ดูภาพยนตร์ที่สนทนาเป็นภาษาอังกฤษทั้งที่มีหรือไม่มีคำ บรรยายเป็นภาษาอังกฤษ				
2. ฟังเพลงภาษาอังกฤษพร้อมทั้งดูหรือไม่ดูคำร้องประกอบ				
3. ฟังบทสนทนาภาษาอังกฤษจากซีดีพร้อมทั้งดูหรือไม่ดู บทสนทนาประกอบ				
4. ดูรายการโทรทัศน์ที่ดำเนินรายการเป็นภาษาอังกฤษทั้งที่มี หรือไม่มีคำบรรยายเป็นภาษาอังกฤษประกอบ				
5. อื่นๆ (โปรดระบุ)..... .....				

7. นักเรียนพยายามพัฒนาทักษะการเรียนรู้ด้านการอ่าน

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 8

ถ้า “ใช่” นักเรียนมีวิธีการช่วยในการพัฒนาทักษะด้านการอ่านโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ดูภาพยนตร์ที่สนทนาเป็นภาษาอังกฤษที่มีคำบรรยายเป็นภาษาอังกฤษ				
2. ฟังเพลงภาษาอังกฤษพร้อมทั้งดูคำร้องประกอบ				
3. ฟังบทสนทนาภาษาอังกฤษจากซีดีพร้อมทั้งดูบทสนทนาประกอบ				
4. ดูรายการโทรทัศน์ที่ดำเนินรายการเป็นภาษาอังกฤษที่มีคำบรรยายเป็นภาษาอังกฤษประกอบ				
5. อ่านสิ่งพิมพ์ต่างๆที่เป็นภาษาอังกฤษ เช่น หนังสือพิมพ์ ภาษาอังกฤษ นิตยสารภาษาอังกฤษ และ ใบปลิวต่างๆ				
6. อื่นๆ (โปรดระบุ).....				

8. นักเรียนพยายามพัฒนาทักษะการเรียนรู้ด้านการพูด

- ใช่
- ไม่ใช่ ถ้าไม่ใช่ข้ามไปทำข้อ 9

ถ้า “มี” นักเรียนมีวิธีการช่วยในการพัฒนาทักษะด้านการพูดโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ฝึกพูดภาษาอังกฤษกับตนเองหรือกับคนไทยคนอื่น				
2. ฝึกพูดภาษาอังกฤษกับอาจารย์ชาวต่างชาติหรือกับชาวต่างชาติคนอื่น ๆ				
3. ใช้โปรแกรมคอมพิวเตอร์ เช่น โปรแกรมคุย				
4. ฝึกออกเสียงเลียนแบบเสียงชาวต่างชาติจากสื่อต่างๆ เช่น ภาพยนตร์ หรือ ซีดี				
5. เรียนพิเศษ				
6. อื่นๆ (โปรดระบุ).....				

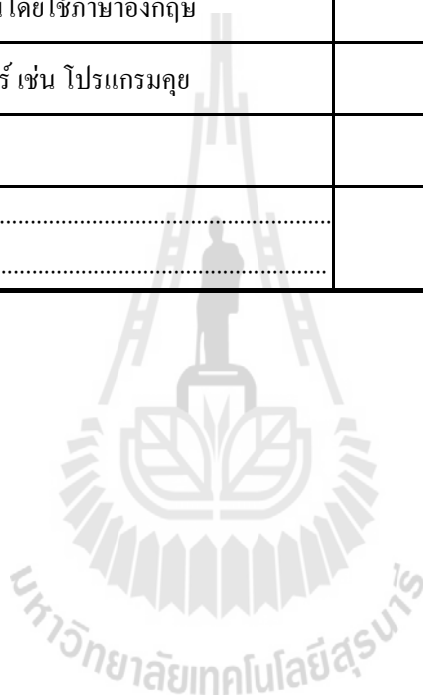
9. นักเรียนพยายามพัฒนาทักษะการเรียนรู้ด้านการเขียน

- ใช่
- ไม่ใช่ กรุณาหยุด

ถ้า “มี” นักเรียนมีวิธีการช่วยในการพัฒนาทักษะด้านการเขียนโดยวิธีต่อไปนี้ บ่อยเพียงใด

กลวิธีการเรียนภาษาอังกฤษ	ทุกครั้ง หรือ เกือบทุกครั้ง	บ่อยครั้ง	บางครั้ง	ไม่เคย
1. ติดต่อสื่อสารกันทางจดหมายหรือทางจดหมายอิเล็กทรอนิกส์ ( E-mail) เป็นภาษาอังกฤษ				
2. ฝึกเขียนบันทึกประจำวันโดยใช้ภาษาอังกฤษ				
3. ใช้โปรแกรมคอมพิวเตอร์ เช่น โปรแกรมคุย				
4. เรียนพิเศษ				
5. อื่นๆ (โปรดระบุ)..... .....				

ขอบคุณที่ให้ความร่วมมือ





## APPENDIX F

### A Strategy Questionnaire (English Version)

\* \* \* \* \*

### The Language Learning Strategy Questionnaire

\* \* \* \* \*

**Instructions:** The Language Learning Strategy Questionnaire (LLSQ) is designed to gather information about how you, as a pre-university student, go about learning English. On the following page, you will find statements related to learning English. Please read each statement carefully and choose the response 'Yes' or 'No' which applies to you. If the response you choose is 'Yes', go on to the statements that follow and mark (x) the response which best describes how often you actually do each activity when you are engaged in learning English. If the response you choose is 'No', proceed to the next part as instructed. Please also note that there are no correct or incorrect answers for your responses. This usually takes about 20-30 minutes to complete. The criteria for the responses are as follows:

- Always or almost always** means students **always or almost always do the activities** which is described in the statement.
- Often** means students do the activity which is described in the statement **more than half the time**.
- Sometimes** means students do the activity which is described in the statement **less than half the time**.
- Never** means students **never do or do not do the activity** which is described in the statement.

EXAMPLE

0. Do you try to prepare yourself in advance?

- Yes.
- No.

If 'No', proceed to 2. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Study the lessons in advance	√			

1. Do you try to prepare yourself before the lessons?

Yes.

No.

If 'No', proceed to 2. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Study the lessons in advance				
2. Study the vocabulary in advance				
3. Try some exercises in advance				
4. Do the revision of the previous lessons either by oneself or with classmates				
5. Attend extra-classes				
6. <input type="checkbox"/> Other (please specific) .....				
.....				

2. Do you try to understand the lessons while studying in class?

Yes.

No.

If 'No', proceed to 3. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Listen to the teacher attentively and pay attention to the teacher				
2. Take notes while studying in class with the teacher				
3. Try to get a seat in the front row				
4. Try not to talk with other students while studying				
6. <input type="checkbox"/> Other (please specific) .....				
.....				

3. Do you try to solve problems about lessons?

Yes.

No.

If 'No', proceed to 4. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Ask the teacher in class either immediately or when appropriate				
2. Ask teacher after class				
3. Ask a classmate or classmates either in class or outside class				
4. Ask people other than your teachers or classmates				
5. Study by oneself				
6. <input type="checkbox"/> Other (please specific) .....				

4. Do you try to learn new vocabulary in the classroom lessons?

Yes.

No.

If 'No', proceed to 5. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Use a dictionary or electronic dictionary to check the meaning of new vocabulary either in Thai or in English				
2. Make a list of a new vocabulary with their meaning				
3. Look at the root of a new vocabulary				
4. Memorize new words with or without a list				
5. Guess the meaning of new vocabulary items from the context				
6. Group new vocabulary items according to their similarity in meaning				
7. <input type="checkbox"/> Other (please specific) .....				

5. Do you try to gain more knowledge about vocabulary?

Yes.

No.

If 'No', proceed to 6. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Play games in English such as computer games				
2. Read printed materials in English such as newspapers, magazines, and leaflets				
3. Watch English-speaking films				
4. Listen to English songs				
5. Attend extra-class				
6. <input type="checkbox"/> Other (please specific) .....				

6. Do you try to improve your listening skill?

Yes.

No.

If 'No', proceed to 7. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Watch an English speaking film with or without English subtitles				
2. Listen to English songs with or without English script				
3. Listen to English conversation from CD with or without conversation script				
4. Watch television programs in English with or without English subtitles				
6. <input type="checkbox"/> Other (please specific) .....				

7. Do you try to improve your reading skill?

Yes.

No.

If 'No', proceed to 8. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Watch an English speaking film with English subtitles				
2. Listen to English songs with English script				
3. Listen to English conversation from CD with conversation script				
4. Watch television programs in English with English subtitles				
5. Read printed materials in English such as newspapers, magazines, and leaflets				
6. <input type="checkbox"/> Other (please specific) .....				
.....				

8. Do you try to improve your speaking skill?

Yes.

No.

If 'No', proceed to 9. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Try to speak English either to oneself or to other Thai people				
2. Try to speak to foreigners, either teachers or other foreigners				
3. Use a computer program such as a chat program				
4. Try to imitate a native speaker from media such as English file or CD				
5. Attend extra-class				
6. <input type="checkbox"/> Other (please specific) .....				
.....				

9. Do you try to improve your writing skill?

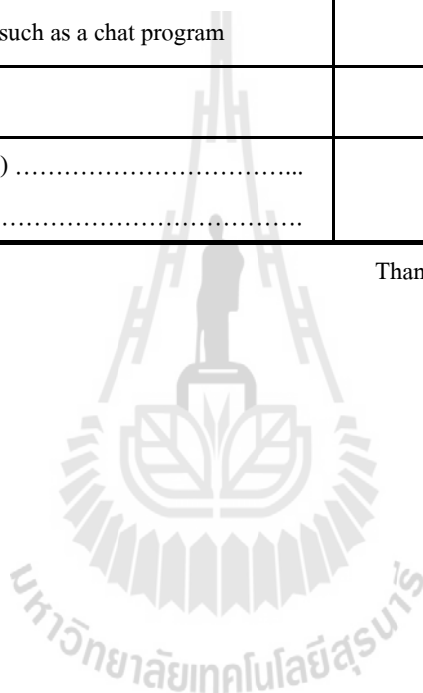
Yes.

No.

If 'No', please stop here. If 'Yes', how often do you.....?

Language Learning Strategy	Always or almost always	Often	Sometimes	Never
1. Correspond in English by letter or email				
2. Practice writing in English such as writing in a diary				
3. Use a computer program such as a chat program				
4. Attend extra-class				
6. <input type="checkbox"/> Other (please specific) ..... .....				

Thank you very much for your co-operation.



## APPENDIX G

\*\*\*\*\*

### The Language Proficiency Test for the Present Investigation

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แบบทดสอบภาษาอังกฤษสำหรับนักเรียนชั้นมัธยมศึกษาปีที่ 6

#### คำสั่ง

1. ให้นักเรียนอ่านคำสั่งในแต่ละส่วนให้ละเอียดก่อนลงมือทำข้อสอบ
2. เวลาที่ใช้ในการสอบ 1 ชั่วโมง 10 นาที
3. ข้อสอบมีจำนวนทั้งหมด 60 ข้อ แบ่งเป็น 3 ส่วน คือ
  - 3.1 ส่วนที่ 1 การอ่านจับใจความ 30 ข้อ (ข้อ 1-30)
  - 3.2 ส่วนที่ 2 การเขียน 15 ข้อ (ข้อ 31-45)
  - 3.3 ส่วนที่ 3 การพูด 15 ข้อ (ข้อ 46-60)
4. กรุณาอย่าขีดเขียนข้อความ หรือ ทำเครื่องหมายใดๆ ลงในกระดาษคำถาม
5. กรุณาทำเครื่องหมายกากบาท (X) ลงในช่องว่างให้ตรงกับข้อที่นักเรียนคิดว่าเป็นคำตอบที่ถูกต้องที่สุดเพียงข้อเดียวลงในกระดาษคำตอบที่แจกให้
6. กรุณาทำข้อสอบให้ครบทุกข้อ
7. ถ้านักเรียนมีคำถาม หรือข้อสงสัย ให้ถามผู้คุมสอบก่อนที่จะลงมือทำข้อสอบ หรือในขณะที่ทำข้อสอบ

#### ตัวอย่าง

0 “Pay attention to your enemies, for they are the first to discover your mistakes.”

This advises you to .....

- a. point out the mistakes of your enemies
- b. be the first to discover your enemies' weakness
- c. listen to your enemies if you want to improve yourself
- d. always know what your enemies are doing before it is too late

**C is a correct answer for this question**

No.	A	B	C	D
1			x	

**The Proficiency Test in English for Thai Pre-University Students**

**SECTION 1: READING COMPREHENSION (Numbers 1-30)**

**Reading Passage 1**

**Instructions: Answer the questions below based on this reading passage.  
(Numbers 1-6)**

คำสั่ง: อ่านเรื่องที่กำหนดแล้วตอบคำถาม ข้อ 1-6

Most of the western world reveres Socrates as one of the fathers of philosophy. Born in 469 B.C., the man who introduced the concept that ‘virtue is knowledge’ actually wrote nothing. **Most of what survives** was recorded by his student, the philosopher Plato. (1)

Socrates served as a soldier in the Athenian army and fought bravely in three battles, but there is little evidence that he had a full-time job. In fact, it seems he spent most of his time arguing in the Agora (marketplace), followed by his faithful students. Those included the best and the worst of Classical Athens—from Plato and Euclid, the father of geometry, to the politician Alcibiades and some of the hated 30 tyrants who briefly suspended Athenian democracy in 404 B.C. (5)

It was in fact his connection with some of the tyrants that gave his enemies a reason to bring Socrates to trial, accused of corrupting youth. In his **Apology**, or defence speech, as recorded by plato, Socrates challenged his accusers in the style later described as Socratic Irony - - meaning pretending ignorance. His judges sentenced him to death by poison, a sentence which he carried out by drinking a cup of hemlock. (10)

1. According to this passage, Socrates is considered a great philosopher by..... .

- |                              |                        |
|------------------------------|------------------------|
| a. his accusers              | c. all the tyrants     |
| b. people all over the world | d. many western people |

2. Socrates lived..... .

- |                        |                                |
|------------------------|--------------------------------|
| a. many decades ago    | c. about 2,500 years ago       |
| b. about 500 years ago | d. at the time of Jesus Christ |



3. Socrates is still remembered today because of his..... .
- a. judges  
b. battles  
c. books  
d. teachings
4. The phrase “**Most of what survives**” (line 3) refers to .....
- a. his ideas  
b. philosophers  
c. his books  
d. fathers
5. We learn from the passage that hemlock can cause..... .
- a. death  
b. memory loss  
c. blindness  
d. personality change
6. The “**Apology**” mentioned in line 12 is..... .
- a. a chapter of Socratic Irony  
b. a speech Socrates made to defend himself  
c. an accusation made by the tyrants at Socrates’ trial  
d. a book written by Plato

### Reading Passage 2

**Instructions: Answer the questions below based on this reading passage.  
(Numbers 7-8)**

คำสั่ง: อ่านเรื่องที่กำหนดแล้วตอบคำถาม ข้อ 7-8

#### **Chickpea Soup**

- |  |                          |
|--|--------------------------|
| ¾ cup chicken broth                                      | 2 carrots, thinly sliced |
| 3 cloves garlic, minced                                  | ½ tsp. dried sage        |
| ¼ tsp. pepper  |                          |
| 2 cups cooked chickpeas, red kidney beans or black beans |                          |
| 4 cups packed, torn spinach or watercress leaves         |                          |

Bring the broth to boil over moderate heat. Add carrots, garlic, sage and pepper, and cook for five minutes or until carrots are tender. Add ¾ cup water and chickpeas, and return to boil. Reduce to simmer, cover, and cook for seven minutes. Stir in greens and cook for one minute. Serves four.

7. Which ingredient is **not** mentioned as part of recipe for chicken soup?

- |            |                   |
|------------|-------------------|
| a. carrots | c. minced garlic  |
| b. spinach | d. chicken breast |

8. How many people in this dish ideal for?

- |      |      |
|------|------|
| a. 1 | c. 5 |
| b. 4 | d. 7 |

### **Reading Passage 3**

**Instructions: Answer the questions below based on this reading passage.  
(Numbers 9-14)**

คำสั่ง: อ่านเรื่องที่กำหนดแล้วตอบคำถาม ข้อ 9-14

The **looting** of Thai plant and fruit varieties for development in rival export countries is an urgent problem that the government must tackle by setting stricter protection measures for the country's intellectual property. (1)

Australia and the US are two major countries which have been found to be developing tropical fruits and plants. They aim to increase their export share in the international market. **Meanwhile**, Taiwan - where an international fruit-research center has been established - is trying hard to develop new varieties of fruits to meet market demand. (5)

Duangkamol Jiambutr, director of the Thai Trade Center in Singapore, said many new varieties of tropical fruit such as durians from Australia, longans and lychees from China and mangoes from Taiwan had been imported for marketing tests this year. (10)

An official at the Thai Agriculture and Cooperatives Ministry said Australia had invested hundreds of millions of dollars in setting up a research center into tropical products. Many strains of Thai plants were imported or brought home by Australian researchers who had studied in Thailand. (15)

The smuggling of **such varieties** had led to them being crossbred to grow in Australia with a higher yield and bigger size than local strains. Australia aims to export these new fruit varieties for commercial purposes.

This issue has become **particular topical** since the much publicized news that US rice researcher Chris Daren will patent a strain of Thailand's Khao Dok Mali 105 (fragrant jasmine rice), which he claims to have acquired from the Philippine-based International Rice Research Institute. (20)

9. The first paragraph clearly states that..... .
- foreigners love Thai fruits
  - there is no international law to deal with the looting of tropical plants
  - the government should do a better job of protecting the country's benefits
  - Thai fruits are the best of all tropical strains
10. According to the passage, Australia and the U.S. do fruit research because they want to ...
- establish more fruit research centers
  - expand their export market
  - advance their knowledge
  - compete with other researchers
11. “**Meanwhile**” (line 6) can be replaced by.....
- However
  - At the same time
  - Therefore
  - On the other hand
12. The phrases “**such varieties**” (line 17) refers to varieties of .....
- crossbred strains
  - Thai plants
  - marketing tests
  - Australian products
13. The phrase “**particularly topical**” (line 20) could best be replaced by .....
- widely discussed
  - overly strict
  - extremely convincing
  - large unknown
14. The next part of this article would most likely discuss how..... .
- Thailand markets its rice
  - to set up a research institute
  - foreign researchers obtain grants
  - to protect intellectual property

#### **Reading Passage 4**

**Instructions: Answer the questions below based on this reading passage.  
(Numbers 15-22)**

คำสั่ง: อ่านเรื่องที่กำหนดแล้วตอบคำถาม ข้อ 15-22

While it's true that there is still something inherently annoying about mobile phones (“I've just got to be in touch at all times”), they have become a regular and essential feature of modern living. So, if you're going to be a mobile phone user - and honestly, who isn't by now? - just **do it** politely, please. (1)

**Mobile Dos:**

1. Do make your conversations brief. It doesn't matter how good your mobile is: it's always hard to hear what someone is saying on a mobile, and it's not pleasant for anyone. And didn't you say when you got your phone that you would use it just to let people know when you were running late? (5)
2. Do use it as a dating device. If you don't give out your mobile number, your admirer never knows where you are, and you therefore seem very mysterious and glamorous. (10)
3. Do use it for chatting if you are trapped somewhere extremely boring, like when there's a long line to check in at the airport. (15)

**Mobile Don'ts:**

1. Don't use that hands-free device-it makes you look like you're talking to yourself.
2. Don't give out your number to someone you don't want using it. This may seem obvious, but it's been known to happen that people have given out their number and then been annoyed to receive a call which cost them a lot of money when they were abroad. (20)
3. Don't use it in restaurants, cinemas, libraries or anywhere it might annoy other people (unless the call is extremely brief and you excuse yourself).
4. Don't raise your voice. Unreliable technology means that some people feel the need to scream. Please don't. No one else wants to hear about your business. (25)
5. Don't use your phone while on a date. We have seen it happen.

15. The intended reader of this passage is someone who..... .

- |                             |                                |
|-----------------------------|--------------------------------|
| a. uses a mobile phone      | c. finds mobile phone annoying |
| b. likes to talk to himself | d. travels a lot               |

16. The main purpose of this passage is to .....

- explain how to use a mobile phone considerately
- warn about the possible dangers of using mobile phones
- criticize people who use mobile phones in public places
- instruct people on how to use their mobile phones economically





**SECTION 2: WRITING** (Numbers 31-45)

**Instructions: Complete the article below. Choose one of the four given responses for each item. (Numbers 31-37)**

คำสั่ง: เลือกคำตอบที่ถูกต้องที่สุดเติมลงในช่องว่างเพื่อทำให้บทความสมบูรณ์ (ข้อ 31-37)

Personal success is the middle ground, the place from which you get what you want and continue to want what you have. Personal success is not measured by who you are, (31) you possess, or what you have accomplished. Instead, personal success is measured by how good you feel (32) who you are, what you have done, and what you have. Personal success is within our grasp, but we must clearly know (33) and set out intention to have it.

Personal success, (34), is not just about feeling good or happy with your life. It also involves (35) that you can get what you want. Personal success requires (36) how to create the life you want. For some, finding personal success is learning how to get more; for (37) it's understanding how to be happier; and for many, it is learning both of these important skills.

The good news is that you can learn how to achieve personal success, and you are probably much closer than you could ever imagine. For most people, it is just a matter of making a few but significant changes in the way they think, feel, or act to create the fulfilling life they want.

- |     |               |              |
|-----|---------------|--------------|
| 31. | a. how much   | c. a little  |
|     | b. a few      | d. how many  |
| 32. | a. for        | c. about     |
|     | b. of         | d. to        |
| 33. | a. what is it | c. how to do |
|     | b. what it is | d. how it is |
| 34. | a. whatever   | c. however   |
|     | b. especially | d. anyway    |

35. a. getting confidence c. being confidential  
b. feeling confident d. having confided
36. a. that one clearly understood c. a clear understanding of  
b. to understand clearly about d. clear to understand
37. a. none c. any  
b. another d. others

**Instructions: Answer the following questions by choosing the most appropriate letter for each question. (Numbers 38-45)**

คำสั่ง: เลือกคำตอบที่ถูกที่สุดเติมลงในช่องว่างเพื่อให้ประโยคสมบูรณ์ (ข้อ 38-45)

38. Although she has an English name, she is, \_\_\_\_\_, Thai.  
a. moreover c. at least  
b. in face d. somehow
39. Statistics show that the number of road accidents has increased \_\_\_\_\_ .  
a. in former times c. in recent years  
b. soon d. later
40. There was so much noise from the audience that the speaker could not make herself \_\_\_\_ .  
a. hears c. to hear  
b. hearing d. heard
41. .... it was clear that the accused was having significant psychiatric problems, the appeals court threw out his life sentence.  
a. Because c. So  
b. Even though d. Given
42. Disney World "Epcot Center" is a perfect vacation for clients who like to stretch their mind ..... their bodies.  
a. like c. within  
b. than d. as well as





Mary: Sure! Are you going to handle the booking or would you like me to do it? I'm free in the afternoon.

46. a. we are going c. going camping  
b. go camping d. to go camping
47. a. We'd go c. We'd better go  
b. We'd choose d. We'd rather go
48. a. I love c. I'm crazy  
b. I fancy d. I've dreamed
49. a. Due to c. That's why  
b. Because d. The reason
50. a. Do you prefer c. Are you happy  
b. Have you got to d. Can we see

**Instructions: Answer the following questions by choosing the most appropriate letter for each question. (Numbers 51-60)**

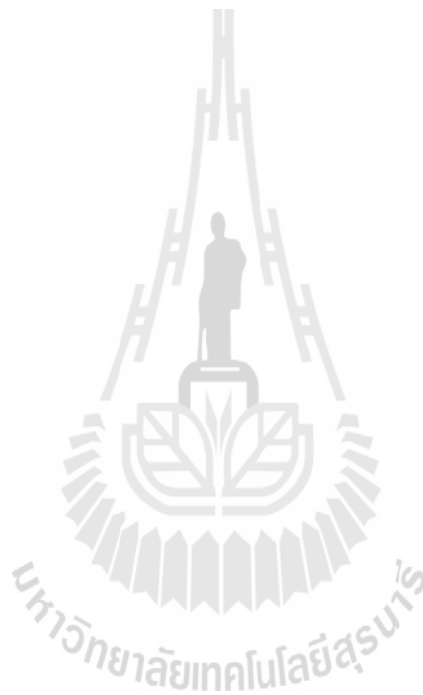
คำสั่ง: เลือกคำตอบที่ถูกต้องเพียงข้อเดียว ข้อ 51-60

51. Your hard-working friend has just won a scholarship to a prestigious university. You say to him, "....."
- a. I see noting wrong with it  
b. Congratulations! You deserve it  
c. That's incredible. I don't believe it  
d. How did that happen? You never told me
52. The doctor gives you some medicine for your illness with some professional instruction. He says, "....."
- a. Get two pills after every meals  
b. Take two pills after every meal  
c. Eat your meal and then your pills  
d. Drink water with getting two pills after your meals

53. You want to borrow your friend's dictionary. You ask, "..... ?"
- Can I lend you a dictionary
  - May I borrow your dictionary
  - Could you offer me a dictionary
  - Would you mind getting me your dictionary
54. On the way to Hua Hin, you see a man standing beside his car trying to fix the tire. You want to help him. You say, "..... ?"
- Can you help me
  - Can I give you a hand
  - May I look under the hood
  - Could you give me a hand
55. **A:** "..... ?"
- B:** " Sorry, I can't. I'm on the phone."
- Would you give me a ring
  - Can I help you with anything
  - Why don't you finish it today
  - Could you help me sort out this master ring now
56. You try on a pair of shoes but they are a bit too tight. You ask the sale assistant, "..... ?"
- Have you got a bigger size
  - Do you have different color
  - Can you find me a modern one
  - Can you have the ones with higher heels
57. Your friend told you about his trip to New York. You show your interest by saying, "..... !"
- Have a nice day
  - Fantastic
  - Bon Voyage
  - What a surprise
58. You are in a restaurant. The waiter asks, "Are you ready to order?" You reply, "....."
- You're ready to serve
  - We prefer chicken to beef
  - We'd like to have a table for three
  - Please give us a minute to look at the menu
59. You would like to get two movie tickets. You call the box office and say, "..... ?"
- Could you buy me two tickets
  - Can I reserve two tickets, please
  - Shall I book you for two tickets
  - May I help you with two tickets

60. You hand in your report late. You say to your teacher, “.....”
- a. That’s quite all right
  - b. I apologize for the delay
  - c. Please accept my sympathy
  - d. Sorry, It’s better late than never

\*\*\*\*\*GOOD LUCK\*\*\*\*\*



**ANSWER SHEET**  
**ENGLISH LANGUAGE PROFICIENCY TEST FOR**  
**PRE-UNIVERSITY STUDENTS**

**Section 1: Reading Comprehension (Numbers 1-30)**

No.	A	B	C	D		No.	A	B	C	D		No.	A	B	C	D
1						11						21				
2						12						22				
3						13						23				
4						14						24				
5						15						25				
6						16						26				
7						17						27				
8						18						28				
9						19						29				
10						20						30				

**Section 2: Writing (Numbers 31-45)**

**Section 3: Speaking (Numbers 46-60)**

No.	A	B	C	D
31				
32				
33				
34				
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## **CURRICULUM VITAE**

Duangporn Sriboonruang was born in Kalasin province, Thailand. She received a B.A. from Mahasarakham University, Thailand and M.Ed. in Teaching English to Speakers of Other Languages (TESOL) from Queensland University of Technology, Australia. She undertook the co-supervision programme between the school of English, Institute of Social Technology, Suranaree University of Technology, Thailand and the School of Education, the University of Leeds, the UK, for a Degree of Doctor of Philosophy in English Language Studies. She was a holder of the Thai government scholarship. Her interests include language learning strategies, learner autonomy, and teaching methodology,

มหาวิทยาลัยเทคโนโลยีสุรนารี