



THE UNIVERSITY OF
WAIKATO
Te Whare Wānanga o Waikato

Research Commons

<http://waikato.researchgateway.ac.nz/>

Research Commons at the University of Waikato

Copyright Statement:

The digital copy of this thesis is protected by the Copyright Act 1994 (New Zealand).

The thesis may be consulted by you, provided you comply with the provisions of the Act and the following conditions of use:

- Any use you make of these documents or images must be for research or private study purposes only, and you may not make them available to any other person.
- Authors control the copyright of their thesis. You will recognise the author's right to be identified as the author of the thesis, and due acknowledgement will be made to the author where appropriate.
- You will obtain the author's permission before publishing any material from the thesis.

Tā Pikitia Hei Āwhina Kōrero

Collaborative Drawing and Storying

A thesis
submitted in partial fulfilment
of the requirements for the degree
of

Masters of Education

at

The University of Waikato

by

Aorere Helen Mary Kururangi

University of Waikato

2008

Abstract

Creating a Māori medium context for beginning learners of *te reo* Māori to converse in genuine dialogue, was a real challenge for our mainstream bilingual unit. This study involved six Year 3-5 primary school students working in two groups of three. The bilingual unit is in a contributing school in an urban setting.

The teacher, a second language learner herself, found students seldom initiated any spontaneous Maori dialogue and tended to respond only to questions or formal teacher initiated direction. So the project sought to develop and explore the approach *Tā Pikitia hei āwhina kōrero* or Collaborative Drawing and Storying, to improve Children's Oral Language Acquisition in Māori, using a socially responsive approach (Glynn, Wearmouth, & Berryman, 2006)

This method encouraged students to initiate, respond and share their own learning in a social and interactive community of learners. The method also allowed students the freedom to generate conversations about their own interests, ideas and background experiences without teacher intervention or direction. The only requirement was *me kōrero Māori i nga wā katoa* (speak Māori all the time). A collaborative picture was created as each group of students quickly illustrated their ideas on a large piece of paper.

Each student was pre tested and post tested using the *Aromatawai Reo A Waha - Kia Tere Tonu* (Berryman & Langdon, 2001). This test assessed each student's Māori vocabulary knowledge and their ability to speak spontaneously about a

familiar item. The daily conversations created by each student group involved *Tā Pikitia hei āwhina kōrero* was recorded on tape, then transcribed verbatim each day to assess changes over time.

Student ownership of the learning and their positive participation resulted in improved language outcomes. At the end of the ten week period there were encouraging gains in the post test, *Aromatawai Reo A Waha - Kīanga* or spontaneous phrases students were able to generate. Furthermore an improved ability to focus on an oral task, and improved engagement by the students were unexpected positive outcomes of this easy to implement activity.

He pēpeha

As an *uri* of *Ngati Porou* this *pēpeha* embodies the aspirations of this thesis. That is, the acquisition of *te reo Māori* by beginning learners in the hope that students will continue to learn and strive to keep our language. *Aotearoa* is our homeland, we are Māori and the survival of the language does matter to us. In the words of Apirana Ngata -

*E tipu, e rea, mō ngā rā of tōu ao;
ko tō ringa ki ngā rākau a te Pākehā hei orange mō tō tinana,
ko tō ngākau ki ngā taonga a ō tīpuna hei tikitiki mō tō māhunga,
ā ko tōu wairua ki te Atua, nāna nei ngā mea katoa.*

Apirana Ngata

Grow and branch forth for the days of your world;
your hand to the tools of the Pākehā for the welfare of your body,
your heart to the treasures of your ancestors as adornments for your head
your spirit with God who made all things.

Apirana Ngata

(Mead & Grove, 2001, p. 48)

Acknowledgments

I wish to express my eternal gratitude and thanks to all those who assisted me in completing this study. Special thanks to Ted, Vin, Ngaere, Cath (and *Kia Ata Mai* Educational Trust) and John for all your help, encouragement and endless patience without which this would not have been possible. Also to James, Jonina and the students who worked with me, I thank you. Finally, to the entire library staff of Waikato University - my sincere appreciation *tēna koutou katoa*.

Table of Contents

Abstract	ii
He pēpeha.....	iv
Acknowledgments.....	v
Table of Contents	vi
List of Tables.....	viii
List of Figures	ix
Chapter 1: Literature review	
1.1. Introduction	1
1.2. The loss of Māori language in Aotearoa / New Zealand.....	5
1.3. Differences between Māori and English language	6
1.4. The oral tradition	7
1.5. Issues of literacy	8
1.6. The importance of Te Reo Māori today	10
1.7. Current educational theory	13
Chapter 2: Methodology	
2.1. Participants:	18
2.2. The researcher	21
2.2.1. Relationship to the children.	21
2.3. Oral language assessor (John Foster)	22
2.4. Data collection.....	23
2.4.1 Audio tapes and transcripts	23
2.4.2. Tape recording	23
2.4.3. Video recordings	24
2.5. General procedure	24
2.5.1. The collaborative drawing and storying procedure: <i>Tā Pikitia hei awhina kōrero</i>	26
2.6. Measures.....	29
2.6.1. An oral Māori language measure:	29
2.6.2. Comments on language used during students engagement with <i>Tā Pikitia Hei Awhina Kōrero</i> (collaborative drawing and storying)..	30
2.6.3. A qualitative assessment	30
2.6.4. Informal measures	31

2.7. Ethical approval.....	34
Chapter 3: Findings	
3.1. Section One:	35
3.1.1. Oral language <i>Kia tere tonu</i> test results	35
3.2. Section Two:.....	49
3.2.1 Comments on oral language used during students’ engagement with <i>Tā Pikitia hei āwhina kōrero</i> programme.	58
3.3. Section Three:.....	61
3.3.1. Some additional descriptions and analyses of students’ oral language across the <i>Tā Pikitia hei āwhina kōrero</i> programme.	61
Chapter 4: Discussion	
4.1. Improved spontaneous use of <i>Te Reo Māori</i>	66
4.2. Student engagement	67
4.3. Conversations displayed characteristics of responsive, social contexts for learning	68
4.4. Gradual improvement in the number of language structures used	70
4.5. High levels of enjoyment	71
4.6. Teacher reflections on the value of <i>Tā Pikitia hei āwhina kōrero</i> as a second language learning strategy.....	71
4.7. Conclusion.....	72
References	74
List of Appendices	
Appendix A	77
Appendix B	91

List of Tables

Table 1. Age, gender and prior exposure to Māori language.....	19
Table 2. Kia Tere Tonu Test Kīanga Scores (Spontaneous Phrases).....	36
Table 3. T-Test: Paired samples statistics: Statistics for significance of difference and effect sizes	37
Table 4. T-Test: Paired samples correlations: Statistics for significance of difference and effect sizes	37
Table 5. T-Test: Paired samples test: Statistics for significance of difference and effect sizes.....	37
Table 6. Pre and post test Kīanga transcripts: Group A, Te P.	40
Table 7. Pre and post test <i>Kīanga</i> transcripts: Group A, Ken.	41
Table 8. Pre and post test Kīanga transcripts: Group A, Qub.	43
Table 9. Pre and post test Kīanga transcripts: Group B, Jos.	44
Table 10. Pre and post test Kīanga transcripts: Group B, Man.	45
Table 11. Pre and post test Kīanga transcripts: Group B, Mik.	46
Table 12. Kia Tere Tonu test: Kupu (vocabulary scores)	47
Table 13. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group A, session 10..	51
Table 14. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group A, session 22..	52
Table 15. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group A, session 36..	53
Table 16. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group B, session 11..	55
Table 17. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group B, session 24..	56
Table 18. <i>Tā pikitia hei āwhina kōrero</i> sample transcript: Group B, session 34..	57
Table 19. Percentage of Foster’s 60 essential language structures used by each student at the beginning, middle and end of the <i>Tā Pikitia hei āwhina kōrero</i> programme: Group A.	62
Table 20. Percentage of Foster’s 60 essential language structures used by each student at the beginning, middle and end of the <i>Tā Pikitia hei āwhina kōrero</i> programme: Group B.	62
Table 21. Length of utterance for all students during sessions at the beginning, middle and end of the programme	63

List of Figures

Figure 1. Collaborative picture (Tā Pikitia). Group A: Session 10.....	28
Figure 2. Collaborative Picture (Tā Pikitia). Group B: Session 11.....	28
Figure 3. Collaborative picture (Tā Pikitia). Group A: Middle session 22.....	50
Figure 4. Collaborative picture (Tā Pikitia). Group A: End session 36.....	50
Figure 5. Collaborative picture (Tā Pikitia). Group B: Middle session 24.....	54
Figure 6. Collaborative picture (Tā Pikitia). Group B: End session 34.....	54

Chapter 1

Literature review

Utaina!

Ngata (Mead & Grove, 2001, p. 636)

1.1. Introduction

The focus of this study is on helping young students to speak in Māori as a second language. The study explores how this might be achieved through creating conversations around collaboratively constructed pictures, with students initiating their own conversations and the teacher taking a collaborative, responsive role, more as a learning partner than as a directive or controlling authority (Glynn et al., 2006). It has been well documented that in order to learn a language it is necessary to use it, and speaking and listening are vital first steps. This study recorded and analysed the Māori language of six children working in two groups of threes, as they created collaborative drawings and talked about what they were doing. The children attended a bilingual classroom unit within an urban mainstream state school.

The reason the topic of Māori oral language output was chosen for this research, is because of the importance of finding ways to allow beginning Māori second language learners, who are being educated within an English majority context, to use their language. Also the need to use Māori as the medium of curriculum delivery in a New Zealand bilingual context presents a further challenge. There are very few places outside the school context where these students hear Māori spoken regularly. Secondly our present methods of oral language teaching tend to

be mainly teacher–directed and criteria-driven exercises. Most of the dialogue between students and teacher typically consists of teacher initiated comments, mainly questions in Māori to the student who invariably replies in English. Very seldom is there any spontaneous kōrero Māori (Māori language) initiated by the student to the teacher, unless asking for something; and very rarely indeed do students initiate a conversation in Māori to peers inside or outside the room unless directed to do so by the teacher. The cultural contexts of waiata or haka would provide the most spontaneous use of Māori in the present context in my experience. You will hear students singing, doing the poi or haka during their free time. However these contexts offer few opportunities for beginning second language learners to converse in Māori. So this project explored whether or not, given regular opportunities daily to converse with peers around a shared task, students’ automatic fluency or spontaneous use of the language would improve (Gatbonton & Segalowitz, 2005).

The study aimed to put theory into practice by implementing *transformative pedagogy* within a Māori medium context. Glynn, Wearmouth, and Berryman (2006), suggest that we need to examine our traditional language teaching methods and see if we are able to *explore ways to facilitate students’ oral language around their own life experiences*. It may be more productive to allow young beginning second language learners to talk about their current experiences (what they are doing here and now), than to require them to respond to phrases or simple repeated questions posed by the teacher.

I am an experienced teacher with about 40 years of teaching experience. I am a senior teacher in charge of a bilingual unit of three multilevel classes Years 0-Year 6. I have taught all primary school class levels (Year 0-8) and have some high school teaching experience also. My experience includes several years teaching overseas in England, Scotland and Singapore. I am a trained reading recovery teacher and presently teach one student a day who has reading problems reading in English.

I have been involved in bilingual (Māori and English) education for the last fifteen years. This has involved me in the delivery of the curriculum in Māori at least 50% of the time, and using English for the remainder. This curriculum requirement presents the challenge to both student and teacher, of becoming fluent in *Te reo Māori*, because Māori is a second language for the majority of Māori people today and for many people is seldom heard and rarely spoken in the home or community.

I am of Māori (*Ngati Porou* and *Whanau Apanui*) and European (Scottish) descent, so have some experience of *te reo Māori me ona tikanga* (Māori customs). However Māori is a second language for me. I have been fortunate enough to attend Ministry of Education professional development courses for bilingual teachers: *Whakapiki Reo Māori*; *Te Rōpu Reo Rua*; and *Nga Taumatua*. In my experience these groups presume you have a certain language fluency level and do not address the most vital element of your individual spoken language proficiency. I feel a certain proficiency standard should be part of teacher professional development for teachers in Māori medium contexts. There needs to

be standards of proficiency, both in language fluency, as well as in pedagogy. The issue of pedagogy is central to the present study. How do we provide a context to improve children's speaking of *Te reo Māori*, and what teaching methods we can use to assist acquisition and improve fluency – especially given that many teachers are second-language learners themselves.

The school where I teach, Kawaha Point primary, is in the Te Arawa tribal area. This makes our bilingual unit eligible to apply for support from the *Ngati Whakaue* Endowment Education Trust (*Ngati Whakaue* is a hapu of Te Arawa) on an annual basis. Our greatest need in terms of resources is to employ an additional teacher, able to speak Māori fluently to help provide more effective models of the language. This we can afford to do for one day a week. This teacher, *Whaea J.* Works collaboratively with each class teacher on planned oral language sessions in Māori, involving language /vocabulary building activities, in addition to playing games, singing *waiata*, sharing *Te karere* (student news), for instance; working both as a whole class and in groups. *Whaea J.* is also the class teacher of the Year 3-4 students in the project. She observed our collaborative drawing and storying activity, and was interested enough to trial informally some sessions with her class.

I was motivated to do this study because of the need identified in our bilingual unit to promote spontaneous Māori language fluency and the need to provide a learning context to improve the children's oral Maori language acquisition.

People learn to read by reading, and learn to write by writing. To speak, and be understood when speaking, requires participation in meaningful and realistic conversations. We learn to speak a second language when given the opportunity to speak it (Baker & Jones, 1998).

1.2. The loss of Māori language in Aotearoa / New Zealand

Since the arrival of European settlers in the mid 19th century in New Zealand and the establishment of British rule, the Māori language and culture has been at risk (Baker & Jones, 1998). The 1867 Education Act decreed that instruction in Native Schools had to be in English. This government stipulation began a slow decline of the language at first but the decline rapidly increased during the 20th Century (Benton, 1981). One recent National Maori language Survey by the Department of Statistics (2006), records of the 42% of Maori report having some knowledge of the language. About 9% of those consider themselves able to speak *well* or *very well*; 33% *fairly well* or *not very well*, 2% report some language skills but 58% speak only a few words and phrases. The survey notes that proficiency increased with age. Among this swiftly declining group of older Māori adults are the native speakers - those for whom Māori was their first language. So, with the loss of these elders, the chance to benefit from their knowledge of Māori language and culture dwindles also.

An earlier report (Statistics New Zealand, 2006) based on the 1996 census figures questions whether or not the Māori language will *survive*, and pronounces the language to be still in a *critical* state. Almost half (41%) of Māori do not speak Māori and a further 43% have low fluency. These discouraging statistics endorse

the need to find a way to assist today's school students to acquire the language as quickly as possible. While this seems the most logical next step to take, it raises a whole set of new issues. Māori are the largest minority group (12%) in a majority population of mainly British/European descent (but other migrant and refugee groups largely Asian are increasing and may even surpass this population). The central issue is thus the maintenance and revitalization of the indigenous language of Aotearoa/New Zealand, in an almost totally monolingual English speaking majority society.

1.3. Differences between Māori and English language

Maōri society has a complex social structure and hierarchy, and the language structure reflects this. There are a large number of pronouns, marking the importance attached to social relationships between the speakers, and those being spoken to, and the contexts in which they are speaking. Similarly, two major categories of possession are marked. The *a* form is used to mark your superiority or ownership of people or things over which you have authority, control or influence, (*taku pene* - my pen) The *o* form is used to mark your subordinate relationship to people or things that have authority, control or influence over you, (*tōku Māmā* – my Mum) and includes parts of things, feelings, abstractions or qualities (Foster, 1987). *Relationship* between the *possessor* and the *possessum* is the main idea underpinning the use of these two forms of possessive pronouns (Harlow, 2001, p. 158). The relationships indicate the quite different cosmologies and understanding of the place and role of humans in the universe. Another one of the difficulties encountered when learning Māori is the use of many prepositions

such as *i* and *ki* which change in meaning depending on where they are used within the language structure.

The English language differs from Māori in that structures of the language pay more attention to *time*. The marking of tenses, order and sequencing are more elaborate in English. These differences between the two languages reflect the importance that social structure and culture, values, beliefs and plays in the development of a language.

1.4. The oral tradition

A major difference between Māori and the English language is that historically Māori has continued to retain a strong oral tradition. There was no recognised written form of the language until the arrival of Europeans in the early 19th century. So Māori learning and cultural knowledge was passed on orally. Oral literacy is culturally important to Māori, the spoken word embracing many forms of literacy (*waiata*, *tauparapara*, *karakia*, *whaikorero*) which are highly valued and respected; and practised with great skill by the many orators within the various tribes. Cultural beliefs, values, and practices surrounding the acknowledgement and welcoming of visitors, relating tribal history, *whakapapa* (genealogy), and fare welling the dead, for instance, have specific forms of oratory to adhere to and is often accompanied by *waiata* sung by the assembly to embellish the orator's speech. Fortunately many of these *tikanga* (customs) remain intact today. But it is the revitalisation of the language of everyday life that is of particular concern; to be able to hear *Te reo* Māori spoken in the street as a normal rather than an unusual or even challenging occurrence. This of course

highlights one of the main problems; there are very few contexts other than school where today students may hear and speak the language. Sadly, *Te reo Māori* has become almost a foreign language to many Māori.

1.5. Issues of literacy

“Literacy for all citizens is probably the single most important goal of any education system”

(Foster-Cohen, 2004, p. 178)

Literacy in most dictionaries is defined as the ability to read and write. However, it is generally understood that oral literacy, that is, listening and speaking, both precedes and accompanies writing and reading. Oral language competence is an essential component of both first and second language learning. However the beginnings of language knowledge and understanding for children are laid down long before they arrive at school. For learning to take place in each child, requires the use of oral language to construct meaningful relationships through engagement in social interaction with others. The *social* background of each child plays a great part in their experience and understanding of literacy (Booth, 2005). Similarly, and just as importantly, the *cultural* background of each child plays a great part in the experience and understanding of literacy. Bruner (1990, p.34) maintains it is *culture* not *biology* that is the major influence on our thoughts and actions as to how we interpret and respond to the world around us, including our language and discourse modes.

The definition of literacy within Māori medium contexts (total immersion or bilingual) is complex because *it involves instruction in two languages* (Baker & Jones, 1998). English is the first language and Māori the second language for the large majority of the students. May, Hill & Tiakiwai (2004) conclude from their analysis of international research literature that effective bilingual /immersion programmes should include at least 50% immersion in the target language. However in our bilingual situation the curriculum delivery needs to be through both languages. This adds the stress of *time* to fit all subjects in to an already overloaded curriculum. Time is needed for teachers to be familiar with new Māori and English resources; and for professional development to familiarise staff with new resources and initiatives. Pressure for teachers in bilingual units to conform to mainstream English literacy assessment benchmarks means they have to prioritise English instruction. This leaves them feeling inadequate and the efforts of students seem dismal. The English benchmarks are age and year level specific, regardless of the length of time the child may have been in immersion and regardless of the differences in structures and contexts, or use of English and Māori. Quality ratings are allocated for summative assessments in each curriculum subject. The same criterion is frequently expected for Māori as for English. In Māori language subject areas such as speaking, reading and writing, Māori is, for many students of primary school age, at the preschool language acquisition stage. Students regularly arrive into bilingual classes with a very limited or no Māori vocabulary. So, when students are reading texts for instance, it is not possible to ascertain comparative age specific achievement levels, as one would expect to do in English. However, more appropriate assessment tools are in the process of being developed, tested and benchmarked (Rau, 2004). In our

context, summative assessment of Māori language is still fairly restricted, because most students are very much beginning learners of Maori.

The current mainstream professional development focus has highlighted the need for improved teaching practice to address underachievement of an increasingly diverse student population. According to John Hattie (2003) while obviously there are differences in student learning rates the most effective way to improve student achievement is to improve *excellence in teaching*. This is a very pertinent observation for Māori medium contexts. It has been my experience that there is a lack of pre service and in service opportunities to provide teachers in bilingual Māori medium contexts with the theoretical and pedagogical knowledge and understandings for teaching a second (minority) language, let alone how to effectively configure for simultaneous instruction in Māori and English through the year levels of often multi levelled classes.

1.6. The importance of Te Reo Māori today

Ko te reo te mauri o te mana

(Traditional proverb)

The fact that the majority of Māori people today are unable to speak their mother tongue is a huge embarrassment to many of them. The query *kei te mohio koe ki te kōrero Māori?* (Do you know how to speak Maōri?) is frequently met with a range of explanations why not, and recounts of the various unsuccessful and often painful attempts to learn. It seems the opportunity for further practice of Maori in authentic oral language contexts is one of the major obstacles to progress. During the late 1930s Sir Apirana Ngata, after previously endorsing state school

education for the education of Māori students, was shocked to meet a Māori who could speak only English after being educated in the state system. Ngata felt *Māori who could not speak Māori were not Māori* (Jenkins & Ka'ai, 1994, p. 165). Many Māori have come to blame themselves for being in this position. As a result Ngata dedicated himself to the cause and was motivated to produce *Nga Mōteatea*, a series of Māori literature works for study at university level to assist and encourage retention of the Māori language. An excerpt from an often quoted proverb by Ngata speaks of his dream for the language. This excerpt clearly places knowledge of language and culture at the core of one's identity as Māori.

Tou ngākau ki nga taonga a o tipuna

Hei tikitiki mo tōu māhunga

(Let your heart remain steadfast to the "legacies" traditional and cultural of your ancestors as a plume for your head)

Many teachers of Māori, and parents of Māori students, find the question of how to retain the culture and especially the language of their heritage a perplexing problem. The next question frequently is - why learn *te reo* Māori? The majority of Māori will probably reply - *because I am a Māori*. The new mainstream draft document *Te Reo Māori in the New Zealand Curriculum* (Ministry of Education, 2007) lists eight reasons why Maori language is important and how young New Zealanders would benefit by learning Māori. Learning Māori would enable them to:

- Participate more fully as citizens of a country in which *te reo* Māori is an official language;
- Participate with understanding and confidence in functions where *te reo* Māori and *tikanga* Māori predominate;

- Broaden their employment options and operate effectively in social, legal, educational, business, and general professional contexts where knowledge of te reo Māori and tikanga Māori is required;
- Develop or increase their awareness and appreciation of the central role that language, culture, place, and heritage play in shaping identity and giving direction and meaning to life;
- Learn to appreciate, understand, enjoy, and value Māori arts, including the performing arts;
- Develop skills, attitudes, and understandings that will help them to learn other languages;
- Learn to appreciate the important role that indigenous languages and cultures play throughout the world in the context of the increasing homogenisation of peoples;
- Develop, through greater understanding, greater respect for a range of views and cultural practices (p.9).

While these points have been written for the mainstream, predominantly European school student population, they may apply equally to the majority of Māori students who have little or limited exposure to te reo Māori or Māori customs and culture. In an article on Māori language revitalisation in New Zealand; Spolsky (1989) observes:

an increasingly assertive minority...requires much more from the schools than simply language teaching or language revival. Instead, it wishes the schools to assume a crucial role in the socialization of children, teaching them to be Māori as well as to speak Māori (p.60).

This view justifies the need for more *kura kaupapa* Māori, but the vast majority of Māori students are attending mainstream schools. These schools may not be safe or effective sites for reclaiming or revitalizing the Māori language and culture.

The most important issue for bilingual educationalists in Aotearoa/New Zealand, therefore perhaps is **how** one provides a programme that enables the Māori student to not only acquire his or her native language, but to become proficient also in the majority language, English. For the bilingual teacher it is this first question – how do we begin to teach Māori in a level 2 immersion situation to students, for whom essentially Māori is a second language that is the focus of this study.

1.7. Current educational theory

Over the last two decades a great deal of language teaching focus has been on communicative language teaching. That is the teaching of a second language with the major goal of communication with other speakers of the second language, “Such a focus has centred on speaking and listening skills, on writing for specific communicative purposes, and on “authentic” reading texts” (Brown, 1998, p. 226).

In a recent draft document for *Te Reo Māori* in the New Zealand Curriculum communicative language teaching is described as enabling learners to engage in meaningful communication in the target language structure. The communication has a purpose or function beyond just teaching the language, (Ministry of Education, 2007). An oral communication may involve greeting and introducing oneself to a class visitor in Māori for instance.

The learning of a second language is summarized by Ellis (1985) in terms of five interrelated factors: situational factors, input, learner differences, learner processes and linguistic output. Ellis suggests these five factors govern the acquisition of a second language and are the criteria underpinning effective communicative language teaching in schools today. While these factors may vary according to the language and its context, there is a natural, almost invariant sequence of development in learning a second language. It begins with simple vocabulary and progresses from basic syntax, to the structure and shape of simple sentences, then finally to complex sentences (Baker & Jones, 1998, p. 636). Our context and this project are still working on focusing on the first four of these progressions.

However, Gatbonton and Segalowitz (2005, p. 325) assert that *although many teachers claim to practise communicative language teaching (CLT), many do not genuinely do so*. Gatbonton and Segalowitz observed that teachers were spending more time on highly structured activities such as formal language lessons giving grammatical explanations and teaching rule applications, rather than conducting conversations, role-plays, games and problem solving activities. These teachers felt that engaging in such socially interactive activities left them with nothing tangible to show for their efforts. The activities appeared to them to have no obvious practical teaching *purpose*, as is the case in the traditional, more formal methods, where arbitrary structured goals are constructed for each lesson. CLT was not considered as real *teaching*. Gatbonton and Segalowitz argue that simply exposing students to target language oral input does not mean students are having genuine interactions, nor is there enough provision made in CLT's approach for *oral fluency*. Fluency implies automatic, smooth and rapid language use. Current CLT methodologies are lacking sufficient repetitive practice in appropriate social contexts, these researchers claim.

Furthermore there is the question of fluency versus accuracy. In this project early fluency was the focus as with first learners of any language, children need to engage in the process of communicating in the target language. While accuracy is important it is unrealistic to expect error-free attempts by beginning learners (Ministry of Education, 2007). Beginning speakers of their first language make many errors as they learn to communicate with others.

While these are valid comments, in my experience there is little research on how to support teachers learning to promote effective oral language in students from minority language educational classrooms. In Aotearoa/New Zealand such assistance is well overdue. Oral language competency in Māori needs to be greatly improved in many bilingual learning contexts. Current methodologies and teaching practices need further scrutiny.

What are we going to do? Eppig, as cited in Clarke (2003) "If pupils don't learn the way we teach ... perhaps we should teach the way they learn" (p. 5)

A paradigm shift in pedagogy within minority language educational classrooms is needed... According to Glynn, Wearmouth and Berryman (2006) this can be achieved by creating learning contexts that are social and interactive. Such responsive, social contexts (Glynn, 1985, 1987) may encourage students to initiate, as well as respond and to share their ideas orally with others, not only about their school experiences but also about their home life. Students need to feel secure in the knowledge that their efforts will be supported and reciprocated in an authentic learning context; that their input is indeed valued. Second language learners require the same kind of positive, responsive feedback that caring parents provide for their young children learning to speak their first language.

In this project, recent literacy research by Glynn (1985, 1987), and other research reported in Glynn, Wearmouth & Berryman (2006), provided a basis for the pedagogy implemented. The approach used is now understood as a responsive or transformative pedagogy. This approach would certainly represent a *paradigm*

shift in pedagogy with many of our Māori/English bilingual classes, and some Māori medium contexts where *tight instructional control* is evident.

The rationale for transformative pedagogies comes from sociocultural perspectives on learning (Bruner, 1990; Vygotsky, 1978). That is, rather than literacy being regarded as an *individual* achievement which equips the individual with cognitive and intellectual skills, literacy is seen as incorporating interdependent and interpersonal learning. This sociocultural stance envisages students acquiring literacy skills and understanding through engagement in social situations (Scribner & Cole, 1981). Learning is regarded as the process of change in the extent to which individuals can actively participate in *communities of practice* (Lave & Wenger, 1991). Acquiring oral and written literacy skills enables students to participate in communities of literacy practice.

A further shift in pedagogical thinking concerns the specific role of the teacher, or adult in children's learning. Rogoff (1990) challenges Vygotsky's concept of the adult as providing the supportive scaffolding for learning, which is then gradually removed leaving the child working independently of adult support. Rogoff (1990) views the adult as doing *more* than provide scaffolding. Rogoff (as cited in Glynn & O'Laoire, 2007, p.8) views the focus as being "more onto children as active initiators of their own learning with the adult acting as both guide and collaborator".

Glynn et al. (2006) list four characteristics of responsive social contexts which facilitate active participation in communities of literacy practice:

1. Learner initiations in responsive social contexts;
2. Shared activities between less-skilled and more-skilled learners; as we see in the enactment of *tuakana /teina* roles by Māori students
3. Reciprocity and mutual influence;
4. Amount and type of feedback.

The collaborative drawing and storying project pedagogy in the present study was based on the transformative or responsive approach, with the above characteristics in mind

Chapter 2

Methodology

Kei pātai ngā mokopuna, i ahatia e koe taku taonga e.

(Te Tāhuhu o te Mātauranga, 1996)

One of the most difficult things for teachers trying to speak and teach a second language with young beginning students is to provide a genuine, meaningful oral language context to keep students focussed. It has been my experience that once students have contributed their own ideas to the discussion they lose interest and find it difficult to stay on task, listening to the contributions of others. The *transformative* pedagogy or *responsive* approach (Glynn & O'Laoire, 2007; Glynn et al., 2006), used for this second language learning project, differed from the usual *buzz group* (small group discussion) format for oral language in class. Firstly there was the added component of collaboratively drawing a large picture. Secondly the pedagogy was totally student driven. The students themselves decided the topics for discussion, initiated the conversations, co-constructed dialogue, and decided the order for participants, and when the sessions would end.

2.1. Participants:

All the students who participated in this project are of Māori descent. The selection process began with the researcher and a *kaiawhina* (language assistant) modelling the collaborative drawing and storying method to the Year 3-4 class and their class teacher. Students were then invited to volunteer for the activity, understanding that only six participants were required. The two other bilingual class teachers were consulted informally as to the suitability of interested students

on the list. Attributes considered to be important for selection by Cloud, Genesee & Hamayan, (2000), were adopted and adapted for this study. These are: firstly, students needed a reasonable level of proficiency in their first language, their primary language, to show they would be able to sustain a very simple conversation. Next, results from Māori language tests taken at the beginning/middle of the year were considered to check that students did indeed have some Māori vocabulary to use. Thirdly, the children needed to have a positive attitude about learning *te reo Māori me ona tikanga* (the Māori language and culture). Students also needed to understand that working on this project meant the commitment of daily participation in these oral language sessions for ten weeks. The final selection process involved seeking parental approval and support. The six students selected met these requirements.

The six students were put then into two groups of mixed gender and year levels, each group comprising one *tuakana* (older more language competent child) and *teina* (younger or less able children). The reason for having just three students per group was to minimise the waiting time for students to take their turns in the discussion and drawing, and to maintain engagement in the task, by ensuring all students would experience a balance of listening and speaking.

Table 1. Age, gender and prior exposure to Māori language

	Student	Gender	Age	Year Level	Prior Exposure Total immersion Kohanga + Kura	Bilingual Unit Exposure
Group A	*Te P	Kotiro	8.10	5	5 years	3 years
	Ken	Tama	7.4	3	2 years	2 years
	Qub	Tama	8.3	4	10 months	3 years
Group B	Jos	Tama	9.0	5	0	4 years
	*Man	Kotiro	9.0	5	0	4 years
	Mik	Tama	8.0	4	3 years	0

**tuakana* students

Group A students have an age range of 1 year 6 months from 7.4 to 8.10 years (age as at January 1, 2007), while Group B students have an age range of 1 year: from 8.0 to 9.0 (age as at January 1, 2007)

Prior Immersion

The students in the study had varying amounts of prior Māori language immersion at *kōhanga* (pre-school) and in *rūmaki* (primary total immersion). The periods of time are approximate, and based on informal information, that is, as reported from the parent's or student's recollection only. Nevertheless, the first language at home for all these students was almost entirely English.

Language at School

The language used and heard the majority of the time for these students, is English. The bilingual unit consists of 3 multi level classes – a junior, middle and senior class, (a total of 54 students at the time of this project). The level of Maori language immersion is Ministry of Education level 2 meaning that Māori should be spoken at least 50%-80% of the time. However it is difficult to meet this 50% minimum required in this context due a number of factors: the pressure of the mainstream English curriculum delivery, the Māori language fluency of the teachers across all subject areas and the lack of *te reo Māori* being spoken outside the class room. The sheer volume of new Maōri vocabulary in subject areas tends to restrict content delivery until teachers and students are *au fait* with it. Therefore children find it very difficult to express themselves totally in Māori. Furthermore English literacy is still a priority requirement of the school with very high

expectations for student achievement. This difference in the valuing of the two languages is felt by both teachers and students.

2.2. The researcher

My own Māori language background includes my father whose first language was Māori, but who used mainly English at home as the thinking of that era promoted English as the key to educational success. In addition to attending the professional development courses already stated, I have also sporadically tried several Māori language courses offered locally by such institutions as *Kainga mo te Reo*, *Te Tau Rā Whiri*, the *Te Waiariki* Poly Tech. courses and Foster's lessons at Ohinemutu to improve my level of proficiency.

The fact that I am of *Ngati Porou* descent in the *Te Arawa* tribal area I need to be mindful when teaching to respect local tribal customs, history and language when teaching in my present context.

2.2.1. Relationship to the children.

Five out of the six students in this project were known to me except for Mik who was a new entrant to the school at the beginning of this year and who left at the end of the term 3. Mik had come from a *rumaki* (total immersion) class. However his initial oral language test scores were similar to those of the other students in the group. Being new, Mik was not very vocal at first and was reluctant to use his *reo* but as he felt more confident, he slowly improved his language output.

I had taught all of the five remaining students previously at other class levels in the bilingual unit, but none of those students are in my present class. Three of the

students Qub, Mik and Ken are in the middle school class and Jos, Man and Te P are in the senior class. Te P and Man had informally tried out the collaborative storying method last year in my class on a few occasions, as a precursor to working with it in a planned and systematic way. (However because of the time factor needed to commit to the project it was not implemented at that stage). The students and I have an established, positive relationship. After seeing the method modelled and after my discussing the task with them, all the students were happy and willing to participate in the project.

2.3. Oral language assessor (John Foster)

John Foster is the well known author of the Māori language books *He Whakamārama* (1987), *He Tuhituhi Maori* (1991), *Nga Kupu Whakamarama* (1997). Foster also wrote language tutorials for a radio programme called *Tu Tangata* (1986). Foster is very concerned about the retention and revitalisation of *te reo Māori* and feels an urgent need to pass on his knowledge of the Maori language to the present generation to assist its survival.

In addition to using the *reo* assessment tools *Kia tere tonu* and *Tā Pikitia hei awhina kōrero* transcripts (described later) it was decided to invite John Foster to evaluate the Māori language of the students who participated in the collaborative drawing and storying project at three stages during the project: the beginning, middle and end of the 36 sessions, to appraise any change. His evaluation on each of the six students' Māori language usage was carried out using a template of the 60 structural elements he considers essential within normal functioning Māori language.

2.4. Data collection

2.4.1 Audio tapes and transcripts

Permission was sought from parents and caregivers, and from the students to audio tape and video record language used in the collaborative drawing and storying sessions. Qualitative and quantitative measures from the tapes were taken to assess changes over time. Transcripts of audio tapes enabled the data to be gathered on the number of separate utterances used and qualitative changes in the spontaneous use of Māori across the whole project. The length of sustained *kōrero i roto i te reo Māori* (dialogue in Māori) each child was able to produce was noted.

2.4.2. Tape recording

The tapes were transcribed verbatim each night from the collaborative storying recordings. On occasions if the recording was unintelligible, the students involved were later asked to clarify or correct the items with the teacher.

The 36 session tapes were divided into three sets of 12, covering the beginning, middle and by the end of the project.

The last three tapes of each set of 12 provided the data for analysis that is tapes 10, 11, 12; followed by 22, 23, 24 and lastly 34, 35, 36. If for any reason such as one of the students being absent from a particular recording, the next tape in the sequence was used. Full transcripts of these nine tapes are provided in Appendix A.

2.4.3. Video recordings

Several of the oral language sessions were videoed to provide a richer illustration of what the process looked like in action. They are not analysed or reported in this thesis.

A complete record of all the oral language transcripts (Group A: 1-46 and Group B: 1-36) of all the students and their collaborative pictures across the 10 week period are held by the author).

2.5. General procedure

The collaborative drawing and storying sessions took place daily in the researcher's classroom before school, any time from 8.30 am onwards when students arrived at school. This was because the researcher taught the junior class and none of the participant children were in that class. However sometimes children were late or school organisational matters interfered. So the sessions would then be held during the *whānau hui* (assembly time 9 – 9.15 am) each day or occasionally after lunch during story time. Both groups felt special about being in these groups, so were happy to conduct the sessions at another time. Students would complete the collaborative drawing and storying around a group table or at a bench with a tape recorder recording their dialogue. The students learned the procedures quickly and soon were able to complete the activity independently, so on the few occasions (about four out of the thirty six sessions) they were prevented from doing it before school, it was successfully rescheduled at an alternative time.

The length of the sessions varied from 8 to 15 minutes. Students were shown how to operate the tape recorder and were given a large sheet of A2 cartridge paper with felt pens to draw their ideas briefly as they spoke. As the students became more confident with the technology and with drawing, the groups were able to work on their own. The children took control of these discussion sessions. They decided amongst themselves the topics for discussion, who would be the first speaker each time (a very sought after position), the order for speakers, and how long the discussion was to last. The teacher did not participate unless there was a student absent, and even then comments contributed were of a similar nature and length to their contributions. On those few occasions teacher comments always responded to student contributions rather than directing them. The teacher participated on their terms, as a student, not as the teacher. She tried not to initiate any new topic but just to contribute to their topics and ideas.

Teacher feedback was kept to an absolute minimum and usually consisted of just a brief positive comment such as a word of praise for interesting vocabulary or ideas expressed. Sometimes it was a reminder about the use of English for a word they were familiar with in Māori.(for example *whaia mai* a direction frequently used in class, in session 16, Jo had used the English term *follow* not linking it with what he needed to say, until reminded). As the sessions progressed students were also shown how to pause the tape recorder to discuss or look up vocabulary. For two students (Ken and Mik) it was occasionally necessary for them to clarify parts of what they had said, as their speech was either not clear enough or too quiet. On these occasions the transcripts were read to students and they were quickly able to recall what they had said.

The students worked daily for approximately 15 minutes. The project began at the beginning of Term 3 and continued for ten weeks until the end of term. Pre testing took place in the last week of term 2. (28/6). Post testing was in the last week of term 3. (21/9).

Group A completed 46 language collaborative drawing sessions and Group B completed 36. The shorter number of lessons by Group B was due to Mik being absent for 2 weeks. So, for the purpose of comparison, sessions 1 to 36 for both groups were analysed. The total time spent listening and speaking Māori by both groups across the 10 weeks was at least 9 hours.

2.5.1. The collaborative drawing and storying procedure: *Tā Pikitia hei awhina kōrero*

The task

The collaborative drawing and storying (*Tā pikitia hei awhina kōrero*) was explained and modelled several times for the students. The only rule for these discussions was students were asked to speak in Maori. Students had access to Maori dictionaries and they could ask the teacher if there was a word they needed.

Materials:

A sheet of cartridge paper A2 size

Felt pens three different colours (or more)

A tape recorder

15 minute tapes

The task consisted of one child initiating a discourse and briefly sketching a related image, sometimes labelling or initialling items he or she was talking about. Students selected their own felt pen to use. The next child continued with a comment and sketch, followed by the third student and so on, until the ideas and images were exhausted or the tape was finished.

Tapes were transcribed verbatim each night with all student verbal attempts and errors included to ensure that transcripts were accurate. On the few occasions when it was necessary to clarify anything on the tape with the students, this usually took place the following morning.

Collaborative drawing (*Tā Pikitia*)

The collaborative drawing consisted of making a quick sketch while speaking to illustrate the topic the student was speaking about. Students sometimes labelled or initialled the items before passing the paper on to the next speaker.

The collaborative picture produced at each session by each group was dated and given a session number. Mostly each student selected a different coloured felt pen to sketch with. This made it possible to visually track student *korero* (dialogue). If time allowed students sometimes coloured in and finished off the pictures.

Figure 1 and 2 are examples from each group of completed collaborative drawings. Figure 1 by Group A in session 10 shows Te P ideas sketched in black, Ken's in green and Qub's sketch in red. Similarly the collaborative picture by Group B during session 11, using three different coloured felt pens by Jos., Man., and Mik. Both of these pictures are from beginning sessions of those selected to be analysed in the study.



Figure 1. Collaborative picture (Tā Pikitia). Group A: Session 10
 (Source: Author)



Figure 2. Collaborative Picture (Tā Pikitia). Group B: Session 11
 (Source: Author)

2.6. Measures

Several quantitative and qualitative measures were taken for analysis.

The measures were:

2.6.1. An oral Māori language measure: *Aromatawai Reo a Waha - Kia tere tonu* (Berryman & Langdon, 2001) was used to assess students' (1) vocabulary (*kupu*) knowledge using a set of 25 picture cards featuring familiar items, and (2) spontaneous language usage from phrases (*kāanga*) students used to talk about one of the familiar items pictured on the cards.

Part 1 Vocabulary (*kupu*)

Knowledge of common nouns

Time limit – 30 seconds

The first part of the test consists of 25 pictures of very common items for students to name as many as they can in 30 seconds, in Māori. The pictures include items culturally familiar to Maori children, such as a *poi*, (a ball on a string) a *tiki* (greenstone pendant), as well as other general items familiar to all children, such as a bicycle and an ice-cream.

A practice sample:

A sample set of six picture items for students to practise, is administered first with each student without a time limit, to ensure students understand what to do before the actual test is taken.

Part 2 Spontaneous language use (*kīanga*)

Students are then asked to select one of the pictures from the test set they would like to talk about. There is no time limit on this component. Students say as much as they can in Māori about the picture and their language is recorded by the tester. In this research the measure assessed the number of spontaneous phrases or *kīanga* used by the student. Spontaneous phrases or *kīanga* are defined as the number of ideas the individual is trying to express within the limits of his/her level of language competence.

2.6.2. Comments on language used during students engagement with *Tā Pikitia Hei Āwhina Kōrero* (collaborative drawing and storytelling).

Some comments of qualitative and descriptive analysis of transcripts of students' oral language, across the *Tā Pikitia hei āwhina kōrero* project.

2.6.3. A qualitative assessment of student's language was undertaken in collaboration with John Foster, a recognised authority on Māori grammar, as evidenced by his published works.

The assessment examined the development or changes, if any, that occurred across three sets of transcripts (10-11-12), (22-23-24) and (34-35- 36) for each of the six students.

Foster 2007 has produced a template of the 60 essential language features/structures he considers as necessary components of normal *functioning language* (NFL).

Foster (personal communication, January 2008) defines normal functioning language as:

The minimum number of grammatical elements needed to produce an adequate range of meaningful sentences. In its normal process of functioning, a language is made up of certain recognisable structures, some of which occur in much greater frequency than others. These are of such general occurrence that little can be meaningfully expressed without their use.

Foster was prepared to comment on the quality of the language of these six participants only after *giving consideration to every single word*.

Foster created a template for each child for the three sets of samples taken, totalling nine in all for each student. The two student groups Foster refers to as Series 1 A for Group A , and Series 2 B for Group B on his templates for his own reference. The sample templates analysed for each student are available from the author.

For a copy of the template used refer to Appendix B.

2.6.4. Informal measures

- i) Length of utterance
- ii) Initiation of ideas
- iii) Māori themes *nga kaupapa* (ie. topics) for background experiences, and sociocultural influences
- iv) *nga momo rerenga* (i.e sentence types) to assess the types of sentences (assessed by Foster).
- v) Student enjoyment of the process.
- vi) An informal trial.

Brief outlines of these measures are as follows:

i) Length of utterance:

Longman's dictionary (Richards, Platt, & Platt, 1992, p. 369) defines an utterance as:

what is said by any one person before or after another person begins to speak.

For example, an utterance may consist of:

(a) *one* word, e.g. B's reply in;

A: *Have you done your homework?* (Kua oti to mahi?)

B: *Yeah.* (Ae)

(b)... *one sentence*...

(c) or more than one sentence.

The length of utterance will be compared from transcripts taken at the beginning, middle and end of the *Tā Pikitia* programme to assess whether there was an overall increase in length (or the ability to sustain an utterance), following time in the programme.

ii) Initiation of new topics in a discussion:

The ability to initiate new topics in a discussion is an important step in learning to use a language. Glynn & O'Laoire (2007) explain that if the student is to have agency over their own learning they need to be able to initiate interactions with others, not simply to respond to peer and adult questions and directions. In this collaborative oral language context the students are learning to have conversations in Māori. It will be interesting to see whether students in each group are able to maintain a balance between initiating new topics of conversation and continuing with topics initiated by others and if any links can be made between initiation and their progress.

iii) Māori themes

Sociocultural theory argues that children’s language skills are acquired through their interactions with others such as parents, peer and other adults in social contexts. So the sociocultural background of each child plays a major role in their approach to understanding literacy practices (Speaker, Taylor, & Kamen, 2004). Topics which students have initiated conversations about in their collaborative storying and drawing, will be tabled to explore what influence their personal background experiences and Māori culture play in any of their dialogue.

iv) Nga momo rerenga (sentence types)

Foster’s analytical template was used to assess the quality of each student’s language and to see what types of sentence structure each student is using. Has the student showed any growth in this area? If so, then what changes are observable?

v) Student enjoyment

At the conclusion of the project the students were asked to rate how they felt about the daily sessions on a scale of 1 to 5 and if they enjoyed it:



1= not at all

2= okay

3= good

4= enjoyed

5= really enjoyed

One of the concerns for the daily sessions was whether the children would lose interest in the project because the sessions required students to initiate their own ideas and learning, so students were asked to give their feedback about the exercise.

2.7. Ethical approval

Ethical approval for this research study was obtained from: Ethics Research Committee, School of Education, University of Waikato, on 30/06/07.

This included approval for the consent forms for Parents/Caregivers, the school Principal and Board of Trustees and the students themselves who participated in the study.

Chapter 3

Findings

Ko te reo, te hā, me te poutokomanawa o te iwi Māori.

3.1. Section One:

3.1.1. Oral language *Kia tere tonu* test results

This chapter presents the research findings in three sections. The first section presents pre and post test results on the two *Kia tere tonu* measures, *kāanga* and *kupu*. The second section presents the findings from the *Tā pikitia hei āwhina kōrero* programme, detailing transcripts of samples of oral language from the two students groups from the beginning, middle and end of the programme. The third section presents additional descriptions and analyses of students' oral language across the programme.

The student's pre and post testing tool used was the *Aromatawai Reo A Waha: Kia tere tonu* (Berryman & Langdon, 2001). The test consists of two parts:

i) Spontaneous language- phrases *kāanga*

This part of the test gave the students an opportunity to talk about one picture they have selected from the set of 24. There was no time limit. The *kāanga* scores provide an indication of the number and complexity of ideas students attempted to convey in their spontaneous language use.

Table 2. Kia Tere Tonu Test Kīanga Scores (Spontaneous Phrases)

	Student	Pre test	Post test	Gain
Group A	Te P	3	10	+7
	Ken	8	9	+1
	Qub	2	4	+2
Group B	Jos	2	6	+4
	Man	4	8	+4
	Mik	3	7	+4
	\bar{x}	3.6	7.3	3.6

*The bolded names indicate students who were one class level ahead of the other students.

i) Spontaneous phrases *kīanga*. (Table 2 and Tables 3-5)

Table 2 shows that all the students showed an improvement in their pre-test and post test kīanga scores. The mean pre-test score across all six students was 3.7, and the mean post test score was 7.3. Table 2 shows that all the students improved in the order of 50% in kīanga scores, except Ken, who showed least improvement (an increase of one).

Table 3. T-Test: Paired samples statistics: Statistics for significance of difference and effect sizes

		Mean	N	Std.Deviation	Std. Error Mean	(d) Effect Size
Pair 1	Vocabulary Pretest	14.8333	6	4.87511	1.99025	
	Vocabulary Posttest	17.5000	6	5.89067	2.40486	0.46
Pair 2	Phrase Pretest	3.6667	6	2.25093	.91894	
	Phrase Posttest	7.3333	6	2.16025	.88192	1.53

Table 4. T-Test: Paired samples correlations: Statistics for significance of difference and effect sizes

		N	Correlation	Sig.
Pair 1	Vocabulary Pretest & Vocabulary Posttest	6	.644	.167
Pair 2	Phrase Pretest & Phrase Posttest	6	.562	.246

Table 5. T-Test: Paired samples test: Statistics for significance of difference and effect sizes

		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Vocabulary Pretest- Vocabulary Posttest	-2.66667	4.63321	1.89150	-7.52893	2.19559	-1.410	5	.218
Pair 2	Phrase Pretest- Phrase Posttest	-3.66667	2.06559	.84327	-5.83437	-1.49896	-4.348	5	.007

Tables 3-5 presents the outcome of paired samples t tests for both *kupu* (vocabulary) and *kīanga* (spontaneous phrases) scores. Tables 3-5 also shows that there was a statistically significant difference ($p = .007$) between students' pre and post *kīanga* scores, and in addition, that the effect size of these differences is strong ($d = 1.53$).

All students in the *Kia Tere Tonu* post test spoke more confidently and attempted to express more ideas as evident in the *kīanga* transcripts (by the greater number of phrases used). Phrases (*kīanga*) used were more comprehensive with Man and Ken attempting to recount personal experiences about the item. For example Man chose to talk about the *pounamu* Table 10 (Group B), and rather than just describe the item. Her first phrase was:

I whiwhi au tētahi pounamu nō tāku whaea kēkē mō te kapa haka.

(I got a greenstone from my Aunty for the *kapa haka*).

Ken Table 7 (Group A) also selected the *tiki* (*pounamu*) and his first phrase was:

Ka haere a Ken ki te tiki tētahi tiki, ki te, he...kit e, ki te puta he mea ki te mau i roto i tōna kaki, ki te tiki, ki te haere ki tōna kapa haka.

(Ken went to get a *tiki* to put, to wear on his neck to go to his *haka* performance).

In the post test a more confident Mik (Group B) showed his background exposure to *te reo Māori* with his *turn of phrase* in his description of a *banana*. Mik's language shows an emerging fluency which in the opinion of the researcher, shows he is beginning to think in Māori in this example:

Ka taea koe ki te kai te panana

You can eat bananas.

He ahua rite ki te marama me te menemene i runga i tō kanohi.

Their shape is like the moon and the smile on your face.

He pai mōku.

They are good for me

The remaining students also used a report type approach to talk spontaneously about the attributes of the item selected usually the colour, dynamics and purpose of the item. For instance Te P:

He panana tēnei

This is a banana.

Te kara o te panana he pango me te kowhai me te kakariki.

The colour of the banana is black, yellow and green.

Ka kai nga makimaki te panana, ka kai nga tangata te panana.

Monkey eat bananas, people eat bananas.

In this research tool, spontaneous phrases or *kāanga* are defined as the number of ideas the individual is trying to express within the limits of his/her level of language acquisition. In the *kāanga* section students greatest gains occurred with the range of improvement in the number of ideas they attempted to convey. These gains range from 1 to 7. Tables 6-11 detail the pre and post Test language used by all students (Group A and Group B).

Table 6. Pre and post test Kīanga transcripts: Group A, Te P.
(Student language left intact).

Items&Scores	Te P
<p>Pre Test 3 Motokā Car</p>	<p>He motokā tēnei. This is a car.</p> <p>Ka haere te motokā ki te taone me te whare me te... The car is going to town and the house.</p> <p>Ka taraiwa te motokā ki, ki te kura. The car is driving to school.</p>
<p>Post Test 10 Panana Banana</p>	<p>He panana tēnei. This is a banana.</p> <p>Te kara o te panana he pango me te kowhai me te kakariki. The colour of the banana is black and yellow and green.</p> <p>Ka kai nga makimaki te panana, ka kai nga tāngata te panana Monkeys eat bananas and people eat bananas.</p> <p>Ka tikina nga panana me te pirangi koe tētahi kai. You can get bananas if you want a feed.</p> <p>He kakariki te tae o te panana. Bananas are green.</p> <p>I tiki nga makimaki nga panana mō tōna kai. Monkeys get bananas for their food.</p> <p>I pirangi nga makimaki mō te wā poto. Monkeys want them for play time.</p> <p>Ka kai nga makimaki i nga panana i te wā poto Monkeys eat bananas at play time.</p> <p>Ka tiki nga tangata i roto i te kararehe. People get them to put in for the animals.</p> <p>He mā i roto i te panama me tētahi kowhai. Bananas are white inside and yellow.</p> <p>Ka kai nga tāngata te panama i nga wā tina mo te wā tākaro. People eat bananas for lunch and playtime.</p>

Table 7. Pre and post test *Kianga* transcripts: Group A, Ken.
(Student language left intact).

Items&Scores	Ken
<p>Pre-test 8 He tiki</p>	<p>He tiki tēna. That is a tiki.</p> <p>E rua ona karu. It has two eyes.</p> <p>Toru ōna matimati Three fingers.</p> <p>Tahi..E kore tōna taringa. One...no ears.</p> <p>He kakariki te tae. It is green.</p> <p>He whero ōna karu. It has red eyes.</p> <p>E rua nga ringaringa. Is has two hands.</p> <p>E tahi ōna puku. It has one stomach.</p>
<p>Post Test 9 He tiki</p>	<p>Ka haere a Ken ki te tiki tētahi tiki, ki te tiki he... ki te, ki te puta he he mea ki te mau i roto i tōna kaki, ki te tiki, ki te haere ki tōna kapa haka. Ken is going to get a <i>tiki</i> to put, a thing to wear on his neck at his kapa haka(Māori singing performance)</p> <p>Ka haere, ka waiata a Ken <i>Tu hikitia rā, tu hapainga rā me Uia mai ko ia.</i> Ken went, and sang <i>Tu hikitia rā, tu hapainga rā me Uia mai ko ia.</i></p> <p>Me ka waiata a Ken tētahi haka anō ki te hae, ki te tiki tētahi mea tētahi taiaha ki te haka. And Ken sang a haka again and got a taiaha to haka with.</p> <p>Ka haka ia, ki te <i>Tu hikitia rā, tu hapainga rā āno;</i> me ki te, haere a Ken, ki te tiki tōna Māmā, ki te tiki tōna tiki . ki te , ki tōna me; He did the haka <i>Tu hikitia rā, tu hapainga rā</i> again and went to get his mother to fetch his tiki.</p> <p>Kei te waiata ia tētahi waiata, me</p>

	<p>Kei te haka ia, <i>Ka mate, ka mate, ka ora ka ora.</i> He sang a song and he did the haka <i>Ka mate, ka mate, ka ora ka ora.</i></p> <p>Ka, me kei te haere a tētahi tama i roto i te kapa haka i roto i tōna whare ki te tākaro ia te <i>Space Invaders</i>; One boy in the kapa haka went to his house to play <i>Space Invaders</i></p> <p>ki te wini tētahi, tētahi mea i runga i te rorohiko. To win something on the computer.</p>
--	---

Table 8. Pre and post test Kīanga transcripts: Group A, Qub.
 (Student language left intact).

Items&Scores	Qub
<p>Pre-test 2 Pukapuka</p>	<p>He pukapuka tēnei. This is a book.</p> <p>He pango me te kahurangi tēnei pukapuka. He, he. This book is black and blue.</p>
<p>Post test 4 Pukapuka</p>	<p>He pukapuka. A book.</p> <p>He pango me te mā me te kikorangi te pukapuka. The book is black and white and blue.</p> <p>Ka titiro nga tamariki i roto i te pukapuka. Children look in books.</p> <p>Ka huakina te pukapuka me te tuhituhi i roto i te pukapuka. You open a book and write in a book.</p>

Table 9. Pre and post test Kīanga transcripts: Group B, Jos.
(Student language left intact).

Items&Scores	Jos
<p>Pre-test 2 Taringa</p>	<p>He māwhero tēnei taringa. This is a pink ear.</p> <p>Kei te mahi tēnei taringa ki te whakarongo ki tō mātua ki tō kaiako. Ears are for listening to your parents and to your teacher.</p>
<p>Post test 6 Pukapuka</p>	<p>Kei te mahi te pukapuka. Books are for work.</p> <p>Kei te pānui koe te pukapuka i mua o te wā tākarō. You read books before playtime.</p> <p>Kei te pango me te kahurangi te kara o tēnei pukapuka. The colour of this book is black and blue.</p> <p>Kei te titiro tētahi pukapuka i roto i tētahi karaehi. You look at a book in class.</p> <p>Kei te titiro koe i roto mō tētahi. You look inside for one.</p> <p>Kei te haere koe ki te kimi tētahi pukapuka i roto i te whare pukapuka. You go to find a book in the library.</p>

Table 10. Pre and post test Kīanga transcripts: Group B, Man.
(Student language left intact)

Items&Scores	Man
<p>Pre-test 4 Kutikuti</p>	<p>Ko taku pikitia he kutikuti. My picture is scissors.</p> <p>Ka mahi koe nga kutikuti. You work the scissors.</p> <p>Ka tapahi te pepa. They cut paper.</p> <p>Ka tapahi nga nūpepa nā te mea he roa nga nūpepa. They cut newspaper if it is long.</p>
<p>Post test 8 Pounamu</p>	<p>Taku hiahia te pounamu. I want the greenstone (tiki).</p> <p>I whiwhi au tētahi pounamu nō taku whāea kēkē mō te kapa haka. I got a greenstone from my Aunty for the <i>kapa haka</i>.</p> <p>He ataahua te pounamu.he rerekē te ahua o te pounamu ki runga te kari nā te mea he iti tōku pounamu. A beautiful greenstone a different looking greenstone to the one on the card because mine is small.</p> <p>He momona te pounamu i runga i te kari. The greenstone on the card is fat.</p> <p>I whiwhi au tēnei tāonga. I was given this greenstone.</p> <p>I whiwhi au mo toku rāwhanau. I got it for my birthday.</p> <p>Kare au i whiwhi te tāonga i tōku whaea kēkē. I didn't get the present from my Aunty.</p> <p>I tiki au te tāonga i au, i te kirihimete nā tōku whaea kēkē. I got the present at Christmas from my Aunty.</p>

Table 11. Pre and post test Kīanga transcripts: Group B, Mik.
(Student language left intact)

Items&Scores	Mik
<p>Pre-test 3 Moenga</p>	<p>He moenga. A bed.</p> <p>Ka moe koe ki roto. You sleep in them.</p> <p>Mo te moe For sleep.</p>
<p>Post test 7 Panana</p>	<p>He panana tēnei. This is a banana.</p> <p>He kowhai te kara. It is yellow.</p> <p>Ka taea koe ki te kai te panana. You can eat bananas.</p> <p>He ahua rite ki te marama me te menemene i runga i tō kanohi. Their shape is like the moon and the smile on your face.</p> <p>He, he, pai mo te kai. They are good to eat.</p> <p>He pai mōku. Good for me.</p> <p>He pai ki te kai te panana. Ko mutu. It's good to eat bananas. The end.</p>

ii) **Vocabulary knowledge *kupu* (Table 12 and Tables 3-5)**

The other section of the *Kia Tere Tonu* tool is a picture recognition test which requires the student to name as many of the pictures (24 familiar items) as possible within a 30 second time frame. This provides an indicator of students' vocabulary knowledge.

Table 12. Kia Tere Tonu test: Kupu (vocabulary scores)

	Student	Pre test	Post test	Gain
Group A	TeP	13	23	+10
	Ken	10	11	+1
	Qub	13	10	-3
Group B	Jos	13	19	+6
	Man	24	24	0
	Mik	16	18	+2
	\bar{x}	14.8	17.5	2.7

*The bolded names indicate students who were one class level ahead of the other students.

Table 12 shows that there was a gain in mean vocabulary (*kupu*) scores (pre test mean: 14.8 post test mean, 17.5). However Table 12 also shows that there was wide variation in individual student performance, from an increase of 10 in one case (TeP), to a decrease of 3 in another, (Qub). Data from the paired samples analysis (Tables 3-5) indicates that there was no statistically significant difference between pre test and post test *kupu* (vocabulary scores, $p = .218$ (NS)). Clearly the impact of the *Tā Pikitia hei āwhina kōrero* programme was far stronger on these students' spontaneous language use (kīanga) than on vocabulary acquisition. However, there was a low to moderate effect size of the changes in *kupu* ($d = .46$). This suggests that there might be some value in further exploring the impact of *tā pikitia hei āwhina kōrero* on vocabulary acquisition.

Inspection of the transcript of Qub, who had a lower vocabulary score at post test shows that he now used the correct form of the indefinite article accompanying a noun when naming each item - *he turu, he karu, he parāoa*; enunciating each word carefully rather than just *turu, karu, parāoa*, which he used at the pre test. Consequently, in the 30 seconds of the post test Qub named only 10 items. However when he continued the test outside the time limit Qub was able to name 18 of the 24 items, compared with 13 at the pre-test.

3.2. Section Two:

Tā Pikitia Hei Āwhina Kōrero collaborative drawing and storying findings

Children need to engage in the process of communicating in the target language. While accuracy is important it is unrealistic to expect error-free attempts by beginning learners. (Ministry of Education, 2007)

This section presents examples of student's oral language transcripts from tapes of their spontaneous language during collaborative drawing and storying -*Tā Pikitia āwhina kōrero*. Tables 13-18 presents one sample transcript from beginning, middle and end of the 36 session series for both Group A and Group B.

It is important to note that the Māori language in these transcripts has not been edited or corrected, but represents the students' own speech as it occurred.

Following Tables 13-18, comments are offered to illustrate the nature of the changes that occurred with these students' language over the 36 sessions when they were engaging in the *Tā Pikitia hei āwhina kōrero* activities.

Figures 3 and 4 show collaborative pictures created by Group A during middle and end session of *Tā Pikitia Hei Āwhina Kōrero* sample transcripts that follow.



Figure 3. Collaborative picture (Tā Pikitia). Group A: Middle session 22
(Source: Author)



Figure 4. Collaborative picture (Tā Pikitia). Group A: End session 36
(Source: Author)

Table 13. Tā pikitia hei āwhina kōrero sample transcript: Group A, session 10
(Student language left intact)

Tape 10	31-7-07 Beginning - Te P, Ken, Qub.
Qub	Kei te whiti te rā.
Te P	Ka haere a Qub rāua ko Ken ki te whutupaoro. Ka wini a Qub.
Ken	Ka tikina a <i>Speak up</i> Qub, ka tikina a <i>Ke</i> a Qub he taiki.
Qub	Ka, ka haere a Qub rāua ko Taylor ki te haere ki te tiki nga, he inu.
Te P	Ka haere a TeP ki te whare pukapuka.
Ken	Ka, ka haere a Dion ki Meketānara.
Qub	Ka haere a Taylor rāua ko Qub ki, ki te, titiro a <i>Harry Potter</i> .
Te P	Ka haere a Ken ki te whare paku.
Ken	Ka haere a Javan ki <i>K.E.</i> ki te whare paku.
Qub	Ka haere a Qub rāua ko Taylor ki te tik tika nga ika.
Te P	Ka haere ka titiro a TeP i a Man, ka haere ka haere a Man rāua ko TeP ki te tikina tētahi aihikirimi
Ken	Ka, ka, ka, ka play a Ken, (TePuhī <i>tākaro</i>) ka tākaro a Ken whutupaoro.
Qub	Ka haramai, ka haere a Qub rāua ko Taylor ki te whare pukapuka ki te tiki a <i>Harry Potter</i> .
Te P	Ka haere a TeP ki te oma i roto i te taone.
Ken	Ka whakahoki a Qub tōna pukapuka.
Qub	Ka haere a Qub rāua ko Taylor i roto i tōna whare, ki te moe.
Te P	Ka haere a TeP rāua ko Man ki te piu.
Ken	Ka, ka hoea te waka a Dion.
Qub	Ka ua.Ua.
Te P	Ka haere a TeP rāua ko Man ki te kaukau, <i>kaukaurama</i> .
Ken	Ka haere a Javan ki Meketānara.
Qub	Ka, haere a Taylor ki te, ki a KFC.
Te P	Ka pirangi a Man tētahi inu.
Ken	Ka haere a Dion, ki KFC, mō he tipī rāua he mīti.
Qub	Ka haere a Qub ki te oma, rāua ko Taylor.
Te P	Ka haere a TeP ki te whare pikitia ki te titiro ki <i>Harry Potter</i>
	Ka tikina ia tētahi inu
Ken	Ka haere a TeP ki, ki, Javan's whare.
Qub	Ka haere a Qub ki ki tōna whare ki te kai, me titiro a nga <i>wrestling</i> .
Te P	Ka hoki a TeP ki tōna whare. Ka haere a Ken ki te whare paku anō.
Ken	Ka haere TeP ki te whare paku me Javan ki te kihi.
Qub	Kei te haramai ko tōku pāpā.

Table 14. *Tā pikitia hei āwhina kōrero* sample transcript: Group A, session 22.

(Student language left intact)

Tape 22	20-8-07 Middle - TeP, Ken, Qub
Qub	Ka haere a Tamatekapua i roto i Te Arawa waka.
TeP	Ka haere a Tamatekapua rāua ko Ngatoroirangi i runga. Ka haere tōna wahine i runga.
Ken	Kei te haere rāua ki te, ki te, ka haere te wahine a Ngatoroirangi ki te kihi ia, ka ka whiti tōna wahine.
Qub	Ka, ka haere <i>oh</i> Ka pai kia a Tamatekapua a nga, nga te wahina <i>oh</i> , wahine a Ngatoroirangi.
TeP	Ka tiki Tamatekapua te wahine o Ngatoroirangi nā te mea ka pirangi ia ki, ka pai kia Tamatekapua.
Ken	Kei te haere mai he taniwha, me te korokoro o te parata.
Qub	Ka haramai, ka haere, ka haere a te tangata ki Ngatoroirangi.
TeP	Ka haere mai te parata ki te titiro a Nga a Tamatekapua nā te mea ka kino ia.
Ken	Kei te haere, mai a Tamatekapua ki te tiki a Ngatoroirangi's, wahine.
Qub	Ka tiki a te parata a a Tamatekapua nā te mea ka kino ia.
TeP	Ka haere te parata Nga me Tamatekapua i roto i te wai. Ka pātai a Ngatoroirangi Kei <i>hea a Tamatekapua me tōku wahine</i> .
Ken	Kei te haere, a, kei te, ka tikina a Tamatekapua rāua ko te wahine o Ngatoroirangi, ka haere te parata i roto i te wai. (<i>Kei te kōhimuhimu a TeP</i>)
Qub	Ka tiki a te parata Te Arawa waka.
Ken	Kare pirangi rāua ki te haere ki roto i te wai.
TeP	Ka kaukau a Ngatoroirangi, Ka haere a Ngatoroirangi ki Tonga, ki Maketu. Ka kaukau ia, ka kaukau ia, ki Maketu.
Qub	Ka haere a Te Arawa waka ki Maketu.
Ken	Kei te haere rāua ki, kei te haere a kei te haere te taniwha ki Maketu.
Qub	Ka haere a Ngatoroirangi me Tamatekapua ki, ki Hawaiki.
TeP	Hawaiki nui, Hawaiki roa, Hawaiki pāmamao.
Ken	Kei te haere, a te waka ki, ki te moana Taupo. Ka kaukau a Ngatoroirangi me Tamatekapua. Ka whawahi ia i roto i te wai.
TeP	Ka haere a, ka haere a Ngatoroirangi ki te Maketu.
Qub	Ka, ka, hoki a a Ngatoroirangi ki te waka.

Table 15. Tā pikitia hei āwhina kōrero sample transcript: Group A, session 36.

(Student language left intact)

Tape 36	7-9-07 End - Qub, Ken, TeP
Qub	Te Rā Whanau o Qub me Ken.
Ken	Kei te tiki a, a TeP rua tekau mā tahi nga mōne ki te tiki tētahi koha.
TeP	Te koha mo te rā whanau o Qub rāua ko Ken.
Qub	I tiki a TeP he nōnohe tātua. (nōnoke)
Ken	Ka, ka tiki a Ken tētahi tīketi ki te titiro a te waka tihi.
TeP	I haere a TeP, i haere a TeP ki te whare pikitia ki te titiro kia <i>Ratatouille</i> .
Qub	I tiki a Qub me Ken he rorohiko ki te tākaro i runga i te rorohiko.
Ken	Ka tākaro ia, rāua <i>Space Invaders</i> .
TeP	I kimi a TeP tōna, tētahi pēke moni.
Qub	He i runga i raro i te peke mone, moni, i roto i te peke moni he moni.
Ken	Ka tiki a Ken he mone kari, kari moni ki te tiki tētahi, nga mone.
TeP	Ka hoko a Ken rāua ko Qub nga kakahū me nga kai me nga hū.
Qub	I haere i runga i te atāmira ki te titiro ki te kapa haka a Ken rāua ko Qub me TeP.
Ken	Ka titiro a te māmā a Qub rāua ko TeP me te pāpā o Ken.
TeP	I pirangi a Qub tētahi kai Meketānara. Ka haere a Qub me Ken ki Meketānara.
Qub	I tiki rāua he, he <i>Big Mac</i> . He kai rāua, he pai me tiki he inu wai.
Ken	Ka tiki a Qub he tātua nōnoke, ki te tākaro, nōnoke.
TeP	I tākaro a, TeP mo tōna tuakana tētahi kēmu.
Qub	He kai, te inu, te <i>Big Mac</i> me te inu. He pai te kai.
Ken	Ka tiki a Dion he <i>Bigger Mac eo!</i>
TeP	I tākaro a TeP me Man tētahi kēmu netiporo.
Qub	I tiki rāua, i tiki a Ken me Qub he, he motopaika.
Ken	Ka haere a Qub ki Maketu ki te kaukau i roto i te wai. Ka tiki ia tētahi koura me tētahi moko (moke?).
TeP	I, he, ka whiti te rā. Ka kite nga tāngata te, nga kapua, me te rā. Ka ua te rā inaianei.
Qub	I tākaro i runga i te wai. Ka kaukau i runga i te wai. Ka, ka haere ki ru, i runga i te motokā ki te haere ki te whare.
Ken	Ka tiki a Qub a, a tētahi kuri ki te kai ia. Ka kai te kuri a te maunga o Qub.
TeP	I tākarō nga ngeru me nga kuri i runga i te atāmira.
Qub	I, haere a te tama me Qub rāua ko Ken.....

Figures 5 and 6 show collaborative pictures created by Group B during their *Tā pikitia hei āwhina kōrero* middle and end sessions that follow.



Figure 5. Collaborative picture (Tā Pikitia). Group B: Middle session 24
(Source: Author)



Figure 6. Collaborative picture (Tā Pikitia). Group B: End session 34
(Source: Author)

Table 16. *Tā pikitia hei āwhina kōrero* sample transcript: Group B, session 11.
(Student language left intact).

Tape 11	8-8-07 Beginning - Mik, Jos, Man
Mik	Kei te whiti mai te rā.
Jos	Inanahi i haramai a Shayla rāua ko tōku tuakana ki te kura ki te purei <i>ringaringa poro</i> .
Man	Ka haere ahau me Hineiwhia ki te kura ki te purei netiporo.
Mik	Kei te tākaro ahau i runga i te papapekepeke.
Jos	Ānei tētahi awa I roto i te wai e tētahi wheke, me nga ika.
Man	Ka haramai a Jos rāua ko Mik ki te hī ika. Ka kumea a Mik tētahi ika.
Mik	Ānei tētahi puke. Ki runga i te puke tētahi kau.
Jos	Ānei tētahi huarahi. I runga i te huarahi i tētahi pahi. Kei te haere te pahi ki te papa tākaro. E whā nga tamariki i roto i te pahi.
Man	Ka haere nga tamariki i roto i te pahi ki Mekitānara. Ka tiki nga tamariki tētahi hamupaka.
Mik	Kei te haere ahau ki te kai te ika.
Jos	I roto i te awa kei te hiakai te wheke.
Man	Ka haere nga tamariki ki ona whare.
Jos	Kei te ua ua inaianei. Kei te haere nga tamariki ki te moe.

Table 17. *Tā pikitia hei āwhina kōrero* sample transcript: Group B, session 24.
(Student language left intact).

Tape 24	4-9-07 Middle - Man, Mik, Jos
Jos	Kei te hī ika a Mik.
Mik	Kei roto i te moana tētahi wheke.
Man	I roto i te awa he mako, he mako.
Jos	Kei te oma a Mik i roto i te whare nā te mea kei te matakū. Kei te tangi ia. Kei te katakata a Jos me Man.
Mik	Kei te rere nga manu.
Man	Ka haramai te mama o Mik ki te kōrero ia kei te pai. Ka haere rāua ki, ka haere rāua ki <i>Chipmunks</i> . Ka haere a Mik i runga i te <i>slide</i>
Jos	I mua i te haere a Mik ki te <i>Chipmunks</i> , kei te haere rātou ki Maketanara , Meketānara, tumeke tanara
Mik	Ka katakata ahau ki a Man rāua ko Jos nā te i taka rāua.
Man	I haramai te Māmā a Jos ka riri te māmā a Jos ki a Mik, (me te māmā o Man.) I tangi a Mik.
Jos	Nā kei te haramai o te Māmā o Mik me Man. Kei te whawhai ia. Kei te wini a te māmā o Man. Kei te tangi a Mik anō, Kei te oma a Mik i roto i te whare.
Mik	Ka whawhai māua ko Man. Ka tangi a Man nā te mea i wini ahau.
Jos	Ka mutu te whawhai, kei te haere a Mik rāua ko Jos me Man ki te moe.
Mik	Ka haramai tōku Māmā ka whawhai ia ki te māmā o Man, ka wini tōku māmā
Man	Kei te haere a Man ki te mahi kapa haka inaianei.
Jos	Haere rā.

Table 18. *Tā pikitia hei āwhina kōrero* sample transcript: Group B, session 34.
(Student language left intact).

Tape 34	18-9-07 End - Man, Jos, Mik.
	Nga Hararei.
Man	I nga hararei, kei te haere ahau ki Waikaremoana, ki te kite ōku Whaea Keke. Kei te haere mātou me tōku whanau ki te eke hoiho. Ko tētahi ingoa o nga hoiho ko <i>Chester</i> , me <i>Flok</i> me <i>Mana</i> me <i>Huru</i> .
Jos	I nga rā hararei kei te haere ahau ki te <i>movies</i> , pikitia. Kei te haere ahau ki te taha i tōku tuahine, māmā, pāpā, oua tōku tuakana.
Mik	<i>On the</i> hararei, kei te haere ki Ahitereiria, ki te noho i reira.
Man	A muri i nga hoiho i haere mātou ki te, nga kuri.
Jos	I roto i nga, i te pikitia, kei te kai ahau ki te <i>popcorn</i> me kei te inu tētahi <i>coca cola</i> ; te kānga paopao me te inu.
Mik	A muri ka haere ahau ki tōku, ki te whare o tōku māmā. Ka moe ahau i reira.

3.2.1 Comments on oral language used during students' engagement with *Tā Pikitia hei āwhina kōrero* programme.

Pikitia group A

Group A sessions: 10, 22, 36

In the dialogue across these three samples from the students of Group A there are examples of language use frequently observed when learning to speak a language. In this instance there is the gradual development of a conversation initiated around a topic rather than random statements. In the beginning session 10, the conversation consists of the repetition of a basic phrase pattern mainly:

Ka haere a ... ki...

and no particular subject just a series of events and friends from their background experiences - a labelling session using known vocabulary. In the middle session 22, students attempt to retell a Māori legend which was their current bilingual unit subject for a kapa *haka* performance and the last sample, session 36, creating a conversation around the topic of a birthday: *Te rā whanau o Qub me Ken*.

The very repetitive phrase beginnings of session 10, *Ka haere a ...ki...* become more varied by session 36 with the use of *i*, *he kei* in addition to *ka*.

There are examples of interlanguage, students inventing Māori vocabulary from English terms:

Te P: *kaukaurama* for *swim-o-rama*, (session 10),

and the use of English structures in Māori. For example (session 22),

Ken: *Ngateroirangi, s wahine* Ngateroirangi's wife.

One student tried humour (session 10),

Ken: *Ka haere a Javan ki K E ki te whare paku*, about going to the toilet which the group found amusing.

Nevertheless, the student group was able to sustain the dialogue in Māori with only between 3-5 English words for the entire sessions. (10, 22, 36)

Group B sessions: 11, 24, 34.

Pikitia group B

Similar language acquisition examples were observed in these sessions. Students in Group B had two older (*tuakana*) Year 5 students which probably impacted on the development of the dialogue used.

The group's conversations were shorter but more cohesive. The students began to add to what the previous speaker had said more often before initiating a new topic (session 11). Phrase beginnings were varied-*ka, kei, i, e, a, nā*.

In these three sessions the conversations developed from several themes in session 10, to a narrative with a (*whawhai*), problem and resolution in session 24 and a conversation with a title *Nga Hārarei* (The holidays) around one topic in session 34. Students also signalled the conversation was at an end in session 24 with *haere rā*.

In the group B sessions, there are examples of students self correcting the use of English for instance, (session 34), Jo self correcting his use of pop corn to *kanga paopao*. Also several examples of inventing their own words, in this case:

Jo Kei te *ua ua inaianei* (session 34);

meaning it is raining hard (a lot); probably based on the repetition of the word for a plural action in Māori, such as *pakipaki*. A further example was *ringaringa*

poro, a word created for handball by Jo in the same session 11. Lastly an interlanguage example used for Māori (session 34);

Mik: *On the hararei* for *I nga hararei*.

The students enjoyed using each other's or friend's names in the dialogue and thought it was funny to have a fight (*whawhai*) and crying (*tangi*) involving themselves and each other's parents as the characters in the conversations (session 24).

One of the main characteristics of the dialogue across the 36 *Tā Pikitia hei āwhina kōrero* sessions for both groups was repetition. The students repeatedly used the same vocabulary, language structures, people and favourite events in the conversations in a variety of context, this repetition being so important for early fluency in the learning of a language.

3.3. Section Three:

3.3.1. Some additional descriptions and analyses of students' oral language across the *Tā Pikitia* hei āwhina kōrero programme.

Analysis of change in language structure using Foster's framework

Foster created a template (Appendix B) based on 60 representative essential structures found in normal functioning Māori language (NFL) to analyse the language structures used by each student. The analysis was carried out on nine sample transcripts of each student's language at three stages of the project. At the beginning (sessions 10, 11, 12), middle (sessions 22, 23, 24) and end (sessions *33, 34, 35, 36). These transcripts are presented in Appendix A. If a particular language structure was present in the dialogue, it was marked on the template. Any structure employed by a student over and above the structures that Foster considers essential was noted in the general observations section of the template and a credit point allocated for their use. For example: *tuatahi* (an ordinal number) would earn a point. Tables 19-20 presents the percentage of Foster's 60 essential language structures evident in each transcript (beginning, middle and end) for students in Group A and B. Tables 19-20 presents a summary table of the results:

Table 19. Percentage of Foster’s 60 essential language structures used by each student at the beginning, middle and end of the *Tā Pikitia hei āwhina kōrero* programme: Group A.

Name	Session	Beginning			Middle			End		
		Tape 10 (A)	Tape 11 (A)	Tape 12 (A)	Tape 22 (A)	Tape 23 (A)	Tape 24 (A)	Tape 33 (A)	Tape 35 (A)	Tape 36 (A)
Te P	Sheet	1	4	7	10	13	16	19	22	25
	Score	8.4	7.8	9.0	12.6	10.2	8.4	9.6	10.2	10.8
Ken	Sheet	2	5	8	11	14	17	20	23	26
	Score	10.2	6.6	7.2	13.8	8.4	7.2	11.4	4.8	11.4
Qub	Sheet	3	6	9	12	15	18	21	24	27
	Score	9.6	7.8	7.2	6.6	8.4	7.8	14.4	6.6	9.6

Table 20. Percentage of Foster’s 60 essential language structures used by each student at the beginning, middle and end of the *Tā Pikitia hei āwhina kōrero* programme: Group B.

Name	Sessions	Beginning			Middle			End		
		Tape 10 (B)	Tape 11 (B)	Tape 12 (B)	Tape 22(B)	Tape 23(B)	Tape 24(B)	Tape 34(B)	Tape 35(B)	Tape 36(B)
Jos	Sheet	1	5	8	10	13	18	20	23	25
	Score	8.4	13.8	6.6	7.8	12.0	12.0	9.8	9.0	16.2
Man	Sheet	2	6	9	11	14	16	19	22	*33
	Score	10.2	8.4	9.0	7.2	10.2	12.6	10.2	10.2	12.6
Mik	Sheet	3	4	7	12	15	17	21	24	26
	Score	7.8	7.8	6.6	1.8	7.2	12.0	7.2	8.4	10.2

* Man was not present for the last session so the tape transcript number 33 for her only was the used which was the tape closest in the series.

Tables 19-20 show that, generally speaking there were increases in number of different structures used by students across the three time points in this study. However the majority of sentences (*nga momo rerenga*) used by the students in this project remained simple sentences according to the Foster framework. The sentences all fell short of the definition for complex sentences provided by Harlow (2001, p. 234).

i) Length of utterance

Gains in the length of utterance may be a worthwhile indicator of a students' increasing competence in learning a second language. In this research, an utterance was measured in terms of the number of individual words. A word count (excluding any English words) was tallied to show the range from shortest to longest language utterance for each of the six students from the sample.

Table 21. Length of utterance for all students during sessions at the beginning, middle and end of the programme

Group A Length of utterance Shortest to longest.	Beginning Sessions	Middle Sessions	End Sessions
Te P	6-23	6-40	8-25
Ken	4-13	5-26	2-22
Qub	2-17	5-25	4-26
Group B Length of utterance Shortest to longest	Beginning Sessions	Middle Sessions	End Sessions
Jos	3-29	6-38	18-36
Man	3-19	3-49	12-38
Mik	3-10	3-14	7-19

Table 21 shows that there was no clear systematic pattern of increasing length of utterance from sessions at the beginning, middle and end of the programme. Long and short utterances occurred at each of the three time points, as well as a wide range from shortest to longest. This information suggests that length of utterance

may not be the most useful descriptor of the language changes of these six students.

ii) Initiation of ideas

Across the 36 *Tā Pikitia hei āwhina kōrero* programme the conversations where students maintained a balance between initiating new topics and responding to topics initiated by others were those that were centred on mutually agreed topics such as the arrival of *Te Arawa waka* (Table 14, tape 22, Group A). The dialogue had a sequence of events making a cohesive conversation. Students also displayed the ability to link their talk to previous conversation by successfully adding a comment. This appears to signal progress in the development of conversational skill.

iii) Māori themes

The themes influencing discussion initiated by both groups of children consisted of their personal experiences and interests, both in and out of school. Māori cultural themes made up in the order of 30% of the themes discussed. The specific Māori and cultural themes that emerged from the 18 *Tā Pikitia hei āwhina kōrero* conversations sampled were:

Maketu, hī ika, wheke, mako, pāpaka, kapa haka, poi, taiaha, rakau roa, rakau poto, waiata, kiwi, tuakana, tui, ngahere, Rotoiti, tuatara, Tamatekapua, Te Arawa waka, Ngateroirangi, waka, taniwha, te korokoro o te parata, Hawaiki, whanau, te moana, Waikaremoana, tuahine, whaea keke, kiwi :(30/102).

The range and variety of cultural themes students chose to draw and talk about was quite extensive and reflected their variety of background, social and cultural experiences.

iv) Student enjoyment

The students rated on the five point scale their enjoyment of their participation in the project. Student gains in conversational skill were generally accompanied by enjoyment in participating. The four students that enjoyed the sessions most made the greater gains, with the two who rated the experience as *good* smaller gains.

v) An informal trial

After an informal trial in a different Y3-4 class in the first 9 weeks of Term 4, Whaea J. noticed a marked improvement in students' oral language. She reported an improvement in *kupu* knowledge and improvement in *kāanga* by three quarters of the students in her class. She commented that there was a clear improvement in Māori language fluency and confidence in this relatively short period. A parent of one of the students in Whaea J's class also noticed a distinct improvement in her son's oral language over this same brief period.

Although the *Kia Tere Tonu* and *Tā Pikitia hei āwhina kōrero* transcripts identified a range of errors in useage, vocabulary, and syntax (noticeably a lack of pronouns), the major findings from these measures also demonstrated clear positive gains in students' improved oral language fluency and the range of syntactical structures they attempted to use within their conversations around their collaborative drawing and storying

Chapter 4

Discussion

Kia kite kia matau i te ao Māori mā te reo.

The transformative pedagogical approach *Tā Pikitia hei āwhina kōrero* (collaborative drawing and storying) method was trialled to explore its impact on beginning Māori second language learners' oral language acquisition. Findings from this initial study provided some very encouraging outcomes. Several important gains occurred.

4.1. Improved spontaneous use of *Te Reo Māori*

The initial results of *Tā Pikitia hei āwhina kōrero* as seen in Table 2 and Table 3 show all the students made strong gains in *Kia Tere Tonu Kāanga* scores. Pre and post test gains were statistically significant ($p = .007$ with an effect size of 1.53). This indicates they have shown strong improvement in fluency and in their ability to use *te reo Maori* more spontaneously. As students progressed so did their ability to sustain a conversation. Five of the six students improved their *kāanga* score in the order of 100% while the remaining student improved by 12.5%. These gains in fluency are particularly promising since they occurred after a total of only nine hours of collaborative drawing and storying spread across ten weeks. However although the sessions were brief, they occurred almost daily.

Kia Tere Tonu vocabulary (*kupu*) scores were much more variable. Two students made large increases, two made smaller increases, one made no change and one student showed a slight decrease in vocabulary scores. It is not surprising that

some students showed few gains in vocabulary specific items since the *Tā Pikitia hei āwhina kōrero* procedure did not focus specifically on particular vocabulary items, but rather on student's making use of what personal vocabulary they know.

4.2. Student engagement

The use of *Tā Pikitia hei āwhina kōrero* as a medium for conversations assisted students' oral language use in several ways. It provided an authentic context for students to recount their real life experiences, and create conversations. It also enabled students to track the various topics visually as well as aurally. Secondly, *Tā Pikitia hei āwhina kōrero* drawing helped maintain students' attention on the *kaupapa* (topic) and kept them engaged because the task involved them making continuous contributions to the conversation. Students needed to think about what to say next. The collaborative drawing provided a *pause* in the conversation, a *thinking time* for the next speaker, as well as providing cues to vocabulary and opportunities to move the conversation in another direction. Thirdly, the *Tā Pikitia hei āwhina kōrero* provided the opportunity to initiate and participate in a community of practice (Lave & Wenger, 1991). It allowed students to negotiate with each other over who would initiate the activity, then the sequence for speaking (*going first* was a much sought after position). Initiating conversations consisted mainly of simply labelling for example Jo: *Ānei he, oh, tētahi whare*. (Here is a house). As time went on conversations developed around shared the topics that emerged, for example, Jo: *Kei te mahi mātou te kapa haka i roto i te piazza*. (We are doing our kapa haka in the piazza). Selecting of conversation topics was often negotiated amongst themselves before they began the session.

The number of students, (three per group), meant student's *wait time* was not too long before making a contribution, thereby maintaining focus and engagement on the topic in hand for the duration of the conversation (10 to 15 minutes). Happily, there was no incident in either group during the 10 week period that required disciplinary intervention from the teacher. In the experience of this teacher this was a real milestone for oral language discussion group behaviours. Any teacher interaction that did occur was simply in response to students' conversations. Very occasionally she supplied a word on request, clarified something students were trying to say, or contributed to the conversations but only if a group member was absent. While students were engaged in *Tā Pikitia hei āwhina kōrero*, the teacher could move around and *tune in* to the conversations and notice areas in students' language usage that required further teaching at another time.

4.3. Conversations displayed characteristics of responsive, social contexts for learning

The nature of student learning within the *Tā Pikitia hei āwhina kōrero* context was both responsive and social in line with the characteristics of these contexts noted by Glynn (1985, 1987) and reports in Glynn et al. (2006). The *transformative* pedagogy approach afforded the students the freedom to make their own choices about their *kōrero* (talking) without the judgemental voice from teacher direction requiring them to come up with the answer to a question or to remember a modelled language pattern. This meant students participated in the learning with others. They were able to initiate their own ideas and frequently assisted each other in expressing what they were trying to say or helping to search for the right word requiring students to come up with the answer to a question or to remember a modelled language pattern. Over time students' spontaneous

language increased. As noted by Gattbonton and Segalowitz (2005) the teacher was initially uneasy about trying to summarize or explain what she had taught using this transformative approach. However it soon becomes apparent that it was the students doing the learning while the teacher was also learning from these conversations about what teaching she needed to introduce into other language learning contexts. *Tā Pikitia hei āwhina kōrero* also allows time for frequent repetition of words and phrases by students, which is so essential for learning of a another language.

Another way in which displayed characteristics of responsive, social contexts for learning was seen in the grouping of students which ensured that more skilled speakers shared oral language activities with less skilled learners. However, the difference in skill level of the speakers was not nearly as great as that which usually occurs between teacher and students. In Group A, Te P the *tuakana* (Year 5) was one class level ahead of her two *teina* (Year 4). Te P, who was the more proficient speaker with a better vocabulary, assisted the group through diplomatically suggesting ideas and supplying words. In group B, Jos and Man (Year 5) were one class level higher than Mik (Year 4), but Man was the more proficient speaker. The two Year 5s were more vocal in the group and each tried to encourage Mik to speak loudly and contribute more. The assistance from more skilled *tuakana* was gratefully and cheerfully accepted by all students as they were often searching for a word or structure to use. The *tuakana-teina* relationship, with its in- built two way responsibilities was found to be effective in facilitating conversations of reciprocity and mutual influence was noticeable with *Tā Pikitia hei āwhina kōrero* conversations. During the shared conversations the students were able to learn from their peers and often reused each others phrases.

Often the students whispered ideas to each other to assist if the other students paused too long or needed a word.

This type of relationship is valued with Māori culture and readily recognized and appreciated by these students (Bishop & Glynn, 1999, p. 79).

4.4. Gradual improvement in the number of language structures used

Foster's template (Appendix B) was specially designed to accommodate the full range of possible structures which Foster considers as occurring in the normal use of the Māori language. Foster considers this template is a powerful diagnostic tool to provide the teacher with focussed and specific suggestions for further teaching.

Analysis of students' oral language during *Tā Pikitia hei āwhina kōrero* using this template indicated that a relatively small percentage of the total numbers of possible structures was actually used. Group A used an average of 9.1% of Foster's list of structures and Group B used 9.1% on average. However the basic structures that were used by these students were Foster's essential simple structures or *stepping stones* needed for further development to the next level of fluency. Nevertheless, analysis of samples of students' oral language taken from the beginning, middle and towards the end of the *Tā Pikitia hei āwhina kōrero* indicate that there was only modest growth in the percentage of different language structures used.

4.5. High levels of enjoyment

The freedom of choice offered in *Tā Pikitia hei āwhina kōrero* saw students enjoy talking about usually frowned upon topics in class conversations but provided a lot of daring and mirth, such as going to the *wharepaku* (toilet) and stepping in dog *tiko* (faeces). However with little if any reaction from the teacher the conversation progressed on to other subjects. Students in Group A enjoyed making sound effects for the *haka*, and bird and animal noises on the tapes. All the students enjoyed contributing to the collaborative drawing. Ken and Qub in particular would often continue the drawing and colouring after the *kōrero* session was over. When asked to rate their opinion of *Tā Pikitia hei āwhina kōrero* programme, on a 5 point scale Man said she had *really enjoyed* it giving it a 5. Two others said they had *enjoyed* it, giving it a 4, and the remaining two said it was *good*, giving it a 3.

4.6. Teacher reflections on the value of *Tā Pikitia hei āwhina kōrero* as a second language learning strategy.

The amount of feedback given by the teacher throughout was kept to a minimum so as to not thwart students' spontaneous efforts and to see what might develop. Teacher feedback mainly comprised the occasional positive comment citing the language used in order to congratulate them for using certain Māori phrases or vocabulary that was pleasing to hear. For example:

He rawe ki te rongō tō kōrero inanahi e pā ana te lunar eclipse Hohepa

(It was great to hear what you said about the lunar eclipse yesterday Hohepa).

There was also positive feedback from the Y3-4 teacher who had informally trialled the methodology with her class after observing this project modelled. In addition there was unsolicited feedback from a parent, who was enthusiastic about the improvement in her child's fluency in *Te reo Māori* and enjoyment of the sessions.

Teachers in this bilingual unit now plan to set up collaborative drawing and storying again in their bilingual context. They aim to increase the number of groups participating in order to engage a whole class of Year 4-6 students. Then, when the programme is successfully established; they plan to re-form the class to include the junior class Y 1-3 students integrating one *teina* into each group with two *tuakana*.

Based on their positive experiences with this preliminary project, both teachers plan to use *Tā Pikitia hei āwhina kōrero* collaborative drawing as a basis for a *collective* retelling of their story in Māori to the class.

4.7. Conclusion

The transformative pedagogy approach *Tā Pikitia hei āwhina kōrero*, was found to be a valuable yet easy method for the teacher to implement and effective in assisting spontaneous language use by beginning second language students learning *te reo Māori*. This approach is in keeping with current pedagogies involving co-construction of knowledge. It provided a context that is in the opinion of this teacher one that is positive and facilitative for language learners in Māori medium contexts and bilingual units. However experience from this initial

study strongly suggests that the success of *Tā Pikitia hei āwhina kōrero* resulted from the teacher faithfully implementing a transformative pedagogical approach which allows students and teacher to co-construct contexts and topics for conversations.

Tā Pikitia hei āwhina kōrero is not seen as a language programme in itself but could form a pivotal part of a comprehensive language programme. This study shows how students' oral language from *Tā Pikitia hei āwhina kōrero* transcripts might inform teachers of vocabulary and language structures students are attempting to use in their spontaneous conversations. *Tā Pikitia hei āwhina kōrero* can provide the teacher with a *window* on students' functional language in a similar way one might capture a *snapshot* of a child's reading strategies from a running record. On the basis of the findings from this exploratory study, further trials of *Tā Pikitia* with a range of students and teacher appear to be very worthwhile.

Ma te kōrero te reo e ora ai. Mā te ora o te reo ka rangatira.

Through being spoken the language will live on.

(Te Tāhuhu o te Mātauranga, 2007)

References

- Baker, C., & Jones, S. P. (1998). *Encyclopedia of bilingualism and bilingual education*. Clevedon, England: Multilingual Matters.
- Benton, R. (1981). *The flight of the amokura*. Wellington, New Zealand: New Zealand Council for Educational Research.
- Berryman, M., & Langdon, Y. (2001). *Aromatawai reo a waha: Kia tere tonu*. Wellington, New Zealand: Ministry of Education: Special Education Division.
- Bishop, R., & Glynn, T. (1999). *Culture counts*. Palmerston North, New Zealand: Dunmore Press.
- Booth, S. (2005). Developing children's emergent literacy. *ACE papers*, 16, 67-69.
- Brown, H. D. (1998). *Principles of language learning and teaching* (3rd ed.). Englewood Cliffs, NJ: Prentice Hall Regents.
- Bruner, J. (1990). *Acts of meaning*. Cambridge, MA: Harvard University Press.
- Clarke, S. (2003). *Enriching feedback in the primary classroom*. London: Hodder and Stoughton.
- Cloud, N., Genesee, F., & Hamayan, E. (2000). *Dual language instruction: A handbook for enriched education*. Boston, MA: Thomson Heinle.
- Ellis, R. (1985). *Understanding second language acquisition*. Oxford, England: Oxford University Press.
- Foster-Cohen, S. H. (2004). Themes and dreams in bilingual and immersion education in Aotearoa/New Zealand. In Ministry of Education Research Division (Ed.), *Language acquisition research: Papers presented at a Ministry of Education Forum held in 2003*. Wellington, New Zealand: Ministry of Education.
- Foster, J. (1987). *He whakamārama: A new course in Māori*. Auckland, New Zealand: Reed Consumer Books.
- Foster, J. (1991). *He tuhituhi Māori: A study of Māori texts by well-known writers*. Auckland, New Zealand: Reed.
- Foster, J. (1997). *Nga kupu whakamārama: Māori grammar*. Auckland, New Zealand: Reed.
- Gatbonton, E., & Segalowitz, N. (2005). Rethinking communicative language teaching: A focus on access to fluency. *The Canadian Modern Language Review*, 61(3), 325-353.

- Glynn, T. (1985). Contexts for learning: Implications for mildly and moderately handicapped children. *Australia and New Zealand Journal of Developmental Disabilities*, 11(4), 257-263.
- Glynn, T. (1987). Effective learning contexts for exceptional children. In D. Mitchell & N. Singh (Eds.), *Exceptional children in New Zealand* (pp. 158-167). Palmerston North, New Zealand: Dunmore Press.
- Glynn, T., & O'Laoire, M. (2007). *Transformative pedagogy and language learning in Māori and Irish contexts*. Paper presented at the Language Education Diversity Conference, November 24, 2007, University of Waikato, Hamilton, New Zealand.
- Glynn, T., Wearmouth, J., & Berryman, M. (2006). *Supporting students with literacy difficulties: A responsive approach*. Maidenhead, England: Open University Press.
- Harlow, R. (2001). *A Māori reference grammar*. Auckland, New Zealand: Pearson Education.
- Hattie, J. (2003). *Teachers make a difference: What is the research evidence?* Paper presented at the Australian Council for Educational Research Conference on Building Teacher Quality, October 2003. Retrieved from Australian Council for Educational Research (ACER): www.acer.edu.au
- Jenkins, K., & Ka'ai, T. (1994). Māori education: A cultural experience and dilemma for the state - a new direction for Māori society. In E. Coxon, K. Jenkins, J. Marshall & L. Massey (Eds.), *The politics of learning and teaching in Aotearoa-New Zealand* (pp. 165). Palmerston North, New Zealand: Dunmore Press.
- Lave, J., & Wenger, E. (1991). *Situated learning: Legitimate peripheral participation*. Cambridge, England: Cambridge University Press.
- May, S., Hill, R., & Tiakiwai, S. (2004). *Bilingual / immersion education: indicators of good practice: Final report to the Ministry of Education*. Wellington, New Zealand: Ministry of Education.
- Mead, H. M., & Grove, N. (2001). *Ngā pēpeha a ngā tīpuna*. Wellington, New Zealand: Victoria University Press.
- Ministry of Education. (2007). *Te reo Māori in the New Zealand Curriculum: Draft*. Wellington, New Zealand: Learning Media.
- Rau, C. (2004). A snapshot of literacy achievement in Māori immersion programmes. In Ministry of Education Research Division (Ed.), *Language Acquisition Research. Papers presented at a Ministry of Education Forum held in 2003*. Wellington, New Zealand: Ministry of Education.
- Richards, J., Platt, J., & Platt, H. (1992). *Dictionary of language teaching and applied linguistics*. Harlow, England: Longmans.

- Rogoff, B. (1990). *Apprenticeship in thinking*. New York: Oxford University Press.
- Scribner, S., & Cole, M. (1981). *The psychology of literacy*. Cambridge, MA: Harvard University Press.
- Speaker, K. M., Taylor, D., & Kamen, R. (2004). Storytelling: Enhancing language acquisition in young children. *Education, 125*(1), 3-14.
- Spolsky, B. (1989). Māori bilingual education and language revitalization. *Journal of Multilingual and Multicultural Development, 2*(10), 89-106.
- Statistics New Zealand. (2006). *QuickStats About Māori*. Retrieved January 18, 2008, from <http://www.stats.govt.nz>
- Te Tāhuhu o te Mātauranga. (1996). *Te reo Māori i roto i te marautanga o Aotearoa*. Whanganui ā Tara, Aotearoa: Te Pou Taki Kōrero Whāiti.
- Te Tāhuhu o te Mātauranga. (2007). *Te marautanga o Aotearoa: He tauira hei kōrerorero*. Te Whanganui-a-Tara, Aotearoa: Te Pou Taki Kōrero Whāiti.
- Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological processes*. London: Harvard University Press.

List of Appendices

Appendix A

Transcripts from the nine session samples analysed.

Group A

Tape 10	31-7-07 Te Puhiataahua, Kennan, Qubyn
Qubyn	Kei te whiti te rā.
Te Puhi	Ka haere a Qubyn rāua ko Kennan ki te whutupaoro. Ka wini a Qubyn.
Kennan	Ka tikina a <i>speak up</i> Qubyn, ka tikina a <i>Ke</i> a Qubyn he taiki.
Qubyn	Ka, ka haere a Qubyn raua ko Taylor ki te haere ki te tiki nga, he inu.
Te Puhi	Ka haere a Te Puhi ki te whare pukapuka.
Kennan	Ka, ka haere a Dion ki Meketānara.
Qubyn	Ka haere a Taylor raua ko Qubyn ki, ki te, titiro a <i>Harry Potter</i> .
Te Puhi	Ka haere a Kennan ki te whare paku.
Kennan	Ka haere a Javan ki <i>K.E.</i> ki te whare paku.
Qubyn	Ka haere a Qubyn rāua ko Taylor ki te tik tika nga ika.
Te Puhi	Ka haere ka titiro a Te Puhi i a Manaea, ka haere ka haere a Manaea rāua ko Te Puhi ki te tikina tētahi aihikirimi
Kennan	Ka, ka, ka, ka play a Kennan, (TePuhi <i>tākaro</i>) ka tākaro a Kennan whutupaoro.
Qubyn	Ka haramai, ka haere a Qubyn rāua ko Taylor ki te whare pukapuka ki te tiki a <i>Harry Potter</i> .
Te Puhi	Ka haere a Te Puhi ki te oma i roto i te taone.
Kennan	Ka whakahoki a Qubyn tōna pukapuka.
Qubyn	Ka haere a Qubyn rāua ko Taylor i roto i tōna whare, ki te moe.
Te Puhi	Ka haere a Te Puhi rāua ko Manaea ki te piu.
Kennan	Ka, ka hoea te waka a Dion.
Qubyn	Ka ua.Ua.
Te Puhi	Ka haere a Te Puhi rāua ko Manaea ki te kaukau, <i>kaukaurama</i> .
Kennan	Ka haere a Javan ki Meketānara.
Qubyn	Ka, haere a Taylor ki te, ki a KFC.
Te Puhi	Ka pirangi a Manaea tētahi inu.
Kennan	Ka haere a Dion, ki KFC, mō he tipu rāua he mīti.
Qubyn	Ka haere a Qubyn ki te oma, rāua ko Taylor.
Te Puhi	Ka haere a Te Puhi ki te whare pikitia ki te titiro ki <i>Harry Potter</i> Ka tikina ia tētahi inu
Kennan	Ka haere a Te Puhi ki, ki, Javan's whare.
Qubyn	Ka haere a Qubyn ki ki tōna whare ki te kai, me titiro a nga <i>wrestling</i> .
Te Puhi	Ka hoki a Te Puhi ki tōna whare. Ka haere a Kennan ki te whare paku anō.
Kennan	Ka haere Te Puhi ki te whare paku me Javan ki te kihi.
Qubyn	Kei te haramai ko tōku pāpā.

Tape 11	1-8-07 Qubyn, Te Puhiaataahua, Keenan
Kennan	Ka haere a, Ka whiti te rā.
Qubyn	Ka haere a Qubyn rāua ko Taylor ki te <i>zoo</i> .
Te Puhi	Ka titiro a Taylor rāua ko Qubyn tētahi makimaki.
Kennan	Ka haere a Javan ki Maketu.
Qubyn	Kei te, kei te hae, kei te haramai a nga raiona i roto i te <i>zoo</i> .
Te Puhi	Ka tikina a Qubyn tētahi aihikirimi.
Kennan	Ka haere a Javan ki Meketanara, at Maketu.
Qubyn	Kei te haere a Qubyn ki te titiro te um snake.
Te Puhi	Ka titiro a Taylor ki te te o te rangi .
Kennan	Ka haere a Kennan ki te <i>zoo</i>
Qubyn	Kei te ti titiro a Taylor, te a he he m, he b, pēpē makimaki
Te Puhi	Ka titiro a Taylor oh, Taylor tētahi tuatara.
Kennan	Ka haere te raiona wharepaku.
Qubyn	Kei te, kei te kei te haere a te makimaki ki tōna whare.
Te Puhi	Ka haere a Qubyn ki te tiki tētahi inu.
Kennan	Ka haere a te raiona ki roto i tona <i>cage</i> .
Qubyn	Kei te haere a Qubyn ki te titiro a Taylor, a Taylor te makimaki.
Te Puhi	Ka haere a Taylor ki waho mo te, mo te aihikirimi.
Kennan	Ka haere a Javan ki te whare kararehe.
Qubyn	Kei te titiro a Qubyn rāua ko Taylor he, he pēpē snake.
Te Puhi	Ka kite a Qubyn tētahi <i>emu</i> .
Kennan	Ka haere a te snake ki tōna whare ki tōna.
Qubyn	He ka titiro he he cheetah a Qubyn rāua ko Taylor.
Kennan	<i>Is that a snake?</i>
Te Puhi	Ka haere a Taylor rāua Qubyn ki te titiro te <i>hippopotamus</i> .
Kennan	Ka, Ka mahi a te <i>snake</i> he <i>wiwis</i> .
Qubyn	Kei te titiro a Qubyn he arewhana rāua ko Taylor.
Te Puhi	Ka titiro a Qubyn tētahi <i>platypus</i> .
Kennan	Ka titiro a Qubyn he <i>kangaroo</i> .
Qubyn	Ka haere a Qubyn ki te titiro he <i>Rabbit</i> .
Te Puhi	Ka titiro a Taylor tētahi <i>cheetah</i> .
Keenan	Ka titiro Javan he hoiho.
Qubyn	Kei tākaro a Qubyn i roto i tōna whare.
Te Puhi	Ka titiro a Qubyn tētahi <i>giraffe</i> .
Kennan	Ka titiro te <i>giraffe</i> ki Te Puhi.

Tape 12	3-8-07 TePuhiataahua,Kennan,Qubyn
	*hia kupu
Qubyn	Kei te whiti te marama.
Kennan	Ka whiti te rā.
Te Puhi	Ka haere a Qubyn ki Mekētānara.
Qubyn	Ka, haramai o, ka haramai a, Qubyn ki, o, ka haramai a Taylor, ki te titiro, a Qubyn.
Kennan	Ka haere a Javan ki, ki Mekētānara,... ki te titiro Qubyn.
Te Puhi	Ka haere a Qubyn rāua ko Javan ki te tākaro whutupaoro.*
Qubyn	Ka haere a Qubyn ki tōna, ka haere a Qubyn ki tōna paihikara.*
Kennan	Ka haere a Kennan rāua ko Qubyn ki whutupaoro.
Te Puhi	Ka haramai te kuri o Kennan.(Kennan <i>I don't have one</i>)
Qubyn	Ka haere a Kennan's kuri ki tōna whare
Kennan	Ka haere a te kuri ki, ki Kennan.
Te Puhi	Ka haere a Kennan rāua ko tōna kuri ki tētahi oma.
Qubyn	Ka haere, o kei, kei te o, kei te <i>back flip</i> te kuri.
Kennan	Ka haere a... te kuri mo he kai.
Te Puhi	Ka haere a te kuri ki tōna whare mo tētahi moe.
Qubyn	Ka, hara mai he, he mā kuri ki te tākaro, tākaro <i>Kuri dogs</i> , o ,Kurikuri.
Kennan	Ka, ka ka haere a Qubyn ki whutupaoro
Te Puhi	Ka tikina te kuri tētahi rākau ki te tākaro.
Qubyn	Ka, ka tākaro te kuri whutupaoro.
Kennan	Ka wini a Kennan te whutupaoro, me Qubyn
Te Puhi	Ka haere a te kuri rāua ko Qubyn ki te papatakaro.
Qubyn	Ka oma me, me <i>forwards flip</i> te kuri
Kennan	Ka haere a te kuri ki te tāone
Te Puhi	Ka haere a te kuri ki te zoo
Qubyn	Ka ka haramai a Kennan ki te titiro ki tōna kuri
Kennan	Ka haere a te kuri ki Mekētānara ki ki te <i>mess</i> i roto.
Te Puhi	Ka haere ka titiro a te kuri tētahi makimaki.
Qubyn	Ka pakipaki te makimaki.
Kennan	Ka ka titiro te kuri tētahi raiona.
Te Puhi	Ka ha titiro a te kuri tētahi giraffe.
Qubyn	Ka kata te te kuri
Kennan	Ka matakū te kuri ki te...

Tape 22	20-8-07 Te Puhiaaahua,Kennan,Qubyn
Qubyn	Ka haere a Tamatekapua i roto i Te Arawa waka.
Te Puhi	Ka haere a Tamatekapua rāua ko Ngatoroirangi i runga. Ka haere tōna wahine i runga.
Kennan	Kei te haere rāua ki te, ki te, ka haere te wahine a Ngatoroirangi ki te kihi ia, ka ka whiti tōna wahine.
Qubyn	Ka, ka haere <i>oh</i> Ka pai kia a Tamatekapua a nga, nga te wahina <i>oh</i> , wahine a Ngatoroirangi.
Te Puhi	Ka tiki Tamatekapua te wahine o Ngatoroirangi nā te mea ka pirangi ia ki, ka pai kia Tamatekapua.
Kennan	Kei te haere mai he taniwha, me te korokoro o te parata.
Qubyn	Ka haramai, ka haere, ka haere a te tangata ki Ngatoroirangi.
Te Puhi	Ka haere mai te parata ki te titiro a Nga a Tamatekapua nā te mea ka kino ia.
Kennan	Kei te haere, mai a Tamatekapua ki te tiki a Ngatoroirangi's, wahine.
Qubyn	Ka tiki a te parata a a Tamatekapua nā te mea ka kino ia.
Te Puhi	Ka haere te parata Nga me Tamatekapua i roto i te wai. Ka pātai a Ngatoroirangi Kei <i>hea a Tamatekapua me tōku wahine</i> .
Kennan	Kei te haere, a, kei te, ka tikina a Tamatekapua rāua ko te wahine o Ngatoroirangi, ka haere te parata i roto i te wai.(<i>Kei te kōhimuhimu a Te Puhi hei awahina</i>)
Qubyn	Ka tiki a te parata Te Arawa waka.
Kennan	Kare pirangi rāua ki te haere ki roto i te wai.
Te Puhi	Ka kaukau a Ngatoroirangi, Ka haere a Ngatoroirangi ki Tonga, ki Maketu. Ka kaukau ia, ka kaukau ia, ki Maketu.
Qubyn	Ka haere a Te Arawa waka ki Maketu.
Kennan	Kei te haere rāua ki, kei te haere a kei te haere te taniwha ki Maketu.
Qubyn	Ka haere a Ngatoroirangi me Tamatekapua ki, ki Hawaiki.
Te Puhi	Hawaiki nui, Hawaiki roa, Hawaiki pāmamao.
Kennan	Kei te haere, a te waka ki, ki te moana Taupo. Ka kaukau a Ngatoroirangi me Tamatekapua. Ka whawahi ia i roto i te wai.
Te Puhi	Ka haere a, ka haere a Ngatoroirangi ki te Maketu.
Qubyn	Ka, ka, hoki a a Ngatoroirangi ki te waka.

Tape 23	21-8-07 Te Puhiataahua, Kennan, Qubyn
Te Puhi	Ka haere nga tamariki i roto i te kura.
Kennan	Kei te tākaro te kura.
Qubyn	Ka tākaro nga tamariki i roto i te kura.
Te Puhi	Ka haere nga tamariki i roto i te kura ki te tākaro i ro, i runga i te papatākaro.
Kennan	Kei te haere te kura ki te kurakura.
Qubyn	Ka tākaro nga tama te whutuporo. Ka tākaro te kura netiporo.
Te Puhi	Ka haere nga tamariki ki tētahi karaehe mo te, mo te, mo te rā.
Kennan	Kei te haere te kura ki te tikina he kura whutuporo.
Qubyn	Ka wini te kura. Ka wini te tama a Kawaha Point.
Te Puhi	Ka haere Kawaha Point kura ki Meketanara mo te mo te kai, mo te kai.
Kennan	Kei te haere a, te tama ki ki te tiki te kura(hei tākaro)
Qubyn	Ka haere a te tama ki Maketu.
Te Puhi	Ka haere nga tamariki ki te kura anō. Ka tākaro whutuporo, ka wini nga tama anō Ka haere nga kōtiro ki te tākaro netiporo.
Kennan	Kei te haere mai he tam, he whiti, kei te haere mai te tama ki te tākaro whutuporo mo Rotoiti.
Qubyn	Ka wini a Rotoiti. Ka haere a te ka haere a Rotoiti Rotoiti lake.
Te Puhi	Ka haere, ka haere nga tamariki ki te, ki te moana mo tētahi kaukau.
Kennan	Kei te haere, a, a kei te haere mai, kei te huri mai Kennan rāua ko tōna kuri.
Qubyn	Ka wini ka haere a Kawaha Point ki Rotorua Primary. Ka wini a Kawaha anō
Te Puhi	Ka haere te tama ki te tākaro, ki te tākaro te, ki te tākaro neti poro ka wini nga kōtiro me nga tama a.
Kennan	Kei te haere mai a Galatea ki te tākaro whutuporo me kei te wini rāua
Qubyn	Ka tākaro, ka tākaro whana poro ka wini a Kawaha Point
Te Puhi	Ka haere nga tama ki <i>KFC</i> mo tōna kai, Ka haere nga kōtiro ki Meketanara. Ka tākaro nga kōtiro i runga i te papatākaro i roto i Meketanara. Ka haere nga tama ki waho o <i>KFC</i> ki te tākaro <i>tiggy</i> ,
Kennan	Kei te haere mai he tuna
Qubyn	Ka haere a te kura i roto i, i roto i te te pahi Ka haere te pahi ki te whare pikitia
Kennan	Kei te
Te Puhi	Ka haere nga kōtiro ki te hoko tētahi, hoko tētahi, Ka haere nga kōtiro ki te taone ki te hoko tētahi tarau me T hate me tētahi koti. Ka haere ki te toa mo tētahi aihikirimi me he inu me tētahi koura.
Kennan	Kei te haere a te kura ki te kura taone.....

Tape 24	22-8-07 Te Puhiaaahua,Kennan,Qubyn
Qubyn	Ka tākaro, tākaro te makimaki <i>Buzz</i> .
Kennan	Kei te haere mai, kei te, kei te haere mai, te kei te haere mai te, kei te haere mai te arani makimaki <i>Sonic Gage</i> .
Te Puhi	Ka haere te, Kā tākaro te arani makimaki ki te whero me te kakariki makimaki.
Qubyn	Ka wini a te makimaki ka tākaro te makimaki me tōna tungane makimaki.
Kennan	Kei te wini kei te haere mai kei te tākaro a te makimaki.Kei te haere a te kakariki makimaki ki te ki te ngahere.
Te Puhi	Ka haere nga makimaki ki te kimi foo, kimi kai i roto i te ngahere.
Qubyn	Ka haramai te waiporoporo makimaki ka tākaro te waiporo makimaki a whutuporo makimaki ka haere te te makimaki ki ki te te makimaki taone.
Kennan	Kei te, kei te tākaro whutuporo a te makimaki whero i runga i te kemu kei te wini a te whero makimaki.
Te Puhi	Ka haere a nga makimaki arani whero kakariki me kowhai ki, ki te tākaro i runga i te pouaka whakaata.
Qubyn	Ka tākaro te whero me te kakariki me rāua ko te whero makimaki te a <i>tiggy</i> i roto i te papatākaro.
Kennan	Ka haere a te makimaki ki Maketu ki te kaukau.
Te Puhi	Ka haere te makimaki ki te kimi kai.
Qubyn	Ka whawhai i roto i te wai, ka wini te whero me te kakariki, ka tākaro i roto i te wai, te wai whutuporo.
Kennan	Kei te haere a te whero makimaki ki te kikorangi makimaki.whare.
Te Puhi	Ka haere te kikorangi makimaki ki te taone ki te tiki a tētahi kōtiro makimaki
Qubyn	Ka haere te makimaki ki te whero makimaki's place
Kennan	Kei te haere mai a Kennan, ki, te, kei te ,
Qubyn	Ka haere a Kennan ki te wai ,ka, ka tākaro a Kennan me Qubyn i roto i te wai te me te makimaki i roto i te te whutuporo.
Kennan	Kei te haere mai a a Kennan piri rāua ko Qubyn piri
Te Puhi	Ka haere te kotiro makimaki ki te taone anō ki te titiro tētahi T hate.
Qubyn	Ka haere a Qubyn me Kennan me tōna kuri ki te, ki te, ki te toa te <i>Warehouse</i> .
Kennan	Kei te haere mai a, Kennan.
Te Puhi	Ka haere te kotiro makimaki i roto i te, ki te titiro, me te titiro mo tētahi panana.
Qubyn	Ka, ka haere a te mawhero me te <i>Buzz</i> anō.
Kennan	Kei te haere a, a Te Puhi ki te taone.
Te Puhi	Ka haere Te Puhi ki te tiki tētahi inu.

Tape 33	4-9-07
Qubyn	I haka rātou i runga i te atāmira.
Kennan	Ka haka nga tamariki a <i>Tua riki</i> .
Te Puhi	Ka haere a te kapa haka rōpu ki runga i te waka rererangi ki Ahitereiria ki te parakatihi i runga te atāmira.
Qubyn	I, i waiata nga kōtiro <i>Purea nei</i> i runga i te atāmira.
Kennan	Ka tiki a nga kōtiro tōna poi.
Te Puhi	Ka parakatihi nga kōtiro te poi me tētahi rakau poto rāua ko te rakau roa.
Qubyn	Ka i, i haere nga tama me nga kōtiro ki Maketu ki te kaukau me te waiata.
Kennan	Ka waiata nga tama me nga kōtiro a <i>Tēnei mātou</i> .
Te Puhi	Ka haere tētahi tama ki te parakatihi i i runga i te wai.
Qubyn	I te pō ka putu te marama, marama me te whetu.
Kennan	Ka tere rāua tōku piki iho te puke.*
TePuhi	Mehemea ka haere au ki te kimi te tama ka ngaro au.
Qubyn	I te pō ka ua, ua.Ka kite au i te tama ki te whare marae
Kennan	I he ngutu o te aua kai *
Te Puhi	He whiti te marama i runga i te rangi, ka kite te kapa haka rōpu tētahi kapua.
Qubyn	Ka puta mai te pāpaka ki te kimi kai māna, mana
Kennan	I haere au ki te whare o kui.
Te Puhi	Ka kite a nga pepe nga te whetu.
Qubyn	He rawe ki rātou nga whetu.
Kennan	I mate te tama i roto i te waka.
Te Puhi	Ka haere nga tama i runga i te waka, ka haere nga kōtiro i runga i te waka rererangi.
Qubyn	Ko nga tae o te rangi he whero, he kowhai, he karaka.
Kennan	Tōna kainga ki te *
Te Puhi	Ka pirangi nga kōtiro ki te haere i runga i te waka, ka pirangi he tama ki te haere i runga i te waka rererangi.
Qubyn	I te ata ka oho tētahi o nga tama
Kennan	Ka kei te piri tōna karaka.
Te Puhi	Ka tikina nga kōtiro tētahi pīnuti i runga i te waka rererangi
Qubyn	Ko te kiwi tētahi manu i haere i te pō
Kennan	I te manu engari kore he tae tae, te rere he po te rere.
Te Puhi	Ka haere nga tama ki Mokoia, ka tikina nga tama tētahi wai.
Qubyn	He tino kaha ia.....

Tape 35	6-9-07 Qubyn, Te Puhiaataahua, Kennan.
Te Puhi	Ka pirangi a Kennan te tangata nānā te pāmu ki te piki i runga i te motupaika.
Qubyn	I haere a te motupaika ki te whare hei.
Kennan	Ka haere a Kennan i runga i te motupaika i runga i te kiwi*.
Te Puhi	Engari he piki whara te kiwi. Kaore i pirangi te tangata nānā te pāmu ki te, ki te piki ki runga.
Qubyn	I tiki a Kennan te pāmu he tarakihana.
Kennan	Ka haere a te hoiho ki te inu tōna miraka.
Te Puhi	Ka pirangi a nga kau ki te kai nga pātiti.
Qubyn	I piki ki runga a te pāmu ki runga te tarakihana.
Kennan	Ka tiki a Kennan te tīni (chain) ki te heri te nanikoti.
Te Puhi	Ka pirangi a te tangata nānā te pāmu ki te tiki tētahi reta i roto i te pouaka reta.
Qubyn	I huakina a te pāmu te ki te ki te haeremai he he tarakihana.
Kennan	Ka haere a te kawahe, kāwhe ki te, ki te, inu wai.
Te Puhi	Ka haere te tangata nānā te pāmu i roto i te whare.
Qubyn	I piki a te pāmu ki runga i te hoiho. Ka haere te hoiho ki te whare miraka kau ki te, whaka miraka te kau, nga kau.
Kennan	Ka haere a Kennan i runga a tōna tarakihana.
Te Puhi	Ka haere nga heihei me nga pēpē heihei te moe i runga i te moenga.
Qubyn	Ka hoki a, ka hoki a, ka hoki a Kennan ki te whare a Kennan.
Kennan	Ka haere a te kāwhe ki te tiki Kennan ki te, ka taea ki te ngaungau.

Tape 36	7-9-07 Qubyn, Keenan, Te Puhi
Qubyn	Te Rā Whanau o Qubyn me Kennan.
Kennan	Kei te tiki a, a Te Puhi rua tekau mā tahi nga mōne ki te tiki tētahi koha.
Te Puhi	Te koha mo te rā whanau o Qubyn rāua ko Kennan.
Qubyn	I tiki a Te Puhi he nōnohe tātua. (nōnoke)
Kennan	Ka, ka tiki a Kennan tētahi tīketi ki te titiro a te waka tihi.
Te Puhi	I haere a Te Puhi, i haere a Te Puhi ki te whare pikitia ki te titiro kia <i>Ratatouille</i> .
Qubyn	I tiki a Qubyn me Kennan he rorohiko ki te tākaro i runga i te rorohiko.
Kennan	Ka tākaro ia, rāua <i>Space Invaders</i> .
Te Puhi	I kimi a Te Puhi tōna, tētahi pēke moni.
Qubyn	He i runga i raro i te peke mone, moni, i roto i te peke moni he moni.
Kennan	Ka tiki a Kennan he mone kari, kari moni ki te tiki tētahi, nga mone.
Te Puhi	Ka hoko a Kennan rāua ko Qubyn nga kakahū me nga kai me nga hū.
Qubyn	I haere i runga i te atāmira ki te titiro ki te kapa haka a Kennan rāua ko Qubyn me Te Puhi.
Kennan	Ka titiro a te māmā a Qubyn rāua ko Te Puhi me te pāpā o Kennan.
Te Puhi	I pirangi a Qubyn tētahi kai Mekeānara. Ka haere a Qubyn me Kennan ki Mekeānara.
Qubyn	I tiki rāua he, he <i>Big Mac</i> . He kai rāua, he pai me tiki he inu wai.
Kennan	Ka tiki a Qubyn he tātua nōnoke, ki te tākaro, nōnoke.
Te Puhi	I tākaro a, Te Puhi mo tōna tuakana tētahi kēmu.
Qubyn	He kai, te inu, te <i>Big Mac</i> me te inu. He pai te kai.
Kennan	Ka tiki a Dion he <i>Bigger Mac eo!</i>
Te Puhi	I tākaro a Te Puhi me Manaia tētahi kēmu netiporo.
Qubyn	I tiki rāua, i tiki a Kennan me Qubyn he, he motopaika.
Kennan	Ka haere a Qubyn ki Maketu ki te kaukau i roto i te wai. Ka tiki ia tētahi koura me tētahi moko (moke?).
Te Puhi	I, he, ka whiti te rā. Ka kite nga tāngata te, nga kapua, me te rā. Ka ua te rā inaianei.
Qubyn	I tākaro i runga i te wai. Ka kaukau i runga i te wai. Ka, ka haere ki ru, i runga i te motokā ki te haere ki te whare.
Kennan	Ka tiki a Qubyn a, a tētahi kuri ki te kai ia. Ka kai te kuri a te maunga o Qubyn.
Te Puhi	I tākarō nga ngeru me nga kuri i runga i te atāmira.
Qubyn	I, haere a te tama me Qubyn rāua ko Kennan.....

Transcripts from the nine session samples analysed in the study.

Group B

Tape 10	7-8-07 Joseph, Manaea, Mikaere.
Mikaere	Kei te whiti mai te rā.
Manaea	Ānei tētahi awa.
Joseph	Ānei tētahi whare.
Mikaere	Kei te hī ika ahau.
Manaea	He, he wheke i roto i te awa.
Joseph	Kei te rere nga manu.
Mikaere	Ānei tētahi huarahi..
Manaea	Ānei tētahi papatākaro.
Joseph	I ro, i roto i te huarahi i tētahi pahi.
Mikaere	Ānei tētahi puke.
Manaea	Ānei tētahi kau, Ka haramai a Mikaere i runga i te puke, I te taha o te kau.
Joseph	Kei te haere te pahi ki te papatākaro, E whā nga tamariki i runga,i roto i te pahi.
Mikaere	Ānei tētahi waka rererangi.
Manaea	E whā nga tamariki i roto i te waka rererangi.
Joseph	Kei te haere nga toru nga tamariki ki Ahitereiria.
Mikaere	Kei te ua inaianei.
Manaea	Ka haere nga tamariki ki ōna kainga.
Joseph	I roto i nga toru nga tamariki whare kei te moe rātou.

Tape 11	8-8-07 Mikaere, Joseph, Manaea
Mikaere	Kei te whiti mai te rā.
Joseph	Inanahi i haramai a Shayla rāua ko tōku tuakana ki te kura ki te purei <i>ringaringa poro</i> .
Manaea	Ka haere ahau me Hineiwhahia ki te kura ki te purei netiporo.
Mikaere	Kei te tākaro ahau i runga i te papapekepeke.
Joseph	Ānei tētahi awa I roto i te wai e tētahi wheke, me nga ika.
Manaea	Ka haramai a Joseph rāua ko Mikaere ki te hī ika. Ka kumea a Mikaere tētahi ika.
Mikaere	Ānei tētahi puke. Ki runga i te puke tētahi kau.
Joseph	Ānei tētahi huarahi. I runga i te huarahi i tētahi pahi. Kei te haere te pahi ki te papa tākaro. E whā nga tamariki i roto i te pahi.
Manaea	Ka haere nga tamariki i roto i te pahi ki Mekitānara. Ka tiki nga tamariki tētahi hamupaka.
Mikaere	Kei te haere ahau ki te kai te ika.
Joseph	I roto i te awa kei te hiakai te wheke.
Manaea	Ka haere nga tamariki ki ona whare.
Joseph	Kei te ua ua inaianei. Kei te haere nga tamariki ki te moe.

Tape 12	9-8-07 Mikaere, Joseph, Manaea
Manaea	Kei te whiti mai te rā.
Mikaere	Ānei tētahi awa.
Joseph	I roto i tēna, i roto i te awa i tētahi wheke, me nga ika.
Mikaere	Kei te haere ahau ki te hī ika.
Manaea	Ka haere a Mikaere ki te tikina tētahi aihikirimi. He māwhero te tae o te aihikirimi.
Joseph	Ānei tētahi huarahi ki te haere tēna huarahi ki te, ki te paptākaro.
Mikaere	Ānei tētahi puke ki runga i te puke tētahi kau. Kei te ua, inaianei.
Manaea	E... toko rua i roto i te pahi, ka haere nga tamariki i roto i te pahi ki te, ki te kaukau.
Joseph	Ānei tētahi, whare. I roto i te whare i, e tētahi rorohika, rorohiko.

Tape 22	31-8-07 Joseph, Manaea, Mikaere
Joseph	A tēra, a tēra wiki kei te purei tōku tuakana tētahi atu whutuporo tauwhainga a tēra wiki . .
Manaea	Kei te whiti mai te rā.
Mikaere	Ānei tētahi huarahi
Joseph	I te purei whutuporo. Kei te tumanako ahau, kei te wini tōku te tīma o tōku tuakana
Manaea	A tēra Ra Horoi kei te purei netiporo ahau.
Mikaere	Ānei tētahi puke.
Joseph	I raro i te puke i tētahi whare.
Manaea	Kei te ua inaianei. Kei te rere nga manu ki ona kainga.
Mikaere	

Tape 23	3-9-07 Joseph, Manaea, Mikaere.
Joseph	Kei te whiti mai te rā.
Manaea	Ānei tētahi awa.
Mikaere	Kei te whiti mai te rā i roto i nga kapua.
Joseph	I nga rā whakatā kei te purei tōku tuakana ki tētahi tīma. Kei te wini te tīma o tōku tukana. Kei te harikoa te tīma o tōku tuakana.
Manaea	I nga rā whakatā i hoko au he hū.
Mikaere	Kei te haere ahau ki te hī ika.
Joseph	I roto i te awa i tētahi wheke me tētahi ika.
Manaea	Kei te ua inaianei, me kei te pupuhi te hau.
Mikaere	Kei te hoki ahau ki te kainga nā te mea kei te ua.
Joseph	I mua i te kemu kei te haere tōku tuakana ki te whare o tōku mātua mo tētahi, ki te moe.
Manaea	Ka haere ahau ki te tiki tētahi hamarara i roto i taku whare, ki te, ka haramai i waho.
Mikaere	Ka whiti mai te rā inaianei.

Tape 24	4-9-07 Manaea, Mikaere, Joseph
Joseph	Kei te hī ika a Mikaere.
Mikaere	Kei roto i te moana tētahi wheke.
Manaea	I roto i te awa he mako, he mako.
Joseph	Kei te oma a Mikaere i roto i te whare nā te mea kei te matakū. Kei te tangi ia. Kei te katakata a Joseph me Manaea.
Mikaere	Kei te rere nga manu.
Manaea	Ka haramai te mama o Mikaere ki te korero ia kei te pai. Ka haere rāua ki, ka haere rāua ki <i>Chipmunks</i> . Ka haere a Mikaere i runga i te <i>slide</i>
Joseph	I mua i te haere a Mikaere ki te <i>Chipmunks</i> , kei te haere rātou ki Maketanara, Meketānara, tumeke tanara
Mikaere	Ka katakata ahau ki a Manaea rāua ko Joseph nā te i taka rāua.
Manaea	I haramai te Māmā a Joseph ka riri te māmā a Joseph ki a Mikaere, (me te māmā o Manaea.) I tangi a Mikaere.
Joseph	Nā kei te haramai o te Māmā o Mikaere me Manaea. Kei te whawhai ia. Kei te wini a te māmā o Manaea. Kei te tangi a Mikaere anō, Kei te oma a Mikaere i roto i te whare.
Mikaere	Ka whawhai māua ko Manaea. Ka tangi a Manaea nā te mea i wini ahau.
Joseph	Ka mutu te whawhai, kei te haere a Mikaere rāua ko Joseph me Manaea ki te moe.
Mikaere	Ka haramai tōku Māmā ka whawhai ia ki te māmā o Manaea, ka wini tōku māmā
Manaea	Kei te haere a Manaea ki te mahi kapa haka inaianei.
Joseph	Haere rā.

Tape 33	17-9-07 Manaea, Joseph, Mikaere. <i>I nga ra whakatā.</i>
Joseph	I tēra wiki, kei te purei <i>the All Blacks</i> , i tēra wiki kei te purei <i>the All Blacks</i> ki Portugal. Kei te wini rātou.
Manaea.	Inanahi i haere ahau me tōku W.haea Keke me tōku, me tōku Karanga rua ki te <i>Rainbow Springs</i> me te <i>Kiwi encounter</i> . I haere mātou i te tuatahi ki te <i>Rainbow Springs</i> ki te hiakai nga ika.
Mikaere	Ka haere ahau ki te matakitaki ki te whutuporo. Ka putu a Jo Roccococo i te poro.
Joseph	Kei te wini rātou ki tahi rau ma wha, tahi mano mā whā. Kei te harikoa te tīma. Kei te pati rātou.
Manaea	Kua mutu tō mātou haere ki te <i>Rainbow Springs</i> . Ka haere mātou ki te kite te <i>Kiwi Encounter</i> . I kite mātou e toru nga kiwi.
Mikaere	A muri i te whutuporo, ka mutu. Ka wini te tīma <i>All Blacks</i>
Joseph	I mua te kēmu, ka haere au ki te moe i roto i tōku whare. I te taha o tōku whare i roto i te <i>sitting</i> te rūma noho.
Manaea	Ka mutu tō mātou haere ki te te <i>Kiwi Encounter</i> , ka haere mātou ki, ki te mahi tētahi pikitia o te <i>Kiwi Encounter</i> .
Mikaere	Ko te taitara o tō mātou mahi,
Manaea	Ko mātou taitara ko <i>I nga rā whakatā</i> . Kua mutu mātou inaianei.

Tape 34	18-9-07 Manaea, Joseph. Mikaere.
	Nga Hararei.
Manaea	I nga hararei, kei te haere ahau ki Waikaremoana, ki te kite ōku Whaea Keke. Kei te haere mātou me tōku whanau ki te eke hoiho. Ko tētahi ingoa o nga hoiho ko <i>Chester</i> , me <i>Flok</i> me <i>Mana</i> me <i>Huru</i> .
Joseph	I nga rā hararei kei te haere ahau ki te <i>movies</i> , pikitia. Kei te haere ahau ki te taha i tōku tuahine, māmā, pāpā, oua tōku tuakana.
Mikaere	<i>On the</i> hararei, kei te haere ki Ahitereiria, ki te noho i reira.
Manaea	A muri i nga hoiho i haere mātou ki te, nga kuri.
Joseph	I roto i nga, i te pikitia, kei te kai ahau ki te <i>popcorn</i> me kei te inu tētahi <i>coca cola</i> ; te kānga paopao me te inu.
Mikaere	A muri ka haere ahau ki tōku, ki te whare o tōku māmā. Ka moe ahau i reira.

Tape 35	19-9-07 Manaia, Joseph, Mikaere. Puni =camp
Manaia	I tēnei rā kei te haere ahau me tōku whanau ki te haere mātou mo te puni.
Joseph	Inanahi i muri i te kura kei te haere ahau ki tōku whare. Kei te titiro ahau ki tētahi pikitia, <i>DVD</i> i runga, i runga i te pouaka whakaata. Ko te *..... Te ingoa o te <i>movie</i> , te <i>magical movie</i> .
Mikaere	Kei te haere ahau ki te *..... i a Rotomahana.
Manaia	I te ata kei te haere mātou ki te hikoi i te taha o te awa. I kite mātou a Mikaere i te taha o te awa. Kei te hī ika a ia.
Joseph	I mua i te titiro nga <i>DVD</i> kei te haere ahau ki tōku, ki te whare o tōku hoa.
Mikaere	I hī ahau i tētahi ika. A muri ka hoki ahau ki tōku kainga ki te kai te ika.
Manaia	Ka mutu tō mātou hikoi ka haere ahau ki tōku whanau ki, ki te kai.

Tape 36	20-9-07 Manaia kare i konei, Joseph, Mikaere
Joseph	Kei te haere ahau ki te <i>bus stop</i> nā te mea, i, i roto i te taone, nā te mea kei te haere tōku tuakana ki up <i>North</i> . Kei te haere tōku tuakana ki up <i>North</i> i runga i tētahi pahi.
Mikaere	Kei te haere ahau ma runga tereina ki a Ahitereiria
Joseph	I mua i te haere tōku tua, i tōku tuakana i roto i te pahi ki up <i>North</i> , kei te haere ahau ki te, ...ki te, i mua i te haere tōku tuakana i runga te pahi, kei te haere, ahau me tōku sss tuahine, me tōku māmā rāua ko tōku pāpā ki te toa, nā te mea kei te, kei te tiki a a koutou tētahi kai mō tēnei rā mo te kura.
Mikaere	A muri ka, haere ahau, ki te, ki tōku, ki te whare o tōku māmā me koro. Ka haere mātou ki te kai i a Meketānara.
Joseph	I mua i te haere ahau ki te toa, kei te haere rātou, koutou ki tōku whare. Nā, i roto i tōku whare kei te, kei te <i>get ready</i> mo tōku kura nā te mea kei te <i>late</i> ahau, reiti ahau. A muri, kei te haere ahau ki te kura kei te haere ahau ki roto i te ruma i te karaehe o te ruma iwa me tekau nā te mea kei te mahi a au ahau tētahi Māori test.

Appendix B

Foster's template for recording language structures used.

Tape: _____

Sheet: _____

Articles	Indef ^s _p	Def ^s _p			
Nouns					
Demonstrative adjs		^s _p			
Adjectives		^s _p			
Verb signs	ka	kua	E-ana	I	me
Verbs	A.	P.	Sign of the agent 'e'		Imperative
Adverbs		Irregular adverbs			
Adverbs of direction					
Preposition 'i'	from	at, past time us, when, point in past time while, past time span			
Preposition 'ki'	to named to	at, speech/attention	to, action, with gerund	at, performance, with gerund	
Transitive prepositions		i ku			
Preposition 'kei'	stating present location		stating temporary possession		
Preposition 'i'	stating past location		stating temporary possession		
Complex prepositions	Present location		past location		as description
Nominal particles	with name		with pronoun		with geo. location
Pronouns	singular	dual	plural		
Relative clause	with 'i'	with e-ana	with 'kua'	with location indication	
Continuous action alternative	'kei' + gerund		'i' + gerund		
Specific particle 'ko'					
Agent emphatic	P.		F.		
Prefix	ka	ua	toho		
Subjunctive 'hia'					
Neuter verb			Sign of the agent 'i'		
Particle 'ai'					
Interrogative					
Negative					
Particle of address/command.					
Possession	'a'/'o'	Possessive adjectives		'a'/'o'	'i'/'o'
Verbal noun					

General obs.

s = singular P = plural. A. = active P. = passive.
 P = past/present F = future.

(Template created by John Foster for this research. Used with permission.)