USING HMONG IN PRE-PRIMARY EDUCATION IN THAILAND: AN EVALUATION OF ORTHOGRAPHY ACCEPTANCE, TEACHER TRAINING AND REPORTED OUTCOMES IN A PILOT PROJECT

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Presented in Partial Fulfillment of the Requirements for the Degree of
MASTER OF ARTS
IN
LINGUISTICS

Payap University
February 2012
Title: Using Hmong in Pre-Primary Education in Thailand: An Evaluation of Orthography Acceptance, Teacher Training and Reported Outcomes in a Pilot Project

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ACKNOWLEDGEMENTS

I would like to express my gratitude to FAL for allowing me to go with Katherine Dooley to go to the schools to collect data for this study. I am also grateful to the principals, teachers and teaching assistants of the four schools and Katherine who have been patient in answering my questions with regards to the pilot project.

I am thankful to Nampeung Kongton who helped me to translate many of the documents and Michelle Miller who proof-read my writing. I would like to thank my advisor Dr Kimmo Kosonen for his advice and guidance. He has been a great help and encouragement throughout the process of writing this thesis.

Tan Hoong Yen
February 2012
ABSTRACT

This study examines the use of Hmong language in a pre-primary education pilot project in four schools in rural Thailand in which the children were mother tongue Hmong speakers. The Hmong orthography used to teach Hmong literacy skills in this pilot project was a newly-revised version of a Thai-based orthography that no one else in the community knew. The teaching assistants who taught in the pilot project were taught to read and write the revised Thai-based orthography when they join this project. This study will attempt to determine: 1) What are the implications of the decision to use a Thai-based orthography for the pilot project? 2) How do the teaching assistants view the newly revised Thai-based orthography? and 3) How long does it take the teaching assistants to learn the orthography so that they can use it fluently?

This study also examines the learning and teacher training aspects of the pilot project. It attempts to answer the following questions: 1) How do the teachers and teaching assistants view their own teaching and the teacher training? 2) How do the school principals view the pilot project in general, and the challenges in particular? 3) What are the outcomes of the pilot project after two years of implementation? and 4) How does this pilot project fare when compared with the characteristics of strong and sustainable MLE programmes?
As the pilot project is just into the beginning of its third year of implementation (Grade 1), this study focuses on the pre-primary level (Kindergarten 1 and 2) of the project.

The data for this study was collected through the use of interviews and questionnaires. The teaching assistants were asked about their opinion of the orthography they had to use in the programme, their own teaching and the children’s learning. Questionnaires were given to the Thai teachers (Kindergarten 1 and 2 and Grade 1) and principals of the four schools. The Thai teachers were asked their opinion of the teaching of the teaching assistants, their own teaching and the children’s learning. The principals were asked their opinion of the teaching of the teaching assistants and Thai teachers, the children’s learning and the programme in general. Informal discussions and observations of classrooms, meetings, teacher training and workshops were also conducted during this study.
ชื่อเรื่อง: การใช้ภาษาม้งในระดับก่อนประถมศึกษาในประเทศไทย: การประเมินการยอมรับระบบการสะกดคำ, การอบรมครู และผลการรายงานในโครงการนาร่อง
ผู้วิจัย: นาง วงษ์ เย็นทัน
ปริญญา: ศิลปศาสตรมหาบัณฑิต สาขาวิชาภาษาศาสตร์
อาจารย์ที่ปรึกษาวิทยานิพนธ์หลัก: ดร. คิมโม โคโซเน็น
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สถาบันการศึกษา: มหาวิทยาลัยพายัพ จังหวัดเชียงใหม่ ประเทศไทย
จำนวนหน้า: 74
คำสำคัญ: ระบบการสะกดคำ, การอบรมครู, การสอน, ม้ง, ภาษาแม่, การศึกษาแบบพหุภาษา

บทคัดย่อ

วิทยานิพนธ์ฉบับนี้เป็นการวิเคราะห์การใช้ภาษาม้งในโครงการนาร่องด้านการศึกษาในระดับก่อนประถมศึกษาในโรงเรียนสี่แห่งในชนบทของไทย ซึ่งมีนักเรียนที่ใช้ภาษาม้งเป็นภาษาแม่ ระบบการสะกดคำภาษาม้งที่ใช้สอนทักษะการอ่านเขียนภาษาม้งในโครงการนาร่องนี้เป็นระบบการสะกดคำภาษาไทยที่เพิ่งได้รับการปรับปรุงใหม่ และไม่มีใครในชุมชนรู้จักมาก่อน โดยครูท้องถิ่นที่เข้าร่วมในโครงการนาร่องจะได้รับการอบรมการอ่านและเขียนในระบบการสะกดคำแบบไทยที่ได้รับการปรับปรุงใหม่นี้ วิทยานิพนธ์ฉบับนี้มุ่งเน้นในการประเมินว่า 1) เพราะอะไรจึงมีการตัดสินใจใช้ระบบการสะกดคำแบบไทยในโครงการนาร่องนี้ 2) ผู้ช่วยครูมีความคิดเห็นอย่างไรต่อระบบการสะกดคำแบบไทยที่ได้รับการปรับปรุงใหม่นี้ และ 3) ผู้ช่วยครูใช้เวลาจากคนใดในการเรียนรู้ระบบการสะกดคำตามระยะยี่ได้ค่อยๆ

นอกจากนี้ยังมีการวิเคราะห์การเรียนรู้และการอบรมครูของโครงการนาร่อง เพื่อตอบคำถามต่อไปนี้ 1) ครูและผู้ช่วยครูมีความคิดเห็นอย่างไรเกี่ยวกับการสอนของตนเองและการอบรมครู 2) ครูใหญ่มีความคิดเห็นว่าไปอย่างไรกับโครงการนาร่อง โดยเฉพาะต่ออุปสรรคต่างๆ 3) ภายหลังจาก 2 ปีของการดำเนินงาน โครงการนาร่องเกิดผลอย่างไร และ 4) โครงการนาร่องนี้ส่งผลอย่างไรในทางนโยบายปรับเปลี่ยนกับลักษณะและความยั่งยืนของโครงการจัดการศึกษาแบบพหุภาษา
เนื่องจากโครงการน่าจะต้องการเป็นระยะเวลาดังกล่าวของโครงการ 3 ปี (ป. 1) วิทยานิพนธ์ฉบับนี้จึงเน้นไปที่ระดับอนุบาลประถมศึกษา (อนุบาล 1 และ 2)

ข้อมูลในวิทยานิพนธ์ฉบับนี้รวบรวมมาจากจากการสัมภาษณ์และการตอบแบบสอบถาม โดยครูผู้ช่วยได้แสดงความคิดเห็นเกี่ยวกับระบบการสะกดคำที่ใช้ในโครงการ การสอนของตนเอง และการเรียนรู้ของเด็ก ส่วนครูไทย (อนุบาล 1 และ 2 และ ป. 1) รวมถึงครูใหญ่ของทั้งสี่โรงเรียนได้แสดงความคิดเห็นเกี่ยวกับการสอนของครูผู้ช่วย การสอนของตนเอง และการเรียนรู้ของเด็ก ส่วนครูใหญ่ได้แสดงความคิดเห็นเกี่ยวกับการสอนของครูผู้ช่วย และครูไทย การเรียนรู้ของเด็ก และโครงการโดยรวม นอกจากนี้ยังมีข้อมูลที่ได้จากการอภิปรายอย่างไม่เป็นทางการและการสังเกตการณ์ในชั้นเรียน การประชุม และการอบรมครูต่างๆ อีกด้วย
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<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>A.</td>
<td>Amphoe (It means ‘District’ in English)</td>
</tr>
<tr>
<td>BICS</td>
<td>Basic Interpersonal Communicative Skills</td>
</tr>
<tr>
<td>CALP</td>
<td>Cognitive Academic Language Proficiency</td>
</tr>
<tr>
<td>CR</td>
<td>Chiangrai</td>
</tr>
<tr>
<td>ECCE</td>
<td>Early Childhood Care and Education</td>
</tr>
<tr>
<td>FAL</td>
<td>Foundation for Applied Linguistics</td>
</tr>
<tr>
<td>KG (1 or 2)</td>
<td>Kindergarten (1 or 2)</td>
</tr>
<tr>
<td>L1</td>
<td>First language</td>
</tr>
<tr>
<td>L2</td>
<td>Second language</td>
</tr>
<tr>
<td>MOE</td>
<td>Ministry of Education</td>
</tr>
<tr>
<td>MT</td>
<td>Mother tongue</td>
</tr>
<tr>
<td>MTBMLE</td>
<td>Mother tongue-based Multilingual Education</td>
</tr>
<tr>
<td>MLE</td>
<td>Multilingual Education</td>
</tr>
<tr>
<td>OBEC</td>
<td>Office of the Basic Education Commission</td>
</tr>
<tr>
<td>RES</td>
<td>Regional Education Service</td>
</tr>
<tr>
<td>RPA</td>
<td>Romanized Popular Alphabet</td>
</tr>
<tr>
<td>TA</td>
<td>Teaching Assistant</td>
</tr>
<tr>
<td>T.</td>
<td>Tambol (It means ‘Sub-district’ in English)</td>
</tr>
<tr>
<td>TPR</td>
<td>Total Physical Response</td>
</tr>
<tr>
<td><strong>GLOSSARY</strong></td>
<td></td>
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<tr>
<td>----------------</td>
<td></td>
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<tr>
<td><strong>Alphabet</strong></td>
<td>a writing system characterized by a “systematic mapping relation between its signs (graphemes) and the minimal units of speech (phonemes)” (Coulmas 1999: 9)</td>
</tr>
<tr>
<td><strong>Orthography</strong></td>
<td>a prescribed system of spelling and punctuation of a specific language</td>
</tr>
<tr>
<td><strong>Script</strong></td>
<td>the graphic form of the units of a writing system developed in the context of a language in which it is to be used</td>
</tr>
<tr>
<td><strong>Writing system</strong></td>
<td>the basic graphic systems of representing a language, like logographic and logosyllabic systems, or the spelling of a language. In the second sense, writing system can be used interchangeably with orthography.</td>
</tr>
<tr>
<td><strong>Mother tongue</strong></td>
<td>a language that a speaker (a) has learnt first, (b) identifies with or is identified by others, (c) knows best, (d) uses most, or (e) speaks and understands competently enough to use it for acquisition of academic content at the appropriate age level</td>
</tr>
<tr>
<td><strong>Multilingual education</strong></td>
<td>the “use in education of at least three languages: the mother tongue, a regional or national language and an international language” (García 2009: 9)</td>
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</tbody>
</table>
Chapter 1
Introduction

This thesis begins with an introduction of the Hmong people, the Foundation for Applied Linguistics (FAL) and the education system in Thailand in chapter 1. The methodology for data collection and analysis is discussed in chapter 2. Chapter 3 discusses Hmong orthography issues and how the teaching assistants view the revised Thai-based Hmong orthography used in the pilot project. Chapter 4 looks at the teaching and teacher training aspects of the pilot project. The views of the principals with regards to the pilot project are also discussed in this chapter. Chapter 5 looks at the benefits and components of a sustainable MTBMLE programme. The reported outcomes of the implementation of the pilot project in its pre-primary education phase are also included in this chapter. Chapter 6 brings together the conclusions of the previous chapters and concludes with some recommendations and suggestions for further studies for the pilot project.

1.1 The Hmong
The Hmong are an ethnolinguistic group living in the mountainous regions of Vietnam, Laos, Thailand and Myanmar. They are said to have originated in China. They maintained their language and unique cultural heritage over the centuries.

1.1.1 Background
The early history of the Hmong people is not easy to determine as they do not have a written record of it. However, it can be reconstructed from oral texts and Chinese accounts of disputes with the Hmong and their ancestors (Yang 1992). According to Hmong historians who participated in a Hmong conference in Beijing in 1988, the ancestors of the Hmong once lived in a kingdom called “Country of the Yellow River”, a fertile area located between the Huang He River and the Tang Tse Kiang River (Yang 1992: 259). The Hmong began migrating south into northern Vietnam during the 18th century. They continued their move in a southeast direction into Laos in the 19th century and on into Thailand and Myanmar during World War II. The movement of the Hmong in the 19th and 20th centuries is depicted in Figure 1.
Hmong communities can be found in China, Vietnam, Laos, Thailand and Myanmar. After the Vietnam War, many Hmong were resettled to the United States, Australia and France (Goddard 2005). According to Smalley (1990) there are up to six million Hmong people living in south China, northern Vietnam, northern Laos, north and northeast Thailand. An estimated 80,000 Hmong are in Thailand, 300,000 in Laos and an equal number in North Vietnam (Smalley 1994). There are approximately 85,000 Hmong in the United States, 7000 in France, 650 in Canada and 350 in Australia (Smalley 1990).

The Hmong are considered to be part of the Miao ethnic group in the People's Republic of China. The Chinese refer to the Hmong as "Miao" and the People's Republic of China has classified them as one of its 56 official nationalities. The term “nationality” is used in China to identify the “diverse ethnic and sociolinguistic groups” within the country (Tsung 2009: 1). Miao communities do not refer to themselves as “Miao”, but as "Hmong/Mong, Hmu, A Hmao and Kho (Qho) Xiong" (ibid: 29). Figure 2 depicts the locations of the Miao in Asia.

Figure 1  Hmong Emigrations during the 19th and 20th Centuries (Mottin 1980)
The Hmong in Vietnam, Laos and Thailand are usually called “Meo” by the local population, but to the Hmong this is not a polite term because it denotes them as being a primitive group of people (Smalley 1990). In Thailand, the Hmong are often looked down upon and referred to as “poor aliens, temporary residents and savages” (Smalley 1994: 253).

1.1.2 Language
Hmong belongs to the Hmong-Mien language family. The other Miao languages are not mutually intelligible with Hmong though there are some mutually intelligible Hmong dialects within the Miao group. The distribution of the language family according to Lewis (2009) is shown in Figure 3.
The two main language varieties of Hmong are Hmong Daw (White Hmong) and Hmong Njua (Green Hmong or Blue Hmong). They are mutually intelligible and very similar in their phonology and grammar (Smalley 1994, Meister 2010). Most of the words in the two language varieties have the same historical source, and any differences are usually matters of pronunciation (Smalley 1994).

Hmong Daw (White Hmong) is the language variety that is referred to in this study.

1.1.2.1 Phonology
A chart of phonemes according to Smalley (1976: 89) is presented in Table 2. The phonemes in parentheses occur in Hmong Daw only and [(ŋ)] has marginal occurrences in Hmong Daw. Those in double parentheses occur in Hmong Njua only.

Figure 3 The Hmong-Mien Language Family
(plotted by the author based on information from Lewis 2009)
Table 1 Hmong consonant chart (Smalley 1976)

<table>
<thead>
<tr>
<th></th>
<th>Labial-central release</th>
<th>Labial-lateral release</th>
<th>Dental-central release</th>
<th>Dental-lateral release</th>
<th>Dental-affricated release</th>
<th>Retroflexed</th>
<th>Palatal</th>
<th>Palatal-affricated release</th>
<th>Velar</th>
<th>Back velar</th>
<th>Glotal</th>
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<tr>
<td>p</td>
<td>p</td>
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<td>np</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

In the following chart, HN refers to Hmong Njua and HD refers to Hmong Daw.

Table 2 Hmong vowel chart (Smalley 1976)

<table>
<thead>
<tr>
<th>i</th>
<th>ü</th>
<th>u</th>
</tr>
</thead>
<tbody>
<tr>
<td>e</td>
<td>o</td>
<td></td>
</tr>
<tr>
<td>HN /ä/=HD /ã/</td>
<td>HN /ã/=HD /a/</td>
<td>õ</td>
</tr>
<tr>
<td>ai</td>
<td>aë</td>
<td>au</td>
</tr>
<tr>
<td>(uí)</td>
<td></td>
<td>(3)</td>
</tr>
</tbody>
</table>

Both /uí/ and /5/ follow /h/ only and occur in words which are final particles. Phonemes /ë/, /ã/ and /a/ in Hmong Njua are /ã/, /a/ and /ãa/ in Hmong Daw respectively.
Table 3  Hmong tone chart (Smalley 1976)

<table>
<thead>
<tr>
<th>Tone</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>˥</td>
</tr>
<tr>
<td>2</td>
<td>˦</td>
</tr>
<tr>
<td>3</td>
<td>˧</td>
</tr>
<tr>
<td>4</td>
<td>˨</td>
</tr>
<tr>
<td>5</td>
<td>˩</td>
</tr>
<tr>
<td>6</td>
<td>˨˩</td>
</tr>
<tr>
<td>7</td>
<td>˩˩ʔ</td>
</tr>
</tbody>
</table>

Typical Hmong syllable structure consists of an onset and peak. The onset can be null, simple or complex. The peak consists of a syllabic, which can be simple or complex, and tone (Smalley 1976: 103). Words in Hmong are mostly monosyllabic (with each syllable having its own tone) and monomorphic (with no affixation) (Fuller 1988: 24).

1.1.3 Writing system
According to Chinese historians, the Hmong had a writing system during the Qin Dynasty (221BC - 206BC) but they lost it over time (Tapp 1991). In Hmong legends, Hmong fugitives, when pursued by Han Chinese troops, threw their books into the Yellow River, keeping only their weapons to fight and defend themselves. They were forbidden to use their writing system and thus used embroidery and batik to write the Hmong characters into the designs of their cloth. Over time, the writing system became “completely incomprehensible and disappeared from human memories, leaving only the flower cloth as its legacy” (Yang 1992: 263).

Over the past century, there were at least fourteen major attempts to develop writing systems for the Hmong language. Each of the systems has been available to various sectors of the Hmong population that are scattered over China, Vietnam, Laos and Thailand. Some of these writing systems did not spread beyond local use but some became more widely used. According to Smalley (1990: 149), there are six writing systems still in use, namely the Romanized, the Pahawh Hmong, the Chinese Romanized, the Whitelock-Lao based system, a variety of the Whitelock Thai-based system and the Sayaboury system. A complete list of the writing systems for Hmong can be found in Appendix A.

1.1.4 Culture
The Hmong are a group-oriented people. They seek the interest of the group before the interest of the individual. Each Hmong is born into a family which in turn belongs to a clan. Lineage is traced through the father’s clan, and individuals were traditionally not allowed to marry someone from the same clan (Smalley 1990). Clan membership is obtained by birth, by marriage for women or by adoption. The people within a clan are obligated to help each other.

The family is the basic social unit in traditional Hmong society. It serves as the unit of production, consumption, socialization, social control and mutual assistance (CAL 2010). The family is under the authority of the male head of the household, who is the oldest male in the family or the oldest adult married son.
The Hmong New Year celebration, which is held during the end of the 12th lunar calendar month and the beginning of the first lunar calendar month, is the major Hmong community event of the year. During the first three days of the Hmong New Year, participants serve their favourite foods, dress in their best clothes and refrain from speaking critically of others. They also take a break from work and business, and animals also are given a break from labour (CAL 2010).

1.2 The Hmong pilot project by the Foundation for Applied Linguistics

1.2.1 The Foundation for Applied Linguistics (FAL)

The Foundation for Applied Linguistics (FAL) is a non-profit Thai linguistics foundation that supports the educational development of disadvantaged children from ethnolinguistic minority groups in Thailand. FAL promotes the use of local ethnic languages in education in order to build a strong educational foundation for further study in the Thai national language. FAL works with two types of education projects: Mother tongue-based multilingual education (MTBMLE) and early childhood care and education (ECCE) centres (FAL 2010).

The MTBMLE projects led by FAL are planned and implemented in partnership with government schools under the Thailand Ministry of Education (MOE) in ethnolinguistic minority communities in which the local ethnic language is the mother tongue of the students. In these projects Thai teachers work alongside teaching assistants (TAs) who are recruited from the local ethnic community and are mother tongue speakers of the local language. The primary rationale for the use of TAs is that doing so will strengthen learning and achievement by using the children's mother tongue, together with Standard Thai in the classroom. FAL is involved with MTBMLE projects in the Mon community in Kanchanaburi province, with the Northern Pwo Karen community in Chiangmai province and the Hmong Daw community in Chiangrai province (FAL 2010).

The ECCE centres are developed in partnership with village communities where there is no education programme available locally for young children. Community members are trained to develop children's cognitive, language and learning skills using their mother tongue, to help prepare them for a smooth transition to formal schooling. ECCE centres have been set up with the help of FAL in Lahu and Akha villages in Chiangrai province and Northern Pwo Karen villages in Chiangmai province (FAL 2010).

FAL works closely with other partners including the Thailand Ministry of Education, local government administration offices, Wycliffe Thai Foundation, Children on the Edge, Bernard van Leer Foundation, Pestalozzi Children’s Foundation and SIL International (FAL 2010).

1.2.2 The Hmong MTBMLE pilot project

The background information about the schools involved in the pilot project that is presented in this thesis is based on a report of a school survey done by the director of FAL in Chiangrai (CR) province on 28-29 November 2008 (Tienmee 2008).

In November 2008, a supervisor from Chiangrai Regional Education Service (RES) Region 4 attended a workshop conducted by FAL on teaching Thai as a second language using a Total Physical Response (TPR) approach. This workshop was conducted for
teachers who teach in schools in which the students are from ethnolinguistic minority
groups and do not understand and speak Thai. After the workshop, this supervisor
indicated interest in implementing MTBMLE in schools under the responsibility RES CR
Region 4. In order to follow-up on this interest, an officer from Office of the Basic
Education Commission (OBEC) and the director of FAL decided to visit several schools
in RES Region 4 to see the context and explore the possibility of supporting them in
starting an MTBMLE programme. They also wanted to find out if the CR RES Region 4
was willing and ready to start a pilot project in the schools under its responsibility.

A two-day visit to the schools was arranged and organized by the Chiangrai RES Region
4 office for the FAL Director and OBEC officials. On the first day they visited schools in
Region 4, and on the second day the FAL Director made a presentation at the RES office
about an MTBMLE model suitable for the Region 4 context. Five schools under the
responsibility of RES CR Region 4 were visited during that time but only four schools
were found to be suitable for implementation of an MTBMLE pilot project. These four
schools were deemed suitable because the students were all Hmong Daw and the
schools were located within Hmong communities. These four schools committed
themselves to begin implementing the pilot project in the academic year beginning May
2009. This project would be registered as a pilot project in the north under OBEC’s
responsibility. The schools agreed to be responsible for mobilising the people in the
community to contribute local resources for use in this pilot project and to work with
the local communities to select teaching assistants that could be trained to teach in
schools where there were no ethnic Hmong teachers. It was planned that the RES CR
Region 4 would start and own the programme with technical help from FAL (in
cooperation with SIL International) with the goal that eventually the RES would do all
the training for maintaining the programme.

FAL and RES developed a plan for the pilot project in which Hmong would be used as the
language of instruction in the classrooms for Kindergarten 1 (KG1) to Grade 3. The use
of Hmong as the language of instruction would decrease gradually over the grade levels
and the use of Thai as the language of instruction would increase. The progression plan
for using Hmong and Thai as the language of instruction and the teaching of Hmong,
Thai and English as a subject for the different grade levels is shown in Table 4.
### Table 4 Use of Hmong and Thai at different grade levels of the pilot project (Dooley 2010)

<table>
<thead>
<tr>
<th>Language of instruction</th>
<th>KG 1</th>
<th>KG 2</th>
<th>Grade 1</th>
<th>Grade 2</th>
<th>Grade 3</th>
<th>Grades 4-6</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Hmong</td>
<td>Hmong</td>
<td>Hmong</td>
<td>Hmong to test understand</td>
<td>Thai to explain &amp; summarise</td>
<td>Thai to explain &amp; summarise</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Hmong to explain &amp; summarise</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teaching of language as a subject</td>
<td>Hmong-listening &amp; speaking</td>
<td>Hmong-listening &amp; speaking</td>
<td>Hmong-listening &amp; speaking</td>
<td>Hmong-listening &amp; speaking</td>
<td>Hmong-listening &amp; speaking</td>
<td>Hmong-listening &amp; speaking</td>
</tr>
<tr>
<td></td>
<td>Thai-listening &amp; speaking</td>
<td>Thai-listening &amp; speaking</td>
<td>Thai-listening &amp; speaking</td>
<td>Thai-listening &amp; speaking</td>
<td>Thai-listening &amp; speaking</td>
<td>Thai-listening &amp; speaking</td>
</tr>
<tr>
<td></td>
<td>English-listening &amp; speaking</td>
<td>English-listening &amp; speaking</td>
<td>English-listening &amp; speaking</td>
<td>English-listening &amp; speaking</td>
<td>English-listening &amp; speaking</td>
<td>English-listening &amp; speaking</td>
</tr>
</tbody>
</table>

The curriculum, lesson plans and materials to be used in the pilot project would be developed by the Thai teachers and Hmong TAs grade level by grade level. As KG 1 was the level that would start first, materials to be used for that level would be developed first. Teachers and teaching assistants would be trained to develop the materials and curriculum a year before the implementation of that grade level, except for KG 1 because there was less than a year to do so. For the rest of the grade levels, the teachers and teaching assistants would be trained to develop the materials to be used in the next level a year before the implementation of that level. The materials would be ready when the school term began for that level.

FAL provided the technical assistance to help the four schools under RES CR Region 4 begin to implement the MTBMLE programme. The first step was to decide on the orthography the project would use to write Hmong. According to Dooley, FAL consultant for the pilot project, there has been some debate about whether or not the existing Thai-based orthography is accepted and usable by the Hmong.

... the Roman-based orthography is widely used, accepted and tested for Hmong Daw. He [a missionary working among the Hmong for many years] said that he has tried using the Thai-based orthography in the past and had bad results, as people got confused with the Thai and Hmong sounds. He did concede that the Thai script had always before been used with adults in informal literacy programmes, often who were already literate in Thai. He pointed out that any Hmong who were already literate in Hmong wouldn't be able to help their children if the script was different... (Dooley 2009)

There was a meeting with representatives of the local communities, schools, RES Region 4, OBEC and FAL in February 2009 to decide whether to use a Thai-based orthography or Roman-based orthography and then to make any necessary revisions to the chosen orthography. At the end of that meeting, it was decided that the pilot project should use
a Thai-based orthography because of the concern that officials from OBEC may not be supportive of a Hmong orthography that “looks very different from Thai” (Dooley 2009). However, the problem was that not many Hmong community members knew how to write the Thai-based orthography. The Romanized Popular Alphabet (RPA) was more commonly accepted and used in the community. Furthermore, it was decided that the project would utilize a revised version of the Thai-based orthography which no one in the community knew. The TAs who were going to teach in the pilot project would be taught to read and write the revised Thai-based orthography by those who attended the meeting in February 2009.

In the following sections, the four schools selected for the pilot project will be described. There is not as much information about Rak Phaen Din School and Phaen Din Thong School due to limited information in the school survey report by Tienmee (2008).

### 1.2.2.1 Huay Khu School in Amphoe Wieng Kaen
Huay Khu School is located in Tambol (T.) Paw in Amphoe (A.) Wiang Kaen of Chiangrai province. There are over 500 students in the school and they are all Hmong. The school offers education from pre-primary through grade 9. Each pre-primary level (note that “pre-primary” refers to KG1 and KG2 grade levels) has about 70 children and they are separated into three classrooms in each grade level. Each classroom has slightly more than 20 children. The school was established about 20 years ago and is in the middle of a Hmong Daw village that has nearly 300 households.

### 1.2.2.2 Huay Haan School in Amphoe Wieng Kaen
Huay Haan School is located in T. Paw in A. Wiang Kaen of Chiangrai province. There are over 500 students in the school and all of them are Hmong. The school offers education from pre-primary through Grade 9. The pre-primary classes, KG 1 (3 classrooms) and kindergarten 2 (2 classrooms), have about 30 children in each classroom. The school was established about 30 years ago and is in the middle of several Hmong villages totalling over 200 households. There are boarding accommodations at the school for children who live in villages that are 10km away.

### 1.2.2.3 Rak Phaen Din School in Amphoe Thoeng
Rak Phaen Din School is located in T. Tap Taw in A. Theong of Chiangrai province. It has close to 300 Hmong students from 16 villages with a total of over 100 households. The school offers education from pre-primary through Grade 9. There is one classroom in each pre-primary level (KG 1 and KG2) and each classroom has fewer than 20 children.

### 1.2.2.4 Phaen Din Thong School in Amphoe Thoeng
Phaen Din Thong School is located in T. Tap Taw in A. Theong of Chiangrai province. It is located among several Hmong villages totalling more than 200 households. The school has over 400 students and offers pre-primary through Grade 9 educations. There are two classrooms in each pre-primary level and there are over 20 children in each classroom.
1.2.3 Teaching assistants

The information in this section comes from personal communication with the project consultant from FAL. In the pilot project, mother tongue Hmong speakers are employed to be teaching assistants in the classes because the Thai teachers do not speak Hmong, the local language and the first language of most students. The TAs are also referred to as "local teachers" in the interviews and questionnaires.

The TAs are the ones who teach all the subjects using Hmong as the language of instruction. They are Hmong Daw by ethnicity and they speak Hmong and Thai. They are employed by the schools. Their education level varies from the completion of Grade 9 to a bachelor's degree. They did not go through teacher training at a teachers' college but were trained to teach in the pilot project by FAL. All of them are paid the same salary which comes from funds from the schools, OBEC and FAL.

Some of the TAs were employed a year in advance of the start of the grade level of implementation so that they could help prepare the materials to be used in that grade level the next school year. The KG 1 TAs and some KG 2 TAs were employed at the beginning of the pilot project so that they could prepare the materials for KG1 to be taught that year. The KG 2 TAs were trained to prepare the materials to be used in KG2 for the following school year.

1.3 Education system in Thailand

Basic education in Thailand consists of six years of primary education, three years of lower secondary education and three years of upper secondary education. Upper secondary education is divided into academic and vocational streams. Students entering the academic stream usually intend to further their studies at a university. Vocational schools offer programmes that prepare students for employment or further studies. According to Thailand’s education policy there are nine years of compulsory basic education which include six years of primary education and three years of lower secondary education. The State provides free education for 15 years of schooling which includes three years of early childhood education and 12 years of basic education (Trakulphadetkrai 2011).

The Office of the Basic Education Commission (OBEC), which is within the Ministry of Education (MOE), is the main agency responsible for early childhood, primary and secondary education. OBEC is in charge of implementing the policies of the education system (Noonan 2008) and ensures “continuity of activities to achieve government policy for social development”. OBEC also assesses the results of activities implemented by all Educational Service Areas which leads to “improvements in policy-based tasks” (Trakulphadetkrai 2011: 198).

The basic education curriculum was established in 2005 and covers Thai language, mathematics, science, social studies, religion and culture, health and physical education, art, career and technology and foreign languages. Seventy-six standards were set for assessing learning quality. The Education Service Area offices have the flexibility to choose the substance that suits the local contexts. Schools can develop the curricular contents according to the needs, aptitude and interests of their students. OBEC encourages schools to adopt a variety of teaching-learning models such as the Montessori Method and learning through development of the thinking process (Noonan 2008, Trakulphadetkrai 2011).
Standard Thai is the language of instruction at all levels of education. Local languages are not prohibited in the schools in Thailand and some schools teach local languages as additional subjects. Schools can use a local language and Standard Thai as languages of instruction if the schools find them appropriate for use in the classes (Kosonen & Young 2009).

1.3.1 Education policy
In recent decades, greater cultural and linguistic diversity has been tolerated in Thailand. This could be due to the fact that most people in Thailand consider themselves Thai, regardless of the ethnolinguistic background. The nation-building activities have been strong and fairly successful, therefore greater cultural and linguistic diversity is tolerated. Thailand, being more democratic since 1992, is more accepting of diversity than in the past (Kosonen 2005, Kosonen & Young 2009). The Thai Constitution of 1997 has provided new opportunities for ethnolinguistic minorities to use their languages. The new Thai school curriculum allows teaching of ethnic minority languages in minority areas by allocating up to 30 percent of the curriculum for minority language study or other local content (ibid).

Standard Thai has been used as the official language of Thailand for the past hundred years. It is also the national language of Thailand and a symbol of identification for the Thai nation (Smalley 1994). The MOE has been promoting the use of Standard Thai and its correct usage and urged all Thai children to be competent in Standard Thai. The MOE does not prohibit the use of local languages (Smalley 1994, UNESCO 2006, Kosonen & Young 2009). Nowadays, Thai Language is the de facto official and national language, as its status is not stipulated by written documents, but by its use.

The MOE has never prohibited the use of local languages in education, so some schools teach local languages as additional subjects. Sometimes teachers use the local language as the language of instruction together with Standard Thai, as they deem appropriate. One example is the project by the Office of the Primary Education Commission, MOE, on teaching techniques through language acceptance. This project, started in 1987, teaches Thai as a second language to kindergarten students in five provinces in Southern Thailand and was being extended to more schools up until 2001. OBEC and other educational organizations in several provinces also rewarded teachers who used local languages and local folklore in education management. Schools are allowed to utilize local knowledge, which may include the local language, as a supplementary course of study, but there is no obligation to do so (Prapasapong 2009).

Thailand’s approach to choice of orthography for any unwritten local language is "somewhat laissez-faire" in that any orthography can be developed and used with some basic regulations. On the other hand, all new orthographies are supposed to be adaptations of the Thai script, though this might not be the choice of the speakers of the languages. Over the past half a decade, Thailand has been developing the first written language policy for the country, which includes a language-in-education policy (Benson and Kosonen 2010, Person 2010). In 2010, the Prime Minister of Thailand approved the National Language Policy draft in Thailand which gives the various ethnic groups the right to use their mother tongue in society and education. The government promotes multilingual education for ethnic groups whose mother tongue is not Standard Thai in order to strengthen their Thai skills and support children’s cognitive development and education in general (Kosonen 2011, Person 2010).
1.4 Research questions
This study will attempt to determine the following: 1) What are the implications for the decision to use the revised Thai-based orthography for the pilot project? 2) How do the teaching assistants view the newly revised Thai-based orthography? and 3) How long does it take the teaching assistants to learn the orthography so that they can use it fluently?

This study also looks at the student's learning and teacher training aspects of the pilot project. It attempts to answer these questions: 1) How do the teachers and teaching assistants view their own teaching and the teacher training? 2) How do the school principals view the pilot project in general, and the challenges in particular? 3) What are the outcomes of the pilot project after two years of implementation? and 4) How does this pilot project fare when compared with the characteristics of strong and sustainable MLE programmes?

As the pilot project is just into the beginning of its third year of implementation (Grade 1), this study will focus on the pre-primary level (KG 1 and KG 2) of the project.
Chapter 2
Methodology

I first learned about the Hmong MTBMLE Pilot Project from the FAL consultant who was overseeing this project. As I learned more about the nature of the project I became interested in documenting and studying the project. The schedule of data collection was sometime influenced by the FAL consultant’s schedule and the school schedule itself.

In this chapter, I have described the method of data collection and analysis.

2.1 Initial research
The initial research for this study was done through informal discussion with the FAL consultant who is overseeing the Hmong pilot project to get an idea of the scope of the implementation of the use of Hmong in the schools. The minutes of meetings that were conducted between the Hmong schools, OBEC, RES and FAL were also referred to for background information and references.

The initial focus of this study was the Hmong orthography used in the pilot project because the orthography was considered “new” in the sense that nobody in the Hmong community knew how to read and write using this revised Thai-based orthography. The issues, challenges and problems that the TAs encountered when they use the orthography to teach were intended to be part of the study. However after some initial data collection, I found that the issue of the orthography was not as major a problem to the TAs as initially anticipated, and thus the teacher training and students' learning aspects of the pilot project were also included in this study.

2.2 Qualitative vs. quantitative research
It is believed that qualitative research can “serve educational planning well in developing countries ... due to its flexibility” (Kosonen 1998: 88). Qualitative research or ethnography as it is called by anthropologist (Spradley 1980), allows the researcher to do fieldwork where the people are. Watson-Gegeo defined ethnography as “the study of people’s behaviour in naturally occurring, ongoing settings, with a focus on the cultural interpretation of behaviours” (Watson-Gegeo 1988: 576). Ethnography asks that the researcher “identify the phenomena she is interested in and then go about discovering where these phenomena occur and how they are linked” (Heller 2008: 254). Ethnography is relevant in the study of bi/multilingualism because it allows the “linking of the discourses of bilingualism to the trajectories of social actors and social resources to the construction of social boundaries and to relations of inequality” (ibid: 253).

In this study, I was able to learn about several key aspects of the pilot project and use the data collected to explain why things happened the way they did. I was able to do so because I spent time where the people were: I participated in the trainings, meetings and workshops. I also got to know the people participating in the pilot project through the one-year of interacting with them during the phase of data collection.
Using qualitative research methods, I collected data from interviews, observations, fieldnotes and open-ended responses in questionnaires. The responses from interviews and questionnaires were collated and put into categories which were then used to write the analysis presented in this study. The categories for data analysis were sorted according to the types of questions asked, and a common theme for each category was then identified. The data were used to help me understand the response of the TAs with regards to the orthography choice used in the pilot project. The data collected were used to learn about the views of the teachers and principals regarding the learning and teacher training aspects of the project. A summary of the comparison between qualitative and quantitative research taken from the works of Johnson & Christensen (2008) and Lichtman (2006) is presented in Table 5.
Table 5 Qualitative vs. quantitative research (Johnson & Christensen 2008, Lichtman 2006)

<table>
<thead>
<tr>
<th>Criteria</th>
<th>Qualitative Research</th>
<th>Quantitative Research</th>
</tr>
</thead>
<tbody>
<tr>
<td>Purpose</td>
<td>To understand &amp; interpret social interactions</td>
<td>To test hypotheses, look at cause &amp; effect, &amp; make predictions</td>
</tr>
<tr>
<td>Group Studied</td>
<td>Smaller &amp; not randomly selected</td>
<td>Larger &amp; randomly selected</td>
</tr>
<tr>
<td>Variables</td>
<td>Study of the whole, not variables</td>
<td>Specific variables studied</td>
</tr>
<tr>
<td>Type of Data Collected</td>
<td>Words, images, or objects</td>
<td>Numbers and statistics</td>
</tr>
<tr>
<td>Form of Data Collected</td>
<td>Qualitative data such as open-ended responses, interviews, participant observations, field notes, &amp; reflections</td>
<td>Quantitative data based on precise measurements using structured &amp; validated data-collection instruments</td>
</tr>
<tr>
<td>Type of Data Analysis</td>
<td>Identify statistical relationships</td>
<td>Identify statistical relationships</td>
</tr>
<tr>
<td>Objectivity and Subjectivity</td>
<td>Subjectivity is expected</td>
<td>Objectivity is critical</td>
</tr>
<tr>
<td>Role of Researcher</td>
<td>Researcher &amp; their biases may be known to participants in the study, &amp; participant characteristics may be known to the researcher</td>
<td>Researcher &amp; their biases are not known to participants in the study, &amp; participant characteristics are deliberately hidden from the researcher (double blind studies)</td>
</tr>
<tr>
<td>Results</td>
<td>Particular or specialized findings that is less generalizable</td>
<td>Generalizable findings that can be applied to other populations</td>
</tr>
<tr>
<td>Scientific Method</td>
<td>Exploratory or bottom-up: the researcher generates a new hypothesis and theory from the data collected</td>
<td>Confirmatory or top-down: the researcher tests the hypothesis and theory with the data</td>
</tr>
<tr>
<td>View of Human Behaviour</td>
<td>Dynamic, situational, social, &amp; personal</td>
<td>Regular &amp; predictable</td>
</tr>
<tr>
<td>Most Common Research Objectives</td>
<td>Explore, discover, &amp; construct</td>
<td>Describe, explain, &amp; predict</td>
</tr>
<tr>
<td>Focus</td>
<td>Wide-angle lens; examines the breadth &amp; depth of phenomena</td>
<td>Narrow-angle lens; tests specific hypotheses</td>
</tr>
<tr>
<td>Nature of Observation</td>
<td>Study behaviour in a natural environment</td>
<td>Study behaviour under controlled conditions; isolate causal effects</td>
</tr>
<tr>
<td>Nature of Reality</td>
<td>Multiple realities; subjective</td>
<td>Single reality; objective</td>
</tr>
<tr>
<td>Final Report</td>
<td>Narrative report with contextual description &amp; direct quotations from research participants</td>
<td>Statistical report with correlations, comparisons of means, &amp; statistical significance of findings</td>
</tr>
</tbody>
</table>

2.3 Data collection and analysis
Primary data collection for this study was done through interviews, questionnaires, observations and informal discussions. I presented a letter from Payap University Department of Linguistics to the principals of the schools, requesting permission to interview the teachers and teaching assistants and to use their response in this thesis.
During the period of data collection, I also acted as a travel companion for the consultant from FAL during her trips to Chiangrai province to conduct classroom observations, meetings, teacher training and workshops for preparing lesson plans and learning materials.

Other sources of data for this study were library research, minutes and reports on the pilot project and internet research.

At the time of data collection, the pilot project was in its second year of implementation. The KG 1 and KG 2 pilot classes had started but the upper grade levels had not yet begun. Therefore the focus of this study was the pre-primary education component of the pilot project. I included comments from teachers and TAs who were preparing to teach Grade 1 because these teachers were in the process of receiving training to teach in the next school year and thus had interaction with the group of children who went through KG 1 and KG 2 using their mother tongue.

### 2.3.1 Interviews

Interviews with the teaching assistants were done individually, with the exception of one interview that was done with two TAs together. All interviews were done in Thai and recorded. The questions for the interviews can be found in Appendix B. These questions were translated into Thai by a native Thai speaker. All the TAs were asked about their ability to read and write the Roman and Thai-based Hmong orthographies. They were also asked for their opinions about their own teaching, teacher training, children’s learning and the new Thai-based orthography. Some of the TAs were asked about the literacy programmes that are available in their villages. Not all of the TAs were asked this question as some of them came from the same village and similar answers were expected to be given. I interviewed the TAs after having made periodic visits over a six month period. This allowed me time to build a relationship with them so that they could feel comfortable sharing their views with me.

I interviewed 22 of the 25 TAs in the pilot project for this study. Two of them were on medical leave during the interview period and were thus left out of the study. Another person that was left out of the study is a TA who taught both Thai and Hmong in the class. He was not interviewed because it was assumed that he would give the desired answers rather than responses based on his actual practice. The TAs who joined the project more recently were not interviewed due to lack of time.

The TAs were interviewed during their break times in workshops and classroom observation so that their training and teaching would not be disrupted. I recorded, transcribed and translated their responses into English. In the quotes that can be found in this thesis, the TAs were also referred to as “local teachers” as they come from the local community and it is also a direct translation of the Thai term “ครูท้องถิ่น [khru th ŋ thin]”.

### 2.3.2 Questionnaires

The Thai teachers and school principals involved in the pilot project were each given a questionnaire to answer. The questions in the questionnaire were written in English and translated into Thai with the help of a native Thai speaker. The questionnaires that were given to the teachers and principals were in both Thai and English. The
questionnaires given to the Thai teachers (Appendix C), asked them about their views of the teaching of the teaching assistants, their own teaching and observations of children’s learning. The school principals were given a different questionnaire (Appendix D). They were asked their opinions of the teaching of the teaching assistants and Thai teachers, observations of children’s learning and their opinion of the pilot project in general. I gave these questionnaires to the teachers and principals to fill out after I had been visiting the schools for six months and had established a relationship with them. This allowed them to know me and the research I was doing.

I gave the questionnaires to the Thai teachers and schools principals through a representative from each school who also collected them and returned them to me during my next school visit. This helped to ease the collection process and saved time because I did not have to go and look for everyone in the school in order to give out and collect the questionnaires. In the process, some questionnaires were lost however, and the teachers and principal whose responses were lost had to complete the questionnaires again.

All the answers in the questionnaire were in Thai, and a native Thai speaker helped to type and translate them into English. In the English questionnaires, the TAs were referred to as “local teachers” which is a direct translation of the Thai term “ครูท้องถิ่น [khru thọη thin].”

2.3.3 Observations
I did several types of observations during this study to get the data needed, including observations of classroom teaching, meetings, workshops and teacher training. All observations were then recorded. I went with the FAL consultant for meetings with parents in the schools, classroom observations, workshops and teacher training. These observations helped to confirm the findings from the interviews and questionnaires and they substantiate the views and opinions of the participants in this study.

I conducted classroom observations in the KG 1 and KG 2 classrooms over a one-year period. More observations were done in KG 2 because that was the level that started during the period of observation and the FAL consultant wanted to monitor the progress of the implementation of the pilot programme in that grade level. She also wanted to make sure that lessons were taught correctly and get feedback from the teachers and TAs regarding the lesson plans and materials. For the KG 1 classes, it was the second year that the project was running so the TAs had experience teaching the curriculum from the year before. Therefore these classrooms were not visited as often as the KG 2 classes. During some of the classroom observations, TAs and teachers from the other three schools sat in to observe too so that they could learn from one another and give suggestions on how to improve on their teaching.

I also conducted observations of meetings, training and workshops during the data collection period. Meetings included parent meetings in each school during the school term in which the teachers and FAL consultant helped to explain the rationale of the pilot project to the parents and provided orientation for parents of new students. There were also meetings with the teachers and TAs after each classroom observation during which the teachers, TAs and FAL consultant who observed the lessons provided feedback to the ones being observed. These meetings, trainings and workshops were held in the four pilot schools and the RES office. When the meeting room in RES office
was not available, a school in A. Thoeng in Chiangrai province was used to conduct the teacher training and workshops.

All the meetings, trainings and workshops were conducted in Thai, which I can understand. I recorded my observations in English. Each trip to the schools lasted one week, and some trips lasted for two weeks.

2.3.4 Informal discussions
During this study I had many opportunities for informal discussions with the teachers, TAs, principals, the officer from RES and FAL consultant. Because I travelled with the FAL consultant to the schools, we had opportunities to talk together during the four-hour ride. During teacher training events and other workshops, especially during meals and break times I took opportunities to talk with the participants.

The analysis of the data in the following chapters includes information collected from these informal discussions.

2.3.5 Research ethics
The actual names of the participants in this study are not used in this report in order to protect their privacy. Participants were told beforehand that their names would not be used in the research report. All the participants for the interviews and questionnaires were given a code. “TA” refers to “teaching assistants” and each of them was assigned a letter from A to Z. “Teacher” refers to the “Thai teachers” and each of them was assigned a letter from A to M randomly according to the responses typed out by the individual who helped translate the responses. As there are only four school principals, they were assigned letter A, B, C and D according to the order in which I received their questionnaire responses.

2.3.6 Data analysis
The data collected from the interviews and questionnaires were translated to English first before they were analysed. The answers given in the questionnaires and interviews were sorted by the questions for each group of participants (principals, Thai teachers and TAs). The answers were then grouped according to the common themes. The data for each group of participants were analysed separately.

2.4 Limitations
In any research project, there are limitations and this particular study is no exception. As much as I tried to establish good rapport with the teachers and TAs, trying to make them feel at ease in sharing their opinion, there was still the possibility that the answers given were “model answers” that they had heard during their training and workshops. The participants’ actual views and practices may not be the same as the ones they expressed in the interviews and through the questionnaires. This discrepancy was seen in actual teaching practices which did not correspond to what they said they believe in. The participants may have based their responses on what they thought I would like to hear rather than what they believed in. It is also possible that is that their “new beliefs” in MTBMLE were not fully adopted, causing the teachers (and other people) to act in contradiction with their stated beliefs. Also, the answers given by several participants were exactly the same, which indicated that a “model answer” was being given.
The language used in the interviews was Thai, but Thai is not mother tongue of either myself (the interviewer) or the interviewees. Information could have been lost in the process of mental translation during the interviews. The translation of the interviews may not have been completely accurate as my language ability in Thai is limited. I studied Thai for two years and am able to use Thai to converse in daily interactions. However, my vocabulary in the domain of education is limited as I did not get much practice to use Thai in this domain of interaction. Also the TAs used their second language, Thai, to explain their views. For some of them, Thai may not be the language in which they are most confident. From my observations during the data collection visits, the TAs tended to use Hmong when interacting among themselves and they were able to express themselves better using Hmong. Thus, using Thai in the interviews may have seemed formal and “restrictive” for what they wanted to say.

The Thai teachers and school principals were given a questionnaire instead of having a face-to-face interview with me due to time constraints and difficulty in arranging for individual interviews. I also did not feel comfortable conducting interviews during school visits as that meant that teachers had to be out of the classroom during lesson time. The Thai teachers were supposed to be in the classroom to help the TAs in managing the class during lessons. It would have been better if the Thai teachers had been interviewed too so that I could ask for clarification of their answers if necessary. The questionnaires I received from the teachers had short answers and it was a bit difficult to quote many of them in the analysis. They also did not have an opportunity to ask for clarification if they could not understand what the questions in the questionnaire were asking for.

The parents of the children were not interviewed so I could not get a clear representation of how they actually felt towards the pilot project. My analysis is based on secondary information that was passed from the teaching assistants to me, and on observations during parents’ meetings. The information passed on to me could have been selectively reported. The observations recorded during parent meetings may not be fully representative of parents’ true opinions because some of them may have been too shy to voice their thoughts during those meetings.

The Grade 1 classes had just started when this thesis was written and the views of the Grade 1 teachers and TAs were included in the analysis. We could not confirm what the teachers and teaching assistants reported about the achievement and progress of the children as their test results were not available yet. The only data we could report on was the teachers’ comparison of the participation levels of students who came from the KG 2 pilot classes with students they had taught in previous years.

Due to the high turnover rate of the teachers and TAs, those who were interviewed or given a questionnaire during the period of data collection are no longer working in the project. The newer teachers and TAs were not interviewed due to the lack of time so the data are not representative of the views of the teachers and TAs who are currently involved in the pilot project.
Chapter 3
Orthography

Writing is the “most important sign system” ever invented (Coulmas 1989: 3). Every society utilizes speech for communication, but not all societies have writing. It is common to find no writing in a society, so according to Coulmas (1989) it is considered a “cultural achievement” if a society has writing (Coulmas 1989: 3). Writing is a recent invention (Goody and Watt 1968, Hockett 1963) which emerged late in the “cultural and societal history” (Coulmas 1989: 4). Writing serves many functions, one of which is broadening the range of communication, making communication not dependent on the person who wants to communicate the message and beyond the immediate moment (Rogers 2005).

The other functions of writing are “memory supportive” functions (Goody 1977: 78, Ong 1982: 96) or what Coulmas called “mnemonic functions”, “reifying function, social control function, interactional and aesthetic” (Coulmas 1989:11). Writing also creates a more complex society, allowing for the development of written records and manuals that can be kept and referred to. Also, there is less opportunity for written information to be manipulated, though the reverse could also be said (Rogers 2005).

In Southeast Asia, although there are several ancient scripts such as those used for Mon and Kammuang, many of the orthographies for minority languages were developed in the 19th and 20th centuries by Western missionaries who did not always have proper linguistic training. These orthographies are still in use today and the people using them have strong attachments to them (Benson and Kosonen 2010).

3.1 Definition of terms
Before discussing the Hmong orthography in Thailand, it is necessary to clarify the meaning of several key terms.

3.1.1 Alphabet
An alphabet is a writing system characterized by a “systematic mapping relation between its signs (graphemes) and the minimal units of speech (phonemes)” (Coulmas 1999: 9). It has a set of symbols representing the phonemes of a language (Crystal 1999). The term “alphabet” applies to consonant scripts such as Hebrew and Arabic as well as to segmental scripts which use graphemes for both consonants and vowels, like Greek, Roman, Mongolian and Thai. Alphabetic writing systems vary in complexity and in the type and regularity of letter-sound correspondence. Decisions regarding symbol choice for alphabets may be based on phonological, morpho-phonological or lexical level factors (Coulmas 1999).

3.1.2 Orthography
In the Blackwell Encyclopedia of Writing Systems (1999), orthography is defined as the “correct spelling and that part of grammar that deals with the rules of correct spelling”
An orthography is a selection from the possibilities of a script for writing a particular language in a uniform and standardized way. All orthographies are language specific and are often “codified” by official decree (ibid). Coulmas, in his book *Writing Systems* (2003:35), reiterated that orthography is the “standardized variety of a given, language specific writing system”. This is also the definition given in Crystal’s *Dictionary of Language* (1999) in which the word “orthography” also means “a prescribed system of spelling and punctuation” (Crystal 1999: 244).

Some older orthographies are based on writing conventions that have evolved over time and which often involved a variety of structural principles of linguistic representation, making it difficult to codify the spelling of that language with just a set of rules. Orthographic codes consist of the set of rules and a word list, which can be an orthographic dictionary for languages with a long literary tradition (Coulmas 1999).

With the definitions of various authors in mind, orthography is defined in this paper as a prescribed system of spelling and punctuation of a specific language.

### 3.1.3 Script
According to Coulmas (1989, 2003), a script is the “graphic” form of the units of a writing system. A script is developed in the context of the language in which it is to be used. Crystal (1999) states that this term is used in a general way to include the properties of different systems: hieroglyphic writing, syllabaries and alphabets. In this paper, I will use the definition of “script” by Coulmas (2003) which is the “graphic form of the units of a writing system” (Coulmas 2003: 35).

### 3.1.4 Writing system
According to Rogers (2005), writing system is a “system for graphically representing the utterances of a language” (Rogers 2005: 299). Coulmas (1999) defines “writing system” as a “set of visible or tactile signs used to represent units of language in a system way, with the purpose of recording messages which can be retrieved by everyone who knows the language in question and the rules by virtue of which its units are encoded in the writing system” (Coulmas 1999: 560).

There are two senses to the meaning of writing system. It can refer to the basic graphic systems of representing a language, such as logographic and logosyllabic systems, or to the spelling of a language. In the second sense, writing system can be used interchangeably with orthography (Coulmas 1999).

### 3.2 The Hmong orthography in Thailand
William Smalley, in consultation with G. Linwood Barney and Father Yves Bertrais-Charrier, drew up a suggested orthography for the Hmong in Laos in 1953. This orthography is Roman-based (known as Romanized Popular Alphabet or RPA) and has been in use since that time. Father Bertrais translated and wrote using this orthography, and there are several thousand Hmong who use this orthography in Laos (Smalley 1990). Around the time this orthography was developed, missionaries who came to Thailand to work with the Hmong adopted it for the Hmong Daw and Hmong Njua in Thailand. It was found that the orthography from Laos was “fully applicable” to both Hmong groups in Thailand (Smalley 1976: 87). There was less interest among the Hmong in Thailand in learning the orthography than in Laos (Smalley 1976, 1990).
In 1958, there was an experiment to see what would be involved to develop a Thai-based orthography for Hmong. However the experiment was not a success because the “problem of transcription was not sufficiently thought out” (Smalley 1976: 88). Then in 1965, a Thai-based orthography was developed by Whitelock. After being tested and modified it was introduced in one village in Thailand. It was better received than the Roman script. Whitelock and her Hmong Daw assistants transcribed some of the Hmong literature into the Thai script for use in this village. However, there was no widespread interest in learning to read among the Hmong in Thailand unlike in Laos (Smalley 1976: 88). The interest was usually localized in one area.

The Hmong orthography used in the four schools participating in the Hmong MTBMLE pilot project is based on the Whitelock Thai-based orthography, but changes were made to several sound-symbol correspondences. Apart from the teachers from the four schools, no one else is able to read and write using this newly revised orthography. A list of the differences between the Whitelock Thai-based orthography and the newly revised orthography is shown in Table 6.

### Table 6 Table of old and new Thai-based orthographies (Dooley 2010)

<table>
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<tr>
<th>RPA</th>
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</table>

### 3.3 The TAs’ views on Hmong orthographies

Interviews with twenty two Hmong TAs from the four schools were conducted and their responses were recorded. There were two TAs who were not interviewed as they were on medical leave during the period of interview, and the newer TAs were not included in the interviews. This section presents an analysis of these interviews.
During the interviews the TAs were asked about their Hmong language literacy ability using the two different orthographies, the Romanized Popular Alphabet (RPA) and newly devised Thai-based orthography. They were also asked about their perception of the Thai-based orthography and the difficulties they faced when using it. Finally, the TAs were asked how they learned to read and write using the new orthography since there were no classes conducted to teach them to read and write it.

3.3.1 The TAs’ Hmong language literacy skills

3.3.1.1 Skills in Romanized Popular Alphabet
Most of the Hmong TAs in the four schools reported that they are literate in the Romanized Popular Alphabet (RPA). They learned it from their parents, older siblings or informal classes conducted by someone in the village. The male TAs usually had more experience using the RPA than did the female TAs. The TAs said they use it to correspond with friends and relatives in different parts of Thailand and overseas via letters and emails.

The TAs who are literate in the RPA reported that they help their parents read letters from their relatives. Some of the TAs who worked away from home said that they wrote letters home using the RPA.

One of the four project schools conducts literacy class for the Grade 9 students who are interested in learning to read and write RPA. The school has an exchange programme with Hmong students from the United States, and conducts Hmong literacy classes using the RPA so that their students can correspond with the Hmong students from the United States. One of the TAs in the school teaches these students to read and write. One of the new TAs learned to read and write Hmong through these classes.

Some of the TAs reported that they are not confident using the RPA because they never took classes but learned to read and write the RPA on their own. Their foundation in using the RPA is not strong and they also have not had opportunities to use it enough to gain fluency.

3.3.1.2 Skills in Thai-based orthography
All the Hmong TAs learned the Thai-based orthography when they started working in the pilot project. Their reported confidence in their ability to use the orthography varied. The TAs who joined the project recently were not confident using the Thai-based orthography. They were not sure which letters to use when they wanted to spell a word.

During the interview, when asked how well they were able to read and write using the Thai-based orthography, almost all the teaching assistants said that they were able to use the orthography in class without any problem. They had no issues and/or problems in using the orthography. Only one TA said that he was not confident in using the orthography, but this may have been because he was very new to the project.

From the kindergarten classroom observations that I conducted in the schools, the teaching assistants from the KG 2 classes were fluent in their writing when they wrote
the children’s experience stories on the board. The stories that the TAs wrote on the board were short and simple. In the classes that I observed, all the TAs read fluently when they read listening stories, big books and small books aloud to the children. The TAs who had been in the project longer said they had experience reading these stories aloud to the children for a year, so they were able to read them fluently. The TAs who had just joined the project for a few months said that they prepared before class by practicing reading the stories and asking the more experienced TAs for help if they were not sure how to read the words.

3.3.2 Perceptions of the TAs regarding the Thai-based orthography

One of the interview questions for the teaching assistants asked them to give their opinion of the Thai-based orthography. The first impression that they had of the orthography was that it was difficult to read when they first encounter it. Without any instruction, they tended to pronounce the letters of the alphabet using Thai pronunciation, and they had to guess to read the Hmong words. They also felt awkward using the Thai-based orthography to read Hmong. However, after having used the orthography to teach and to develop materials, most of the TAs thought that the Thai-based orthography was easy to use and learn. Some of them thought that it was even easier than the RPA. A small group of TAs, however, expressed the opinion that the orthography would be difficult to learn for those who were not familiar with the pilot project and for those who were not literate in Thai. This is because of the perception that the Thai-based orthography is not easy and the foundation in Thai is not there for the transfer of literacy to be done between old and new orthographies.

As the TAs gained experience using the Thai-based orthography in their teaching, they said they became more fluent using this orthography than using the RPA. They said they did not get to use the RPA often.

The TAs said that using the Thai-based orthography to write Hmong will help the children to “learn Thai easily” (TA I) and “help children to understand Thai better with the orthography” (TA M). Some of them said that the children will not be confused between the two orthographies because they speak Hmong as their mother tongue. The children would be able to differentiate the sounds of the two languages when reading and writing them. However, another group of TAs were concerned that the children would be confused with the same script. They think that the children would either not be able to differentiate the sounds of the letters for the two languages or that they would not be accurate in their pronunciation when using the same type of script to read Thai and Hmong.

When the TAs were asked to describe any problems they may have had using the orthography, said they had difficulty spelling words with consonant clusters. Most of the times they had to refer to the alphabet chart or ask their fellow TAs for help in spelling words with consonant clusters as they were not sure which letters to use for the sounds.

The TAs attributed the ease of learning the Thai-based orthography to the fact that they were already literate in Thai, so transferring this knowledge to Hmong was not a problem for them. Also, they said that because Hmong is their mother tongue, learning to write it using another script was easy and did not pose any problems for them. Below are several quotes from TAs expressing their views.
those who are literate in Thai, they will be able to read and write the Thai-based orthography, no need to learn and will be able to read. Only a few sounds are different. Will be able to read the first time seeing it though may not be clear in pronunciation (TA I).

...not difficult to learn...learn Thai already, easy to adjust the sounds (TA Q).
easier to use Thai-based. Learn Thai first so easy to learn Thai-based orthography (TA D).

The ability to embrace the new orthography by the TAs made it feasible for the orthography to be accepted in the wider community when it is introduced to the community at a later stage. Even though the Hmong teaching assistants had some initial reservation in using the orthography, they were willing to give it a try. Also the perceived ease of transfer to reading and writing Thai for the children in higher grades is one motivation for the TAs to accept the orthography.

3.3.3 Learning the Thai-based orthography
When the TAs were asked how they learned to read and write the Thai-based orthography, all replied that they learned it on their own. Those who were already literate in RPA would compare the Roman letters with the Thai letters and then memorize the Thai-based equivalent of the RPA letter. The teachers were given the alphabet chart (see Appendix E) and they also memorized letters from the chart. If they were not sure which letter of the alphabet to use in their spelling, they would ask their fellow TAs at school.

One of the Hmong teaching assistants, W, came to see himself as the “expert” in the orthography because he was involved in the orthography development process from the beginning. He was always willing to help other TAs if they had a problem using the orthography. Through the interviews, I learned that the other Hmong TAs regarded him as someone they could go to for help. The TAs who had been with the project longer were also willing to teach the newer ones how to read and write Hmong using the Thai-based orthography.

The transfer of literacy is quite easy for bilingual speakers of languages using the same script (Smalley 1994) and between different writing systems (Kenner 2004). Being literate in the national language, Thai makes the transfer to learn Hmong using the same script easy for the TAs. They are able to differentiate the sounds for the same letter and adjust the pronunciation accordingly. The writing skills that the teachers have acquired when they learn Thai are then transferred to learning the new Thai-based Hmong orthography (Kenner 2004). Their fluency and competency in the orthography will also improve when they use it every day. There must also be plans to bring their competency to a higher level as the vocabulary they are currently using in their teaching is limited to the kindergarten level.

The availability of help from friends and colleagues is an advantage for the teaching assistants as they learn to read and write Hmong using the new orthography. They can learn and correct each other’s work and help each other to gain proficiency in the orthography.
3.4 Summary
Orthography is the system of spelling and punctuation for a specific language. In the Hmong MTBMLE pilot project, the revised Thai-based orthography that is being used is considered “new” because it was developed not long before the implementation of the project. The research data shows that the initial concern that the Thai-based Hmong orthography would be difficult for the Hmong teaching assistants to use in their teaching does not seem to be an issue for the TAs themselves. Although it is considered a new Hmong orthography and no one else in the villages knows how to use it, the teaching assistants were willing to accept it and use it. Being literate in Thai and the Hmong Romanized Popular Alphabet make the transfer of literacy to the Hmong Thai-based orthography easy. This is because literacy skills can be transferred between different writing systems (Kenner 2004). There is maximum motivation (Smalley 1964) for the teachers to learn and teach using the orthography because of the perceived ease in transferring the literacy skill to Thai in the later grades for the children.

The availability of help from the other teaching assistants allows the teaching assistants gain proficiency in their ability to read and write Hmong using the Thai-based script. They can learn together and from other teachers in areas that they are not good in and by teaching others, they improve in their own proficiency too.
Chapter 4
Teaching and Teacher Training

Training and supervision help teachers gain competence, creativity, commitment and credibility within and outside the community (Malone 2008). A successful multilingual education programme is one that has “recruited motivated and credible individuals from the local community” as leaders in the programme and helped them to develop the skills to support and sustain the programme (UNESCO 2006: 48) although it is also possible to have successful MLE initiatives with teachers who are not recruited from the local community. Teacher training is important for enabling teachers to be effective in the programme and for building up their capacity. “Well-trained, confident teachers from the community encourage greater community ownership of the programme, which contributes to sustainability” (ibid). If there is access to instructional materials that are easy to use along with regular in-service training and supportive supervision, even members of the community who have not had formal training in education can be trained to be excellent teachers/teaching assistants (ibid).

The success of education programmes that utilize the mother tongues of minority children depends significantly on the recruitment of teachers who are fluent speakers of the language of the community (Dutcher 2004, Ball 2010) and are “comfortable using that language in an academic setting” (Dutcher 2004: 21). Pre-service training, in-service training and outside study to upgrade teacher credentials are needed to ensure that teachers are successful in the classrooms. Pre-service training prepares the teachers to start teaching in the classroom. In-service training helps teachers develop pedagogical proficiency in their teaching and provides opportunities for teachers to meet together and come up with solutions for problems they face in their teaching (ibid).

In an MTBMLE programme, time and resources should be invested in teacher training and in the development of learning materials. All stakeholders should be involved in decision-making regarding the implementation of bilingual schooling including which languages will be used and how they will be developed (Benson 2004a). The quality of a teacher is not defined only by the qualifications that he/she has, but by how much he/she has been “adequately prepared, supported, motivated and compensated to teach” (Robinson 2011: 42). How teachers teach and how much they teach also determine the achievement of the children under their care. To improve the quality of teaching, teachers must be adequately prepared, motivated and supported, and school leadership and management must be strengthened (ibid).

Benson (2004b) used examples from bilingual programmes in Bolivia and Mozambique to develop a template for a training curriculum for teachers involved in such programmes. The teacher training curriculum includes teaching language learning theory as well as demonstrations of language teaching methods. Teachers need to develop a “pedagogical vocabulary” so that school-related themes and all subject disciplines can be discussed comfortably in the L1 (Benson 2004b: 210). Plans to develop the teachers' written and verbal competence in both the L1 and the L2 have to be developed. Teachers should also be trained to look for ways to bring the home culture into the classroom. Discussions on how to cultivate productive relationships
with students, their families and their communities should be included in teacher training and workshops. Teacher training should include the sharing of information and evidence regarding how and why MTBMLE programmes work so that teachers can be good advocates for the programme. The curriculum should also include language and programme assessment and “alternative measures of programme effectiveness, so that language attitudes and identity are seen as no less important than test scores” (Benson 2004b: 218).

The term “mother tongue” in this paper refers to a language that a speaker (a) has learnt first, (b) identifies with or is identified by others, (c) knows best, (d) uses most, or (e) speaks and understands competently enough to learn academic content at the appropriate age level (Benson & Kosonen 2010: 135). This term can also be referred to as “first language” (L1) or “primary language” (Ball 2010: 8). In the context of this study, Hmong is the mother tongue or L1 of the children in the four schools of the pilot project. The use of the term “multilingual education” in this study is modelled after the usage of the European Commission in its policy statement to mean “mother tongue plus two other languages for all” and UNESCO which uses the term to refer to “the use in education of at least three languages: the mother tongue, a regional or national language and an international language” (García 2009: 9). In this study, unless a particular author is being quoted using the term “bilingual education”, the term “multilingual education” will be used.

This chapter focuses on how Thai teachers and Hmong TAs view their own teaching. It also describes how Thai teachers view the teaching of the Hmong TAs. These reports are analysed in light of classroom observations. In order to be able to teach in the classrooms, the teachers and TAs had to be trained how to teach using the learning materials that they helped to develop for the pilot project. Lesson plans and the curriculum were also developed especially for this programme. Thus, the views of the teachers and TAs on how appropriate the teacher training and workshops were in preparing them to teach will be discussed in this chapter too. The information presented in this chapter is based on the analysis of the teachers’ questionnaires and TAs’ interviews.

### 4.1 Definition of terms

#### 4.1.1 Thai Teachers
References to “Thai teachers” in this chapter refer to the teachers in the pilot schools who are of Thai ethnicity, have gone through teacher training in a teacher training college and have been assigned by the Ministry of Education to teach in that particular school.

#### 4.1.2 School Principals
References to “school principals” refer to the principals of the four schools participating in the programme. The principals provide leadership in their respective schools and are some of the key decision makers in their schools.

#### 4.1.3 Teaching
The term “teaching” in this chapter refers to the teaching the teachers of the programme conduct in their classrooms. It may include teaching children using the primer, big and
small books, creative writing, picture stories, writing experience stories, physical exercise, arts and crafts and local culture. An example of a small book story written in RPA can be found in Appendix F and the same story written in Thai-based orthography can be found in Appendix G. An example of a picture story used in teaching can be found in Appendix H.

4.1.4 Teacher training
“Teacher training” in this study refers to the training that the teachers and TAs in the programme received from the Foundation for Applied Linguistics (FAL) to prepare them to teach in the classroom. Topics covered in the teacher training included teaching methodology, classroom management and the development of learning teaching materials. Teacher training was conducted at least once a term. Teacher training was organized for all teachers and TAs before the start of each new school term, and was also held during school holidays and term time.

Teacher training also included workshops in which teachers and TAs from the relevant grade level came together to develop materials and lesson plans to be used for the following school year. These workshops were conducted during the school term. Teacher training and workshop were held usually for two to five days at the RES office or at one of the project schools.

4.2 Hmong teaching assistants
During the interviews I conducted with the Hmong TAs, I asked them how they felt about their own teaching and the teacher training they had received. I recorded, transcribed and translated their responses into English.

I conducted classroom observations in the KG 1 and KG 2 classes, and the narrative in this chapter includes data from these observations.

4.2.1 Teaching in practice
This section discusses the views of the TAs of their own teaching in the classroom. When asked how they felt about their teaching, most of the TAs responded that they were happy and proud to be able to teach. They were especially happy when they heard their students calling them “teacher”.

... help to translate Thai to Hmong for children ... (TA R)

... local teachers are like translators for kids when they learn in class ... (TA W)

The teaching assistants said that using the same language as the children put them in a better position compared with that of the Thai teachers because they were able to communicate with the children in the classroom and be understood. Most of the children did not know how to speak Thai when they started school because they speak Hmong exclusively at home. The TAs described themselves as being a bridge between the school and the children, including their families, and also as a translator for the children, from Thai to Hmong and Hmong to Thai.

A few of the newer TAs expressed that they were not very confident in using the teaching methodology for the various materials used in the classroom, e.g. big books,
small books, experience stories and the primer. This may be because they did not have an opportunity to attend any teacher training events when they joined the school, as no official teacher training was being conducted during that time. These teachers received informal training from more experienced teachers, and they also learned by observing the experienced teachers in the classroom.

The TAs who had been teaching in the schools for a longer period of time reported that they did not have any problems with their teaching. However, they expressed the need for help in thinking of interesting activities to go with their lessons because the lesson plans were sometimes not detailed with regard to the activities to be conducted. My classroom observations revealed that a ten minute lesson was conducted instead of a 20 minute lesson. Some of the activities listed in the lesson plans were easy for the children so they could finish them quickly. The teaching assistants did not know how and were not guided on how to extend the activities to make them appropriate and/or interesting for the children. Some classroom observations showed that the KG2 lesson plans for those weeks had not been finished and the TAs had to devise alternative lessons to teach on their own. I conducted classroom observations during the first year of programme implementation in the KG 2 classrooms, and some of their materials and lessons plans were not ready to be used.

From the KG 2 classroom observations I conducted in the schools, I found that teachers who went through the teacher training were able to apply what they learnt in the classroom. There was a difference in their teaching in the first and second term of the school year. In the first term, the teaching assistants were not able to get the teaching methods right, and had to refer to the training guide when they taught. By the second term of the school year, however, they were confident in their teaching and were no longer referring to the training guide.

4.2.2 Teacher training in practice
All teachers went for teacher training before they started a new school term. They were trained in the teaching techniques and methodology for using the teaching materials. And, during the school term, workshops were conducted for teachers to develop their materials especially for the level that they would be starting the next school year, to edit lesson plans and observe each other's lessons. A couple of the teachers' responses to these trainings are presented below:

Good training, if I did not get the training, I will not be able to teach... (TA Y)

[training] good, each time not the same. The training can be used in class. (TA N)

When asked how they felt about the training they received, the TAs said that it was enough for what they needed to do. The training they received before the school term started helped to prepare them and teach them the methodology they needed in order to teach the material. They thought the training was practical and gave them the confidence to teach. They said they needed more training on classroom management and on how to motivate the children as they had problems managing the children in their classrooms. Some of the classrooms had more than 25 children.
4.3 Thai Teachers
In this section, I discussed the views of the Thai teachers regarding the teaching of the TAs and their own roles in the classrooms. I used questionnaires to gather information from the Thai teachers in KG 1, KG 2 and Grade 1 in the schools involved in the pilot project. The Thai teachers were asked for their opinions on the teaching of the TAs, their own responsibilities and roles in the classroom and the children’s learning.

Notes from my classroom observations of the KG 1 and KG 2 classes were also included in the analysis presented in this section. I did not observe the Grade 1 classes because the programme had not yet been extended to that grade level when I conducted my observations.

4.3.1 Teaching practice of the Hmong teaching assistants
...being a bridge between teachers and community. Local teachers are experienced in teaching and that makes the students happy to study. (Teacher E)

When the students don’t understand some Thai words, the local teachers will come to help translate and communicate with students. (Teacher K)

The Thai teachers commented that the Hmong TAs were able to communicate well with the children and their parents because they had a common language. They were like a bridge between the school and the parents. The TAs were able to communicate to the parents about the progress of their children and matters relating to the school.

There were two Thai teachers who recommended that the Hmong TAs use more Thai in their teaching as they believed it would help the children learn Thai faster.

[TAs] interact with kids and parents well but have to learn more about how to keep children and take care of children (Teacher F).

Local teachers make kids understand and can respond well. Classroom is clean. Lots of kids’ work. The teaching of local teachers improves. Parents start to understand the teaching method of local teachers... (Teacher L).

The Thai teachers said that the TAs used good teaching methodology and activities when they taught, and that they also showed improvement in their teaching ability over the school year. The difficulty that they had, if any, was classroom management. The classroom management issue was also noted by teachers, TAs and myself during classroom observations. Some of the TAs were not able to manage the children in classroom, and thus they were somewhat noisy and inattentive during lessons. I found during classroom observations that one of the reasons the children misbehaved in class was that the TAs were new and had no experience with children. The Thai teacher was not there to help in class. Another reason for the students’ misbehaviour was that the classes were big, with more than 25 children, and the TA was not able to manage the children alone.

4.3.2 Role of Thai teachers in class
In this section, I discussed the views of the Thai teachers on their roles and responsibilities in the classroom since the implementation of the pilot project in their schools. Below are some of the Thai teachers’ comments:
I participate by helping to prepare the curriculum, teaching plan, materials, evaluate kids’ development, follow up and provide consultancy to local teachers in their teaching and seek solution together (Teacher M).

I prepare teaching plans, materials and suggest teaching techniques to local teachers (Teacher I).

I am there to help and take care of everything such as how to teach, how to keep the kids, teaching techniques, how to control kids and be there when the local teachers teach (Teacher B).

I am involved in teaching just a little bit, only 15 minutes in the morning and 15 minutes in the afternoon (Teacher C).

The Thai teachers said that they helped to prepare materials and lesson plans so that they would be ready to be used. They also gave suggestions to the Hmong TAs on their teaching and classroom management. When the TAs were teaching, the Thai teachers helped to manage the classroom and made sure the children were listening and not misbehaving. The KG 1 and KG2 Thai teachers had a lighter teaching load in the pilot project compared to past years when they taught in the regular programme because they taught Thai using total physical response (TPR) for only fifteen minutes twice a day, and the Hmong TAs taught the other subjects.

During my observations in the KG 1 and KG 2 classrooms I noted that there were occasions in which the Thai teachers were either not in class most of the time, or, when they were in class, they were passive in helping the TAs discipline the children when they misbehaved. The Thai teachers sometimes had to leave the classroom because they had administrative work to do or errands to run. Sometimes a single Thai teacher was shared between two classrooms and so she could not be in one classroom all the time to help. There was a shortage of teachers in some schools because when teachers transferred out of the school there was some lag time before a replacement was found. While waiting for new teachers, the existing Thai teacher had to take care of two classes.

There was difficulty in communication because the kids don’t understand Thai while teachers don’t understand local language (Teacher A).

In the beginning, the local teachers help in communication with the children. When the kids are familiar with Thai and TPR is used, kids can understand commands better (Teacher M).

The Thai teachers reported that they had difficulty communicating with the children because most of the teachers did not speak Hmong and the children spoke little or no Thai. The Thai teachers would ask the TAs to translate when they needed to communicate with the children. However, as the academic year progressed, the Thai teachers could communicate more and better with the children because the children started to speak more Thai. What the Thai teachers have seen is the children’s basic interpersonal communicative skills being developed by the end of the school academic year. There is a distinction between basic interpersonal communicative skills (BICS) and cognitive academic language proficiency (CALP). Research shows that conversational aspect of language proficiency can be attained at a peer-appropriate level within two years of L2 exposure, but a period of five to seven years or longer is required.
to reach grade norms in academic aspects (Cummins 2000). The Thai academic language proficiency of the children still needs to be developed and it will be in the upper primary level that the Thai teachers will see the children achieve grade norms in academic aspects in using Thai language for their learning.

4.4 School principals
This section I discussed the school principals’ views on the teaching of the Thai teachers and TAs, the children’s learning and pilot programme in general as it was being carried out at their schools. The school principals of the four schools involved in the project were each given a questionnaire (see Appendix D) asking them for their opinion of the teaching of the TAs and Thai teachers in their own school. The questionnaire also asked about the children’s learning and the project in general. The school principals were also asked to list the type of help they received from outside agencies for the programme and other help they would like to receive. The following section is an analysis of the data collected from the school principals and also notes from my informal interviews.

4.4.1 School principals’ views of the teaching assistants
Teaching atmosphere is happy. [teaching assistants] Can communicate. Should control children to have discipline and teach the children to be responsible (School principal A).

The local teachers teach with high intention and devotion. They follow the steps very well (School principal D).

The school principals think that the TAs in their schools were able to teach well, with exception of a few of the TAs. The only problem they noticed with the work of the TAs was in regards to classroom management, and they attributed this to a lack of experience. From my personal observations, the principles’ impressions that the children were out of control in the classroom could have come from the fact that the activities conducted in the classes were more participatory and children tended to get excited doing them. The children in the pilot project had more active participation in class as compared to children in previous groups who were not in the programme, and this could give the impression that the children were not managed well when principals walked past the classrooms.

There is good co-operation between Thai and local teachers. There is fairly good interaction with children because there is understanding between teachers and students (School principal B).

[teaching assistants develop] Public relations with parents to understand [the programme] (School principal C).

The TAs had good interactions with the parents, children and Thai teachers. The school principals saw that the TAs’ relationships with their Thai colleagues were good and they related well to the children in their classrooms. They also had a common language with the children and their parents.
4.4.2 School principals’ views of the Thai teachers

Good interaction with children and parents. Always take care of children (School principal B).

The school principals’ questionnaires showed that the Thai teachers had good interaction with the teaching assistants, parents and children in their class. The principals said that the Thai teachers were in the classroom to help take care of the children and manage the children when the teaching assistants were teaching.

The classroom is nice and clean. There is proper studying environment. Thai teachers teach with intention and high efficiency. Thai teachers meet with parents, which leads to excellent interaction and great understanding of each other (School principal D).

Thai teachers teach with intention and high efficiency (School principal C).

The school principals also said that the Thai teachers helped to make the classroom into a nicer learning environment for children. They organized learning corners for the children so that they would have different activities in the classroom. The Thai teachers also aimed to teach well and efficiently in class.

One of the principals said that the Thai teachers had less teaching to do now as compared to before the pilot project started. One of the problems that some of the school principals reported having to grapple with was that some of the teachers were not committed to the programme. But generally, the school principals expressed that they were happy with the work of the Thai teachers in their schools.

From the informal interviews I conducted with the Thai teachers and TAs, I learned that some of the KG 2 lesson plans were not ready. During the teacher training for KG 1 and KG 2 teachers before the start of a new school term of the third year of the project, it was found that the lesson plans of the KG 2 were still not complete though the teachers had taught for a year. There were missing activities and components of the curriculum which needed to be added in to the lesson plans so that they could be used for the next school year.

My classroom observations confirmed that the Thai teachers were not in classroom some of the time because they had other responsibilities outside the classroom. Some of the Thai teachers did not help their TAs prepare for the lessons. This caused some conflict between the Thai teachers and the TAs. However I do not know if the school principals were aware of the issue. The issue of the lesson plans not being ready was reported to the principal of the teachers involved. I do not know what action was taken to resolve this problem.

4.4.3 School principals’ views of the project in general

In the questionnaire, the school principals were asked about the type of help they received and the additional help they needed for the programme in the school.

All the support makes the programme run smoothly, quickly, efficient and very effective for the kids (School principals C and D).
They said that they received financial assistance from OBEC, FAL and RES to pay for the salaries, trainings and learning material development in the programme. FAL conducted trainings before each school term to train teachers in teaching methodology and led workshops to develop materials, lesson plans and curriculum. The community provided the cultural knowledge that was used in the learning materials for the classes.

The school principals said they would like to have more expertise and financial help to run the programme in the schools. At times, the schools did not receive the funds on time to pay their TAs, so they expressed that they would like the funds to be more prompt in reaching the school. Also, they would like to have more funds with which to purchase equipment and resources for the schools to use in the programme. One of the principals commented in the questionnaire that he "wanted the Education department to budget the cost for local teacher better to create security for the teachers. Budget the cost based on real conditions and give reasonable benefit" (School principal B).

Education should start from easy to difficult. Especially in communication, it is important to start with language that is easy to understand which is the local language. Then bridge to the second language or technical language. When kids can communicate, the activities can move on (School principal C).

The school principals expressed their belief that using the children's mother tongue in early education would help them develop their Thai language skill at a later stage. They saw it as a bridge for the children to learn Thai and as part of the formal education for the children. The principals felt that the use of Hmong language and culture in class materials would help to preserve tradition and culture of the children. They said that MTBMLE is a sustainable education model as teaching resources can be found locally. The children who went through the first year of pilot programme had better development and results when compared with children of their age in another school who did not use the mother tongue of the children as the language of instruction in their schools. This was seen in a comparison of the results of the pre-and post-tests conducted in their schools and the control schools in which children in their schools scored better than children in the control schools.

All the school principals said that they supported the project and that it was beneficial for the children. From my interactions with people who were involved in the project, however, there were situations in which it was difficult to get support from the school principals, especially in terms of releasing money for workshops. The principals wanted to keep the money to pay their staff as the funds from OBEC were delayed in reaching them. Also, there was a situation in which one school principal promised something for the workshop but the other school principals were not aware of it. Information was not passed promptly to the rest of the school principals, and there may have been miscommunication of information at times too.

4.5 Summary
One key role of a teacher is to build a “caring and safe interactive atmosphere by creating rapport, cohesiveness and solidarity among classroom members” (Xie 2008: 17) where students will feel secure to speak out, offer suggestions, voice opinions, challenge the teacher's or other students' thoughts and opinions with the knowledge that their contributions are welcomed and valued and that their mistakes are acceptable (ibid). Although some of the TAs may not have been confident to teach well, all the TAs were able to create a “safe” environment for the children in which they could speak up
and participate in classroom activities because of the common language that they spoke. From my classroom observations, the TAs tried to involve their children in the classroom activities and the children were responsive to the questions asked in class. The TAs “speak the language of the community and are comfortable using that language in an academic setting” (Dutcher 2004: 21) making learning easier for the children because they could understand what the TAs were teaching in class. The common language that the TAs and students shared made the children feel “safe” in the classroom environment, making it a place where they could speak out and voice their opinions. The students could also gain knowledge taught in school in a language that they knew before a second language was introduced. When the second language was introduced, children did not have to learn the subject content again. The TAs were able to help explain what the children had learned in school to parents who were interested to know, and this in turn helped to increase parents’ participation in their child’s learning. The “caring and safe interactive” atmosphere was also carried into the lessons taught by the Thai teachers, seen at times when the children were brave to speak up and participate in the activities conducted by the Thai teachers even though they did not yet speak much Thai.

The success of a teacher’s or TA’s teaching is dependent not only on his/her teaching ability, but the training and help they receive are also factors that determine their success in a classroom situation. The teacher training that the Thai teachers and TAs received prepared them to teach in the classroom. The practice that they got during training also helped to develop their confidence in teaching. The help that the teachers and TAs gave each other in the classroom helped them learn to manage the children and make the learning environment more pleasant for the children. According to Wells (1999: 333), “learning will be most successful when it is mediated by interaction that expresses mutual respect, trust and concern”. Thai teachers and TAs helped create the kind of interaction that helps children to learn in class. When a teacher was not able to be in the classroom most of the time, it was difficult for the teacher to know what type of help his/her TA needed. The teacher’s absence hindered mentoring and made it difficult for them to offer help to the TAs when it was needed. A confident and well-equipped teacher/TA should be flexible and able to adjust their teaching to suit the needs of the children.

The perception that a school principal had of the teaching of a teacher/TA depended largely on what he had seen or heard being done in the classroom. At times, this perception could have been affected by the attitude that a teacher/TA had with regards to other issues such as salary and workload. The principal’s perception could also have been influenced by the education level of the TAs. The difference in education level between the Thai teachers and TAs may have had a part to play in shaping the perception that the school principals had of the TAs. Most of the TAs had a lower education level than the Thai teachers, and they may thus have been perceived as lacking in ability. Their role as teaching assistant to the Thai teachers (although they taught most of the lessons in the classroom) might have given the impression that they had less capability than the Thai teachers. Additionally, from a sociolinguistic perspective, the TAs being from an ethnic minority may have affected how they were viewed by the principals who are of Thai ethnicity.

According to UNESCO (2006), having regular and appropriate training is more important than having a one-time training for an extended period of time at the beginning of the programme. Bringing teachers together for in-service training is a social learning experience in which teachers can share their experiences and learn from
one another. And this is what I have seen happening in the pilot project in the four schools. There is an attempt to bring the teachers and TAs together for in-service trainings via material development workshops and lesson observations across the schools according to their grade level, which helps to develop their capacity.

There is a distinction between basic interpersonal communicative skills (BICS) and cognitive academic language proficiency (CALP). Research has shown that the conversational aspect of language proficiency can be attained at a peer-appropriate level within two years of L2, exposure but a period of five to seven years or longer is required to reach grade norms in academic communication (Cummins 2000). Cummins (2000) expressed the difference between BICS and CALP by noting that native speakers of any language who go to school at age five were fully competent users of their language. They acquired the “core grammar of their language and many of the sociolinguistic rules for using it appropriately in familiar social contexts” (BICS) and yet schools have to spend another twelve years attempting to “extend this basic linguistic repertoire into more specialized domains and functions of language” (Cummins 2000: 59) (CALP).

Therefore, teachers and TAs in the pilot project should be trained to know the differences between BICS and CALP so that they can help to develop the academic language proficiency that children will need in order to progress successfully through the grades (ibid).
Chapter 5
Reported Outcomes

Research provides strong support for using the mother tongue of the students as the language of instruction in the classroom. The length of time a student from a minority language background has received formal education through the L1 is a strong predictor of how well that student will perform in his or her education in the long term. The language minority students who had five to six years of strong cognitive and academic development through their L1 as well as L2 did well in Grade 11 assessments (Thomas and Collier 1997, 2004). Also “the more children develop L1 academically and cognitively at an age appropriate level, the more successful they will be in academic achievement in L2 by the end of their school years...” (Thomas and Collier 1997: 49). In order for language minority children to succeed in their education, having their schooling done in their mother tongue for as long as possible, before moving on to the national language helps to keep them in schools longer than education done in a language that they do not know as well as their mother tongue. Studies have also shown that “children’s L1 is the most efficient language for early literacy and content area instruction. Late transition to education in L2 is more effective than early transition” (Ball 2010: 20).

Studies have shown that mother tongue-based education at the primary level does not negatively affect a child’s ability to learn additional language(s). A learner’s fluency and literacy in the mother-tongue lay a “cognitive and linguistic foundation for learning additional languages” (Ball 2010: 2). The gradual transition to academic learning in the second language after receiving formal primary education in the learner’s mother tongue will help him/her learn the second language quickly. The transition from mother tongue to second language must not be done too soon or too abruptly as it can affect learners’ self-confidence and interest in learning (ibid). According to Baker (2006) the use of mother tongue in education is important for children’s achievement, self-esteem and for learning the second language. This is because “academic and linguistic skills in a minority language transfer relatively easily to the second language” (Baker 2006: 330).

5.1 Requirements for sustainable and successful mother tongue-based education

According to Malone (2008), there are many components of a sustainable language development or multilingual education programme (Figure 4). The orthography must be acceptable to the majority of the stakeholders and helps to promote reading and writing in the language. All staff must gain competence, creativity, commitment within and outside the community through training and supervision. There must also be a system in place to make sure that curriculum and instructional materials that are developed can be tested and revised so that they are relevant and appropriate in the community. The process of developing learning materials can be a way of standardizing a writing system as learners read and write in their mother tongue (UNESCO 2006:41). Gaining practice using the orthography is especially important for languages where the
orthography is new as in the case of this study which used the newly revised Hmong Thai-based orthography.

Figure 4 Requirements for Sustainability of Language Development and Minority Language Education Programs (Malone 2008)

Multilingual education programmes also need the support of the government, thoughtful planning, careful preparation and collaboration between agencies, organisations and individuals. The local community is especially important in planning and implementing programmes for their own communities (UNESCO 2006).
Ball (2010) has also listed the various stakeholders and resource elements that are needed to support successful mother tongue-based bi/multilingual education (Figure 5). The mother tongue-based bilingual programmes in Mali, Papua New Guinea and the Pu_nana Leo programme in Hawaii are examples of strong programmes that show intersection of many of these factors including “government policy, political will, language activism, parent demand, community involvement, teacher training, resource development and cultural pride” (Ball 2010: 43). If careful consideration is given to the factors outlined by Ball (2010) before implementation of a MTBMLE programme the programme will have a greater opportunity to be successful.

Both Ball and Malone stress the need for teachers and staff involved in MLE programmes to be trained and competent to do their roles. The pedagogy to be used by the teachers in the education programmes must be appropriate and effective. Community involvement is crucial so that the community feels a sense of ownership for the programmes. There must be mobilization within and outside the community to generate interest and support for the programmes. Also the language to be used in the
programme has to be a written language and there must be appropriate literature produced using the written language. Regarding the requirements for sustainable and successful mother tongue-based education programmes, Malone focuses on putting systems and processes in place for the education programmes whereas Ball focuses on developing appropriate curriculum and instructional approaches.

5.2 Benefits of mother tongue-based multilingual education

Research has shown that MTBMLE programmes help to improve the quality of education especially for ethnolinguistic minority children whose first language is not the language of instruction in the national schools. The use of the learners' mother tongue for beginning literacy and initial instruction before introducing a second language as a language of instruction helps learners stay longer in the education system, which in turn provides them with greater opportunities for further education and future employment (UNESCO 2005).

Mother tongue-based multilingual education focuses on using a learner's mother-tongue as a language of instruction in his/her education. It takes away the stress of having to learn both the content and the language for the learner. The longer a learner gets to learn using his/her mother tongue, the greater the advantage for him/her academically. Mother tongue or L1 literacy enables "relative ease of learning (and learning through) a second language by the transfer of knowledge, language abilities (e.g. literacy strategies, communication skills) and learning processes" (Baker 2006: 295). Research has shown that the transfer of literacy skills and strategies happens between languages that have similar writing systems or different writing systems (Baker 2006). Children in a MTBMLE programme can perform well in learning a second language too.

One outcome of a bi/multilingual programme is increased parent participation (Ball 2010, Cummins 2000, Malone 2003) in school affairs and their children's learning. This is because parents have a common language with the teachers and can use it to communicate with them regarding matters related to their children. Parents can be more involved in their children's education and be given a "real opportunity to participate in decision-making about their children's schooling" (Benson 2005: 14).

According to Malone (2007), a strong and well-planned mother tongue-based multilingual education programme helps children build a strong educational foundation, build a "good bridge" to a second language (L2) and additional languages and ensure that children achieve "educational competencies or standards established by education officials for each grade" (Malone 2007: 4). A strong MLE programme will also enable children to gain competence and confidence in using the new language(s) for communication and for learning new and abstract concepts. Learners will also grow in their ability to "understand, apply, analyse, evaluate and create new language" (UNESCO 2006:15).

Mother tongue-based education can also be effective in maintaining the learners' home language, especially if compared with language minority children who are placed in mainstream education. Children in strong and well-implement mother tongue-based bi- or multilingual education can perform as well as children in mainstream education in curriculum areas such as geography, mathematics, science and history. There is "no loss in curriculum performance" for children who are educated in their mother tongue (Baker 2006: 279), even if it is a minority language. Learning in a language they
understand makes schooling a positive experience for children, and results in positive
attitudes toward learning and enhanced self-esteem (ibid).

5.3 Reports about children’s performance
This section discusses how the Thai teachers, school principals and Hmong TAs view the
performance of the children who are in the pilot project.

Children want to learn more...more interested now...will ‘fight’ to answer
questions (TA O).

Children can write better, hold pencil correctly, draw nicer too ... imagination of
the children is developed...more exposed...elaborate what they have drawn...
(TA I).

Children dare to express themselves...all want to participate, raise their hands,
don’t know who to choose (TA R).

Children may not know the letters yet but dare to express themselves, speak out
and tell stories. Most of them look like they are not afraid to speak wrongly
because there’re local teachers ... (TA Y).

Children want to go to school because they have Hmong teachers to help explain
lessons (TA M).

Kids are happy, can express themselves, pay attention and focus in assignments
given (Teacher I).

Most of the principals, teachers and Hmong TAs said that the children are happy and
want to go to school. The absentee rate has decreased and children have been regular in
attending school. Those children who do not go regularly tend to skip school because
"their parents do not understand the project, they bring them to the fields" (TA K).

Teachers observed that, during lessons, the children were eager to express themselves
and participated actively in class activities. They volunteered to answer questions and
were vocal in giving answers. The classroom observations I conducted confirmed the
observations of the teachers, TAs and principals.

...they [children in this project] have better development. Children who are not
in the programme are quiet and dare not talk much in class. When teacher asked
them questions, they do not answer as they do not understand. They are not so
active too as compared to those in the programme. Those in the programme are
more willing to participate in the class activities ... (TA S).

According to the teachers, TAs and school principals, the children were creative and
confident and they had good comprehension of the material in class. They participated
actively and performed well in answering questions and giving their opinions in class.
They also performed better when compared to the children in schools which did not use
the children’s mother tongue as the language of instruction. The teachers in each of the
pilot project schools conducted pre- and post-testing (Appendix I) with the children in
their school and a control school at the beginning and at the end of a school year. The
KG 1 children were tested in their ability to speak and understand Hmong and in their
ability to understand Thai. The KG 2 children were tested in their listening, reading and writing ability in Hmong. They were also tested in their Thai language comprehension and speaking skills. The children in the pilot project did better than those not in the project in the post test result (Appendix J). A TA who went to evaluate the children at a control school said that the children in that school sat quietly and did not dare to reply when he asked them questions. He was not sure if it was because he was a stranger to them or because they really did not know how to reply. He mentioned that the children in the control school “felt strange having a Hmong teacher speak Hmong to them” (TA T) and they just smiled at him when he asked them questions. The children in the control school were not used to using Hmong in school for their learning.

Some of the children were reportedly also getting bolder in trying to communicate with the Thai teachers even though their Thai language skills were still quite limited. Their boldness and interest in communicating with the Thai teachers seems to indicate that the educational method and classroom interaction has instilled confidence and inquisitiveness in the children.

5.4 Parents perception

I did not have an opportunity to interview the parents of the children studying in the pilot project directly. The data presented in this section are from feedback I received from the Thai teachers, TAs and school principals, personal communication with the FAL consultant and observations of parent meetings conducted in the four schools.

Parents are not so happy in the beginning of the project but now ok as their children can tell them what they learn in school (TA A).

Parents wonder why the school doesn’t use RPA, they are worried that their children will be confused with Thai. If they use Thai-based orthography, [they] wonder if it is still Hmong. But with explanation [from the local teacher] they accept. Now don’t hear anything from them (TA U).

Some parents say if it [the programme] is beneficial to the kids, they will send their kids to school. Also they say they send their kids to school to learn Thai, not Hmong. But such group [who oppose] is small. Most parents are happy to have local teacher teach in the class as they can communicate with their children. They [teaching assistant] can also call them when their kid is sick or when school needs to find parents. They are confident that there is someone in the school who can help to take care of their children (TA T).

The TAs told me that some parents they spoke to were apprehensive of the programme initially. The parents did not understand why the school decided to use Hmong to teach when the children were already using it at home. Also, parents said that they sent their children to school to learn Thai, not Hmong. The TAs had to explain the rationale for using Hmong in the classroom based on the information they learned during the teacher training. They told the parents that using Hmong as the language of instruction would help their children learn better, as their children could now understand and participate during lessons in class. The TAs also told the parents that using the Thai-based orthography would make it easier for their children to learn standard Thai in the upper grades. The TAs believed that the transfer of literacy skills from Hmong to Thai would be easy for bilingual speakers of languages using the same script (Smalley 1994), although research indicates that transfer of literacy skills also does occur between...
languages using different writing systems (Kenner 2004). The parents usually accepted their explanation. Some of the parents were still not sure how the programme would be beneficial but were willing to give it a try. They saw that their children were happy to go to school.

One man commented that his daughter is learning faster. He has seen results and is satisfied. A mother said her child is doing better in KG 2 when the principal asked her if her child is learning better now. A man who has children in KG 1, KG 2 and P3 is satisfied too, he said his children in KG are doing better (Fieldnotes 2010).

A few parents who attended the parents’ meeting said that their children were learning in school. The parents who had children of different ages attending school had the opportunity to compare their children who were in the pilot programme and those who studied with the traditional approach. They said that their children who were currently in the programme were learning in school and could share what they have learnt in school with them at home. These knew that their children were progressing in their learning in school through their own observation and via feedback they received from the TAs.

As the presentation continued, I could see some changes to the expression of this lady. At first, she was frowning a lot, but as the presentation continued, her frown disappeared and she seemed more relaxed. The feeling I got is that she seemed to begin to understand the rationale behind the project and the project itself more. She gave me the feeling that she had a lot of questions with regards to the project. She looked very interested throughout the session. And her thoughts/feelings were a bit more relaxed by the end of it. A group of women sitting in the middle of the room (right in front of the screen) looked very interested in what was being presented (Fieldnotes 2010).

The physical expressions of some of the parents I noted during parents’ meetings gave the impression that they were willing to accept the programme if it would benefit their children. Though I did not have an opportunity to interview the parents directly, the observations I made during the parents’ meetings confirmed what the TAs told me about how some of the parents’ were accepting of the explanation of the rationale for the programme. The pilot project will be going into its third year when the first group of children will be going on to Grade 1, and there is a concern that the parents may not want the programme to continue. This is because their children would no longer be in the pre-primary level and would be starting "real" schooling in Grade 1 during which there will be exams and tests. Parents may therefore be concerned that their children will not be reading and writing Thai like the children attending the schools in town. Parents may not want to let their children continue using Hmong in Grade 1 if they think their children are not learning enough Thai when they go to school. In the pilot programme, children start to write Thai in the second term of the school year.

In the beginning of the academic year of the third year of the programme, a teacher from one of the schools reported that several of the children had withdrawn from the pilot school and were attending schools in the town of Thoeng. The parents of these children may have been the ones who were not convinced of the benefit of using mother tongue in pre-primary education. They could afford to send their children to study in town and they opted to do so as they did not believe the programme was beneficial for their children.
5.5 Outcomes resulting from the involvement of Thai teachers and teaching assistants

This section looks at the outcomes from the involvement of the Thai teachers and TAs in their roles in the classrooms, in the development of learning materials and in capacity building.

There is a relatively high turnover rate of TAs and Thai teachers in the pilot schools due to transfer or resignation. Three of the schools had at least two staff (TAs and Thai teachers) who had asked to transfer or had resigned during the one year that I visited the project. New teachers and TAs have to be trained and taught how to teach using the materials. Also, follow-up classroom observations are needed to see how they teach. While waiting for new teachers and TAs to come to the school, the existing teachers and TAs had to help substitute teach in classes that were without teachers which increased their workload.

There were teachers and TAs who were still not proficient using the teaching methodology and learning materials in the programme, so retraining needs to be done.

Suggest the local teachers to use more Thai. If the students don't understand then explain to them [in Hmong]. This is learning as well as preserving culture at the same time (Teacher D).

Some of the Thai teachers still did not understand why Hmong must be used in schools as the language of instruction. They believed that children would learn Thai better by immersing them in the Thai language environment and that by knowing the Thai language, they would be learning the content of the lessons too. They equated language as knowledge whereby knowing the language means having the knowledge. Also they believed that they were preserving Hmong culture by using Hmong language to explain the lessons that children did not understand. The use of the local language only occasionally may not help to preserve the local culture.

Unlike the TAs who had a choice as to whether or not they wanted to be involved in the programme (they voluntarily applied to work in the pilot schools), the Thai teachers did not have a choice. They were assigned to the schools and to the grade they were to teach, so even though they may not have been convinced of the value of using mother tongue in education they had to be involved because they were teaching in the school. The Thai teachers were also concerned that the children were not listening to as much Thai as they should when they used Hmong as the language of instruction at the pre-primary level. They were also concerned that the children were not speaking as much Thai as the children who were not in the programme. The Grade 1 teachers said that the children who were in the programme were not speaking Thai well, if compared to previous groups of children who were not in the programme. Some of them were concerned that the children would not be ready to take the national test at Grade 3. Also, some of the Thai teachers had misunderstood the curriculum, and thus thought that they should not speak Thai to the children at all except when they were teaching TPR.

In the pilot project schools, almost all the teaching materials had to be developed by the TAs and teachers. This was something new for them, and they received training on how to develop the teaching materials. The Thai teachers and TAs may not have been used to having to develop materials because previously they used ready-made materials purchased from outside vendors. Some of the TAs proved to be more adept at
developing learning materials than others. The FAL consultant needed to work with the TAs to edit the materials so that they would all be usable in the classroom.

The Thai teachers teaching in the pre-primary level had less teaching time in the classroom and some of them may not have liked that. However, some of them may have liked it because they had more time to do other administrative work in the school. This led to the Thai teachers spending less time in the classrooms helping the TAs manage the classes and guiding them in areas in which they needed to improve. Even if they were in class, they did not have time to help the TAs.

Some of the teacher trainings were conducted over the holidays and I am not sure how the teachers and TAs felt about this. There was a dilemma regarding whether to have teacher development training or to give time for teachers to rest and recharge during the holidays. It seemed that there was not enough time during the holidays to conduct the training because the schools and/or Ministry of Education sometimes arranged other training and workshops for the teachers. Teachers and teaching assistants were given allowances during the training times in order to compensate them for having to work during the holidays.

In the implementation of the second year of the pilot project, the lessons plans for KG2 were not ready or were incomplete at the start of the school term, which affected the teaching of the TAs. In order to provide continuous teaching in the classes, some of the Thai teachers worked very closely with their teaching assistants to help prepare for the week’s lessons whether the lesson plans were available or not. However, some of the TAs were left to plan the teaching activities by themselves which was quite stressful for them, especially the newer ones. At the end of the second year of the programme, it was decided that two coordinators, one for the Hmong TAs and one for the Thai teachers, should be employed to help follow up on matters related to the programme. They would help to make sure that materials were developed, lesson plans were ready and assistance given to teachers and TAs whenever needed.

The Thai teachers helped build the capacity of the TAs by giving them suggestions on how to improve their teaching. By working as a team, they encouraged each other and worked to come up with solutions for difficult situations in the classroom. The children also benefited because the lessons were more interesting. The Thai teachers were also developing their own capacities when they mentored the TAs.

The Hmong TAs were trained to develop materials for the programme. Their capacity was being built through the teacher training and workshops they attended. With more experience in developing materials, they could write more interesting stories and develop better learning materials. The materials they developed and stories they wrote were based on the local culture and tradition of the children and thus were familiar to the children and culturally appropriate. From my observations and personal communication with the FAL consultant, I also found that the TAs who worked closely with their Thai teachers were the one whose teaching capacity greatly improved as compared to those whose did not work as closely with their Thai teachers.

The Hmong TAs were better able to assess how well the children learned in class because they had a common language with the children, unlike the Thai teachers. The TAs could teach the content of the lessons again in Hmong when children did not comprehend the Thai instruction.
5.6 Summary
A strong MTBMLE programme enables its learners to gain competence and confidence in using the new language(s) for communication and for learning new and increasingly more abstract concepts. Learners can grow in their ability to "understand, apply, analyse, evaluate and create new knowledge" (UNESCO 2006: 15). Even though FAL’s MTBMLE programme in the Hmong communities in Thailand is at a beginning stage of development, several benefits of a strong MTBMLE programme are apparent. Most of the teachers, principals and teaching assistants in the schools gave very positive feedback regarding the children’s learning and participation in class.

Parents who are supportive and/or have no opinions about the programme continue to send their children to the schools. Those who are against the programme and can afford to pay take their children out of the pilot schools and send them to another school. This is because parents feel pressured to have their children taught in dominant languages for perceived economic gains. If the use of children's first language is not promoted in parent education, through support programmes and in the learning curricula and materials for young children, many parents will still believe that their home language is not suitable for contemporary economic, technological and educational processes. They will not give priority to their home language as the primary language in raising their children to be ready for school and for life. Thus, awareness-raising campaigns can help parents understand the difference between “valuing education for their children and devaluing mother tongue-based education” (Ball 2010: 42).

The teachers' and TAs' skills in teaching and developing materials improved when they worked together as a team. They developed interesting lessons and materials for the children to use in the classrooms. There was a system in place to make sure that materials and curriculum developed for use in the programme were appropriate and relevant. The TAs who came from the local community were able to bring the local culture into the materials that they developed.

When children are motivated to learn in the classroom and parents are seeing the benefits of mother tongue-based education for their children, the pilot project is one step closer to being a successful multilingual education initiative. The data shows that children in the pilot project participate more actively in class activities and are happy to go to school. Their self-esteem and achievement are also greatly boosted (Baker 2006).

The potential for the pilot project to succeed in helping the children learn and stay longer in the education system is high when the L1 of the children is used for a long time. In this Hmong pilot project systems and processes have been put in place to ensure that teachers and TAs are trained to be competent, creative and committed; instructional materials are relevant and appropriate for the local community and interest and support for the programme is generated within and outside the community (Malone 2008).
Chapter 6
Conclusions

6.1 Findings and analysis
This section brings together all the findings presented in the previous chapters about the orthography, teaching and learning, teacher training, the pilot project in general and the accomplishments and reported outcomes from the implementation of the pilot programme.

6.1.1 Reading and writing Hmong using a Thai-based orthography
In the MTBMLE pilot project, the TAs were relatively comfortable using the new Thai-based orthography to write Hmong. Though they had not seen or used it prior to teaching it in the programme, they were able to learn to read and write using the new orthography within a month. Being literate in Thai helped them transfer their literacy skills to using the new orthography and for some of them, being literate in the Roman orthography also helped them learn the new orthography. When new TAs came to the programme, they were able to get help learning the orthography from the TAs who had been teaching longer. The more experienced TAs also improved their proficiency through helping the newer TAs.

There was a perception by several stakeholders that using a Thai-based orthography at the pre-primary level would make the transition from reading and writing Hmong to Thai easier. Some teachers and TAs expressed the belief that using a Thai-based orthography would help children learn Thai faster and more easily in the later grades. Representatives from the community and the pilot schools who attended the meeting in February 2009 to decide on an orthography for the pilot project were willing to use the Thai script because of the belief that doing so would aid learning Thai in the upper grades (Dooley 2009). This belief was confirmed in the interviews with the TAs when they said that the children would learn Thai easier with the Thai-based orthography taught in the programme. Though some of the TAs and teachers expressed concern that the children would be confused by the use of the same script for Thai and Hmong, the majority of them thought otherwise. Studies have shown that the transfer of literacy skills to reading/writing a second language happens readily for bilingual speakers of those languages if the languages use the same script (Smalley 1994). The transfer of literacy skills also happens when learning to read/write a language using a different writing system (Kenner 2004). According to literacy research with biliterate children, "different scripts operate by different rules. Even scripts which look similar have their special attributes." (Kenner 2004: 73). Therefore it was not actually necessary that the Hmong pilot programme use the Thai script to write Hmong in order to develop strong Thai literacy skills in primary school, but education officials from OBEC may not have been supportive of using a Hmong orthography that "looks very different from Thai" (Dooley 2009). A Thai script-based Hmong orthography was chosen for the pilot project because of the fear that the children would be at a disadvantage with regards to learning Thai. The RPA was actually the preferred choice of many parents because the Hmong community has an attachment to this orthography. If the RPA had been chosen, more
parents would have been able to be involved in the education of their children because more of them were literate in the RPA than in the Thai-based orthography, which was known only by the TAs in the project. The use of the RPA would also have reduced the burden on the project administrators of producing all materials from scratch because the project could have incorporated some of the commercially available RPA-based materials.

The TAs were able to learn the revised Thai-based orthography quickly after being employed in the project which shows that they were able to transfer their literacy skills between the Hmong and Thai orthographies. The TAs’ learning experience gives an indication that the children would be able transfer their literacy skills between scripts if the project had chosen to use an orthography that was not Thai-based.

To avoid confusion between reading/writing Hmong and Thai that the parents, teachers and TAs were concerned about, it is important that the children develop a strong foundation in learning to read and write Hmong using any orthography (in this case a Thai-based orthography), and that the transfer to reading/writing Thai be done well. A well-designed MTBMLE curriculum will include a plan for careful, systematic transition into reading and writing the L2. Smalley (1994) emphasized the need for a “well-designed curriculum” to enable the children to “read and write their own language ... along with the Standard Thai they are learning’ (Smalley 1994: 284).

6.1.2 Teaching and teachers training for the Thai teachers and Hmong teaching assistants
The ability of a teacher to teach effectively is greatly dependent on the training and help they received. The teacher training that the teachers and TAs received through the FAL teacher training and in-service workshops prepared them sufficiently to teach in the MTBMLE classroom. The practice that they got during training also helped to develop their confidence in teaching. The help that the teachers and TAs gave each other in the classroom helped them manage the children and make the learning environment more pleasant for the children. A confident and well-equipped teacher/teaching assistant is flexible and able to adjust his/her teaching to suit the needs of the children. Having confidence helps the TAs feel enabled and free to adapt their teaching to meet the students’ needs rather than feeling compelled do everything exactly the way it was taught in the training and workshops. Also, no matter how good the teacher training is, if the teachers and TAs do not use what they learned in class it is of little value.

The perception that a school principal had of the teaching of a teacher/TA depended largely on what he had seen or heard being done in the classroom. At times, this perception could have been affected by the attitude that a teacher/TA had with regards to other issues such as salary and workload. The principal’s perception could also have been influenced by the education level of the TAs. The difference in education level between the Thai teachers and TAs may have had a part to play in shaping the perception that the school principals had of the TAs. Most of the TAs had a lower education level than the Thai teachers, and they may thus have been perceived as lacking in ability. Their role as teaching assistant to the Thai teachers (although they taught most of the lessons in the classroom) might have given the impression that they had less capability than the Thai teachers. Additionally, from a sociolinguistic perspective, the TAs being from an ethnic minority may have affected how they were viewed by the principals who are of Thai ethnicity.
According to UNESCO (2006), it is more important to have regular and appropriate training than to conduct a one-time training for an extended length of time only at the beginning of the programme. This is because bringing teachers together for in-service training is a social learning experience during which they can share their experiences and learn from one another. I observed this kind of synergistic learning happening in the pilot project in the four schools. The FAL consultant brought the teachers and TAs together for in-service training in the form of learning-material development workshops and lesson observations between the schools according to grade level which helped developed the capacity of the Thai teachers and TAs.

There was a high turnover rate of teachers and TAs, and the replacement of teachers/TAs, which was beyond the control of the principals, did not generally happen quickly. Although it would have been ideal if the teachers and TAs informed the schools in advance of their plan to leave the school, this seldom happened. More has to be done to increase the job satisfaction of the teachers and TAs with the hope doing so will lead to increased longevity in their participation in the programme.

The TAs' salary was low compared to that of people working jobs available in more urban areas. All of the TAs were paid the same salary regardless of their education level. Those who stayed did so because they believed in the benefits of the programme and wanted to do their part to help. However, they had to face the reality of needing a higher income to meet the needs their families. Some of them reportedly resigned to look for a higher-paying job so that they could better support their family.

6.1.3 Project in general
Local initiatives are usually more sustainable than initiatives from outside (Kosonen 2005). The pilot programme was initiated by a supervisor from RES Chiangrai Region 4 who wanted to implement an MTBMLE programme in the schools under her responsibility because many of the students at the schools were from ethnic minority groups and did not understand and speak Thai (Tienmee 2009). This supervisor has since been transferred to another region to work and it is not known if the person who took over her responsibility has the same vision that she did.

Although opinion from the local community is important, I do not know if the Hmong communities associated with the RES Chiangrai Region 4 schools were consulted before the decision to implement the pilot programme in the four schools was made. The schools were responsible for mobilizing the community, obtaining local resources and selecting TAs to be trained for the programme. Schools were also encouraged by FAL to get local support from the community (Tienmee 2009). The schools did recruit teaching assistants from the local community. There were workshops conducted in which representatives from the local community were invited to share their knowledge of the traditions and culture of the Hmong. Some of the people in the local community were approached by the TAs to give feedback to the stories written by the TAs. They were asked whether the stories written were natural and fluent and whether or not the grammar was correct. There are plans in the pilot project to involve the local community more in the future.

Local language education may not be more costly than other basic education, especially if it also reduces retention and dropout rates of minority children (Kosonen 2010). However, if the school principals do not understand this benefit, they may be reluctant to spend more money initially for training workshops for the teachers and teaching
assistants. It may seem to them that the programme is costly and time-consuming as materials have to be developed by the teaching staff and money has to be spent on teacher training and various workshops. The general lack of finances in the schools, especially if improvement of the school facilities is also needed, necessitates that the principals prioritize spending of the school budget funds. In the Hmong pilot project schools I have noticed that the principals expressed concerns about funding sources for various workshops, and that they have been hesitant to release school funds for the development of the MTBMLE programme.

Local language education may not be more costly than other basic education, especially if it also reduces minority children's retention and dropout rates (Kosonen 2010). However, if the school principals do not understand this aspect, it will be a challenge to get them to spend more money initially for training and workshops for the teachers and teaching assistants. It may seem to them that the programme is very costly and time consuming as materials have to be developed by the teaching staff and money has to be spent on teacher training and workshops. The lack of finances in the schools especially if they have to improve the facilities and building of the schools makes the principals prioritize what needs to be spent first. In the Hmong pilot project schools, I have noticed principals expressing concerns about funding sources for various workshops, and that they have been hesitant to release school funds for the development of the MTBMLE programme.

6.1.4 Reported outcomes of using Hmong in schools
A strong MTBMLE programme enables the learners to gain competence and confidence in using the new language(s) for communication and for learning new and more abstract concepts. The learners grow in their ability to "understand, apply, analyse, evaluate and create new language" (UNESCO 2006: 15). Although the Hmong pilot project is not a full MTBMLE programme yet, the children in the pre-primary level are showing similar outcomes of learners in a strong MTBMLE programme. Most of the teachers, TAs and principals in the schools gave very positive feedback of the children's learning and participation in class. Children were bold to express themselves and participated actively in class activities. They volunteered to answer questions and were vocal in giving answers during lessons. Their attendance in school was regular too.

These results are similar to those from a study in Africa in which African educators reported that the use of the learners' first language in school "promotes a smooth transition between home and school, fostering an emotional stability that translates to cognitive stability" and enables the children to "learn better and faster and retain knowledge longer" (Ball 2010: 21).

The TAs in the Hmong programme were able to communicate matters about school to the parents of the children and to help to relay messages from the parents back to the school so that parents were able to be more involved in the education of their own children. They provided feedback to the parents on the learning progress of their children. Open communication between the schools and parents developed because they were able to use a common language, and neither side felt that attending meetings was a waste of time.

According to Malone (2008), a strong and sustainable MTBMLE programme has mobilization activities that "generate interest and support for the programme within and without the community". Therefore, communication with key stakeholders in the programme is important. If there is any misunderstanding or miscommunication,
discontentment can grow and will negatively affect the progress of the programme. In this pilot programme, some of the parents were concerned that their children were not learning Thai. Additionally, they thought that there was no need to learn Hmong in school because they used Hmong at home. The parents may also have been concerned that their children were not reading and writing Thai like other children in the schools in town. They may not have wanted to let their children continue using Hmong in Grade 1 as they believed that their children were not learning Thai and that they should be doing so when they go to school. In this MTBMLE programme, children start to write Thai in the second term of Grade 1. Therefore, it is imperative to gain the trust of the parents regarding the benefits of using the children’s mother tongue in education. The parents may not have understood the difference between gaining language skills and gaining academic knowledge in the subject content in their children’s schooling. They may have thought that if their children have the language skills, they will automatically have the knowledge. Thus, helping them to see the distinction between language and academic knowledge will be useful for gaining their support. If the parents become convinced of the benefits of using Hmong to teach academic content in the programme, they could be strong advocates for MTBMLE to the rest of the community.

The potential for the pilot project to succeed in helping the children to learn and stay longer in the education system is great when the L1 of the children is used for a long time. In this Hmong pilot project there are systems and processes in place to make sure that teachers and TAs are trained to be competent, creative and committed, that instructional materials are relevant and appropriate in the local community and that interest and support for the programme is generated within and outside the community (Malone 2008).

6.2 Recommendations

In this section, I will discuss recommendations for the pilot programme in the four schools. There must be plans in the bilingual education programme to bring the Hmong literacy level of the TAs in the Thai-based orthography to a higher level as the vocabulary they are currently using in their teaching is limited to the kindergarten level. The TAs have to continue to improve and develop more graded reading materials for the children and for themselves to read. This will help them become even more fluent in reading and writing using the orthography.

Schools should employ teachers who can read and write the Roman orthography very well so that they can learn the Thai-based orthography easily and fast. When teachers are confident, able to write/read, they make fewer mistakes and with fewer mistakes, others will not question their ability and rationale for such a project (TA W).

One of the TAs recommended that the project should employ TAs who are literate in the Roman-based Hmong orthography because it will be easy for them to learn the Thai-based orthography.

The transfer from using the L1 to L2 as the language of instruction and language of literacy must not be done in a hurry and must be done when the children are ready. If transition is done too soon or too abruptly, the learners’ self-confidence and interest in learning may be negatively affected (Ball 2010). There is no shortcut as it takes time for the transfer of L1 literacy skills to the L2 to take place. For young learners, it will take “three to four years of L1 literacy and development with oral L2 learning before they
The programme has to make sure that the teaching methods used for the transfer are appropriate and that the children are ready to learn Thai before they begin bridging into Thai. The teachers and TAs have to teach according to the curriculum and help build a good foundation in the L1 for the children. Children should not miss too many lessons (due to various reasons) that the curriculum for the school year could not be completed. The training for teachers and TAs has to be updated so that it takes into consideration current trends in the teaching profession.

The key stakeholders involved in the programme should come together to work out the plans for managing the programme. The management of the programme in terms of areas of responsibility, progression plans, training schedule, learning materials development and teacher training should be described in detail so that people who are involved know clearly what role they have to play. The local community can also be mobilized for greater involvement. They should be engaged in tasks related to the programme with which they are capable of helping, e.g. in learning materials development. Literacy classes in the new orthography can also be conducted for the community, including the parents, so that they can help to write more stories or help their children with their school work.

The current financial situation of the programme is such that the budget from OBEC is approved on a yearly basis. The plan is that the pilot programme will continue to Grade 3 and depending on the results, it may or may not be extended beyond that. The TAs are aware that external funding for the programme needs to be raised. The school principals feel stress from the fact that the programme is using more money than what they thought it would. A recommendation from the people involved in the programme is that a 3-5 year plan is needed especially in the area of financing. The training plan, learning materials development, staff needs and budget should be planned for three to five years in advance, not on a year-to-year basis. Advance planning would facilitate continuity and give assurance to the people involved in the programme that it will continue. A detailed training schedule should also be planned out a year in advance so that the school principals can work out their budgets and designate the funds needed for the scheduled teacher training, workshops and learning materials development. Sufficient funding must also be available for the programme.

Interest and support for the programme must also be generated among the staff in the schools. The rationale of the programme is not widely understood by the other staff at the pilot schools, so it would benefit the programme if support can be garnered from everyone in the pilot schools. The commitment of the teachers and school principals to the programme would be affirmed, too, through the interest and support of the other school staff. There must be a “shared vision, mission and goals among the staff” of the schools (Baker 2006: 314). It would be ideal if the leadership of the schools and programme have an “excellent knowledge of curriculum approaches to language minority children and communicating this to the staff” (ibid: 315).

If there is a system of differentiated salaries and an offer of future professional upgrades in place, the TAs would be encouraged and motivated to stay longer in the programme. The TAs should have opportunities to upgrade themselves and, for those who are interested, be encouraged to further their studies and be trained as qualified teachers. If the TAs are trained as teachers, the need to look for TAs to teach in schools would be reduced because the teachers would be bilingual in Hmong and Thai. The salary of the
TAs should be on par with their education level or with the national salary scale so that they are “appropriately compensated” (Robinson 2011: 42).

It is recommended that the MTBMLE programme in these schools be continued as long as possible, whatever the results will be from the national test in Grade 3, because the longer a child is able to learn using his/her L1, the better he/she will be able to do academically through the L2. The academic learning gets more difficult as the grade level increases, so continuing to use the children’s mother tongue in their learning as long as possible will help them to achieve better results than if they study exclusively in L2 when the academic content gets more difficult in the higher grades.

Teachers and TAs who have potential to be trained as trainers should be identified and trained. This will help to build up the capacity of the programme staff, and if the programme were to be extended to other schools, these programme staff could help train others.

The cultural perception of having two teachers in a classroom should be explored to find out why some Thai teachers were not in the classroom as much as we would have liked them to be. We need to find out if the Thai teachers’ frequent absences were due to a cultural perception that two teachers in each classroom was confusing the children regarding classroom authority or by other factors. Ways to improve the co-operation between the Thai teachers and their TAs should also be identified.

6.3 Further studies

The focus of this study is on the pre-primary education phase of an MTBMLE pilot programme in four schools, and the reported outcomes of the programme implementation come from the observations and reflections of the teachers, TAs and school principals. In order to know more about how the programme has benefitted the children who have gone through it, further assessment of the children’s learning is needed in later grades.

The long-term response of the Hmong community with regard to acceptance of the Thai-based orthography should be studied to determine whether the community does embrace it for long-term usage when it is used in the upper grade levels. The effects on the children’s learning of using the same script for the L2 (Thai) and L1 (Hmong) should be explored so that future MTBMLE programmes taking place in situation similar to that of the Hmong will have a case for reference.

The beliefs about language and education of the various project stakeholders should be explored to find out what they think about using a minority language in education. This will give us insight into why particular stakeholders do or do not support MTBMLE programmes and thereby help guide future mobilization efforts.
BIBLIOGRAPHY


Ball, Jessica. 2010. Enhancing learning of children from diverse language backgrounds: Mother tongue-based bilingual or multilingual education in the early years. University of Victoria.


Appendix A
HMONG ORTHOGRAPHIES

Chinese character, discovered between 1906-09
Savina Romanized alphabet, before 1917
Homer-Dixon Romanized alphabet, 1939
Romanized Popular Alphabet, 1951-53
Vietnamese Romanized alphabet, 1967-57
Chinese Romanized alphabet, 1957-58
Trung Thai-based alphabet, before 1932
Whitelock Thai-based alphabet, late 60s
Whitelock Lao-based alphabet, early 70s
Pathet Lao alphabet, late 60s
Pollard script, applied to Hmong Bo before 1922
Pahawh Hmong, 4 versions, 1959
Sayaboury alphabet

Appendix B
INTERVIEW QUESTIONS FOR HMONG TEACHING ASSISTANTS

1. รู้สึกอย่างไรเกี่ยวกับการสอนของตนเอง How do you feel about your teaching?
   a. รู้สึกอย่างไรเกี่ยวกับการอบรมที่ได้รับ How do you feel about the training you received?

2. คิดว่านักเรียนเรียนในโรงเรียนเป็นอย่างไร How do you feel the children are learning in the school?
   a. เล็กนักเรียนในกลุ่มโครงการนาร่องที่ใช้ภาษาแม่เป็นสื่อ แตกต่างจากนักเรียนที่ไม่เคยเรียนโดยใช้ภาษาแม่เป็นสื่ออย่างไร How are the pupils in this group (pilot MT-based programme) different from previous groups of pupils who have not studied in the MT-based programme?
   b. เล็กๆไปโรงเรียนรู้สึกอย่างไร How do the children feel about going to school?
   c. เมื่อเปรียบเทียบนักเรียนตอนเริ่มเรียนและตอนเรียนจบแตกต่างกันอย่างไร When you compare the pupils at the beginning and end of the school year, how are they different?

3. ท่านสามารถอ่านและเขียนภาษาฮงม้งด้วยระบบการเขียนที่ใช้อักษรอังกฤษและอักษรไทยได้ดีแค่ไหน How well can you read and write the Roman and Thai-based Hmong orthographies?
   a. ท่านรู้สึกอย่างไรที่ต้องเขียนภาษาฮงม้งด้วยอักษรไทย How do you feel about having to use the Thai-based orthography?
   b. ท่านคิดว่าการใช้อักษรไทยจะมีผลต่อการสอนและการพัฒนาสื่อเพื่อการเรียนการสอนอย่างไร How do you think using the Thai-based orthography will affect your teaching and the development of learning/teaching materials?

4. ท่านรู้สึกอย่างไรเกี่ยวกับการใช้ระบบการเขียนตัวอักษรไทยในการฮงม้ง What do you think about the Thai-based Hmong orthography?
   a. ระบบนี้มีข้อดีอะไร What is good about it?
   b. มีปัญหาอะไรบ้างในการใช้ระบบนี้ What are the problems you face when using it?
   c. มีการวางแผนอย่างไรในการปรับเสียงต่างๆที่อาจจะไม่เข้ากันหรือเป็นเสียงที่ยาก How do you plan to adjust/amend the sounds that may not be appropriate or have problems with?

5. ในหมู่บ้านนี้มีการให้ความรู้ด้านการศึกษาอื่นๆ เช่น การสอนอ่าน-เขียน อะไร What kind of other education programmes, such as literacy classes, are there in the village?
   a. เพราะอะไรจึงมีหรือไม่มี Why or why not?
b. ใครเป็นผู้สอน Who’s teaching?
c. สอนให้ใคร Who are the learners?
d. ใช้ตัวหนังสืออะไร The type of orthography used?
e. การสอนนี้เกิดผลเป็นอย่างไร What are the outcomes of these programmes / classes?
Appendix C
QUESTIONNAIRE FOR THAI TEACHERS

1. ท่านรู้สึกอย่างไรเกี่ยวกับการที่มีครูท้องถิ่นเป็นคนสอน How do you feel about the local teachers teaching?
   a. การจัดระเบียบในห้องเรียน Classroom management
   b. การสอน Teaching
   c. การปฏิบัติต่อกับนักเรียนและ ผู้ปกครอง Interaction with the children, parents
   d. การสอนและการเรียนภาษาฮมง Teaching and learning the Hmong language

2. ท่านสื่อสารกับนักเรียนในชั้นอย่างไร How do you communicate with the children in the classroom?

   a. มีส่วนร่วมในชั้นเรียนมากน้อยแค่ไหน What is your level of participation in the classroom?

   b. ช่วยเหลือครูท้องถิ่นอย่างไร How do you support the local teachers?

3. เด็กๆเข้าใจสิ่งที่สอนหรือไม่ Are the children learning?
   a. ทราบได้อย่างไร How do you know?
4. How do you feel the children are learning in the school?

a. How are the pupils in this group (pilot MT-based programme) different from previous groups of pupils who have not studied in the MT-based programme?

b. How do the children feel about going to school?

c. When you compare the pupils at the beginning and end of the school year, how are they different?

5. Are you learning the local language? Why?
Appendix D
QUESTIONNAIRE FOR SCHOOL PRINCIPALS

1. ท่านรู้สึกอย่างไรเกี่ยวกับการเรียนของเด็กๆ How do you feel the children are learning in the school?

__________________________________________________________________
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a. เด็กนักเรียนในกลุ่มโครงการนำร่องที่ใช้ภาษาแม่เป็นสื่อ แตกต่างจากนักเรียนที่ไม่เคยเรียนโดยใช้ภาษาแม่เป็นสื่ออย่างไร
How are the pupils in this group (pilot MT-based programme) different from previous groups of pupils who have not studied in the MT-based programme?

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b. เด็กๆไปโรงเรียนรู้สึกอย่างไร How do the children feel about going to school?

__________________________________________________________________
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b. เมื่อเปรียบเทียบนักเรียนตอนเริ่มเรียนและตอนเรียนจบแตกต่างกันอย่างไร
When you compare the pupils at the beginning and end of the school year, how are they different?

__________________________________________________________________
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2. ท่านรู้สึกอย่างไรเกี่ยวกับครูไทย How do you feel about the Thai teachers teaching?
   a. การจัดระเบียบในห้องเรียน Classroom management
   b. การสอน Teaching
   c. การปฏิบัติตัวกับนักเรียนและผู้ปกครอง Interaction with the children, parents

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3. ท่านรู้สึกอย่างไรเกี่ยวกับครูห้องอื่น How do you feel about the local teachers teaching?

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__________________________________________________________________
a. การจัดระเบียบในห้องเรียน Classroom management
b. การสอน Teaching
c. การปฏิบัติต่อกับนักเรียนและผู้ปกครอง Interaction with the children, parents

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4. ท่านมีความเห็นอย่างไรเกี่ยวกับโครงการ What is your opinion of the project?
__________________________________________________________________
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5. ท่านได้รับความช่วยเหลืออย่างไรบ้างจากกระทรวงศึกษาธิการ ชุมชน และเจ้าหน้าที่ที่ดำเนินโครงการ What kind of help do you receive from the Ministry of Education, FAL, community and staff to run the programme?
__________________________________________________________________
__________________________________________________________________
__________________________________________________________________

a. ท่านคิดอย่างไรเกี่ยวกับความช่วยเหลือ / หรือการไม่ได้รับความช่วยเหลือ How do you feel about the help/ or the lack of it?
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b. มีความต้องการการสนับสนุนในด้านใดอีกบ้าง What else do you need?
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### Appendix E

**ALPHABET CHART**

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67
Source: FAL Hmong MTBMLE project
Appendix F
SMALL BOOK STORY USING ROMANIZED POPULAR ALPHABET

Noj mov npej tshiab

1. Niam thiab Dawb hlais nplej.
2. Niam thiab Dawb cub nplej tshiab.
3. Niam thiab Dawb ziab nplej tshiab.
4. Qaib noj nplej uas ziab.
5. Niam thiab Dawb caum ntes taw qaib.
6. Niam thiab Dawb mus tuav nplej tshiab.
7. Niam thiab Dawb ua zaub mov.
8. Niam thiab Dawb noj mov nplej tshiab ua ke.

Author: Duan Daw
Source: FAL Hmong MTBMLE project
Appendix G

SMALL BOOK STORY USING THAI-BASED ORTHOGRAPHY

น้อ ม่อ เบล เลี้ย (Eating new rice)

เนี่ย เที่ยว เค้ ไอละห์ เบล.

เนี่ย เที่ย เค้ จุ้ เบล เลี้ย.

เนี่ย เที่ย เค้ เยซี เบล เลี้ย.

ใช้ น้อ จ้อ เบล อว่า เเยซ.

เนี่ย เที่ย เค้ เขา เนตท้ เคา ใช้.

เนี่ย เที่ย เค้ มูห์ ตัว เบล เลี้ย.

เนี่ย เที่ย เค้ อว่า เเยซ น่อ.

เนี่ย เที่ย เค้ น้อ ม่อ เบล เลี้ย อว่า เก.

Author: Duan Daw
Source: FAL Hmong MTBMLE project
Appendix H
KG 1 PICTURE STORY

The story:

ทําลูกหมุน
เก็บลูกหมุน
ทําลูกหมุน
เล่นลูกหมุน

Source: FAL Hmong MTBMLE project
### Appendix I

**PRE AND POST TEST FOR KG 1**

แบบทดสอบก่อนเข้าเรียนอนุบาล 1 โรงเรียนบ้านรักแผ่นดิน ปีการศึกษา 2554

ชื่อ……………………………………………………………นามสกุล………………………………………ชื่อเล่น……………………………………

วันที่เกิด…………เดือน…………………พ.ศ.……………อาชวะ……………………………………บ้านเลขที่………………

หมู่บ้าน………………………………ตําบล………………………………อีabcdefghijklmnopqrstuvwxyzจังหวัด………………………………

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<tr>
<th>ผู้ทดสอบ</th>
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<th>การทดสอบก่อนเริ่มเรียนชั้นอนุบาล 2 (ค่าบ้านนอก 1)</th>
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<td>1.1 สังเกตว่าเด็กถือหนังสือถูกด้านหรือไม่ (กลับหัวกลับหางหรือเป็น (จับหนังสือถูกต้องได้ 1 คะแนน)</td>
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<td>1.2 สังเกตว่าเด็กเริ่มเรียนรู้หนังสือถูกต้องหรือไม่ (เริ่มที่หน้าแรกหรือภาพแรก) (ถ้าเริ่มต้นได้ถูกต้อง ได้ 1 คะแนน)</td>
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<td>1.3 สังเกตว่าเด็กเริ่มเปิดหนังสือจากหน้าแรกจนถึงหน้าสุดท้ายหรือไม่ (ถ้าใช้ได้ 1 คะแนน)</td>
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<td>1.4 เด็กสามารถบอกหัวข้อหรือประเด็นของหนังสือได้อย่างถูกต้องหรือไม่ (ถ้าใช้ได้ 1 คะแนน)</td>
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<td>1.5 เด็กสามารถบอกหัวข้อหรือประเด็นที่อ่านจากรูปภาพต่างๆได้อย่างถูกต้องหรือไม่ (ถ้าใช้ได้ 1 คะแนน)</td>
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<td>2.1 การจดจำเสียงพยัญชนะเด็ง</td>
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<td>ให้เด็กฟังคำพยากรณ์ที่เป็นภาษาแม่ของเด็ก 20 คำ โดยแบ่งเป็น 10 ข้อ ให้เด็กฟังและจดจำคำพยากรณ์ที่แผ่นสีม่วงเสียงเสียงของพยัญชนะเด็งเท่านั้นจากนั้นถามเด็กว่า ถ้าคำพยากรณ์เสียงเหมือนหรือต่างกันวิธีวัดผล : เด็กสามารถบอกคำพยากรณ์และคำของเสียงคำพยากรณ์ได้อย่างถูกต้องหรือไม่ (ถ้าตอบถูกต้อง ได้ข้อละ 1 คะแนน)</td>
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<td>ให้เด็กจับคู่ภาพตัวอักษรภาษาแม่ที่เหมือนกัน 5 คู่ (ก ข ค ฆ จ) วิธีวัดผล: เด็กสามารถจับคู่ภาพตัวอักษรได้ถูกต้องหรือไม่ (1คะแนน ต่อ 1คู่)</td>
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<td>ให้เด็กจับคู่ภาพภาษาแม่ 5 คู่ (ไข้ อห็ ฒื ม๋อ เตห็ ) วิธีวัดผล: เด็กสามารถจับคู่ภาพที่เขียนได้ถูกต้องหรือไม่ (1คะแนน ต่อ 1คู่)</td>
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<td>ให้เด็กจับคู่คำในภาษาแม่ 5 คู่ (เปล่ำเฮา ฆ๋อมัวห์ ฆ๋อเนจ้า กอเตอ ฆ๋อ น) วิธีวัดผล: เด็กสามารถจับคู่คำในภาษาแม่ได้ถูกต้องหรือไม่ (1คะแนน ต่อ 1คู่)</td>
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แบบทดสอบที่ 2.3 ทดสอบความเข้าใจภาษาม้ง (ภาษาแม่)
ให้เด็กฟังเรื่องเล่าสั้น ๆ ของม้งแล้วเป็นไปตามคำสั่งและเป็นเรื่องที่เด็กได้รับทราบจากนั้นให้เด็กตอบคำถามสั้น ๆ ราว 3-4 คำถาม (ตอบถูกข้อละ 1 คะแนน)

คำถามที่ 1 แม่ ม้า อูห์ ซี่ ป้ ชูง ลิ้น จ้า ยก? (เสือมีนิสัยอย่างไร)
คำตอบ: แม้ ม้า (สุริยา)

คำถามที่ 2 ดีมี่ เตราะ แม่มี ต่ออะไร?
(ตัวอะไรที่ถูกเฉยจับกิน)
คำตอบ: เตราะ (บาง)

คำถามที่ 3 ลุงที่ แนง ปาย ต่อ ยุน อำเภอ ย่า ลิ้น?
( นายทหารก้างลำลำอะไรอยู่)
คำตอบ: ลุงที่ ปาย (ล้างล้าน)

แบบทดสอบที่ 2.4 ทดสอบความเข้าใจภาษาแม่ (อังกฤษ)
ให้เด็กฟังเรื่องสั้น ๆ ของภาษาอังกฤษแล้วเป็นไปตามคำสั่งและเป็นเรื่องที่เด็กได้รับทราบจากนั้นให้เด็กตอบคำถามสั้น ๆ ราว 3-4 คำถาม (ตอบถูกข้อละ 1 คะแนน)

คำถามที่ 1 แม่ ม้า อูห์ ซี่ ป้ ชูง ลิ้น จ้า ยก?
ตอบ: เสือมีนิสัยอย่างไร?
คำตอบ: แม้ ม้า (สุริยา)

คำถามที่ 2 ดีมี่ เตราะ แม่มี ต่ออะไร?
(ตัวอะไรที่ถูกเฉยจับกิน)
คำตอบ: เตราะ (บาง)

คำถามที่ 3 ลุงที่ แนง ปาย ต่อ ยุน อำเภอ ย่า ลิ้น?
( นายทหารก้างลำลำลำอะไรอยู่)
คำตอบ: ลุงที่ ปาย (ล้างล้าน)
คําถามที่ 4 อ้าวที่ แม่ สอง ตัวหรือ?
(เลือกที่ไม่ถูกต้อง)
คําตอบ เลวกะ อู หน่อย มุม ปล่อย ตัว
(ถูกตามความจริง)

คําถามที่ 5 อูหนี้ เน่ง ปล่อย เอาก่อน อ้าว ตัว
ผัง?
(ถูกพร้อมก่อนปล่อยไว้)
คําตอบ อูหนี้ น้อย เล็ก มาก
(กินและเอาไปขาย)

คําถามที่ 6 ก้อ ข้า อ้าว อูหนี้ ดีๆ เล็ก ยืน ตัว
เน่งช UserId: 3 (
คําถามที่ 3 ทดสอบความสามารถ
ภาษาไทย
แบบทดสอบที่ 3.1 ทดสอบการจัดให้คำสั่ง
ภาษาไทย
วิธีวัดผล : เด็กสามารถปฏิบัติตามคำสั่งได้
ถูกต้องหรือไม่ (1 คะแนน ต่อ 1 คำสั่ง)
- หยิบดินสอ 2 เท่า
- เดินไปที่ประตู
- กระโดดตบมือ
- วาดวงกลม
- ลบวงกลม

แบบทดสอบที่ 3.2 ทดสอบการจัดให้คำถาม
วิธีวัดผล : เด็กสามารถตอบคำถามได้ถูกต้อง
หรือไม่ (ตอบถูกข้อละ 1 คะแนน)
คําถามที่ 1 หนูเป็นผู้หญิงหรือผู้ชาย
คําถามที่ 2 หนูอยู่ที่ไหนบ้าง?
คําถามที่ 3 หนูอยู่ที่ไหน?
คําถามที่ 4 บ้านของหนูอยู่ใกล้บ้านใคร
คําถามที่ 5 ที่บ้านของหนูอยู่ใกล้บ้านอะไร

<table>
<thead>
<tr>
<th>คําถามที่ 3.2</th>
<th>ทดสอบการจัดให้คำถาม</th>
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</thead>
<tbody>
<tr>
<td>วิธีวัดผล :</td>
<td>เด็กสามารถตอบคำถามได้ถูกต้อง</td>
</tr>
<tr>
<td>หรือไม่</td>
<td>(ตอบถูกข้อละ 1 คะแนน)</td>
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<td>คําถามที่ 1</td>
<td>หนูเป็นผู้หญิงหรือผู้ชาย</td>
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<td>คําถามที่ 2</td>
<td>หนูอยู่ที่ไหนบ้าง</td>
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<tr>
<td>คําถามที่ 3</td>
<td>หนูอยู่ที่ไหน</td>
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<td>คําถามที่ 4</td>
<td>บ้านของหนูอยู่ใกล้บ้านใคร</td>
</tr>
<tr>
<td>คําถามที่ 5</td>
<td>ที่บ้านของหนูอยู่ใกล้บ้านอะไร</td>
</tr>
</tbody>
</table>
เรื่องเล่าที่ใช้ทดสอบแบบทดสอบที่ 2-3 ทดสอบความเข้าใจภาษาม้ง

<table>
<thead>
<tr>
<th>ภาษาม้ง</th>
<th>ภาษาไทย</th>
</tr>
</thead>
<tbody>
<tr>
<td>ภูค เที่ย เนห้ ปล็ื้ื่ฮ่ำ ยั่ง</td>
<td>เสือกับนายพราน</td>
</tr>
</tbody>
</table>
| ม้ว ฮี่ ดุ้่้ฮ่ำ ฮ่ำว ๆ เญา เสิง อั้วดาระ ฮ่ำ เยก สื้ื่ฮ่ำ เยี่ม เหมื่่ฮ่ำ ก้า บุ้่่ฮ่ำ นิ่่ฮ่ำ ม้ว ฮี่ ฮ่ำ เที่ย ฮ่ำ ฮ่ำว ดั้่ฮ่ำ เนี่่ระ นิ่่ฮ่ำ ม้ว ฮี่ ดุ้่่ฮ่ำ เก่า เคฮ่ำ ฮ่ำอั้ฮ่ำ. บิ่่ฮ่ำ เยี่ม ฮี่ ม้ว ฮ่ำ ฮ่ำว ดั้่ฮ่ำ ฮ่ำ เอก เอก ดั้่ฮ่ำ ดั้่ฮ่ำ เน่่ง เอก ปล็ื้ื่ฮ่ำ ยั่ง เคฮ่ำ ฮ่ำอั้ฮ่ำ บิ่่ฮ่ำ ฮ่ำ เอก ดั้่ฮ่ำ ฮ่ำว ดั้่ฮ่ำ เน่่ง เเอก เอก ฮ่ำอั้ฮ่ำ นิ่่ฮ่ำ เ�ื้ื่ฮ่ำ เ�่่ฮ่ำ เฮ่ำ ฮ่ำอั้ฮ่ำ เน่่ง เเอก เอก เอก ฮ่ำอั้ฮ่ำ. นิ่่ฮ่ำ เ�่่ฮ่ำ เ�่่ฮ่ำ เ�่่ฮ่ำ เ�่่ฮ่ำ เ�่่ฮ่ำ.

เมื่อเสือตัวหนึ่่่งมีเสือตัวร้ายมากจน สัตว์ที่อาศัยอยู่ในป่าไม่กล้าเข้าใกล้ อยู่ ม้วนหนึ่่่ะแรกที่เสือกำลังหาอาหารอยู่มี กวางตัวหนึ่่่งเดินผ่านมา เสือเห็นกวางจึง วิ่งไล่กัด และกินกวางเป็นอาหาร พันใด นั่่่ะเมื่อนายพรานกำลังล่าสัตว์เดินผ่านมา เห็นเสือกำลังกินกวางจึงใช้ปืนยิงเสือตาย แล้วนำนายพรานก็เอาเสือไปเป็นอาหารและ แบ่งขาย |

Source: FAL Hmong MTBMLE project
Appendix J
2010 PRE AND POST TEST RESULTS FOR KG 1

The graphs show a comparison of the average scores of the Hmong and Thai language ability of the 2010 KG1 children from the 4 pilot schools and their control schools.

Graph 1: Language ability in Hmong

Numerical values of test scores shown in Graph 1 above

<table>
<thead>
<tr>
<th></th>
<th>Hmong- Start of term</th>
<th>Hmong- End of term</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pilot schools</td>
<td>48</td>
<td>87.92</td>
</tr>
<tr>
<td>Control schools</td>
<td>43.75</td>
<td>65.41</td>
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</table>

Graph 2: Language ability in Thai
Numerical values of test scores shown in Graph 2 above

<table>
<thead>
<tr>
<th></th>
<th>Thai- Start of term</th>
<th>Thai- End of term</th>
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</thead>
<tbody>
<tr>
<td><strong>Pilot schools</strong></td>
<td>22.45</td>
<td>74.55</td>
</tr>
<tr>
<td><strong>Control schools</strong></td>
<td>34.15</td>
<td>56</td>
</tr>
</tbody>
</table>

Source: FAL Hmong MTBMLE project
RESUME

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