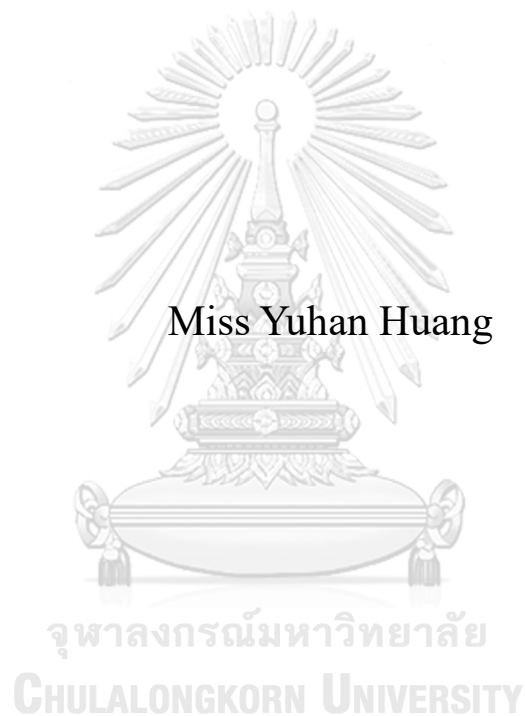


AN INVESTIGATION INTO THE SUBSTITUTIONS OF  
ENGLISH ARTICLES BY L1 CHINESE LEARNERS



A Thesis Submitted in Partial Fulfillment of the Requirements  
for the Degree of Master of Arts in English as an International Language  
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การศึกษาการใช้คำกำกับนามแทนในภาษาอังกฤษโดยผู้เรียนที่มีภาษาจีนเป็นภาษาที่ 1



วิทยานิพนธ์นี้เป็นส่วนหนึ่งของการศึกษาตามหลักสูตรปริญญาศิลปศาสตรมหาบัณฑิต  
สาขาวิชาภาษาอังกฤษเป็นภาษานานาชาติ สหสาขาวิชาภาษาอังกฤษเป็นภาษานานาชาติ

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ชูกาน หวง : การศึกษาการใช้คำกำกับนามแทนในภาษาอังกฤษโดยผู้เรียนที่มีภาษาจีนเป็นภาษาที่ 1. ( AN INVESTIGATION INTO THE SUBSTITUTIONS OF ENGLISH ARTICLES BY L1 CHINESE LEARNERS) อ.ที่ปรึกษาหลัก : รศ. ดร.ณัฐมา พงศ์ไพโรจน์

ระบบไวยากรณ์คำนำหน้านามถือเป็นความท้าทายอย่างหนึ่งของผู้เรียนภาษาอังกฤษเป็นภาษาที่สอง โดยเฉพาะอย่างยิ่งในกลุ่มผู้เรียนที่มีภูมิหลังทางภาษาที่ไม่มีระบบไวยากรณ์คำนำหน้านาม งานวิจัยชิ้นนี้มุ่งศึกษาปัญหาและสาเหตุของการแทนที่คำนำหน้านามในภาษาอังกฤษโดยผู้เรียนภาษาอังกฤษที่มีภาษาจีนเป็นภาษาที่หนึ่ง สมมติฐานงานวิจัยชิ้นนี้ คือ ผู้เรียนภาษาอังกฤษชาวจีนจะมีปัญหาการแทนที่คำนำหน้านามในภาษาอังกฤษ และในการวิเคราะห์ข้อผิดพลาดทางไวยากรณ์ ปัญหาการแทนที่คำนำหน้านามในภาษาอังกฤษอาจมีสาเหตุมาจากการที่ภาษาแม่ของผู้เรียนไม่มีการใช้คำนำหน้านามในระบบไวยากรณ์ และความซับซ้อนของระบบไวยากรณ์คำนำหน้านามในภาษาอังกฤษ ผู้เข้าร่วมวิจัยในงานนี้ประกอบด้วยผู้เรียนชาวจีนจำนวน 60 คนที่เป็นนักศึกษาในสาขาวิชาภาษาอังกฤษ มหาวิทยาลัยเซวตส์มินซู (Southwest Minzu University) ประเทศจีน ผู้เข้าร่วมวิจัยถูกแบ่งเป็น 2 กลุ่ม ในจำนวนเท่ากัน ซึ่งประกอบด้วยกลุ่มที่มีสมรรถภาพภาษาอังกฤษระดับกลาง และระดับสูง งานวิจัยชิ้นนี้เก็บข้อมูลโดยใช้แบบทดสอบเติมคำในช่องว่าง (Fill-in-the-Blank Test) แบบทดสอบการตัดสินความถูกต้องทางไวยากรณ์ (Grammaticality Judgment Task) และการสัมภาษณ์ โดยมีบริบทการใช้คำนำหน้านามตามระบบไวยากรณ์ภาษาอังกฤษจำนวนทั้งสิ้น 3 รูปแบบ ได้แก่ บริบทที่มีลักษณะชี้เฉพาะและลักษณะบ่งชี้ความเจาะจง [+definite, +specific] บริบทที่ไม่มีลักษณะชี้เฉพาะแต่มีลักษณะบ่งชี้ความเจาะจง [-definite, + specific] และบริบทที่ไม่มีลักษณะชี้เฉพาะและ ไม่มีลักษณะบ่งชี้ความเจาะจง [-definite, - specific] (Ionin et al., 2004) โดยแบบทดสอบเติมคำในช่องว่างใช้เพื่อเก็บข้อมูลด้านการผลิต และแบบทดสอบการตัดสินความถูกต้องทางไวยากรณ์ใช้เพื่อเก็บข้อมูลด้านการรับรู้คำนำหน้านามภาษาอังกฤษ ผลการวิจัยบ่งชี้ว่า ผู้เรียนทั้งสองกลุ่มมีปัญหาการแทนที่คำนำหน้านามในภาษาอังกฤษในทั้ง 3 บริบท ซึ่งเป็นการยืนยันสมมติฐานแรกของงานวิจัยนี้ และผลการวิจัยจากการวิเคราะห์ข้อผิดพลาดทางไวยากรณ์พบว่า มีปัจจัยข้อผิดพลาดทั้งจากระหว่างภาษา และจากภายในภาษาเดียวกัน กล่าวคือ ในด้านปัจจัยข้อผิดพลาดระหว่างภาษา การใช้คำนำหน้านามไม่ปรากฏในระบบไวยากรณ์ภาษาจีน จึงอาจเป็นปัญหาต่อการรับระบบไวยากรณ์คำนำหน้านามภาษาอังกฤษในผู้เรียนชาวจีน ในด้านปัจจัยข้อผิดพลาดจากภายในภาษาเดียวกัน ปัญหาการแทนที่คำนำหน้านามในผู้เรียนชาวจีนมีสาเหตุมาจากความซับซ้อนของระบบไวยากรณ์คำนำหน้านามภาษาอังกฤษเอง รวมถึงผลจากความผิดพลาดในการตั้งสมมติฐานต่อการใช้คำนำหน้านามของผู้เรียน ผลการวิจัยนี้จึงสนับสนุนสมมติฐานที่สอง ผลลัพธ์จากงานวิจัยนี้ช่วยเพิ่มองค์ความรู้ด้านการรับภาษาที่สองและยังให้ข้อเสนอแนะการซึ่งเป็นนัยทั้งด้านทฤษฎีและด้านการเรียนการสอนด้วย



สาขาวิชา ภาษาอังกฤษเป็นภาษานานาชาติ  
ปีการศึกษา 2566

ลายมือชื่อนิสิต .....  
ลายมือชื่อ อ.ที่ปรึกษาหลัก .....

## 6488003820 : MAJOR ENGLISH AS AN INTERNATIONAL LANGUAGE

KEYWORD: second language acquisition, error analysis, English article substitution

Yuhan Huang : AN INVESTIGATION INTO THE SUBSTITUTIONS OF ENGLISH ARTICLES BY L1 CHINESE LEARNERS. Advisor: Assoc. Prof. NATTAMA PONGPAIROJ, Ph.D.

The English article system is a challenge for English second language learners, especially for learners whose language background is an articleless language. The objectives of the present study were to investigate L1 Chinese learners' problems of English article substitutions and find out possible causes of L1 Chinese learners' English article substitutions. It was hypothesized that L1 Chinese learners had problems of English article substitutions and that, based on Error Analysis, both non-existence of articles and complexity of the English article system caused English article substitutions by L1 Chinese learners. The participants in the study consisted of 60 speakers of Mandarin Chinese who majored in English at Southwest Minzu University in China. They were equally divided into an intermediate and an advanced group according to their English proficiency levels. Based on the three nominal contexts in the English article system, i.e., the [+def, +spec] context, the [-def, +spec] context, and the [-def, -spec] context (Ionin et al., 2004), data were collected from a Fill-in-the-Blank Test, a Grammaticality Judgment Task (GJT), and an interview. The Fill-in-the-Blank Test and the GJT focused on learners' English article production and perception, respectively. Results from the tasks showed that both the intermediate learners and the advanced learners had problems of English article substitutions in all the three nominal contexts, confirming the first hypothesis. Based on Error Analysis, the results were caused by both interlingual and intralingual factors. For the interlingual factor, as articles are non-existent in Chinese, it could be problematic for the Chinese learners to acquire the English article system. For the intralingual factors, the L1 Chinese learners' English article substitutions were caused by the complexity of English articles as well as false concepts hypothesized. Hypothesis 2 was therefore supported. The findings of the study made a contribution to Second Language Acquisition and also provided theoretical and pedagogical implications.

จุฬาลงกรณ์มหาวิทยาลัย  
CHULALONGKORN UNIVERSITY

Field of Study:	English as an International Language	Student's Signature .....
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# CHAPTER I

## INTRODUCTION

### 1.1 Background of the Study

Second language acquisition (SLA), which is a sub-discipline of applied linguistics, is a systematic study of how people learn a second language (L2) after their first language (L1) acquisition is established (Hoque, 2017). An L2 cannot be learnt overnight and it is also problematic for language learners to attain native-like proficiency levels even after years of learning, especially in terms of grammatical competence (Liu, 2009). A number of grammatical features in English have been found to be problematic among L2 learners from several L1 backgrounds, such as English reflexive pronouns by L1 Japanese learners (Hirakawa, 1990), English passive by L1 speakers of Hungarian (Tankó, 2010), English relative clauses by L1 German and L1 Turkish speakers (Yas, 2016), English restrictive and non-restrictive relative clauses by L1 Thai learners (Amornwongpeeti & Pongpairoj, 2014), and English past tense marker by L1 speakers of Chinese (Sharmini et al., 2009).

Among English syntactic features, the English article system is one of the most difficult challenges faced by many L2 learners. Even the most advanced non-native learners of English confront problems with English articles in terms of article omissions and substitutions. This is particularly problematic for the speakers whose first languages have no articles, such as Chinese speakers (Han et al., 2006).

Many studies have explored problems of English article substitutions by L2 learners from different L1 backgrounds, for example, L1 Persian learners in Geranpayeh (2000), L1 Spanish learners in Díez-Bedmar and Papp (2008), L1 Thai learners in Pongpairoj (2020), and L1 Pashto learners in Ahmad and Khan (2019). As far as L1 Chinese learners are concerned, there are some studies such as Robertson (2000), Zhang (2007), Zhou and Du (2015) and Lei (2016). These studies covered the errors, including English article omissions, made by L1 Chinese learners. To the best of my knowledge, there have not been any studies specifically focusing on English article substitutions by L1 Chinese learners. And this study filled this gap by investigating substitutions of English articles by L1 Chinese learners.

## 1.2 Research Objectives

The objectives of this study were:

- 1) To investigate L1 Chinese learners' problems of English article substitutions.
- 2) To find out causes of L1 Chinese learners' English article substitutions.

## 1.3 Research Questions

Based on the objectives of this study, the research questions of this study were:

- 1) Do L1 Chinese learners have problems of English article substitutions?
- 2) Based on Error Analysis, are L1 Chinese learners' English article substitutions caused by non-existence of articles in Chinese and the complexity of the English article system?

## 1.4 Statement of the Hypotheses

The hypotheses of the study were formulated as follows:

- 1) L1 Chinese learners have problems of English article substitutions.
- 2) Based on Error Analysis, both non-existence of articles and complexity of the English article system cause English article substitutions by L1 Chinese learners.

## 1.5 Scope of the Study

The scope of the study was as follows:

### 1.5.1 Population and Sample

The participants of the study comprised 60 Chinese undergraduate students of Southwest Minzu University in China. They were divided into two groups based on their English proficiency levels: an intermediate group and an advanced group. All the participants were recruited via purposive sampling. They all majored in English, and their proficiency levels were categorized by a national test in China called TEM4<sup>1</sup>. Participants who get 80 points or above are classified as 'excellent' in TEM4 and were put into the advanced group in the study. Participants who score between 70 and 79 are classified as 'good' in TEM4 and were put into the intermediate group in the study.

### 1.5.2 Target Linguistic Features

English is an inflectional language. Definiteness and indefiniteness of nouns in

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<sup>1</sup> TEM4, which is the abbreviation for Test for English Majors-Band 4, is an English certificate test designed to measure the English proficiency of Chinese university undergraduates majoring in English (Jin & Fan, 2011).

English is mainly conveyed by means of two articles: the definite article *the* and the indefinite article *a/an*. In the experiment, only singular concrete bare nouns were used in the target items (Çanta, 2018), such as ‘building’, ‘cup’ and ‘computer’.

### 1.5.3 Tasks for Data Elicitation

In this study, three tasks, a Fill-in-the-Blank Test, an untimed Grammaticality Judgment Task, and an interview, were used to elicit data from L1 Chinese learners. The Fill-in-the-Blank Test and the untimed Grammaticality Judgment Task focused on the learners’ production and perception of English articles, respectively, while the interview data focused on the participants’ attitudes towards English articles.

### 1.6 Definition of Terms

(1) **Substitution** in the present study means the act of using *the* in the contexts where the indefinite article *a/an* is required and using *a/an* in the contexts where the definite article *the* is required (Ionin et al., 2004).

(2) **Error Analysis (EA)** is a theory that describes and explains errors made by L2 learners (Muqbel, 2018). Error collection, error identification, error description, error explanation and error evaluation are the five steps which are used to conduct error analysis (Corder, 1974). This research focused on errors of English article substitutions by L1 Chinese learners.

(3) **English articles**, which refer to ‘a’, ‘an’, ‘the’, and the null article ‘Ø’, are among the most frequently occurring function words in the language (Master, 1997). In this study, English articles were limited to ‘a’, ‘an’, and ‘the’.

(4) **L1 Chinese learners** are undergraduate Chinese students whose mother tongue is Chinese and who are learning English in the Chinese context. In this study, they were from Southwest Minzu University in China. There were 60 L1 Chinese learners divided into two proficiency groups, i.e., an intermediate group and an advanced group, 30 each.

### 1.7 Significance of the Study

The present study was significant in the following aspects.

Firstly, to the best of the researcher’s knowledge, no study has focused on the substitutions of English articles by L1 Chinese learners. The study provided evidence about whether it was problematic for L1 Chinese learners to use English articles in the correct contexts.

Secondly, not only quantitative data but also qualitative data were provided in the present study.

Thirdly, both interlingual and intralingual causes contributing to L1 Chinese learners' English article substitutions were found in the study. Most previous studies have paid attention to the interlingual factor, i.e., the differences between definiteness in English and the L1 investigated. The present study also put emphasis on the intralingual factors that were found in the study, i.e., complexity of English articles and false concepts hypothesized.

Fourthly, the study also had pedagogical implications as it offered suggestions for English article teaching and English textbook design in China. English teachers in China, for example, were encouraged to give emphasis on English articles instead of letting students discover English article use by themselves. It was also suggested that authentic texts should be given so as to demonstrate English article use in different nominal contexts.

### **1.8 Stages of the Research According to the Objectives and Method**

The stages of the research are listed below:

- (1) Find the research interest and topic: L1 Chinese learners make errors while using English articles;
- (2) Review previous literature on the related topic: 1) Error Analysis (EA), 2) Definiteness in English and Chinese, 3) Previous studies on the acquisition of English articles by L2 learners, including learners' problems of English article substitutions. Specify the research gap: studies which specifically focus on the English article substitutions by L1 Chinese learners;
- (3) Design the instruments, including a Fill-in-the-Blank Test, an untimed Grammaticality Judgment Task, and an interview;
- (4) Validate the instruments by three experts;
- (5) Submit information about the methodology to the Office of the Research Ethics Review Committee for Research Involving Human Subjects;
- (6) Conduct a pilot study;
- (7) Conduct the main study;
- (8) Analyze the data, and discuss, summarize and conclude the findings.

## 1.9 Organization of the Thesis

The thesis is comprised of five main chapters.

**Chapter I** is the general introduction of the present study where the background of the study, the research objectives, the research questions, and the statement of the hypothesis are presented. The key terms used in study are defined as well. The scope of the study, the significance of the study, and the stages of the research according to the objectives and method are also included. This chapter ends with an outline of the thesis which shows how the thesis is organized in each chapter.

**Chapter II** reviews the literature which is relevant to the present study. Error Analysis Theory is described in detail, followed by a comparison of definiteness in English and Chinese. Previous studies on English article substitutions by learners from different backgrounds are also provided in this chapter, raising the gap of the previous studies.

**Chapter III** details the methodology of the present study, including the research participants, the research instruments, the validity test, the research procedure, and data analysis. The pilot study is reported at the end of this chapter.

**Chapter IV** presents the results and discussions of the present study. Both quantitative data and qualitative data are analyzed based on the research questions and hypotheses of the research. The causes of L1 Chinese learners' English article substitutions are also explained in this chapter.

**Chapter V** is the conclusion part of the present study. Major findings are summarized at the beginning of this chapter. Both theoretical and pedagogical implications are offered according to the findings of the present study. The limitations and recommendations for further research are mentioned in the end.

**References** are listed after Chapter V.

**Appendices**, which consist of the information of TEM4, test items of the Fill-in-the-Blank Test and the untimed GJT, and the details of the IOC results, are also presented at the end of the thesis.



## **CHAPTER II**

### **LITERATURE REVIEW**

This chapter reviews literature related to the topic of the thesis. It begins with the related theory on Error Analysis in 2.1, which includes the definition of errors (2.1.1), Error Analysis (2.1.2) and types of errors (2.1.3). Then, definiteness in English (2.2.1) and Chinese (2.2.2) is compared in 2.2. Finally, the chapter reviews previous studies on the acquisition of English articles by learners from different L1 backgrounds in 2.3.

#### **2.1 Error Analysis**

##### **2.1.1 The Definition of Errors**

Analyzing errors made by language learners is an indispensable part in the studies of SLA. Since the present study investigated the substitutions of English articles by learners whose L1 is Chinese, it is essential to know the definition of errors. In James (1998: 83), an error is “an instance of language that is unintentionally deviant.” Gass and Selinker (2008: 102) defined errors as “red flags” for the reason that errors could reflect learners’ knowledge of the second language in their learning process.

Errors are not the same as mistakes. Corder (1967) distinguished errors and mistakes based on the distinction between “competence” and “performance” proposed by the American linguist Noam Chomsky in the late 1950s. According to Chomsky (1965), competence is speakers’ ideal knowledge of their languages while performance is the actual realization of their languages in production and comprehension. Corder (1974: 24) stated that “errors of performance (mistakes) will be characteristically unsystematic and errors of competence, systematic.” Compared with mistakes, errors are made due to a deficiency in competence. Mistakes, on the contrary, are caused by some random and unsystematic factors such as slips of the tongue. Mistakes can be made by natives and are ready to be self-corrected. Making mistakes refers to learners’ performance. It does not mean that learners do not master the related knowledge of that language, but errors reflect the speakers’ current stage of L2 development, or underlying competence.

### 2.1.2 Error Analysis

Error Analysis was first established by Corder and his colleagues in the late 1970s. As one of the major theories of SLA, it is a type of linguistic analysis that focuses on errors committed by second language learners (Abisamra, 2003). Corder (1974) believed that the study of errors should be included in the process of language teaching and learning. The procedures of conducting error analysis include five steps: error collection, error identification, error description, error explanation and error evaluation (Corder, 1974). The researcher first needs to be aware of the goals of his research. Knowing what to collect and how to collect it are important in this step. In the first step, researchers should collect samples of learners' language errors. It can be cross-sectional sampling or longitudinal sampling<sup>2</sup>. Once the samples of language errors have been collected, those errors should then be identified. Researchers in this step need to distinguish errors from mistakes. Description of errors involves researchers' "attention to the surface properties of the learners' utterances" Ellis (1994: 54). The category of errors should be stated in this step. Several categories can be used. One of the most commonly used categories is linguistic taxonomy (i.e., linguistic constituents that learners have problems with). Another commonly used one is surface strategy taxonomy, which includes omission, addition, misformation and misordering (Dulay et al., 1982). The fourth step is error explanation. This step aims to explain why certain errors are made. It can be considered as the most important step in the procedures because knowing why an error is made is a prerequisite for corrections. The sources of errors, according to Ellis (1994: 57), can be "psycholinguistic, sociolinguistic, epistemic, or may reside in the discourse structure". One of the most popular explanations is based on psycholinguistic sources which were distinguished by Richards (1975), i.e., interlingual errors and intralingual errors. After the explanation, errors should then be evaluated. It is a process of measuring how serious the errors are based on their influence on learning.

There is no shame in making errors. It is an effective way to let language learners and instructors be aware of the knowledge that has not been acquired by learners and

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<sup>2</sup> Cross-sectional sampling is a sampling approach in which data are collected from different participants at a time, while data in longitudinal sampling are collected by observing only one participant over a period of time (Caruana et al., 2015; Olsen & St George, 2004).

help them improve themselves instead. Errors are beneficial to language learners, instructors and researchers. For language learners, errors exist as evidence of their active contribution while learning a new language (Ellis, 1995). Learners without producing errors are difficult to make progress. For language instructors, errors made by language learners provide data about what errors learners have made in the process of learning and show instructors whether learners have achieved the goals of learning (Corder, 1967; Dulay et al., 1982). For language researchers, errors tell researchers how a language is being learnt by learners and what strategies or procedures learners are employed by language learners (Corder, 1967).

### **2.1.3 Types of Errors**

Different types of errors have been proposed by different researchers. According to stages of development, Corder (1974) divided errors into three categories: pre-systematic errors, systematic errors and post-systematic errors. Pre-systematic errors occur when learners have not learnt the rules of L2. Errors made by learners at this stage are usually caused by their lack of knowledge or negative transfer of their mother tongue. They can neither understand nor correct their errors. When learners begin to make systematic errors, it indicates that the rules learnt by learners are still not completely acquired by them. Therefore, they cannot apply what they have learnt correctly. Post-systematic errors are similar to mistakes. Learners can correct post-systematic errors by themselves and can also explain the reasons when they make post-systematic errors. Dulay et al. (1982) summarized four types of error taxonomy: linguistic category taxonomy, surface strategy taxonomy, comparative taxonomy and communicative effect taxonomy. In the first taxonomy, errors are classified based on linguistic constituents that learners have problems with, including phonology, grammar, lexis and so on. Errors in surface strategy taxonomy are classified as omission, addition, misformation and misordering. Comparative taxonomy is based on a comparison between learners' L1 and L2. That is to say, errors made by learners in their L2 are compared with equivalent phrases or structures in their L1. Developmental, interlingual and ambiguous errors are produced in comparative taxonomy. Communicative taxonomy is used to distinguish errors which can affect the listeners' or readers' comprehension from those which do not have effect.

Richards (1975) classified errors into two categories, namely, interlingual errors

and intralingual errors. Interlingual errors are caused by negative influence of learners' L1. While interlingual errors are caused by first language interference, intralingual errors result from faulty or partial learning of the target language, rather than from language transfer (Deng, 2019). More specifically, Richards (1975) subdivided intralingual errors into four groups, i.e., “overgeneralization”, “ignorance of rules”, “incomplete application of rules”, and “false concepts hypothesized”. “Overgeneralization” occurs when the learner creates a deviant structure based on other structures in the target language (Ellis, 1994). For example, the learner might overgeneralize the comparative morpheme *-er* for every adjective such as *\*bader* in comparative context. “Ignorance of rules” arises when the learner fails to notice the restrictions on grammatical rules. For instance, the learner might create a sentence like *\*I have dog*. The learner does not follow the grammatical rule of English articles in this case. “Incomplete application of rules” is caused when the learner cannot produce acceptable sentences because the required linguistic rule is not fully acquired by him/her. For example, the learner may ask *\*“who he is?”* instead of *“who is he?”*. Last but not least, “false concepts hypothesized” results from the learner’s incorrect understanding of grammatical rules due to teaching and learning materials and/or faulty teaching. Take the sentence *\*he is likes dance*, for example. The learners added *is* here because they probably thought *is*, the marker of the present tense, could indicate the tense of this sentence. But they did not realize that *-s* in the verb *likes* already revealed the tense.

## 2.2 Definiteness

Definiteness is a grammatical category featuring formal distinction whose core function is to mark a nominal expression as identifiable or nonidentifiable (Chen, 2004). It exists in different languages in different forms. According to Pongpairoj (2020), definiteness, as a universal linguistic category, can be categorized into grammatical and conceptual definiteness. Definiteness in English is grammatical, because it is expressed through the English article system. Conceptual definiteness is in articleless languages such as Mandarin Chinese, because there is no article in those languages. For those articleless languages, definiteness is inferred through context.

### 2.2.1 Definiteness in English

English is an inflectional language. English articles, *the* and *a(an)*, can tell

whether a noun is definite or indefinite. The definite article *the* in English can be used in two domains: situational/cultural reference and textual co-reference (Zhang, 2018).

In terms of situational/cultural reference, it includes three classes, i.e., general knowledge which both speakers and listeners know, knowledge that is known within a country or a small area and the extra-linguistic situation (Zhang, 2018). For example,

(1) *The earth* moves round *the sun*.

(2) Let's go to *the playground*.

(3) *The roses* are very beautiful.

In (1), 'earth' and 'sun' are definite because *earth* and *sun* are the nouns which everyone knows without any explanation. In (2), 'playground' is definite because the speakers and hearers involved in the sentence are at the same school. That is to say, they all know which playground the speakers are talking about. Similarly, when the speakers and hearers are looking at the same objects in an immediate situation, 'roses' in the sentence (3) is definite in this case.

As for textual co-reference, it can be subdivided into anaphoric reference and cataphoric reference (Zhang, 2018). Anaphoric reference refers to the entity that is mentioned again in the text. For example,

(4) I received a letter yesterday. *The letter* was written by John.

When *letter* is mentioned again in the example (4), 'a letter' and 'the letter' represent the same thing. Therefore, the hearers can understand what the letter refers to.

Cataphoric reference, which can also be called as structural reference, usually appears in postpositive attributes. Postpositive attributes are put right after the nouns they modify or restrict. For example,

(5) *The house* on the corner is mine.

*House* in (5) is definite because it is modified by the prepositional phrase 'on the corner'.

### 2.2.2 Definiteness in Chinese

Chinese is an isolating language. It does not have articles. Definiteness in Chinese is expressed through word order and context (Chen, 2004; White, 2008; Wong & Quek, 2007). For instance,

(6) *lǎo shī lái le*  
 teacher come ASP  
*The teacher(s) came.*

(7) *lái le lǎo shī*  
 come ASP teacher  
 (Some) *teachers* came.

Because Chinese is a topic-prominent language<sup>3</sup> (Wong & Quek, 2007), nouns appearing on subject positions are usually known to the speaker and the hearer. In (6), the noun *lǎo shī* ‘teacher’ is definite in the subject position. But when it is changed to the postverbal position, *lǎo shī* ‘teacher’ in (7) is indefinite.

In addition to word order, definiteness can be expressed through context in Chinese. For example,

(8) *lǎo shī shì xué xí de yǐn dǎo zhě*  
 teacher is learning POSS facilitator  
*Teachers* are facilitators of learning.

(9) *lǎo shī ān pái de rèn wù wǒ yǐ jīng wán chéng le*  
 teacher assign POSS task I ASP finish ASP  
 I have finished *the task(s)* assigned by *the teacher(s)*.

While *teachers* in the sentence (8) refers to all teachers, *teacher(s)* and *task(s)* in (9) are definite, because in the context, *the tasks* are what the subject *I* have done, and *the teachers* are the persons who assigned *the tasks*.

To summarize so far, definiteness in English belongs to grammatical definiteness where articles are used to express definiteness as a syntactic category, while definiteness in Chinese belongs to conceptual definiteness where context is usually used to express definiteness (Pongpairroj, 2020). Definiteness in English, an inflectional language, is expressed through the article system, whereas definiteness in Chinese, an isolating language, is expressed through word order and context (Chen,

<sup>3</sup> Topic-prominent languages refer to the languages where the topic of a sentence often comes first (Chen, 2011). An example is shown in (i) where the topic “earthquake” comes first.

(i) *dì zhèn fā shēng de shí hòu wǒ zhèng zài shuì jiào*  
 earthquake happen POSS when I ASP sleep  
 I was sleeping when the earthquake happened.

2004; White, 2008; Wong & Quek, 2007).

### 2.3 Previous Studies

A number of studies have been conducted on the acquisition or the substitutions of English articles by L2 learners. English learners from different L1 backgrounds have been found to have problems on English article choice. A significant study is Huebner's (1983) research, which has been widely mentioned by later researchers on English article substitutions. Adopting Bickerton's (1981) semantic wheel model, Huebner categorized English noun phrases into four semantic categories: [ $\pm$ Specific Referent ( $\pm$ SR)] and [ $\pm$ Assumed Known to the Hearer ( $\pm$ HK)]. Type 1 is [-SR, +HK], i.e., generic nouns. Type 2 [+SR, +HK] is referential definite nouns. Type 3 [+SR, -HK] is referential indefinite nouns. Type 4 is [-SR, -HK], i.e., nonreferential nouns. In his longitudinal study on a Hmong native speaker, Huebner (1983) found that there was a systematic variability in the learner's English article choice. The Hmong speaker in his study gradually decreased the use of the definite article *the* in the [-SR, -HK] and the [+SR, -HK] contexts and began to retain *the* in the [+HK] contexts. Ahmad and Khan (2019) investigated the difficulties in the acquisition of English articles by 75 L1 Pashto adult learners whose first language did not have an article system. Definiteness in Pashto was expressed through demonstratives (e.g. /da/ 'this' and /dwi/ 'these') and numerals (e.g. /yaw/ 'one'). According to Ahmad and Khan (2019), the demonstratives in Pashto were used in the [+referential, +definite] contexts, while the numerals in Pashto were used in the [+referential, -definite] contexts. Results from a gap-fill task showed that the Pashto learners fluctuated between selecting the English articles based on definiteness and specificity and made more errors in using 'a/an' in place of 'the'. Park and Song (2008) explored the reasons why advanced L1 Korean learners had difficulties in English articles. The qualitative and quantitative analysis of 41 advanced Korean college and graduate students revealed that misjudgment of referentiality and misjudgment of noun countability were the two major causes. Misjudgment of referentiality led to the students' incorrect use of English articles in all four semantic types, i.e., [-SR, +HK], [+SR, +HK], [+SR, -HK] and [-SR, -HK], while misjudgment of noun countability mainly affected their article use in the [+SR, -HK] and the [-SR, -HK] types. Geranpayeh (2000) analyzed the L1 Persian learners' performance on two article

elicitation tasks. Although Persian had articles, the article system in Persian and English were different because the former had a specific marker, while the latter used a definite marker. Unlike English, definiteness/indefiniteness in Persian was not heavily governed by syntax. Semantics seemed to have the main role in the case of Persian instead. Geranpayeh (2000) found because of the difference between English and Persian, the L1 Persian learners had problems in identifying the English article marker when it was in the subject position. The acquisition of English articles by L1 Dagbani learners, whose L1 also had articles could be found in a study conducted by Kwame and Westergaard (2020). The article system in Dagbani differed from the article system in English in that Dagbani only had two definite articles. It could be found in the results that L1 Dagbani speakers' article use was based on definiteness instead of specificity. Indefinite and generic contexts were more problematic for them.

Some studies also included participants from different L1 backgrounds, e.g. Snape (2005), Schönenberger (2014), and Pongpaioj (2020). Snape (2005) investigated the use of English articles by 10 Japanese learners of English and 10 Spanish learners of English. According to Snape (2005), the difference between Japanese and Spanish was that Spanish had count singular, plural and mass nouns while Japanese only had mass-like nouns. The results showed that 1) the Japanese participants fluctuated between definiteness and specificity more than the Spanish participants; 2) the Spanish participants had less difficulty in the definite anaphoric mass context; 3) the intermediate Japanese participants fluctuated more than the advanced participants. Hawkins et al. (2006) tested the performance of L1 Japanese learners and L1 Greek (a language that had articles to encode definite and indefinite) learners and found that Japanese L2 learners of English fluctuated between definiteness and specificity in the [-definite, +specific] context while Greek L2 learners of English mostly chose *the/a* to mark definiteness/indefiniteness. The participants in the study conducted by Ionin et al. (2004) consisted of adult speakers from two articleless languages: Russian and Korean. Results from the force-choice elicitation task and the written production task in the study showed that the advanced learners performed better than the intermediate learners in terms of article choices and that both the L1 Korean learners and the L1 Russian learners tended to use *the* in the [+specific] contexts and use *a* in the [-specific] contexts. Another study by



Schönenberger (2014) revealed that, compared with German speakers whose languages had articles, the Russian group made much more errors in using English articles. German speakers rarely misused English articles. What is more, between the two groups of Russian speakers, only the Russian speakers of English fluctuated in both definite and indefinite contexts. Russian speakers of economics and technical sciences made errors not only in the contexts, but also in general. The performance of L1 Thai English learners whose first language had no articles could be found in a study conducted by Pongpairoj (2020). Comparing the use of English articles between an L1 Thai group whose native language was articleless and an L1 French group whose first language had an article system, in both perception and production tasks, Pongpairoj (2020) found that the correct English article usage rates for the L1 Thai group were significantly low. Besides, English article substitutions by the L1 Thai group were found in all three nominal contexts, i.e., the [+definite, +specific], the [-definite, -specific], and the [-definite, +specific] contexts, while the L1 French group rarely misused English articles in all the nominal contexts.

As far as L1 Chinese learners are concerned, some researchers also compared the use of English articles by L1 Chinese learners with the use of English articles by learners from other [+article] or [-article] L1 backgrounds, e.g. Díez-Bedmar and Papp (2008), Zdorenko and Paradis (2008), and Han et al. (2006). Zdorenko and Paradis (2008) conducted a longitudinal study on L2 English children's acquisition of English articles. The participants whose first languages (Spanish, Romanian and Arabic) had articles performed better than those who spoke articleless languages (Mandarin, Cantonese, Korean and Japanese). Besides, among the different types of article misuse, using *the* in indefinite context was the predominant error type for both the [+article] and [-article] groups. However, compared with adult learners from other research studies, children made much fewer errors in the misuse of English articles. Han et al. (2006) analyzed 668 TOFEL essays from Chinese, Japanese, and Russian students and found that among all the NPs, about one in eight NPs had article errors. However, the proportion of the error type, *a-the* confusion, was relatively low compared to the other types of errors in the test. Because of the differences between English and Spanish articles and non-existence of the article system in Chinese, the L1 Chinese learners had more problems with the use of English articles than the L1

Spanish learners (Díez-Bedmar & Papp, 2008). The L1 Chinese learners misused the indefinite articles in generic context in their essays. Díez-Bedmar and Papp (2008) concluded that L1 Chinese learners had both grammatical and pragmatic problems, whereas L1 Spanish learners may only have pragmatic problems. However, L1 Chinese learners performed better than L1 Japanese learners to some extent. Snape et al. (2006) explained that it was because Mandarin Chinese was well ahead of Japanese in the process of fully developing definiteness as a grammatical category.

Some researchers focused on the English article errors made by L1 Chinese learners (Lei, 2016; Zhang, 2007; Zhou & Du, 2015). From the corpus compiled by Lei (2016), he found seven confusion errors made by the L1 Chinese learners out of 36 article errors. Using *the* instead of *a/an* was the dominant subgroup among all types of errors. A similar result can also be seen in a study conducted by Zhou and Du (2015). From the tasks which included filling blanks and error corrections, the authors found that the L1 Chinese learners made more errors when they had to select between *the* and *a*, because L1 Chinese learners had problems with the distinction of specific reference and generic reference. Zhang (2007), on the contrary, found that Chinese college students made many more errors when they had to select between *a* and *an*. The *a/an* confusion occupied 74.7%, which was much higher than *a/the* confusion (18.9%) and *an/the* confusion (6.4%). She believed that the effect of L1 transfer, L2 related factors and article semantics caused Chinese speakers' errors in English articles.

As the above literature presented, compared with learners from [+article] backgrounds, L1 Chinese learners made many more errors with English articles, e.g. Díez-Bedmar and Papp (2008). L1 Chinese learners had great difficulties in selecting *the* in [+definite] contexts and selecting *a/an* in [-definite] contexts, e.g. Zhou and Du (2015). The errors investigated in the above studies, however, included not only English substitutions, but also other errors such as omissions and overuse. Additionally, the above literature believed that the main causes of English learners' English article substitutions lay in the interlingual factor, i.e., L1 transfer. To the best of the researcher's knowledge, no previous study focused on English article substitutions by L1 Chinese learners, and none paid attention to intralingual factors of Chinese learners' English article substitutions. Thus, the present study aimed to bridge

this gap by exploring both interlingual and intralingual factors behind L1 Chinese learners' English article substitutions.



## **CHAPTER III**

### **METHODOLOGY**

This chapter explains the methodology of the present study, including the research participants in 3.1, research instruments in 3.2, a validity test in 3.3, the research procedure in 3.4, data analysis in 3.5, and a pilot study in 3.6.

#### **3.1 Participants**

This study involved 60 Mandarin Chinese speakers who majored in English at Southwest Minzu University in China. They were all recruited online. Most of them learnt English for more than 10 years. Based on their TEM4 scores, all the participants were divided into two groups according to their English proficiency. One was labeled as an intermediate group and the other was an advanced group. The reason why TEM4 was used is that TEM4 is a national test which all undergraduate English majors in China are required to take in their 4th semester. Results of TEM4 are reported in scale scores (0-100) at three levels. Test takers scoring 80 or above are classified as ‘excellent’; test takers scoring between 70 and 79 are classified as ‘good’; test takers scoring between 60 and 69 are classified as ‘pass’. Those who score 0-59 fail the test and are given one more chance to retake the test in the following year (See Appendix A for details of TEM4).

As for my participants, those who were ‘good’ (scored between 70 and 79) were put into the intermediate group, while those who were ‘excellent’ (scored 80 or above) were put into the advanced group. Besides, a total number of eight participants from each group were selected through stratified sampling for an interview.

#### **3.2 Research Instruments**

Three instruments were employed in this study: a Fill-in-the-Blank Test which focused on the learners’ ability to produce English articles, an untimed Grammaticality Judgment Task (GJT) which was designed to test the learners’ perception of English articles, and an interview which investigated the learners about English articles. The instruments were conducted based on the classification of the contexts in the English article system, i.e., definite & specific context, indefinite & specific context, and indefinite & nonspecific context (Ionin et al., 2004). According to Ionin et al. (2004), the [ $\pm$ definite] contexts reflect the state of knowledge of both

the speaker and the hearer, while the [ $\pm$ specific] contexts only reflect the speaker's state of knowledge. Each task had four items for each context. All the nouns in the first two tasks were simple nouns which were taken from the Cambridge English Dictionary. Variables were controlled in this study. That is, only singular concrete nouns were used in the target items. The target sentences in each task comprised the same number of the three types of sentences, i.e., four simple sentences, four compound sentences, and four complex sentences. Table 1 shows the information of the sentence types in the study. Because tenses did not affect the participants' performance on English article choice, there was no restriction on tenses in each item. What is more, all the target nouns were bare nouns, i.e., no premodifiers (e.g. adjectives, nouns, present/past participles), as well as postmodifiers (e.g. relative clauses, present/past participles, prepositional phrases). Also, 18 distractors which covered some other grammatical points were included in the test items so as to make the participants unaware of the purpose of this test. Each task contained 30 test items in total, i.e., 12 target items and 18 distractors.

Table 1: Information of the Sentence Types in the Tasks

Types	Examples	The Number of Sentence Types in Task 1	The Number of Sentence Types in Task 2
Simple Sentences	All joiners will receive <u>(a)</u> pack.	4	4
Compound Sentences	She finished the tea and laid <u>(the)</u> cup aside.	4	4
Complex Sentences	I couldn't sleep because <u>(the)</u> bed was too uncomfortable.	4	4

### 3.2.1 The Fill-in-the-Blank Test

A Fill-in-the-Blank Test is a type of test where test takers are asked to fill in a correct word in the sentences with blanks for missing words. The Fill-in-the-Blank Test of this study was composed of 30 test items. The participants were required to fill in the blanks within 20 minutes. This task was graded by assigning one point for each correct answer and zero point for each wrong answer. Following are three examples taken from the test, followed by the correct answers:

(10) a) Did you encounter anyone in \_\_\_ building?

b) I am hungry now because I only ate \_\_\_ banana this morning.

c) All joiners will receive \_\_\_ pack.

For the target items, in the [+definite, +specific] context, *the* is the correct choice, while in the [-definite, +specific] and [-definite, -specific] context, *a/an* is the correct choice. In (10a), the noun *building* is a thing that both the speaker and the hearer know, so this sentence belongs to the [+definite, +specific] context. Definite article *the* must be used here. In (10b), only the speaker knows which banana he or she refers to. The context in this sentence is indefinite & specific, so *a* is the correct answer. The context in (10c) is indefinite & nonspecific. Neither the speaker nor the hearer knows which pack the joiners will get, so *a* must be used here (See Appendix B for details of the Fill-in-the-Blank Test).

### 3.2.2 The Untimed Grammaticality Judgment Task

An untimed Grammaticality Judgment Task (GJT) is a common research method in SLA research. It attempts to test the speakers' linguistic knowledge by asking them their acceptability of the given utterances (Myers, 2017). In the present study, there were 30 test items given to the participants to let them judge whether the sentences were correct or not. They had to submit their answers within 20 minutes. If the sentence was correct and the participants who considered it correct put the mark √ in the blank, one point was given. If the sentence was correct but the participants who considered it incorrect put the mark × in the blank, then zero point was given to them. If the sentence was incorrect but the participants considered it correct and put the mark √ in the blank, they got zero point. If the sentence was incorrect and the participants who considered it incorrect put the mark × in the blank, one point was given. For the test items which focused on English articles, if the participants had to correct the wrong sentences, they only had two choices, i.e., *the* and *a/an*. Correcting the articles would be too easy for them. This is the reason why the participants were asked to only judge the sentences and not correct the sentences which were judged incorrect.

Examples of the untimed GJT in this research were shown below.

(11) a) Move up, John, and let a lady sit down. \_\_\_\_

b) I saw the movie yesterday and its name is Romeo and Juliet. \_\_\_\_

c) A triangle has three sides. \_\_\_\_

Because (11a) is definite & specific, using the indefinite article *a* here is incorrect. In (11b), the context is indefinite & specific, because only the speaker knows which movie he or she refers to. Definite article *the* should not be used here. *Triangle* is indefinite & nonspecific in (11c), so using *a* here is correct.

While the participants were taking the test, they were not allowed to check and change their answers. Only their first responses were counted (See Appendix C for details of the untimed GJT).

### 3.2.3 Interview

Interviews were used in this research because they had the advantage of reflecting participants' attitudes towards learning English articles and their teachers' teaching method. After finishing the first two tasks, eight participants from each group were selected through stratified sampling to participate in the interview. The interview in the study was mainly formed from three aspects: their thoughts about English articles, the types of errors they often made and their learning methods. Also, in order to make sure they could express their thoughts without any language barriers, the participants were allowed to use their mother tongue to answer the questions. Seven questions that were asked in the interview were:

- (12) a) What do you think about learning English articles?
- b) Do you think English articles are difficult to learn?
- c) How did your teachers teach English articles?
- d) How did you learn English articles?
- e) Do you have any problems learning English articles?
- f) What do you think about the two tasks?
- g) Are you confident about your answers?

### 3.3 Validity

Evaluating whether items match objectives or not is the most important assessment (Berk, 1984). A validity test named the Index of Item-Objective Congruence (IOC) was applied in the present research for the purpose of evaluating the items in the tasks. IOC was developed and introduced by Rovinelli and Hambleton (1977). It aims to examine whether test items are consistent with research objectives in test development by asking experts about their opinions on test items embedded in tasks. Items are given to experts and are given points based on the following

evaluation criteria:

(1) +1 = Congruent, which means the item clearly matches objectives.

0 = Questionable, which means the experts are not sure about the item's function.

-1 = Incongruent, which means the item cannot match objectives.

After the experts rate the items, IOC scores can be then calculated by the formula below:

$$(2) \text{IOC} = \frac{\sum R}{N}$$

In this formula, 'R' is the point given by experts. 'ΣR' represents the total points given by each expert. 'N' shows the numbers of experts. For each item, only items with scores higher than one can be kept, while items with scores lower than zero must be revised. Three experts who were native speakers with English or linguistics background helped to validate the test items of the study. The result showed that all the items passed the IOC. The mean scores for the Fill-in-the-Blank Test, the untimed GJT and the interview were 0.973, 0.945 and 0.906 respectively (See Appendix D for details of the IOC scores of each test).

### 3.4 Research Procedure

The research was conducted in stages: a preparation stage and an experimental stage. Details of each stage are as follows.

In the preparation stage, before the execution of the research, the research project was verified and approved by the Office of the Research Ethics Review Committee for Research Involving Human Subjects at Chulalongkorn University. Then, 30 students who scored between 70 and 79 in TEM4 and 30 students who scored 80 or above in TEM4 were invited to be the participants of the study and were divided into two groups, i.e., an intermediate group that scored between 70 and 79 in TEM4 and an advanced group that scored 80 or above in TEM4. Before the data was collected, the 60 participants joined a WeChat group and were informed of the time of the tests and the link of Tencent Meeting<sup>4</sup> where they would take the tests.

In the experimental stage, the researcher collected data through an online

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<sup>4</sup> The original plan was to collect data onsite. However, a few participants tested positive for COVID-19, so the plan was adjusted to the online data collection.



platform named Tencent Meeting. In Tencent Meeting, before sending the files of the Fill-in-the-Blank Test and the untimed GJT to the group chat, the researcher stressed the instructions of each task and the time requirements, i.e., 20 minutes, for each task. The files of the Fill-in-the-Blank Test and the untimed GJT were not sent to the participants at the same time. Not until the participants finished the Fill-in-the-Blank Test within 20 minutes could they have the file of the untimed GJT. After the participants finished the two tasks, eight participants from each group were selected through stratified sampling for the interview, while the other participants left the meeting room. During the interview, the participants were allowed to use Chinese to answer the questions so as to help them express their thoughts without language barriers.

### 3.5 Data Analysis

In terms of the Fill-in-the-Blank Test and the untimed GJT, the total scores of each participant from the target items of the two tasks were calculated. IBM SPSS Statistics (version 26) was used as a tool to compare the difference between the two learner groups in each task, with the level of significance set at 0.05. In addition, the contexts of each test item where the participants made English article substitutions were also listed for further analysis. In order to observe the participants' English article substitutions in different nominal contexts, the participants' inaccuracies of English articles in the three nominal contexts from the two tasks were also calculated by using the formula "Inaccuracies of each nominal context from each task by each group =  $\frac{\sum I}{N} \times 100\%$ ." In this formula, 'ΣI' is the number of the test items where the learners made English article substitutions in the corresponding nominal context. 'N' represents the number of the test items in the corresponding nominal context. Each task had four items for each context, and the number of the participants in each group was 30. That means 'N' here is 120. For example, in the advanced group, the learners substituted English articles in 5 test items in total in the [+def, +spec] context of the Fill-in-the-Blank Test, which means the inaccuracies of the [+def, +spec] context from the Fill-in-the-Blank Test by the advanced group =  $\frac{5}{120} \times 100\% \approx 4.17\%$ .

As for the interview of the study, the participants' answers to the questions were recorded for retrievability. During the interview, the participants answered the

researcher's questions in Chinese. The researcher then translated their answers into English sentence by sentence. The interview data in the present study was used to support the findings from the Fill-in-the-Blank Test and the untimed GJT.

### 3.6 Pilot Study

Before the main study, a pilot study was conducted. "A pilot study" is defined as "A small-scale test of the methods and procedures to be used on a larger scale (Porta, 2008: 320)." Although the small-scale test might only give us limited information, it can still increase the likelihood of success in the latter research. According to Van Teijlingen and Hundley (2001), pilot studies have many advantages: they can be used, for example, to test adequacy of research instruments, to test whether the research design is realistic and workable, and to identify logistical problems which might occur while using proposed methods. The pilot study in this research aimed to assess whether the research instruments were practical and to check whether there were any problems that may occur in the actual data collection.

#### 3.6.1 Participants

Generally, according to Baker (1994), the reasonable number of participants in a pilot study is 10-20% of the main sample size. In this regard, a total of eight L1 Chinese learners from Southwest Minzu University, China, participated in the pilot study. All of the participants were female, and they were all English majors. Among these eight participants, five of the participants were in their sixth semester of the study, while two of the participants were in their eighth semester. These learners were selected and divided into two groups based on their TEM4 scores. Both the intermediate group and the advanced group had four participants. Table 2 shows the information of the participants in the pilot study.

Table 2: Information of the Participants in the Pilot Study

Groups	Number	Age Mean
Intermediate	4	20.5
Advanced	4	21.75

#### 3.6.2 Instruments

There were three instruments employed in the pilot study: a Fill-in-the-Blank Test, an untimed GJT, and an interview. Due to the current COVID-19 pandemic, data

were collected online via a cloud-based videoconferencing app named Tencent Meeting. The researcher posted the file of the Fill-in-the-Blank Test and the untimed GJT in Tencent Meeting first so that the participants could download it and finish it through their computer within 40 minutes. After finishing the first two tasks, the participants were given a 10-minute break before each of them was interviewed in a breakout room.

### **3.6.3 Summary of the Pilot Study**

Overall, the participants of the pilot study were able to complete the tasks within the time limit and had no problem understanding the instructions of the tasks. While being interviewed, the participants were allowed to use their first language Chinese to answer the questions so as to prevent language barrier. It greatly helped them to express their thoughts fluently. They all felt that the Fill-in-the-Blank Test and the untimed GJT were clear, proper and well-targeted. To conclude, the pilot study showed that there was no problem with the design of the three instruments and that these research instruments would be reliable and practical in the actual data collection.

## CHAPTER IV

### RESULTS AND DISCUSSIONS

This chapter presents results and discussions of the research. Section 4.1 shows findings of the Fill-in-the-Blank Test and the untimed GJT, followed by discussions on the research questions in 4.2.

#### 4.1 Task Results

##### 4.1.1 Results of the Fill-in-the-Blank Test and the Untimed GJT

As presented in Chapter 3, the Fill-in-the-Blank Test and the untimed GJT aimed at investigating the participants' perception and production of English articles with respect to article substitutions. Each task was comprised of 12 target items and 18 distractors. Only scores of the target items were calculated.

The Fill-in-the-Blank Test in this research aimed to induce the participants to produce English articles. The participants were given one point for a correct answer. Results from the Fill-in-the-Blank Test were shown in Table 3.

Table 3: Scores of the Two Participant Groups in the Fill-in-the-Blank Test

Groups	N	Maximum	Minimum	Mean	Sum (360)	Std. Deviation
Advanced	30	12	10	11.17	335	.699
Intermediate	30	12	7	9.73	292	1.311

According to Table 3, the mean of the advanced group ( $m=11.17$ ) was higher than that of the intermediate group ( $m=9.73$ ). An independent t test was conducted to compare the difference between the two learner groups and the results were significant at  $p<.05$ , as shown in Table 4.

Table 4: Independent Samples T-Test of the Fill-in-the-Blank Test

t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
					Lower	Upper
5.283	44.247	.010	1.433	.271	.887	1.980

That is, the advanced group performed significantly better than the intermediate

group in the Fill-in-the-Blank Test, which showed that learners' English proficiency levels more or less influenced their production of English articles.

The untimed GJT in this research was designed to test the participants' perception of English articles. The participants got one point when they judged the sentence correctly. The participants' scores in the untimed GJT were shown in Table 5.

Table 5: Scores of the Two Participant Groups in the Untimed GJT

Groups	N	Maximum	Minimum	Mean	Sum (360)	Std. Deviation
Advanced	30	12	10	11.40	342	.563
Intermediate	30	12	7	9.57	287	1.406

According to Table 5, the mean of the advanced group ( $m=11.40$ ) was higher than that of the intermediate group ( $m=9.57$ ). An independent t test was conducted to compare the difference between the two learner groups and the results were significant at  $p<.001$ , as shown in Table 6.

Table 6: Independent Samples T-Test of the Untimed GJT

t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
					Lower	Upper
6.628	38.068	.000	1.833	.277	1.273	2.393

That is, the advanced group performed significantly better than the intermediate group in the untimed GJT, which showed that learners' English proficiency levels more or less influenced their perception of English articles.

Because this study investigated English article substitutions, it is worth analyzing results of English article substitutions from the Fill-in-the-Blank Test and the untimed GJT in the three nominal contexts by the two learner groups. The results of English article substitutions in all the three nominal contexts from the two tasks were shown

in Table 7<sup>5</sup>.

*Table 7* Inaccuracies of English Articles in the Three Nominal Contexts by the Two L1 Chinese Groups

Tasks	Groups	Contexts		
		<i>the</i> [+def, +spec]	<i>a</i> [-def, +spec]	<i>a</i> [-def, -spec]
Fill-in-the-Blank Test	Advanced	<i>a</i> : 4.17%	<i>the</i> : 0.83%	<i>the</i> : 1.67%
	Intermediate	<i>a</i> : 4.17%	<i>the</i> : 0.83%	<i>the</i> : 7.50%
Untimed GJT	Advanced	<i>a</i> : 1.67%	<i>the</i> : 9.16%	<i>the</i> : 4.17%
	Intermediate	<i>a</i> : 12.50%	<i>the</i> : 27.50%	<i>the</i> : 20.83%

As Table 7 presented, it could be seen that the learners made English article substitutions in all the three nominal contexts. For the Fill-in-the-Blank Test, the advanced learners made the highest errors in the [+def, +spec] context (4.17%), while the intermediate learners made the highest errors in the [-def, -spec] context (7.50%). For the untimed GJT, both the advanced learners and the intermediate learners made the highest errors in the [-def, +spec] context, i.e., 9.16% and 27.50%, respectively. The intermediate learners made a lot of errors in the [-def, -spec] context as well (20.83%). It could therefore be observed that errors on English article substitutions were all scattered because they could be found in all the three nominal contexts in both production and perception tasks. The nominal context types where the learners made errors were not consistent, which reflected the learners' confusion about the use of English articles. As far as the English proficiency levels are concerned, the data showed that the intermediate learner group seemed to make more errors in both tasks,

<sup>5</sup> It was found that in the Fill-in-the-Blank Test, some participants filled demonstratives like 'this' and 'that' and/or quantifiers such as 'some' and 'few' in some items. These answers were excluded from the data. In addition, some participants left some blanks empty. These answers were also excluded from the data analyses.

especially in the untimed GJT. In the untimed GJT, for example, the intermediate group did very badly in the [-def, +spec] (27.50%) and the [-def, -spec] contexts (20.83%).

#### 4.1.2 Results of the Interview

There were eight participants who were selected through stratified sampling from the two groups to participate in the interview. Four of them were from the advanced level group, while the other four participants were from the intermediate level group. Because the participants were allowed to use Chinese to answer questions, their answers were translated by the researcher sentence by sentence. Some participants offered similar answers for some questions, and their answers were summarized below.

Question 1: *What do you think about learning English articles?*

Among the eight participants, six of them believed that learning English articles was important. Two participants from the intermediate group, on the contrary, thought that it was not necessary to learn English articles, especially in oral English. A participant from the advanced group added that learning English articles was challenging for non-native speakers, especially beginners.

Question 2: *Do you think English articles are difficult to learn?*

Among the eight participants, almost all the participants shared that English articles were difficult to learn when they just began to learn English and that it was not easy to master them well. Only one participant was confident in learning English, saying that it was easy to learn English articles.

Question 3: *How did your teachers teach English articles?*

For the third question, all the eight participants said that their teachers did not spend much time on teaching English articles in class. Their English teachers only taught them the classification of English articles and gave them some examples, but the examples were not many.

Question 4: *How did you learn English articles?*

Due to the teaching methods mentioned in question 3, seven of the participants said that they tried to learn English articles on their own by reading grammar books and doing a lot exercises after class. One participant said that when he did exercises about English articles, he translated the sentences first and then chose English articles

with the help of Chinese translations.

Question 5: *Do you have any problems learning English articles?*

When the participants were asked if they had any problems learning English articles, six of them said that it was hard for them to distinguish English articles. Sometimes the articles they chose were different from the answers and that sometimes they did not know which article should be used. Two participants answered that at times when they did not know if they should add an article before a noun, they would use the definite article ‘the’ as the default article.

Question 6: *What do you think about the two tasks?*

For the sixth question, the participants from the advanced group thought the test items in the first two tasks were basic. Three participants from the intermediate group, however, thought that the test items in the first two tasks were quite difficult to answer.

Question 7: *Are you confident about your answers?*

For the last question, most of the participants in the interview said that they were confident about their answers (even though the results above showed that most of the participants did not perform well in the first two tasks).

#### **4.2 Discussions on the Research Hypotheses**

As mentioned in 1.4, Hypothesis 1 of the study was that L1 Chinese learners had problems of English article substitutions. Hypothesis 2 of the study was that both non-existence of articles and complexity of the English article system caused English article substitutions by L1 Chinese learners.

The scores of the Fill-in-the Blank Test and the untimed GJT showed that although the advanced learners performed significantly better than the intermediate learners, both learner groups had problems of using English articles. English article substitutions made by the articles could be found in all the three nominal contexts, as shown in Table 7. The interview data from the fifth question *Do you have any problems learning English articles?* in the interview also showed the participants’ confusion. For example, a participant said, “Well... Actually, although there are only *a*, *an*, and *the* in the English article system, it is really hard to find the right one most of the time.”

Based on Error Analysis (Corder, 1974; Dulay et al., 1982; Ellis, 1994), there



were possible causes of both interlingual and intralingual errors.

For interlingual errors, expressions of definiteness in English were different from those in Chinese. English is an inflectional language, while Chinese is an isolating language. Definiteness is expressed in English through the article system, while definiteness in Chinese is expressed through word order and context. Definiteness in English is grammatical whereas that in Chinese is conceptual (See 2.2). As articles are non-existent in Chinese, it could possibly be problematic for the Chinese learners to acquire the English article system. The results from the Fill-in-the-Blank Test and the untimed GJT showed that the learners had difficulties with both production and perception of English articles, respectively.

Apart from the interlingual causes, an intralingual cause, i.e., complexity of the English article system, was another factor. In English, there were both definite and indefinite articles. With Chinese being an articleless language, it is probably difficult for the learners to decide on the definite article and the indefinite article. In the second interview question *Do you think English articles are difficult to learn?*, only one of the eight participants thought English articles were easy to learn. She said that, “Learning English articles is much easier than learning other grammatical features such as the subjunctive mood, because English articles are limited to only *a*, *an*, and *the*, and we only need to know the classification of English articles.” However, this participant’s performance on the Fill-in-the-Blank Test was not satisfactory, even though she was confident in her answers. In the fifth question *Do you have any problems learning English articles?*, all the participants agreed that English articles was so confusing. A participant also added, “When I do not know which article should be chosen, I’m used to using *the* before nouns.” In the Fill-in-the-Blank Test and the untimed GJT, the learners substituted English articles most frequently in the test item with the [-def, +spec] context, \**“I saw the movie yesterday and its name is Romeo and Juliet.”* Thirty-five percent of the learners thought the definite article ‘the’ was used here correctly. In the [-def, -spec] context, about 17% of the learners considered the sentence “A triangle has three sides” incorrect. In the [+def, +spec] context, about 12% of the learners filled in the blank with the indefinite article ‘a’ in the sentence \**“She finished the tea and laid    cup aside.”*

Based on Error Analysis, the data from the interview showed that, besides the

interlingual factor of non-existence of English articles in Chinese and the intralingual factor of complexity of the English article system, the intralingual factor of false concepts hypothesized seemed to play a role. As mentioned in 2.1.3, false concepts hypothesized refers to the learner's misapprehension of grammatical rules as a result of teaching and learning materials and/or faulty teaching (Richards, 1975). When the participants were asked about how they learnt English articles and how their English teachers taught English articles in Question 3 and Question 4, all the participants said that their teachers did not mention English articles often in class and seven of them said that they relied on themselves to master English articles with the help of some grammar books and exercise books. When a participant tried to answer the third question, she answered, "To be honest, I can't even remember how my English teachers taught me English articles. I can only remember my English teacher of my junior high school mentioned the rules of English articles only once. I always make errors when using English articles, so the only thing I can do is to do some exercises after class to help myself do better." In order to have more data about English article teaching and learning in China to support this finding, the case of English article teaching and learning in Sichuan province was taken as an example<sup>6</sup>. In Sichuan province, most students started to learn English articles when they were in the first semester of their seventh grade. In the textbook *Go for it!*, the English structures they had to learn were distributed among 12 units. However, there was no any unit or part specifically designed for English articles.

The usage of English articles was found in some exercises through introductions of some English structures, rather than the focus on English articles. For example, consider Figure 1.




Figure 1: An Activity in the Students' Textbook (Liu et al., 2013: 7)

<sup>6</sup> The researcher is from Sichuan province in China.

Figure 1 shows an activity from Unit 2 on the wh-question “What’s this/that in English?” and the answer “It’s...”. It could be seen that there was no explanation of why the indefinite article ‘a’/ ‘an’ was used in the answer.

Consider another example in Figure 2.

**3a** Listen and color the things. 听录音，为下列物品涂色。



**3b** Listen again. Complete the sentences. 再听一遍录音并完成句子。

1. The key is yellow.

2. The ruler is \_\_\_\_\_.

3. The cup is \_\_\_\_\_.

Figure 2: Exercises in the Students’ Textbook (Liu et al., 2013: 11)

Figure 2 shows two exercises from Unit 3 on the wh-questions “What’s this/that in English?” and “What color is it?” and the answer “It’s...”. Similarly, it could be seen that there was no explanation of why the definite article ‘the’ was employed.

Although English article rules were mentioned at the end of the textbook, as shown in Figure 3, it could be doubted whether the students could understand and acquire English articles through reading the short part. In this part, English articles were classified into three categories: the definite article ‘the’, the indefinite articles ‘a/an’, and zero article. In each category, explanations were given through just one or two sentences and some examples.

#### ..... Grammar .....

### III. 冠词 (Articles)

冠词是置于名词之前，说明名词所表示的人或事物的一种虚词。冠词不能离开名词而单独存在。冠词包括定冠词、不定冠词和零冠词三类。

1. 定冠词 (the) : the 通常有明确的所指，即以说话人和听话人已知的人或事物为前提，可与单数可数名词、复数可数名词或不可数名词放在一起使用。例如：The white model plane is hers. Where are the keys? The milk is on the table. 定冠词 the 在辅音前读 /ðə/, 在元音前读 /ði/, 特别强调时，可读作 /ði:/。

2. 不定冠词 (a/an) : a/an 有不确定的意义，即所说的人或事物对听者或读者来说可能是不知道的，其中 an 放在以元音开头的名词前面，如 an apple. 不定冠词只能与单数可数名词结合，基本含义有“该类中的一例”、“只有一个”、“每一个”等。例如：Do you have a volleyball? It’s an orange. I take the medicine twice a day.

3. 零冠词：即不使用冠词。一般来说，在复数可数名词、不可数名词或专有名词前不使用冠词。例如：Hamburgers are not healthy. I like ice-cream. My friend is in China.

Figure 3: English Articles Mentioned in the Textbook (Liu et al., 2013: 87)

It could therefore be noticed that except the short part at the end of the textbook, there was no specific unit in the students' English textbooks which mainly provided detailed rules and exercises of English articles. Data from the interview also supported this. Some students in the interview said that their teachers did not explain much about English articles. Most of them learned English articles by themselves by reading some grammar books and doing some exercises.

To summarize so far, in accordance with Error Analysis, the Chinese learners did not do well in both production and perception of English articles probably because of language transfer and the complexity of the L2 with respect to English articles. So, the results confirmed the two hypotheses. Another intralingual factor, i.e., false concepts hypothesized, was also found to be a possible cause of the problems of English article substitutions in the study. The results were in line with some of the previous studies on the acquisition of English articles like Zhang (2007) and Zhou and Du (2015) on the effect of L1 transfer and L2 related factors, i.e., complexity of English articles as causes of Chinese speakers' errors in English articles. Another intralingual factor, i.e., false concepts hypothesized, which has not been found in the previous studies, was also found from the interview data and some English textbooks in China to be a possible cause of the problems of English article substitutions in the study.

## CHAPTER V

### CONCLUSIONS

This chapter summarizes the main findings in 5.1, followed by implications of the study in 5.2, and the limitations and the recommendations for future research in 5.3.

#### **5.1 Summary of the Findings**

The present study was designed to investigate L1 Chinese learners' problems of English article substitutions and find out causes of L1 Chinese learners' English article substitutions. Two research hypotheses were formulated:

1) Hypothesis 1: L1 Chinese learners have problems of English article substitutions, and

2) Hypothesis 2: Based on Error Analysis, both non-existence of articles and complexity of the English article system cause English article substitutions by L1 Chinese learners.

The participants of the study were 30 intermediate and 30 advanced L1 Chinese learners. Data were collected through a production task named Fill-in-the-Blank Test, a perception task named untimed GJT, and an interview.

Firstly, the results from the Fill-in-the-Blank Test and the untimed GJT showed that both the intermediate learners and the advanced learners had difficulties with production and perception of English articles. According to the data, although the advanced learners performed significantly better than the intermediate learners in both the Fill-in-the-Blank Test ( $p < .05$ ) and the untimed GJT ( $p < .001$ ), both groups made English article substitutions in all the three nominal contexts: the [+def, +spec], the [-def, +spec], and the [-def, -spec] contexts. Hypothesis 1 was thus confirmed.

Secondly, based on Error Analysis (Corder, 1974; Dulay et al., 1982; Ellis, 1994), both interlingual and intralingual factors were found in the study. For the interlingual factor, definiteness in English is different from that in Chinese because definiteness in English is grammatical whereas that in Chinese is conceptual. The non-existence of articles in Chinese might cause problems for Chinese learners to acquire the English articles. For the intralingual factor, the complexity of the English article system in relation to false concepts hypothesized possibly caused the L1

Chinese learners' English article substitutions. Hypothesis 2 was therefore confirmed.

## **5.2 Implications**

The following are two implications of the study, i.e., theoretical implications in 5.2.1 and pedagogical implications in 5.2.2.

### **5.2.1 Theoretical Implications**

Richards (1975) classified errors into two categories, i.e., interlingual and intralingual errors. In the present study, while interlingual errors were caused by L1 transfer, intralingual errors resulted from complexity of the English articles and false concepts hypothesized. In previous studies, most of the researchers focused on the interlingual factor, i.e., L1 transfer. Intralingual factors of complexity of English articles and false concept hypothesized were also found to be major factors in the present study. The findings confirmed the Error Analysis Theory and contributed to SLA on analyzing errors and diagnosing possible causes.

### **5.2.2 Pedagogical Implications**

Based on the findings of the present study, some implications on English article teaching in China can be put forward in the following.

Firstly, the present study demonstrated that it is difficult for L1 Chinese learners of English to choose English articles in different nominal contexts. Therefore, it is important for English teachers to understand the roles which both L1 and L2 play in students' English article acquisition. On the one hand, L1 transfer influences learners' competence and performance on English articles, so it is necessary for English teachers to show the differences between definiteness in English and Chinese to L1 Chinese learners. On the other hand, results from the three instruments demonstrated that complexity of the English article system and false concepts hypothesized play major roles in L1 Chinese learners' English article acquisition, so teachers should give emphasis on English articles used in different nominal contexts and have the students exposed to authentic usages.

Secondly, English articles need to be explained with contexts and examples. Besides, exercises based on authentic texts should also be given to students in the process of teaching and learning English articles. It is a very effective method to improve their understanding and knowledge of English articles.

Thirdly, there is no specific unit on English articles in the students' textbooks.

Therefore, it is suggested that textbook editors should add a part about English articles to a unit so as to help English teachers in teaching English articles.

### **5.3 Limitations and Recommendations for Future Research**

Some limitations of the study and recommendations for future research are as follows. Firstly, the present study focused on the L1 Chinese learners' group results. Future studies might add analysis of the individual results as well. Secondly, the present study focused on the substitutions of English articles by L1 Chinese learners. Future studies could expand to article omissions or both error types. Thirdly, the intralingual factor of false concepts hypothesized was found in the study. This factor was not informed in previous studies. Future studies might investigate more about this factor on whether teaching affect learners' English article acquisition. Fourthly, results from the first research question showed that although most of the participants believed that learning English articles is important, there are still participants who thought learning English is unnecessary. Future studies could bridge this gap by analyzing whether L2 English learners' attitudes toward English articles influence their competence and performance of English articles.

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**APPENDICES**

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**CHULALONGKORN UNIVERSITY**

## Appendix A: TEM4

### 1. Tasks and Scores

Task	Input	Format	Score (%)
Dictation	1 passage, listen 4 times	Word-for-word dictation	10%
Listening Comprehension	1 talk, listen once	Gap-filling task	20%
	2 conversations, listen once	Multiple choice questions	
Grammar and Vocabulary	20 sentences	Multiple choice questions	20%
Cloze	1 short passage	Multiple choice questions	10%
Reading Comprehension	3 passages	Multiple choice and short answer questions	20%
Writing	1 excerpt	A text of 200 words	20%

### 2. Score Ranges and Proficiency Levels

Score Range	Level of Performance	Proficiency Level
80-100	Excellent	Advanced
70-79	Good	Upper Intermediate
60-69	Pass	Intermediate

### Appendix B: Fill-in-the-Blank Test

Instructions: Fill in each blank with an appropriate word or leave the blank empty if you consider the sentence is correct. Once you finish a test item, please do not change your answers.

- (1) Did you encounter anyone in \_\_\_ building?
- (2) The library \_\_\_ built last month.
- (3) The sun sets \_\_\_ the west.
- (4) I am hungry now because I only ate \_\_\_ banana this morning.
- (5) They used to \_\_\_ to movies every evening.
- (6) She \_\_\_ up at ten o'clock every day, but she will get up earlier from now on.
- (7) Have you ever worked as \_\_\_ volunteer?
- (8) \_\_\_ English is important is an undoubted fact.
- (9) She finished the tea and laid \_\_\_ cup aside.
- (10) I have not decided \_\_\_ I should vote for.
- (11) All joiners will receive \_\_\_ pack.
- (12) Joe was guilty \_\_\_ theft.
- (13) It is obvious \_\_\_ he needs more time to think.
- (14) I want to buy \_\_\_ computer, so could you give me some advice?
- (15) I have no idea \_\_\_ has happened to him.
- (16) I know a friend \_\_\_ sister is a singer.
- (17) I couldn't sleep because \_\_\_ bed was too uncomfortable.
- (18) The doorbell rang while I was \_\_\_ a bath.
- (19) Linda ate nothing in the morning, \_\_\_ she?
- (20) I bought \_\_\_ chicken, so we can have it for dinner.
- (21) He is waiting \_\_\_ me at my home.
- (22) When was \_\_\_ bridge constructed?
- (23) No sooner had I arrived home \_\_\_ it began to rain.
- (24) Scarcely had it grown dark \_\_\_ she realized it was too late to go home.
- (25) Dating seemed to be out of the question for him, but he now has \_\_\_ girlfriend.
- (26) It was \_\_\_ he was so young that he couldn't do it.
- (27) It was a convention that the deputy leader was always \_\_\_ woman.
- (28) Have you ever \_\_\_ a French course?

(29) It is wise \_\_\_ Emma to make up her mind to play an instrument.

(30) There are many scratches on the doors because the previous apartment owner had \_\_\_ dog.



### Appendix C: Untimed Grammaticality Judgment Task

Instructions: Judge if the underlined words are used correctly or not. Fill in each blank with “√” or “×” based on your judgment.

- (1) We have lots of equipments. \_\_\_\_\_
- (2) Move up, John, and let a lady sit down. \_\_\_\_\_
- (3) None of us has a gift. \_\_\_\_\_
- (4) He works harder than any other students in his class. \_\_\_\_\_
- (5) The clock is about two minutes slow. \_\_\_\_\_
- (6) I find he is bored to listen to. \_\_\_\_\_
- (7) I saw the movie yesterday and its name is Romeo and Juliet. \_\_\_\_\_
- (8) Chicago is the third highest publishing centre in the United States. \_\_\_\_\_
- (9) A triangle has three sides. \_\_\_\_\_
- (10) Who will chair the meeting have not yet been decided. \_\_\_\_\_
- (11) The man whose picture is in the newspaper is famous. \_\_\_\_\_
- (12) Although students are required to wear uniforms in school, Lucy is still wearing the overcoat today. \_\_\_\_\_
- (13) The church in that we were married was built on 1994. \_\_\_\_\_
- (14) After graduating from the university, he found a job. \_\_\_\_\_
- (15) Where is a key? \_\_\_\_\_
- (16) One of the places where I want to visit is Tibet. \_\_\_\_\_
- (17) My canary has laid the egg and so do you want to have a look? \_\_\_\_\_
- (18) Child as he is, he is knowledgeable. \_\_\_\_\_
- (19) I must return some books to the library. \_\_\_\_\_
- (20) Her cake is three times big than mine. \_\_\_\_\_
- (21) If I had stayed at home, I would have met him. \_\_\_\_\_
- (22) I heard Lisa had an accident. \_\_\_\_\_
- (23) If I am you, I wouldn't do that. \_\_\_\_\_
- (24) In English law, a person is presumed innocent until he or she is proved guilty. \_\_\_\_\_
- (25) I have gone to Beijing many times. \_\_\_\_\_
- (26) I took some cash and give it to the girls. \_\_\_\_\_
- (27) The village where I was born has grown into a town. \_\_\_\_\_

- (28) She might refuse your invitation. \_\_\_\_\_
- (29) My friend insisted on buying this car. \_\_\_\_\_
- (30) The boy must learn to fight like a man and this is generally accepted. \_\_\_\_\_





### Appendix D: Details of the IOC Results

#### Task 1: Fill-in-the-Blank Test

Test items	+1	0	-1	IOC Score
1. Did you encounter anyone in <u>(the)</u> building?	3			1.00
2. I am hungry now because I only ate <u>(a)</u> banana this morning.	3			1.00
3. Have you ever worked as <u>(a)</u> volunteer?	3			1.00
4. She finished the tea and laid <u>(the)</u> cup aside.	3			1.00
5. All joiners will receive <u>(a)</u> pack.	3			1.00
6. I want to buy <u>(a)</u> computer so could you give me some advice?	3			1.00
7. I couldn't sleep because <u>(the)</u> bed was too uncomfortable.	3			1.00
8. I bought <u>(a)</u> chicken so we can have it for dinner.	2	1		0.67
9. When was <u>(the)</u> bridge constructed?	3			1.00
10. Dating seemed to be out of the question for him, but he now has <u>(a)</u> girlfriend.	3			1.00
11. It was a convention that the deputy leader was always <u>(a)</u> woman.	3			1.00
12. There are many scratches on the doors because the previous apartment owner had <u>(a)</u> dog.	3			1.00
Mean Score				0.973

**Task 2: Untimed Grammaticality Judgment Task**

Test items	+1	0	-1	IOC Score
1. Move up, John, and let <u>a</u> lady sit down. (×)	3			1.00
2. <u>The</u> clock is about two minutes slow. (√)	3			1.00
3. I saw <u>the</u> movie yesterday and its name is Romeo and Juliet. (×)	3			1.00
4. Although students are required to wear uniforms in school, Lucy still wears <u>the</u> overcoat today. (×)	2	1		0.67
5. <u>A</u> triangle has three sides. (√)	2	1		0.67
6. Where is <u>a</u> key? (×)	3			1.00
7. My canary has laid <u>the</u> egg and so do you want to have a look? (×)	3			1.00
8. I must return some books to <u>the</u> library. (√)	3			1.00
9. I heard Lisa had <u>an</u> accident. (√)	3			1.00
10. In English law, <u>a</u> person is presumed innocent until he or she is proved guilty. (√)	3			1.00
11. The village where I was born has grown into <u>a</u> town. (√)	3			1.00
12. <u>The</u> boy must learn to fight like a man and this is generally accepted. (×)	3			1.00
Mean Score				0.945

**Task 3: Interview**

Test items	+1	0	-1	IOC Score
1. What do you think about learning English articles?	2	1		0.67
2. Do you think English articles are difficult to learn?	3			1.00
3. How did your teachers teach English articles?	3			1.00
4. How did you learn English articles?	3			1.00
5. Do you have any problems learning English articles?	3			1.00
6. What do you think about the two tasks?	2	1		0.67
7. Are you confident about your answers?	3			1.00
Mean Score				0.906

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