



uOttawa

L'Université canadienne
Canada's university

**FACULTÉ DES ÉTUDES SUPÉRIEURES
ET POSTDOCTORALES**



**FACULTY OF GRADUATE AND
POSTDOCTORAL STUDIES**

Debra Diane Hauer

AUTEUR DE LA THÈSE / AUTHOR OF THESIS

M.A. (Education PSP)

GRADE / DEGREE

Faculty of Education

FACULTÉ, ÉCOLE, DÉPARTEMENT / FACULTY, SCHOOL, DEPARTMENT

**“That’s how people learn. It’s through the connection”:
Collaborative Learning in an Aboriginal Adult Literacy Centre**

TITRE DE LA THÈSE / TITLE OF THESIS

Maurice Taylor

DIRECTEUR (DIRECTRICE) DE LA THÈSE / THESIS SUPERVISOR

CO-DIRECTEUR (CO-DIRECTRICE) DE LA THÈSE / THESIS CO-SUPERVISOR

EXAMINATEURS (EXAMINATRICES) DE LA THÈSE / THESIS EXAMINERS

Christine Suurtamm

Janice Ahola-Sidaway

Gary W. Slater

Le Doyen de la Faculté des études supérieures et postdoctorales / Dean of the Faculty of Graduate and Postdoctoral Studies

**“That’s how people learn. It’s through the connection”:
Collaborative learning in an Aboriginal Adult Literacy Centre**

by

Debra Hauer

A thesis submitted to the
Faculty of Graduate and Postdoctoral Studies
In partial fulfillment of the requirements
For the degree of Master of Arts (Education)

Faculty of Education
University of Ottawa
Ottawa, Ontario, Canada

May 2008

© Debra Hauer, Ottawa, Canada, 2008



Library and
Archives Canada

Bibliothèque et
Archives Canada

Published Heritage
Branch

Direction du
Patrimoine de l'édition

395 Wellington Street
Ottawa ON K1A 0N4
Canada

395, rue Wellington
Ottawa ON K1A 0N4
Canada

Your file Votre référence

ISBN: 978-0-494-41665-5

Our file Notre référence

ISBN: 978-0-494-41665-5

NOTICE:

The author has granted a non-exclusive license allowing Library and Archives Canada to reproduce, publish, archive, preserve, conserve, communicate to the public by telecommunication or on the Internet, loan, distribute and sell theses worldwide, for commercial or non-commercial purposes, in microform, paper, electronic and/or any other formats.

The author retains copyright ownership and moral rights in this thesis. Neither the thesis nor substantial extracts from it may be printed or otherwise reproduced without the author's permission.

AVIS:

L'auteur a accordé une licence non exclusive permettant à la Bibliothèque et Archives Canada de reproduire, publier, archiver, sauvegarder, conserver, transmettre au public par télécommunication ou par l'Internet, prêter, distribuer et vendre des thèses partout dans le monde, à des fins commerciales ou autres, sur support microforme, papier, électronique et/ou autres formats.

L'auteur conserve la propriété du droit d'auteur et des droits moraux qui protègent cette thèse. Ni la thèse ni des extraits substantiels de celle-ci ne doivent être imprimés ou autrement reproduits sans son autorisation.

In compliance with the Canadian Privacy Act some supporting forms may have been removed from this thesis.

Conformément à la loi canadienne sur la protection de la vie privée, quelques formulaires secondaires ont été enlevés de cette thèse.

While these forms may be included in the document page count, their removal does not represent any loss of content from the thesis.

Bien que ces formulaires aient inclus dans la pagination, il n'y aura aucun contenu manquant.

Acknowledgements

Dr. Maurice Taylor provided wise counsel during my experience in academic research. He stimulated my interest in research during my first class in the Masters program as a special student and encouraged me to develop my ideas within a supportive environment. The advice of Dr. Janice Ahola-Sidaway and Dr. Christine Suurtamm brought enthusiasm and fresh perspectives to my work.

The staff and learners at the Literacy Centre made me welcome at their special place and I feel privileged that they shared their stories with me. I wish them the best in their learning journeys. Bonnie and Laurie opened their home to me while I conducted my research. Without their generosity, my research experience would have been much more lonely, less comfortable and more difficult.

Finally, I would like to express my deep appreciation to my husband, Blair Jarvis, whose keen eye while reading and commenting on my thesis contributed greatly to the clarity of my writing. Although rooted firmly in a quantitative paradigm, Blair acted as a sounding board for my ideas and consistently encouraged me to move forward through this academic experience.

Abstract

Collaborative learning is an important component in adult literacy learning but has not been investigated among Aboriginal adults. The concepts of cognitive apprenticeship and guided participation informs the case study of an Aboriginal adult Literacy Centre. A metaphor of entering a house of literacy learning was used to describe how learners become a part of a community of literacy practice. An individual stands on the threshold with dreams for the future. He or she walks fully into the house by increasing participation in learning activities. Learning occurs through connections with others by sitting together at a round table. The literacy organization, the funding agency and the community act as floorboards in supporting the learners. The findings point to particular patterns of guided participation in Aboriginal settings, may broaden our understanding of social perspective of literacy and may contribute to our knowledge of learning in an urban Aboriginal setting.

Table of Contents

Acknowledgements	ii
Abstract	iii
Table of Contents	iv
CHAPTER ONE: Introduction	1
Who are Aboriginal peoples?	1
Legacy of residential school policies	4
Literacy, educational attainment and employment	4
A measure of literacy in Canada	6
Adult literacy programs and Aboriginal people	6
Can a sociocultural view provide new insights?	7
Purpose of the study	8
My relationship to the topic and the participants	9
Definition of terms	9
Significance of the study	12
CHAPTER TWO: Focussed Literature Review and Conceptual Context	13
Adult literacy learning	13
Functional perspective of literacy	14
Critical perspective of literacy	18
Social perspective of literacy	19

Collaborative literacy learning in adults	21
Literacy learning in Aboriginal settings	24
Conceptual Context	27
Cognitive development in a sociocultural context	27
Situated cognition	30
Situated learning	31
Communities of practice	32
Cognitive apprenticeships	35
Research Question	36
CHAPTER THREE: Methodology	38
Case study methodology	38
The site	40
Confirming the data collection site	40
Access to the site	41
The participants	41
Ethical protocol	42
Data collection	43
Observation of learning activities	43
My role as an observer and participant observer	44
Learner interviews	45
Instructor interviews	45
Interviews with interested others	46
Informal discussions	46

Document review	47
Reflective journal	48
Data analysis path	49
Reading and note taking	49
Describing	49
Classifying	50
Interpreting	51
Trustworthiness	51
CHAPTER 4: Findings	53
Description of the case	53
Interviews with learners	54
Interviews with instructors and interested others	55
Observation of learning activities	58
One-on-one tutoring	58
Pre-GED class	59
Beginner internet	61
Introduction to Japanese	64
Review of documents	66
Entering a house of literacy learning: Themes arising from the data	67
Standing at the threshold: “I see a great deal of hope for my life”	68
Walking into the house: “They’ve accepted me because I’ve accepted them”	70
A sense of personal safety	71

Development of trust	72
Increasing motivation	73
Forming groups of like-minded learners	73
Sitting around the table with others: “Aboriginal literacy is all about relationships”	75
The role of instructor: A guide on the side	77
Creating an inviting environment	78
The use of humour to engage learners	78
Not a traditional school	79
A culturally appropriate atmosphere for Aboriginal learners	82
Personal transformation through participation	86
Supporting a community of learners: “To help people prepare for the next step...to help people empower themselves”	89
Support from the Literacy Centre	89
Support from the funding agency	90
Support from the community	92
CHAPTER 5: Discussion and Contributions	95
Can Rogoff’s perspective help to explain how collaborative learning occurs?	96
Looking along the personal plane of analysis	96
Situated cognition	98
Looking along the community plane of analysis	100
Communities of practice	102

Constraints to learning in this community of practice	103
Cultural tools in this community of practice	105
Legitimate peripheral participation	105
Looking along the interpersonal plane of analysis	106
Cognitive apprenticeships	106
Patterns of guided participation in an Aboriginal setting	109
How collaborative learning occurs in an Aboriginal adult Literacy Centre	112
Factors encouraging collaborative learning in an Aboriginal learning environment	114
The instructor as a guide on the side	114
The use of humour to engage learners	115
A culturally appropriate atmosphere	116
Contributions to Research, Practice, and Policy	116
Contributions to research	117
Using Rogoff's perspective in expanding our understanding of collaborative learning	117
Adding to a social perspective of literacy	118
Expanding the understanding of cognitive apprenticeships	119
Contributions to practice	119
Increasing participation of Aboriginal literacy learners	120
The use of computers to aid learning	121

Adding to knowledge of a positive learning environment	121
Contributions to policy	122
Contributing to knowledge of Aboriginal learning	123
Considerations regarding urban Aboriginal learners	124
Limitations of the study	125
Transferability	125
Trustworthiness	126
Triangulation	126
Member checking	127
Lack of use of an audio recorder	127
Talking circle	128
Issues of class, race and distance	128
Concluding statement	129
REFERENCES	131
Appendix 1	142
Appendix 2	143
Appendix 3	145
Appendix 4	147
Appendix 5	149
Appendix 6	152
Appendix 7	153

CHAPTER 1

Introduction

The level of educational attainment and employment rates among Aboriginal peoples in Canada lag behind those of the general Canadian population. According to the United Nations Human Development Index (HDI), Canada ranked sixth among 177 countries in a global measure of quality of life in 2006. The HDI measures life expectancy, educational attainment and real gross domestic product per capita (United Nations Development Program, 2006, p.48). HDI scores vary widely among Canadians. When HDI criteria were applied to Aboriginal peoples in Canada, the quality of life for registered Indians living on reserves was similar to that of residents of developing countries such as Peru or Kazakhstan (Canadian Human Rights Commission, 1998; Cooke, Beavon, & McHardy, 2004). Literacy skills have been linked to an individual's health status, educational attainment, and employment (Mendelson, 2006; Rootman & Ronson, 2005; Statistics Canada, 1996). If literacy skills can be improved among individuals in this group, the effects of poor health, unemployment and poverty in Aboriginal communities can be ameliorated.

Who are Aboriginal peoples?

The term, Aboriginal, is a broad term that refers to the original inhabitants of North America and their descendants. Approximately one million people, 3% of Canada's population, identified themselves as Aboriginal in the 2001 Census of Canada (Mendelson, 2006). The population of Aboriginal people in Canada is growing. According to the 2001 census, the Aboriginal population of the country has increased by 22% since 1996, a greater increase than the general Canadian population (Indian and Northern Affairs Canada, 2005).

The Canadian Constitution recognizes three groups of Aboriginal peoples – Indians, Métis and Inuit (Indian and Northern Affairs Canada, 2002). Each group of Aboriginal peoples has its own languages, cultures and traditions. Status Indians are entitled to have their names included on the Indian Register, a list that records the names of people whose ancestors signed a treaty with the federal government. Based on the treaties, the federal government has specific obligations to Status Indians in the areas of health care, education, housing and other areas. Other Indians are referred to as Non-Status Indians as their ancestors did not sign a treaty with the federal government or were otherwise left off the Indian Register. Non-Status Indians are not entitled to the same health care, education or housing benefits as Status Indians. Together, Status and Non-Status Indians can be referred to as First Nations people.

Reserves are lands that were set aside for Status Indians at the time of the signing of treaties. Some Status Indians continue to live on lands designated in their band's treaty agreements and reside on their reserve. Other Status Indians have moved to nearby towns and cities and live 'off-reserve'. Seventy per cent of Aboriginal people in Canada live off-reserve. Of Status Indians, approximately 50% live off-reserve (Statistics Canada, 2003). In general, Status Indians living off-reserve tend to have higher educational attainment, higher incomes and a higher life expectancy than Status Indians living on-reserve (Cooke et al., 2004).

Under the provisions of the Indian Act of 1876, Status Indians are considered wards of the Canadian state and their lives are highly regulated. "Taking on a guardianship role, acts were passed ...that would impose regulations to control movement, marriage, schooling, employment, indeed every aspect of Aboriginal life" (Wilson, 2003, p.166). Indian agents,

the Canadian government's representatives on reserves, would grant permission in the form of a 'pass' to allow Status Indians to travel off their reserves. Without a 'pass', Indians could not travel freely. Also, Status Indians could vote in Canadian elections only if they gave up their treaty rights. It was not until 1960 that Status Indians were first granted the right to vote without losing their treaty status, a privilege that many Canadians take for granted.

In addition to Indians, the Canadian Constitution recognizes the Métis and Inuit as Aboriginal peoples. The term 'Métis' refers to people of mixed Aboriginal and European ancestry. In contrast to the well-defined status of Indians in Canadian law, there is no legal definition of Métis. People may identify themselves as Métis based on their own affiliation with Métis culture and traditions. Although the Métis did not sign treaties, the federal government has recognized the unique culture and traditions of Métis peoples.

Inuit people are the Aboriginal peoples of Arctic Canada and live primarily in the North-West Territories, Nunavut, and the Arctic regions of Quebec and Labrador. Although treaties were not signed with the Inuit, the federal government has recognized that this group has land rights, hunting rights and are eligible for financial compensation through land claims agreements signed since the 1970's.

In the past, federal government policy restricted the movement of Status Indians from reserve lands. In contrast, other government policies mandated the removal of children from Aboriginal communities for the explicit purpose of education and the implicit purpose of assimilation into the mainstream culture. These strategies disrupted generations of Aboriginal families, weakened the social fabric of Aboriginal communities, and led to a loss of traditional culture and language, leaving residential school survivors living between two worlds.

Legacy of residential school policies

Children were removed from their families and placed in residential schools often a long distance from their communities. “It was believed that if children were removed from their cultural influences, the customs, the languages, and the practices of their parents, they would soon adopt mainstream ... practices” (Wilson, 2003, p.166). Residential schools operated in every province except Newfoundland, New Brunswick and Prince Edward Island. Nearly 100,000 Aboriginal children were removed from their families and attended one of the 130 residential schools in Canada from 1874 until the last school closed at Gordon’s First Nation near Raymore, Saskatchewan in 1996 (Indian and Northern Affairs Canada, 2003). Today, approximately 80,000 people in Canada are survivors of residential schools.

In addition to physical and sexual abuse, some former residential school students allege that they experienced cultural loss, a loss of educational opportunities and forcible confinement (Indian Residential Schools Resolution Canada, 2006). During their time at residential schools, some survivors allege that they suffered mental and physical abuse and lost their culture and traditional knowledge. Although children were sent to school for the purpose of education, the legacy of the residential school system is not only a lost generation, but also, the general loss of family, community and culture (Aboriginal Healing Foundation, 2002).

Literacy, educational attainment and employment

The size of the Aboriginal labour force in Canada is projected to increase markedly in the future, based on the number of Aboriginal children aged less than 15 years. It is estimated, for example, that the Aboriginal workforce will comprise 17% of the total workforce in Manitoba and Saskatchewan by 2016, a projection based on 1991-2001 census

data (Mendelson, 2004). In Ontario, the Aboriginal workforce is projected to be 2% of the total provincial workforce by 2016. Although this figure is lower in Ontario than in western provinces, it is estimated that the Aboriginal workforce in Ontario will increase by more than 33,000 by 2016, the greatest number of any province. At the same time, skilled labour shortages are forecast as Canada's population ages. "There is great potential for Aboriginal individuals in developing the skills necessary to help address these shortages" (Brunnen, 2004, p.9). It is essential that governments and businesses focus their efforts in ensuring that Aboriginal people have the employment skills, including literacy skills, necessary to fill looming labour shortages in Canada.

Educational attainment of Aboriginal peoples in Canada is lower than the general Canadian population (Indian and Northern Affairs Canada, 2005). Aboriginal youth tend to leave school earlier than non-Aboriginal youth, most often in Grade 9 or 10, leading to high school completion rates for Aboriginal youth that are lower than the Canadian average (Auditor General of Canada, 2004). Nearly 50% of the Aboriginal population in Canada have not completed high school, compared with approximately 30% of the general population (Brunnen, 2004, p.11). Thus, many Aboriginal people may enter the labour force without the necessary education, including literacy skills, for employment.

"Canadians, Aboriginal and non-Aboriginal alike, who have less than a high school diploma are the least likely to participate in the labour force, and those who do participate are also the most likely to be unemployed" (Brunnen, 2004, p.11). Since 50% of Aboriginal people do not possess a high school qualification, they are more likely to be unemployed compared with the general Canadian population. For Aboriginal people living on reserves in western Canada, the unemployment rate was constant at approximately 30% in both the

1996 and 2001 censuses (Brunnen, 2004, p.8). Among those living off-reserve, the unemployment rate for Aboriginal people improved significantly in this time period, decreasing from 22.7% to 16.6%, both of which were still higher than the unemployment rate in western Canada of 7.6% and 6.2% respectively (Brunnen, 2004, p. 8).

A measure of literacy in Canada

In order for Aboriginal people to participate more fully in their communities and in Canadian society, literacy levels must improve. In 2003, the International Adult Literacy and Skills Survey (IALSS) reported that 15% of Canadians aged 16 to 65 years were placed in Level 1 and 27 % in Level 2, the lowest of the five levels used in the study. Individuals placed in Levels 1 and 2 are considered to operate below the level required for everyday life in a knowledge economy according to IALSS (Human Resources and Skills Development Canada & Statistics Canada, 2003). IALSS also estimated that the literacy levels of urban Aboriginal people in selected parts of Canada was lower than that of the Canadian population overall (Human Resources and Skills Development Canada & Statistics Canada, 2003).

Adult literacy programs and Aboriginal people

The recent emphasis on increasing the employability of Canadians has led to a proliferation of adult upgrading and training programs. Literacy and adult basic education programs are an integral part of this public policy effort that recognizes the importance of improving skills to help all citizens more fully participate in the work force. Recently, literacy advocates have proposed that the federal government adopt a national adult literacy policy. In 2005, six national literacy organizations proposed that the federal government support a 'National Literacy Action Plan' that would allow Canadians to have access to free

high quality literacy training and upgrading to high school completion...” (Movement for Canadian Literacy, 2005, p.1). In addition, the federal Advisory Committee on Literacy and Essential Skills called for the federal government to work with the provinces and territories to develop a “Pan-Canadian Literacy Strategy”(Advisory Committee on Literacy and Essential Skills, 2005).

Despite the lack of a coordinated national plan, the federal and provincial governments do fund a wide range of adult literacy programs with the specific goal of increasing literacy skills of adults in Aboriginal communities. The federal government is responsible for education of Status Indians. Thus, the federal government funds literacy and employment preparation programs both on and off reserve for Status Indians with the goal to increase the skills for employment within this group. The federal government also provides funding to national Métis organizations for adult employment training in local communities. In some cases provincial governments have also provided funds for literacy and adult basic education programs that target Aboriginal peoples. For example, Ontario was the first province to provide dedicated funding for local adult literacy programs to serve Aboriginal communities through the Literacy and Basic Skills Program of the Ministry of Training, Colleges and Universities (Johnny, 2005). Although the federal and provincial governments have funded many literacy and adult basic education programs, little research has examined how these literacy programs fulfil both individual and collective needs within Aboriginal communities.

Can a sociocultural view provide new insights?

Cognitive development can be viewed through a socio-cultural perspective, where “learning is rooted in the situation in which a person participates” (Fenwick, 2000, p.253).

Considering adult literacy learning through the social and cultural aspects of participating in a community could bring fresh insight in the analysis of research in adult literacy (Taylor & Blunt, 2001). Socio-cultural learning theorists suggest that understanding emerges through participating in activities with others (Brown, Collins, & Duguid, 1989; Greeno, 1998; Packer & Goicoechea, 2000; Wertsch, del Rio, & Alvarez, 1995). Some evidence now exists that collaborative learning is an important component in adult literacy learning (Taylor & Abasi, 2005); however, this idea has not been investigated among Aboriginal adults. A study of how Aboriginal adults learn collaboratively, using a socio-cultural perspective, could assist in developing literacy programs and policies that focus learners in an Aboriginal setting. Investigating collaborative activities in Aboriginal adults may also broaden our understanding of a socio-cultural model of adult learning.

Purpose of the study

The purpose of this study is to determine how collaborative learning occurs in an Aboriginal adult literacy environment. The definition of collaborative learning will be guided by Rogoff's concept of guided participation, defined as "the processes and systems of involvement between people as they communicate and coordinate efforts while participating in a culturally valued activity" (Rogoff, 1995, p. 142). For the purposes of this study, collaborative learning is defined as the cognitive development of individuals that occurs through interaction with others in a community of practice (Rogoff, 1995). A community of practice is formed when people work towards a common goal within a group or community, over a period of time (Wenger, 1998).

To help frame this study, three themes will be discussed in the literature review: adult literacy learning, collaborative learning in adult literacy, and learning in Aboriginal adult

settings. To investigate the problem, a case study design was chosen and will be used to examine interactions among learners and instructors through a range of data collection methods. In addition to a thorough description of the case, the results will identify themes and patterns that could reveal an initial understanding of the role of collaborative activities in Aboriginal adult literacy learning.

My relationship to the topic and participants

I have an interest in how people (Aboriginal and non-Aboriginal) can learn from each other. Although I had lived in the community for four years, I had no previous formal connection to the Aboriginal Adult Literacy Centre that was investigated in this study. When I lived in the community, I worked for four years as a Volunteer Coordinator and as a Finance Officer for an organization that provided employment training to Aboriginal women on long-term social assistance. I also acted as the Finance Officer for an organization that provided cultural, health, educational and social services programs and services to Aboriginal people. While I lived in the community, I served as a volunteer Board member and Treasurer of a local organization committed to improving the relationship among Aboriginal and non-Aboriginal residents. Before moving to this community, I was employed by a provincial Aboriginal Capital Corporation to assist in increasing leadership skills among rural Aboriginal youth. I have also coordinated a national project that encouraged the participation of Aboriginal youth and adult volunteers in community-based agriculture and technology clubs.

Definition of terms

The key concepts will be defined to develop a common understanding of the terminology guiding this study. The description of the Aboriginal peoples in Canada has

preceded this section. Definitions of literacy, collaborative learning, situated cognition, situated learning, communities of practice and cognitive apprenticeships will be outlined in the following section.

Literacy

The various definitions of literacy can lead to a variety of educational approaches depending on the perceived needs of learners, whether they have needs for specific skills, a need for power of a marginalized group or a need for self- improvement. For the purpose of this study, I will consider adult literacy from a social perspective of literacy, where an individual is transformed through a developing literacy identity, a view proposed by Barton and Hamilton (2000). In a social perspective of literacy, the process of becoming literate is more important than the particular skills that are attained. As a person constructs a literacy identity, they make use of their new skills and confidence in participating in social practices outside the classroom.

Collaborative learning

Collaborative learning, defined as learning in a collaborative social context, contributes to higher order cognitive functioning such as literacy (Christie & Stone, 1999). For the purposes of this study, collaborative learning is defined as the cognitive development of individuals that occurs through interaction with others in a community of practice (Rogoff, 1995). Collaborative practices in this study includes all interpersonal interactions. These interactions are therefore considered a part of learning in a collaborative context.

Situated cognition

Situated cognition, as described by Brown, Collins and Duguid (1989), involves the idea that cognitive skills such as thinking, representing, and planning can be acquired

through engaging in actual activities of a particular culture. Thus, situated cognition in this study will refer to the internal changes that occur as an individual takes part in social interactions within a community.

Situated learning

Situated learning refers to a broader concept of learning through participation in a community (Fenwick, 2000; Greeno, 1998). In situated learning, a newcomer becomes a more experienced group member by engaging in the activities of a group (Lave & Wenger, 1991). It is important, then, to consider communities when considering the concept of situated learning.

Communities of practice

The complex social interactions among experts and novices taking part in a process of collective learning is considered to be a community of practice (Wenger, 1998). A community of practice has three defining characteristics: a community of people sharing a common purpose, a domain or particular subject area, and a practice that could include resources developed by the group such as common experiences, stories and tools.

Cognitive apprenticeships

A cognitive apprenticeship focuses on an individual's learning through guidance from an expert in a shared problem-solving situation (Taylor, King, Pinsent-Johnson, & Lothian, 2003). An instructional model proposed by LeGrand Brandt, Farmer and Buckmaster (1993) was used in this study as a guide to identify activities related to cognitive apprenticeships.

Significance of the Study

This investigation may expand our understanding of the concept of collaborative learning in adult literacy learning. The concept of collaborative learning has been studied in adult literacy programs but, to date, there has not been an investigation of collaborative learning involving Aboriginal adults. Thus this study may be able to increase our understanding of collaborative learning in general and in an Aboriginal learning setting, in particular.

When considering adult literacy learning in an Aboriginal setting, there may be considerations particular to Aboriginal culture that literacy practitioners and program planners could consider when creating adult literacy programs or planning instruction. This study may suggest characteristics of a successful Aboriginal adult literacy learning program that may be useful to instructors and policy makers when planning their programs. Taylor and Blunt (2001) suggested that a social cultural perspective of learning could provide a new way of viewing adult literacy programs and could provide a new direction for research, program planning and instruction. This study will view an Aboriginal adult literacy program from a sociocultural perspective. This study may, therefore, expand our understanding of a social cultural perspective of learning in an Aboriginal adult literacy setting. The study's findings regarding collaborative learning, specific cultural considerations and an increased understanding of a sociocultural view of adult literacy learning may be useful to researchers, policy makers and practitioners in the future.

CHAPTER 2

Focussed Literature Review and Conceptual Context

Before undertaking a study of collaborative learning in Aboriginal adult learning, it is necessary to describe and critically review what is currently known about (1) adult literacy learning, (2) collaborative literacy learning in adults, and (3) literacy learning in Aboriginal settings. Adult literacy learning can be viewed from varying perspectives: functional, social or critical. Each perspective of literacy learning can provide a foundation upon which a study can be structured. It is important to consider each perspective to determine the best fit for a study of collaborative learning in an Aboriginal milieu.

Collaborative learning is an important factor contributing to learning in adult literacy programs. Previous studies have provided indications of how collaborative learning occurs among adult literacy learners. A review of these studies will outline their findings and suggest additional areas for investigation. A description of what is known of Aboriginal adult literacy settings is provided in the following section.

Once the relevant literature has been reviewed, the conceptual context guiding the study will be described. Rogoff's perspective of cognitive development through activity in a socio-cultural context will guide this investigation. Concepts relating to Rogoff's three planes of analysis will then be described: situated cognition and situated learning relating to the personal plane, communities of practice relating to the community plane and cognitive apprenticeships relating to the interpersonal plane.

Adult literacy learning

There are competing definitions of adult literacy which reflect the epistemological views of literacy researchers and theorists. The various definitions of literacy can lead to

differing educational approaches depending on the perceived needs of learners: to acquire specific skills, to increase the power of a marginalized group or engage on a journey of self-improvement. Three perspectives of literacy, functional skills literacy, a critical perspective of literacy and a social perspective of literacy will be described.

Functional skills perspective of literacy

Traditionally literacy acquisition in adults was considered to be equivalent to that in children. For example, adult learners acquired specific skills in order to complete grade level expectations in a high school curriculum. From this functional literacy perspective, literacy is viewed as the attainment of a specific set of skills or competencies (Demetris, 2001). Functional skills literacy corresponds to the idea that low literacy is an economic issue related to international competitiveness and globalization, which are public policy concerns. A highly literate population, in this view, is regarded as an essential component of a productive and globally-competitive economy (Statistics Canada, 1996).

The determination of relative literacy levels in OECD countries by the International Adult Literacy and Skills Survey (IALSS) in 2003 and the International Adult Literacy Survey (IALS) in 1994 are examples of functional literacy. In these surveys, respondents were placed in one of five literacy levels, where '1' represented the lowest skill level, and '5' the highest skill level, in each of four literacy domains, prose, document, numeracy and problem solving (Human Resources and Skills Development Canada & Statistics Canada, 2003; Statistics Canada, 1996). Respondents placed in Level 3 were considered by IALSS researchers to have the minimum literacy skills to cope with everyday life in an advanced and complex society. Those placed Level 1 and 2 were considered to have inadequate skills to cope in a knowledge economy.

The IALSS expanded the numeracy questionnaire and added the domain of problem-solving. However, the prose and document literacy scales for the IALSS were identical to those used in the IALS conducted ten years previously. In the IALSS, 15 % of Canadians aged 16 to 65 years were placed in Level 1 and 27 % in Level 2 in the prose domain, resulting in a total of 48% of adults in this age range that researchers considered to have inadequate literacy skills. These results were similar to those of the 1994 IALS where 22% of adult Canadians surveyed were placed in Level 1 and 26% in Level 2. The 2003 IALSS results indicated that there had been no improvement in literacy skills among Canadians since the IALS was conducted in 1994 (Human Resources and Skills Development Canada & Statistics Canada, 2005).

The IALSS also estimated that the literacy levels of urban Aboriginal people in selected parts of Canada are lower than that of the Canadian population overall (Human Resources and Skills Development Canada & Statistics Canada, 2003). “Just over 60% of the urban Aboriginal population in Manitoba and Saskatchewan scored below Level 3 in the prose literacy scale. In comparison, 45% of the non-Aboriginal population of Manitoba and 39% of the non-Aboriginal population of Saskatchewan and 48% of the overall Canadian population...score below Level 3” (p.56). This survey is the first large scale estimate of literacy levels in Aboriginal peoples in Canada as the IALS did not separately identify Aboriginal peoples in its analyses. The lower literacy scores recorded by people who identified themselves as Aboriginal in IALSS could correspond to the generally lower educational attainment of Aboriginal people surveyed compared with the total sample. Also, a native language, such as Cree or Ojibwe, may be the first language for some respondents. As the IALSS survey was conducted in either English or French, some Aboriginal

respondents conducted the survey in their second language (Bougie, 2008; Human Resources and Skills Development Canada & Statistics Canada, 2003). IALSS researchers surveyed urban Aboriginal people living in selected communities in Manitoba, Saskatchewan, the North West Territories, Yukon and Nunavut. These results can not necessarily be generalized to conditions in other parts of the country or to rural and on-reserve communities, as the Aboriginal people surveyed lived in urban communities in a particular geographic areas of the country.

The results of these international literacy surveys have been used by advocates to lobby for increased funding for adult literacy programs. The statement that nearly half of adult Canadians have inadequate literacy skills has drawn attention to the issue of literacy skills nationally. At the same time some literacy researchers have questioned the validity of the IALS results and have cautioned people in making generalizations without mentioning the potential limitations of the survey. A close examination of the IALS results suggests that it is not clear which knowledge and skills were measured by the survey instrument and that the conclusions of the researchers do not match the perceptions of those who were surveyed (Sticht, 2001). Knowledge and skills such as problem-solving, reasoning, test taking skills, motivation and competitiveness may have been measured rather than pure literacy skills, indicating that the construct validity of the IALS instrument is suspect (Sticht, 2001).

Hamilton and Barton, proponents of a social perspective of literacy, suggest that IALS researchers advocate a quantitative model of literacy, which falls short of adequately describing the complexity of literacy in a community (Hamilton & Barton, 2000). They state that IALS testing does not provide a complete picture of literacy in a community. Rather, Hamilton and Barton suggest that literacy only has meaning within a certain community

where literacy practices are developed over time. The IALS tests seek to diminish a variation in responses that are based upon differences in culture. It was assumed, for example, that all individuals taking the English Canadian IALS would respond to questions in a similar manner notwithstanding differences in their cultural background. In contrast, Hamilton and Barton suggest that literacy is formed in part by its cultural context and not so easily be measured by quantitative means.

Most respondents to the IALS felt that their literacy skills did not place limits on their daily lives. Of those placed in Level 2, 90% indicated that they felt that their reading skills were good or excellent. Despite the respondents' general satisfaction with their skills, the authors of the report rejected these findings, stating that a minority of people with weak literacy skills recognize a need to improve their skills (Statistics Canada, 1996). Many respondents placed at Level 2 may not be able to cope with higher order tasks, but are satisfied with their literacy skills in the context of their daily lives. It is likely the respondents placed in Level 2 who are satisfied with their skills do not live in the complex, advanced economy assumed by IALS researchers.

The functional skills perspective of literacy forms the basis of public discourse about the literacy skills in the Canadian workforce and economy. "The Canadian literature (in adult literacy) has recently become dominated by a focus on numbers and statistics related to people who have literacy challenges..." (Quigley, Folinsbee, & Kraglund-Gauthier, 2006, p. 16). Using the functional skills perspective, economists have quantified the relationship between labour productivity, Gross Domestic Product (GDP) and literacy levels. "A 1% rise in literacy levels can result in a 1.5% increase in GDP per capita and a 2.5% improvement in labour productivity (Canadian Council on Learning, 2007b, p.48). However, some literacy

researchers suggest that public discussions could involve more perspectives of literacy than only the acquisition of functional skills. Little literacy research in Canada has involved “the lived experiences of adults with literacy challenges, on their learning experiences in programs...or on the everyday literacy practices of people with literacy challenges” (Quigley et al., 2006, p.26). It is important, therefore, to consider other perspectives of literacy research so that the voices of adult literacy learners can be heard in public discussions.

Critical perspective of literacy

In contrast to functional literacy theorists, critical literacy theorists argue that acquiring literacy creates a critical consciousness in marginalized groups of adults who can gradually assume greater control over their lives (Demetrian, 2001). Proponents of the critical literacy perspective argue that literacy in adults is a tool for advancing the needs of poor and politically powerless groups. Increasing literacy skills in this view would assist marginalized individuals to critically assess their personal situation, actively seek solutions for themselves and others, and then work towards a more just society in general. From a critical perspective, learners can develop literacy skills by reading and writing and communicating about issues, such as affordable housing or youth suicide, and then making changes in their lives and their communities.

Some Aboriginal educational theorists suggest that the historical context of European colonization and the resulting oppression of Aboriginal peoples must be considered in understanding Aboriginal literacy (Antone, 2005; Battiste, 2005; Battiste & McLean, 2005; Weber-Pillwax, 1999). “To understand the contemporary aspect of Aboriginal literacy, one must begin with an understanding of the history of European and Aboriginal relations in terms of colonization and residential schools” (Antone, 2005). Aboriginal critical literacy

theorists, argue that Aboriginal literacy has a distinct place in adult literacy theory. “Without this acknowledgement Aboriginal people continue to be considered as second-rate citizens in a two-tiered system that couches Aboriginal literacy in stereotypical terms and does not value or have a clear understanding of Aboriginal approaches to and expressions of literacy” (Antone, 2005). In Canada, Aboriginal literacy has been discussed in terms of both functional literacy and critical literacy. A third view, a social theory of literacy, may provide additional information in describing the acquisition of literacy skills in Aboriginal settings.

Social perspective of literacy

From another perspective, a social theory of literacy, individuals engage in literacy practices as a part of their every day life. Literacy practices are considered to be “general cultural ways of utilizing written language which people draw upon in their lives” (Barton & Hamilton, 2000, p.7). Similar to the critical view of literacy which is concerned with power relationships within society and considers the purpose of literacy education to be the empowerment of marginalized groups, social literacy theorists also suggest that “literacy practices are ...patterned by power relationships and some literacies are more dominant than others”(Barton & Hamilton, 2000, p. 12). However, from a social perspective, many literacy practices, both dominant and vernacular, are acknowledged to be a part of the every day life of a community.

From a social perspective of literacy, individuals make use of written materials, or literacy texts. Literacy events are observable activities that use literacy texts together with spoken language as a set of social practices through which a person can participate in their community. Barton and Hamilton consider the concept of social practices to include not only the literacy event itself, but also people’s values and attitudes and way of making sense of

literacy. This process of making sense in a literacy practice is personal, involves interactions with others, and is affected by societal and cultural norms.

Building on Barton and Hamilton's views of literacy as practices, a socio-cultural perspective was used as a conceptual framework in a discourse analysis of selected adult literacy programs in Canada (Taylor & Blunt, 2001). The findings of this study support the idea that a social cultural perspective can provide a new way of viewing adult literacy and provide a new direction for research, program planning and training instructors. A template was constructed that compared four elements of situated learning (content, context, community and participation) with four domains of literacy practice (community, workplace, family and school). Based on an analysis of this framework, the study examined articles written by instructors and administrators of various programs. Although the findings of this study provide insight for a new orientation towards a social perspective of literacy research, further analyses that include the voices of the learners could provide additional information in developing Barton and Hamilton's perspective.

From a socio-cultural perspective, participating in social practices by using literacy skills is more important than the particular skills that are attained. This view of literacy as 'practices' contrasts with the perspective of functional literacy adherents who consider literacy to be 'skills' that are separate from the contexts in which the skills are used. A social view of literacy considers that meaning is derived from the context in which literacy events occur, in contrast to a functional view in which skills are divorced from context.

A social view of literacy may provide a valuable perspective when examining adult literacy learning in a variety of cultural settings. "Although the sociocultural perspective of learning acknowledges multiple realities and the social construction of knowledge, the

everyday practice of teaching and learning tends to adopt a position of ultimate truths shaped by Eurocentric ideals. The sociocultural perspective holds promise for challenging the Eurocentric ideals in the practice of adult education (Alfred, 2002, p.11). Thus, investigating adult literacy learning through the lens of a social theory of literacy may provide additional insights in Aboriginal settings.

Collaborative literacy learning in adults

Collaborative learning has been described as an important factor contributing to learning in adult literacy programs. In a study involving twenty adult literacy classes in eight U.S. states, collaboration among learners was found to contribute to a sense of a community in the classroom, an important component of successful learning in adult literacy education (Beder & Medina, 2001). Three factors contributed to a sense of community: learner collaboration with learners, teacher support for a community environment and inclusion. Although educational outcomes were not formally assessed, the authors concluded that a sense of community had positive effects on program completion and academic success.

A methodological limitation of the study was that Beder and Medina observed interactions between learners and instructors, and interviewed instructors, but did not consider the voices of the learners. Without considering student perspectives the authors could only draw limited conclusions. Including the lived experiences of the learners would have contributed to a more complete picture of the role of collaborative activities. As Beder & Medina suggest, peer collaboration may assist in developing and encouraging a sense of community in non-Aboriginal classrooms; however, it is not known whether this is true for Aboriginal learners. It is also not known whether encouraging a sense of community through peer collaboration could assist in successful outcomes among Aboriginal literacy learners.

Collaborative activities can support and challenge individuals in many ways depending on their orientation towards learning, seeking knowledge, building personal relationships or working towards independence (Kegan, Broderick, Drago-Severson, Helsing, Popp, 2001). A cohort, defined as a “tightly knit, reliable, common-purpose group” (p.14), was extremely important to learners in a study of three adult literacy classes in the Eastern United States. The classroom cohorts provided a supportive environment for the learners to experience academic success, interpersonal support and, perspective transformation.

The researchers interviewed and observed 41 adult basic education (ABE) and English for Speakers of Other Languages (ESOL) students from a variety of cultural backgrounds in three classes that lasted from nine to fourteen months (Kegan et al., 2001). The three groups were purposefully selected as exemplary examples of adult literacy programs although a definition of ‘exemplary’ was not provided. The findings of this study indicate that collaborative learning is an important aspect of successful adult learning in these exemplary programs. Further study is needed to determine whether collaborative learning and the development of a supportive classroom cohort are important factors in the success of adult literacy programs that are not considered to be ‘exemplary’.

Peer collaboration was found to occur in adult literacy classrooms in a Canadian study (Taylor et al., 2003). The literacy task, the leadership style of the instructor, the collaborative practices of peers and the movement towards independent learning were critical components of peer collaboration in the acquisition of reading, writing, numeracy, communication and computer skills in a formal adult literacy program. The instructor played an essential role in establishing a positive learning environment and adopted a teaching style that enables students to collaborate and work towards becoming self-directed learners.

The organizing framework proposed by Taylor and colleagues provides an early indication of how peer collaboration can assist learning in adult literacy programs. Further investigation of the relationships among the factors that contribute to collaborative learning is required to further develop the proposed organizing framework. A broader perspective of peer collaboration in adult literacy learning could be acquired by studying more programs in different settings using a phenomenological or grounded theory approach.

An ethnographic study of four adult literacy agencies and programs at nine sites was designed to explore how Taylor et al.'s organizing framework of peer collaboration might occur in formal and informal learning settings. The researchers found that collaborative learning, defined as peer modelling, mentoring, scaffolding and coaching, was found to be an essential process in the formation of communities of practice (Taylor & Abasi, 2005; Taylor, Abasi, Pinsent-Johnson, & Evans, 2007). Peer collaboration led the learners through the process of developing a community of practice to the final stages of moving towards independent learning. In addition, an instructor's philosophical orientation towards collaboration and a teaching style that involves student participation were also found to be key factors in the development of a community of practice among literacy learners. An instructor who values collaborative learning will select teaching strategies and learning materials that encourage teamwork, leading to the development of a sense of community.

Additional findings from this study suggests that "collaborative learning is the cement that bonds the various building blocks in a community of literacy learning practice" in formal and informal literacy learning programs (Taylor, Evans, & Abasi, 2006, p.231). Literacy instructors' views of their roles, as well as the teaching strategies that they choose, create an environment that may encourage collaborative learning. The investigation of the

instructor's perspective of teaching adds to the preliminary framework proposed by Taylor et al. (2003). In this study, literacy instructors who supported a collaborative learning tended to have a focus on developing new ways of thinking among their students. A collaborative learning environment can be created if the instructor encourages social learning behaviours and selects learning activities that encourage collaboration.

This investigation of formal and informal literacy programs provides additional information that adds to the importance of peer collaboration in developing communities of practice in adult literacy programs. It is not known if peer collaboration as described by Taylor et al. (2003) and Taylor et al. (2007) occurs in specific cultural settings such as Aboriginal adult literacy programs. Thus, studies of peer collaboration in this cultural environment could contribute to evolving definitions of Aboriginal literacy.

Literacy learning in Aboriginal settings

Before exploring the potential role of collaborative learning in an Aboriginal setting, it is important to review what is known about how Aboriginal adults learn. Aboriginal education theorists maintain that Aboriginal peoples hold a unique world view compared with the traditional Euro-Western worldview of education (Antone, Gamlin, & Provost-Turchetti, 2003; Bazylak, 2002; Dowdall, 2003; Tremblay & Taylor, 1998). This world view involves the connectedness of all things, "if indigenous ways of knowing have to be narrowed through one particular lens... then the lens would focus on relationality" (Wilson, 2003, p. 173). Relationality refers to the concept that all things are related and are relevant (Weber-Pillwax, 1999). In contrast to the Euro-Western view, an Aboriginal world view considers those relationships among people and between people and the natural world to be interconnected, rather than compartmentalized. The mainstream education system based on

the Euro-Western worldview, may have contributed to high drop out rates of Aboriginal youth in elementary schools leading to lower educational attainment of Aboriginal people in Canada (Antone et al., 2003).

Learning in traditional Aboriginal communities emphasized the spiritual, mental, physical and emotional aspects of life. Aboriginal people have adopted a holistic approach to education in which everything in the world is considered to be related (Antone, 2003). Euro-Western educational practices tend to focus on the cognitive and perhaps the physical aspects of a person while often ignoring the emotional and spiritual aspects of life (George, 2003). Aboriginal people perceive that individuals cannot achieve their full potential without considering the spiritual, emotional, mental and physical aspects of life.

The Literacy and Learning Project, conducted in Ontario in 2002, reported that best practices for Aboriginal literacy training were those that had a culturally appropriate holistic perspective (Antone et al., 2003). The project report concluded that there is no one best practice in Aboriginal literacy training, but rather, the most effective programs motivate learners by employing practices that are relevant to their values and beliefs.

A national research project found that Aboriginal adult literacy is “a distinct philosophy for learning” (Antone & Córdoba, 2005b, p.9). Twenty-six practitioners involved with literacy work with Aboriginal people were asked about their views of Aboriginal literacy in three Learning Circles in Eastern, Western and Northern Canada in 2004. The participants indicated that Aboriginal adult literacy is an alternate perspective of learning compared with learning in the mainstream society and must involve traditional culture, traditions and language. Aboriginal adult literacy involves a holistic approach to literacy and

learning through the four aspects of life, “body, mind, heart and spirit” (Antone & Córdoba, 2005a; Antone & Córdoba, 2005b, p.11).

Antone and Imai’s description of Aboriginal health literacy is an illustration of how an Aboriginal world view affects one aspect of life, the health of individuals and communities (Antone & Imai, 2006). The authors propose that “cognitive and social skills, not limited to reading or writing and numeracy are needed to access, use and understand existing health care services, to make appropriate health care decisions and to take necessary actions” (p.11). Health literacy, in an Aboriginal context, would involve using a variety of skills such as understanding information to make informed decisions with the goal of improved health of an individual, their family and community.

In an analysis of Aboriginal and non-Aboriginal university student narratives of learning to read, a positive connection was found between family and community attitudes towards literacy and a student’s own experiences in learning to read and write (O’Reilly-Scanlon, Crowe, & Weenie, 2004). Although the researchers, who were both Aboriginal and non-Aboriginal, hypothesized that the Aboriginal learners would have had more negative experiences in learning to read than non-Aboriginal students, no supporting evidence was found in the narratives. The researchers then examined their own assumptions regarding which students would have had negative experiences and suggested that similar biases are reproduced within classrooms and institutions. The inclusion of people who had withdrawn from formal education programs, in addition to university students, may have provided a wider perspective of positive and negative experiences and, therefore, may have broadened the basis on which to generalize about childhood experiences of learning to read.

The cultural environment, defined as the values and beliefs of the learners, was more important than the instructional or social environment in contributing to a positive learning atmosphere in a Native employment preparation program (Tremblay & Taylor, 1998). The three key dimensions of cultural environment - values, cooperative emphasis and supportiveness - were important from the perspectives of both the learners and the instructors in this adult basic education program. The definition of values in this study included the creation of a physically comfortable and psychologically warm atmosphere where learners felt supported and respected. Tremblay and Taylor's findings point towards the importance of a supportive, cooperative atmosphere in an Aboriginal learning environment.

Little is known of the significance of collaborative learning or how it may occur in Aboriginal adult education. Although no particular best practices for Aboriginal literacy training have been identified yet, successful programs are guided by a holistic, culturally appropriate perspective (Antone et al., 2003). Therefore, in future investigations involving adult Aboriginal learning, it may be important to consider the particular nature and characteristics of collaborative learning.

Conceptual Context

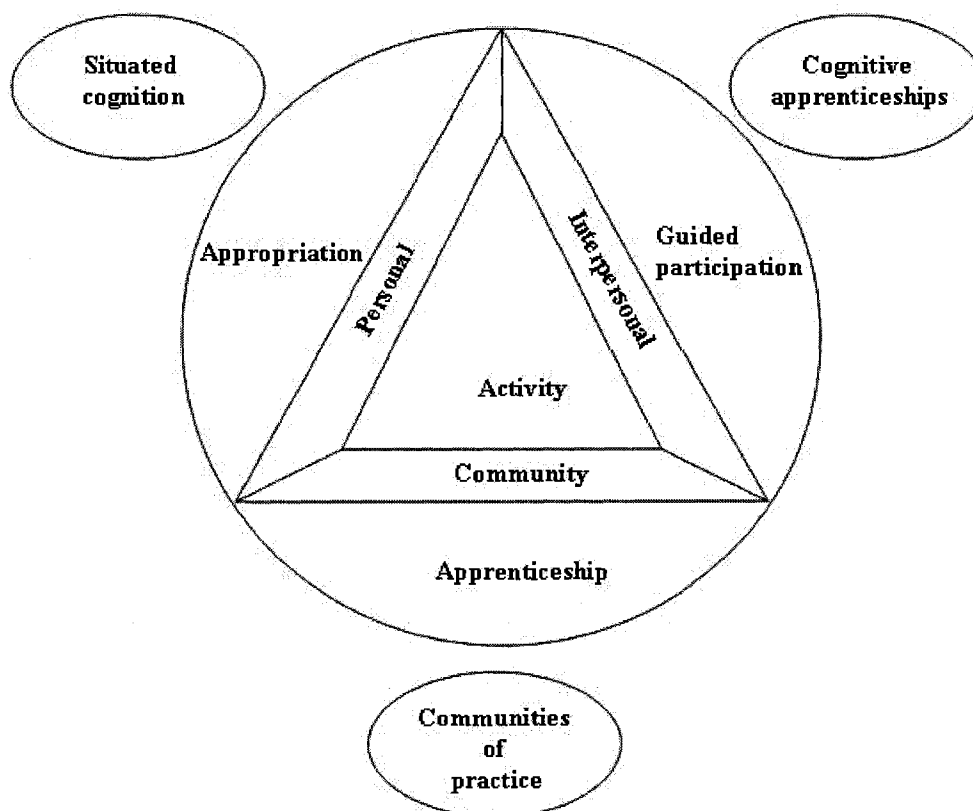
Cognitive development in a socio-cultural context

A perspective of cognitive development in a socio-cultural context involves three inter-related components of learning by participating in an activity: the personal, interpersonal and the community (Rogoff, 1995). From this viewpoint, these three planes of focus interact during a learning activity, are inter-related and cannot be separated (Figure 1).

When one component such as the interpersonal focus is studied, it is important to gain a sense of the personal and the community as well, as no aspect can be studied in isolation.

In Rogoff's view of cognitive development through activity, participatory appropriation is the "process by which individuals transform their understanding of and responsibility for activities through their own participation" (Rogoff, 1995, p. 150).

Figure 1. Learning through Activity. Adapted from Rogoff (1995).



Participatory appropriation, which relates to the personal plane, involves changes in an individual through participation in an activity and is related to the concept of situated cognition which is described in this chapter. For example, a person may not only increase their language-based skills and knowledge, but may also increase their feelings of self-confidence and success by participating in a literacy program, leading to a transformation in how they view themselves.

Investigating cognitive development by considering the community plane of focus, could change the way in which theorists and practitioners view the components of adult literacy programs. In focusing on the community, Rogoff refers to the metaphor of ‘apprenticeship’ in describing the structuring of activities so that newcomers can participate more fully in activities, thereby becoming mature members of a community. Learning in the community plane of focus includes institutional and cultural constraints, such as the policies for enrolment in adult education programs, cultural tools, such as pencils, software and language systems as well as jointly-held values about how a group works together (Rogoff, 1995). The related concept of communities of practice proposed by Wenger (1998), also described in this chapter, can provide additional insight into the ideas surrounding the community plane of focus.

The third component of cognitive development through activity is the interaction among group members, the interpersonal plane of focus. Rogoff describes the concept of ‘guided participation’ a process in which people interact by observing and participating in community activities. The process of becoming a mature group member involves learning from peers and from experts who may fulfil a variety of roles in helping a newcomer to learn.

A cognitive apprenticeship is a process by which an expert can support a newcomer in learning within a community of practice.

Three concepts related to each of Rogoff's three planes of analysis are described in the following section: situated cognition, communities of practice and cognitive apprenticeships. Each concept is primarily related to one of the three planes of focus and is an important component in cognitive development from a socio-cultural perspective (Figure 1).

Situated cognition

A view of learning, the situated perspective, has emerged in the writings of socio-cultural theorists (Lee & Smagorinsky, 2000). The concept of a situated perspective of learning can be traced to Vygotsky who proposed that the social group and its culture are important factors in the learning process (Vygotsky, 1978). Inspired by Vygotsky's writings, some contemporary educational theorists have focussed on how interactions among members of a community contribute to learning (Bonk & Cunningham, 1998; Greeno, 1998; Lave & Wenger, 1991; Packer & Goicoechea, 2000). "A primary tenet of Vygotskian psychology is that individual mental functioning is inherently situated in social, interactional, cultural and historical contexts. Therefore to understand human thinking, and learning, one must examine the context and setting in which that thinking and learning occurs (Bonk & Cunningham, 1998, p.35).

Situated cognition, as described by Brown, Collins and Duguid (1989), involves the idea that cognitive skills such as thinking, representing, and planning can be acquired through engaging in actual activities of a particular culture. The authors contrast the idea of situated cognition with the process of gaining knowledge through classroom activities that

are not related to real world situations. The concept of situated cognition has evolved from the fields of anthropology, and critical and socio-cultural theories, and involves individuals learning through interaction with others (Kirshner & Whitson, 1997). The concept of situated cognition considers that the unit of analysis becomes the “socio-cultural setting in which the activities are embedded” (p.5), rather than the individual. Thus, situated cognition refers to the internal changes that occur as an individual takes part in social interactions within a community and is a concept that is closely related to Rogoff’s personal plane of focus.

In the past, Aboriginal people have acquired the traditional knowledge of their culture by participating in community activities (Rogoff, 2003; Ross, 1992). Young people, in traditional Aboriginal communities, learned to hunt by accompanying and intently observing experienced hunters. Then, the inexperienced youth would acquire knowledge and skills by assisting these hunters in real life situations and then by practicing hunting techniques on their own. These young people would become experienced hunters through observing and participating in the actual community activities. As there have been no investigations in this area to date, it is not known whether the concept of situated cognition could be helpful in describing cognitive development either in the acquisition of traditional knowledge or learning through participation in Aboriginal literacy programs.

Situated learning

The concept of situated learning has grown from discussions of situated cognition and refers to a broader idea of how learning occurs in a community. Discussions of situated learning are inherently tied to participation in communities (Fenwick, 2000; Greeno, 1998; Rogoff, Matsuov, & White, 1996). A learning activity from this perspective was considered

by Lave and Wenger (1991) to be ‘legitimate peripheral participation’ (p. 122) where a newcomer becomes a more experienced group member by engaging in the activities of a community. Rogoff’s metaphor of ‘apprenticeship’, focusing on the processes of learning in a community is similar to Lave and Wenger’s concept of ‘limited peripheral participation’ in that both describe the process whereby newcomers become mature group members through increasing participation in community activities.

From a situated perspective of learning, the purpose of education is not necessarily to develop individuals but rather to assist them in participating in their community (Greeno, 1998). Situated learning, therefore, does not distinguish learners from their communities, cultures and histories. An educator, from a situated perspective, would arrange real-life activities for learners to experience so that development can occur through participation.

The concepts of situated cognition and situated learning are primarily related to Rogoff’s personal plane of analysis. The concept of communities of practice, related to the community plane of analysis, is described in the following section.

Communities of practice

The concept of a community of practice was introduced by Etienne Wenger as he studied learning through apprenticeships. He considered the complex social interactions among experts and novices taking part in a process of collective learning to be a community of practice (Wenger, 1998). Although a group may form intentionally, Wenger suggested that a community of practice has three defining characteristics, a domain, a community and a practice. A group of people share a common purpose and are committed to learning in a particular subject area or domain. Members of this group undertake shared activities in their joint learning and form a community. Finally, through sustained effort over a period of time,

members of a community of practice develop a ‘shared repertoire of resources’ such as common experiences, stories, tools and vocabulary (Wenger, 1998).

The concept of ‘communities of practice’ can be examined from a perspective of social theory of literacy (Barton & Hamilton, 2005). Using Wenger’s description of the development of a community of practice in an insurance claims processing office, Barton and Hamilton suggest that many of the interactions among participants in a community of practice could be described from a social theory of literacy as ‘literacy events’. For example many interactions among group members in the insurance claims processing centre involved texts such as email, telephone messages and forms. Wenger’s description of a ‘practice’ or a shared repertoire of resources developed by community members could correspond to the concept of ‘literacy practices’, described by Barton & Hamilton (2005). In this example of a community of practice, many ‘literacy events’ or interactions could be grouped together to form literacy practices, “distinct, coherent configurations of practice” (Barton & Hamilton, 2005, p.4). Also, similar to a community of practice, literacy practices develop over time and “exist within a cultural context and are built up from existing practices” (p.18).

Barton and Hamilton have illustrated the similarities between the concept of a community of practice and their proposed social theory of literacy. They state that although the fields of situated learning and situated literacies have “common roots in the work of Scribner and Cole” (p.1), the two fields have evolved separately during the past twenty years. Barton and Hamilton suggest that the understanding provided by “theories of language, literacy, discourse and power” are central to strengthening our understanding of the concept of communities of practice. They maintain that Wenger, in his description of communities of practice, often refers to activities that involve literacy events and practices. Barton and

Hamilton then suggest that an analysis of social processes through the perspective of literacy studies could strengthen the concept of communities of practice in the future.

Wenger illustrated the concept of a community of practice by describing the activities of an insurance company employee during a typical day at work. Examples of the key components of a community of practice, domain, community and practice, were provided through the description of this vignette. Barton and Hamilton used Wenger's fictional account of this workplace to identify similarities between the key concepts proposed by Wenger and those proposed in a social theory of literacy. As only this description of a fictional workplace was used by Barton and Hamilton to illustrate the similarities between communities of practice and a social theory of literacy, their argument would be stronger if communities of practice were examined through a perspective of a social theory of literacy in real life situations.

Collaborative learning in adult literacy has been described as the foundation upon which the building blocks of a community of practice can be placed (Taylor et al., 2007). As this concept has not been investigated in the area of aboriginal literacy, it is not known whether the development of a community of practice could assist learners in this particular setting.

Both situated cognition and situated learning, related to Rogoff's personal plane of analysis, as well as communities of practice, related to the community plane have been discussed. The concept of cognitive apprenticeships, related to the interpersonal plane, will be described in the following section.

Cognitive apprenticeships

A cognitive apprenticeship focuses on an individual's learning through guidance from an expert in a shared problem-solving situation (Taylor et al., 2003). An instructional model using the concept of cognitive apprenticeships in adult education has been proposed in professional educational activities involving both physical and cognitive skills (LeGrand Brandt, Farmer, & Buckmaster, 1993). The five phases described in this model of cognitive apprenticeships are: (1) modelling, (2) approximating, (3) fading, (4) self-directed learning and (5) generalizing. During these five phases, an expert provides both behavioural and verbal modelling of an activity. The learner practices the task while talking through the procedure and then reflects upon what the expert has shown and said. Over time the expert gradually lessens his or her assistance as the learner masters the task, seeks independent educational experiences and transfers the new knowledge to other situations.

Six teaching techniques were suggested in another model of cognitive apprenticeships (Collins, Brown, & Newman, 1989). These methods, (1) modelling, (2) coaching, (3) scaffolding and fading, (4) articulation, (5) reflection and (6) explorations, follow a generally similar process as the model proposed by Le Grand et al. beginning with modelling and ending with generalizing what was learned to other situations. The second step in Collins model, 'coaching' corresponds to the second step in Le Grand's model, 'approximating', albeit from the instructor's perspective rather than the learner's. The third step in each model refers to 'fading'. In Collins model, the term 'scaffolding' is also included in this third step, implying that an instructor supports what a learner can not yet do and then gradually removes that support as the learner increases their skill. 'Articulation', the fourth step in Collins model, is also included in Le Grand's concept of 'fading'. Le

Grand suggests that an instructor can assist learners in the fading phase by requesting that learners verbalize what they are thinking. Le Grand's 'self- directed learning' phase corresponds to Collins' 'reflection' although self- directed learning is a broader term that suggests a wider range of activities compared with Le Grand's 'reflection' phase.

It is not known whether the concept of cognitive apprenticeships can be used to describe collaborative learning activities in Aboriginal cultures in a similar manner to that of mainstream literacy classrooms as the characteristics of guided participation can vary among communities (Rogoff, 2003). In traditional Aboriginal cultures, individuals learn through observation and participation in community activities rather than by explicit instruction. Today, Aboriginal communities may continue to have distinct patterns of guided participation based on traditional methods of transmitting knowledge among its members. These patterns of guided participation may include behaviours such as learning through 'listening in', intent observation, and assisting in day-to-day community activities (Rogoff, 2003). Traditional Aboriginal communication styles such as a respect for silence, and transmitting knowledge through storytelling could also influence guided participation in Aboriginal learners (Rogoff, 2003). The concept of cognitive apprenticeships could expand to encompass distinct patterns of guided participation in Aboriginal communities. It will, therefore, be important to investigate whether forms of guided participation based on Aboriginal learning traditions occur among adult literacy learners.

Research Question

This study explores how collaborative learning occurs in an adult Aboriginal learning environment. The overarching research question guiding the present study is 'How does collaborative learning occur in an Aboriginal Adult Literacy Centre?' A sub-question to be

considered, in this study, is 'What are the factors that encourage collaboration in an Aboriginal learning environment?' Identifying these factors could add to a picture of how collaborative learning occurs in this setting.

CHAPTER 3

Methodology

This study was guided by the qualitative research methodology of a case study design. This chapter describes the characteristics of a qualitative case study design, briefly outlines the process in confirming a data collection site, the study participants, the ethical protocol and the various phases of data collection undertaken during the study. Then, the data analysis path and measures taken to increase trustworthiness of the findings are discussed.

Case study methodology

A case study qualitative research design was used to describe how collaborative learning occurs in an Aboriginal Adult Literacy Centre. The intensive description and analysis of a single entity is considered to be a case study (Merriam, 2002). The entity, or unit of analysis, can be a single classroom, program or social unit. In this study, the unit of analysis was the Adult Literacy Centre which offers literacy and basic education for Aboriginal adults in North-Western Ontario.

A case study design is particularly well suited to describing complex situations and can be used to reveal new understanding in an area not previously investigated. The concept of collaborative learning has not, as yet, been studied in Aboriginal adult learning. A study of collaborative learning in an Aboriginal setting could add to the existing knowledge and may add a new layer of complexity to our understanding of this concept in adult literacy learning. Thus a case study design was chosen as this investigation could reveal information regarding a new and potentially complex area.

Merriam considers case study methodology to have three defining characteristics (2000, p. 109). In her view, case studies are descriptive, particularistic, and heuristic. A case

study includes a thorough description of the unit of analysis and its environment. This allows others to understand the unit of analysis and the context in which it is situated and helps them to determine whether the findings are transferable to their own situations.

The Aboriginal Adult Literacy Centre was chosen as the unit of analysis because it has provided literacy programs as an independent organizations since 1991, in a community that is grappling with many social and economic challenges. These challenges, poverty, unemployment, substance abuse and social dislocation, are issues that Aboriginal people are dealing with across Canada. The Literacy Centre provides programs that address the particular literacy needs of members in this community.

A case study methodology is heuristic or can reveal new understandings. Quigley et al. (2006) state that much of the recent literature published about adult literacy in Canada has been quantitative, describing “counts and amounts”, rather than qualitative research. Although quantitative studies provide a ‘snapshot’ of certain aspects of adult literacy issues, new understandings of collaborative learning in adult literacy could be uncovered through a qualitative case study investigation. Together, quantitative and qualitative research findings can reveal a broader perspective of adult literacy in Canada.

In addition, a case study methodology builds on this conceptual context and could provide an initial description of themes pointing to areas for further investigation. Taylor and Blunt (2001) called for adult literacy research to be considered from a social view of literacy. The conceptual context used in this study draws upon the ideas of guided participation (Rogoff, 1995), situated learning (Lave & Wenger, 1991), communities of practice (Wenger, 1998) and cognitive apprenticeships (LeGrand Brandt et al., 1993).

The site

Confirming a data collection site

My journey to confirm a data collection site took me to many communities. I initially approached the teacher of the Alternative Aboriginal High School Program in my community. I had previously completed a mini-research project with this classroom teacher and the teacher's aide in this program. The teacher was interested in participating in the research study, but a board member of the agency hosting the Alternative High School Program had been questioning, in general, the role of universities in research projects at the organization. In light of these questions, the teacher felt that my request would likely be received unfavourably by the organization's Board of Directors and advised me to look elsewhere.

I next approached the director of an Aboriginal Adult Literacy Program located at a nearby First Nations community. After an initial positive response, their invitation to visit and discuss the research project was withdrawn. As a result, I then visited an instructor of another Aboriginal Adult Literacy Program at a nearby First Nations community. Although he expressed interest in the proposed research project, together we determined that their program was a poor fit as all learners worked on an individual basis, directly with an instructor or teacher's aide. Thus, it was unlikely that collaborative learning would have been observed in this setting.

After interviewing people involved in Aboriginal literacy research in Ontario, I learned about a variety of informal Aboriginal learning and literacy groups in the province. After considering the possibilities, I contacted the Aboriginal Adult Literacy Centre in a

community in North-Western Ontario where I had previously lived. There, I received an immediate positive response to my request to conduct my research project.

Access to the site

After an initial telephone conversation with the Director of the Literacy Centre outlining the plans for my research study, I was encouraged to seek formal approval from the Board of Directors. The Director suggested that the Centre could potentially benefit directly from participating in the study and that people outside of the community may increase their knowledge of the Literacy Centre and its programs. I then requested and obtained written permission to conduct research at the Adult Literacy Centre as a site for research purposes from the Board of Directors (Appendix 1).

The participants

There were twenty-two participants involved in the study. Four learners, 5 instructors, as well as 2 individuals interested in the history and operation of the Centre were interviewed. The remaining 11 participants were observed while participating in literacy learning activities. In addition, two of the learners and four of the instructors, who were interviewed, were also observed during learning activities. In total, seventeen learners and instructors participated in the observation phase of data collection. All study participants, learners, instructors and others, were adults over 18 years of age. All of the learners who were interviewed were Aboriginal. As well, almost all of the learners participating in the observation phase of data collection were Aboriginal. For the purpose of this study, the term Aboriginal is defined as including Status and non-Status Indians, Métis, and Inuit peoples of Canada.

Ethical protocol

The learners agreed to participate in the proposed research activities by signing a consent form outlining their rights as research participants (Appendix 2). As the reading level of the learners was likely to be low and English may not have been their first language, I read the consent form to the learners, paraphrasing when necessary. The instructors also signed consent forms describing the purpose of the research and their rights as research participants (Appendix 3). At the time the consent forms were signed, I also answered the participants' questions about the purpose of the research project and their role as a participant in this study. In this way, I was able to ensure, as much as possible, that the participants understood the important points outlined in the consent form. A signed copy of the consent forms was added to the learners' files at the Literacy Centre so that the learners could check back at any time to review the form for clarification.

In accordance with Tri-Council Policy Statement list of best practices for conducting research in Aboriginal settings, the Research Ethics Board of the university requested that I provide a draft copy of the thesis to the Board of Directors of the Literacy Centre for their comment before the thesis was finalized. This process ensured that the community had the opportunity to "react and respond to the research findings before the completion of the final report" (Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council of Canada, & Social Sciences and Humanities Research Council of Canada, 2005). The Board of Directors of the Literacy Centre approved a draft of this thesis once it was complete.

Data collection

To provide a rich description of an Aboriginal Adult Literacy Centre, data was collected by a range of methods, consistent with a case study design. These data collection methods were: (1) observation of learning activities, (2) interviews of learners, (3) interviews of instructors and other individuals interested in the history and operation of the Centre, (4) a document review, and (5) a reflective journal. The research proposal included a sixth data collection method, a talking circle or group interview but this was not conducted as a part of the data collection process. This decision will be discussed in the final chapter with regards to the potential limitations of the study.

Observation of learning activities

The initial data collection phase involved the observation of learning activities among learners and instructors, to gain an understanding of the prevalence and types of collaborative activities. Observation of learning activities took place during two three-week periods, for a total of six weeks. The two three-week data collection periods were separated by five weeks. As the data collection site was located far from my home, it was my preference to conduct data collection during two shorter periods rather than one longer six-week period. As well, I chose to return for the second data collection period five weeks later, at a time when there were no statutory or school holidays so that the number of days available to collect data was maximized. Thus the total period of time between the first and last observation was eleven weeks. This lengthy period for observation allowed me to observe many examples of the four main learning activities.

A coding sheet was developed by incorporating the phases of cognitive apprenticeship proposed by LeGrand Brand et. al. (1993), as well as the potential patterns of

guided participation in Aboriginal communities identified by Rogoff (2003) (Appendix 4). Once I had completed a coding sheet for each learning activity that I observed, I summarized the data for that learning activity in an observation protocol (Appendix 5). Learning activities were generally one to three hours in length and had a defined beginning and end point.

My role as an observer and participant observer. I made an effort to sit behind and to the side of the learning activities, away from the learners and instructors. An instructor initially questioned my position suggesting that it might be too close to learners for them to be comfortable. Although I had hoped to be unobtrusive while making observations, she was concerned that my presence would be uncomfortable for learners and that they might leave as a result. Once I explained the purpose of my research to this instructor, her concern was alleviated. I was, however, very aware that my presence might be threatening for some learners and may contribute to decreased participation at the Centre.

It was not always possible to sit to the side of a learning activity. Depending on the layout of the room and the type of activity, I sometimes joined the group around a table. At other times, I joined the group to answer a question or assist a learner when the instructor was occupied and then returned to my position. My role as an observer, therefore, varied according to each learning activity. In general, my role was an observer of the learning activities but I did become a participant, either in the role of learner or mentor depending on the situation.

Merriam suggests that the data collection and data analysis phases of qualitative research are reciprocal, with one phase informing the other as the research process proceeds (Merriam & Simpson, 2000). In this view, data analysis often occurs concurrently with data

collection. As the research process moved forward, I conducted a preliminary analysis of the data obtained by observation, and learner and instructor interviews to identify emerging themes or issues. During the learner and instructor interviews, I asked questions about these emerging themes. I also continued to ask questions informally of learners and instructors at the Centre as well as of representatives of other community organizations involved in adult learning.

Learner interviews

Data collected through observation assisted me in focussing my questions during individual interviews with learners. Four learners of Aboriginal ancestry were interviewed to explain how collaborative activities contributed to their learning experiences. These semi-structured interviews ranged in length from about 15 minutes to 40 minutes. Two learners were new to the Literacy Centre having begun their involvement during the data collection period and two had attended for more than a year.

Two of the learners preferred to be interviewed without the audio-recorder. Thus, two learner interviews were taped and two interviews were recorded manually. During the latter interviews, I took notes and subsequently produced a narrative from my notes rather than a transcript of the audio-tape. Questions were structured around Rogoff's three planes of analysis through activity, the personal, interpersonal and community (Appendix 6).

Instructor interviews

All five Literacy Centre staff were interviewed as a part of the study. All of the instructors had direct contact with adult learners at the Literacy Centre. Four of the respondents were non-native and one was of Aboriginal ancestry. Literacy Centre staff perform a variety of roles. In addition to acting as instructors, staff also fulfill program and

Board management, administrative, accounting and public relations functions of the organization. Instructors work in formal structured classes, in informal groups of learners with similar interests, as one-on-one tutors to individual learners and as informal mentors, assisting learners informally when they have problems.

I had originally planned to conduct learner interviews first, and then proceed with the instructor interviews after the learner interviews were complete. In fact, the learner and instructor interviews were scheduled for times that were convenient for the respondents and occurred over the entire six-week data collection period. The instructors were interviewed to determine how their role may be contributing to collaborative activities and student learning. The initial results from the observation phase provided a focus for the instructor interviews. These semi-structured interviews were tape recorded, ranged in length from 30 to 50 minutes and followed the interview guide which appears in Appendix 7.

Interviews with interested others. The initial analysis of the data received from the instructor interviews suggested that I could obtain additional information helpful in contributing to an understanding of the case by interviewing individuals who had an interest in the operation of the Centre. I interviewed two individuals who were knowledgeable about the history, policies and operation of the Centre. One was a current member of the Board of Directors and the other was the immediate former Director of the Literacy Centre. These two individuals provided a general overview of the previous and current activities of the Centre. One interview was tape-recorded and one was recorded manually.

Informal discussions. I had many informal conversations with these learners and instructors, as well as other learners and interested community members as a normal part of every day routine at the Centre. The thoughts and observations resulting from these

conversations were a valuable addition to the data collected as they were willing to share their opinions freely with me in an informal manner.

I had informal discussions with representatives of organizations, such as the Friendship Centre, involved with adult education and training in the community. The interviews with these representatives provided information about their organization's adult education programs and their relationship with the Literacy Centre. From these conversations I was able to gain an understanding of the landscape of adult education in the community and how the programs provided by the Literacy Centre fit within it.

Document review

I collected a variety of documents related to the Literacy Centre, its programs and the learners. These included samples of curricula from the Pre-GED Connection course materials and samples of lesson plans developed by the instructors for the "Beginner Internet" course, as well as, copies of the local newspaper containing reports of literacy activities in the community. I also collected samples of student work whenever possible.

As learners tended to work on their own, informally, with an instructor or followed an on-line curricula, paper copies of student work were difficult to obtain. In some cases, learners completed on-line exercises in English, science or geography topics in AlphaRoute. Once these exercises were completed, a paper copy was added to the learner's file. I was able to obtain a paper copy of the completed work of one learner with the permission of the Director.

In other situations, no paper copies of the completed learning activity were generated when learners engaged in on-line activities. While I observed the interactions between

learners and instructors during on-line instruction, I recorded information about the content of the electronic learning materials that were being used.

In these documents, I looked for evidence supporting the initial categories that had emerged from the initial analysis from the data collected through observation and interviews. I read the documents, made margin notes regarding potential topics and then compared these notes with the initial categories from the observation and interview data sources.

Reflective journal

I kept a journal in which I recorded my thoughts and impressions during the data collection phase. I noted questions that arose and described potential connections between my observations and theory. The journal entries also helped me focus my enquiry and adjust my perspective as the research process progressed. An example of a journal entry states: “It was very interesting that (two learners) are participating in the Japanese class. This is completely voluntary on their part and they are participating fully. Is this an example of legitimate peripheral participation where they are becoming mature group members by getting ‘closer to the centre’? What would be other examples of learners becoming mature group members? Perhaps describe the journey of learners as mature group members”.

This quote from my journal connects my observations of a learning activity with adult learning theory. These reflections led me to change my view about adult literacy learners working in groups. Initially, I had expected that a class of adult learners would function as a community of practice. Through observation and reflection, I broadened my perspective and considered how the entire Literacy Centre could be a community of practice.

Data analysis path

The steps in data analysis reflected the procedure suggested for a case study as described by Creswell (1998). The procedure involves the following steps: reading and note taking, describing, classifying, and interpreting. Each step is discussed below.

Reading and note taking

I transcribed all of the interviews that I recorded on audiotape. Then I read the transcripts of the interviews completely adding personal reflections and thoughts in the margins of the transcripts about any connections to my experience and to the literature. I also added a theme or topic in the margin for each paragraph in the interview transcripts. During interviews, I made brief notes on the interview schedules, highlighting insights that arose as the interviews progressed.

During the learner and instructor interviews, I took care to be fully attentive and took few notes while I listened. I made more extensive notes directly after the interviews with my impressions rather than impede the interview process with note-taking. In some interviews, the conversation began to flow anew after the tape recorder was turned off. I also recorded detailed impressions of these informal discussions.

I also made extensive notes on the coding sheets which were completed during my observations of learning activities. These coding sheets were designed to record evidence of collaborative learning during learning activities. A completed observation protocol provided a summary for each learning activity.

Describing

A detailed description of the case in its social or historical context is a characteristic of qualitative case study research (Merriam & Simpson, 2000). The goal of a case study

design is considered to be a “holistic description and interpretation” (2000, p 108). I have provided a rich description of the Literacy Centre to situate the case within its social and historical setting.

During the data analysis phase, I wrote a descriptive narrative of each interview. Each narrative summarized the story of that interview and highlighted the meanings inherent in the interview responses. These narratives were read and the content was approved by the learners.

Classifying

After I read and made notes about the data, I looked for statements where meaning could be drawn. I made additional notes in the margins of the interview narratives noting the theme or topic for each paragraph. This made it easy to locate similar topics in the narratives. I also marked topics or themes when they occurred in my journal and in my coding sheet notes. I grouped the data into categories of similar themes. Then I looked for correspondence between categories to determine patterns in the data. I started to write about these themes and how they related to collaborative learning. I reread the narratives and interview transcripts again, marking quotes that I thought could be evidence of these topics. While thinking about these initial topics, I read again the literature supporting the conceptual context and reconsidered the categories. Then I returned to the narratives, and in some areas, marked new topics in the margins. Based on these revised topics, I re-categorised the data and new themes were revealed.

An example of re-categorization involves particular patterns of guided participation suggested by Rogoff (Rogoff, 2003). She suggested that, in Aboriginal communities, the process of guided participation might follow different patterns compared with those in other

communities. During the data collection phase, I looked for the particular patterns that Rogoff had proposed, (1) learning by ‘listening in’, (2) intent observation and pitching in, (3) engagement in real-life community activities, (4) respect for silence and (5) conveying indirect messages in stories. Initially I had marked in my margin notes that I had not seen a ‘respect for silence’ as a pattern. After considering consistent patterns across the five sources of data and then reading Rogoff’s description of silence in Aboriginal communities, I realized that perhaps a ‘respect for silence’ in this setting could manifest differently from what I had assumed at the beginning of the data collection process. Respecting the ‘silence’ of other learners by providing assistance only when asked was a consistent pattern in the data. I then realized that this pattern may reflect the concept of ‘respect for silence’ described by Rogoff (2003).

Interpreting

After the data was analyzed, I indicated how the themes that arose from the data were related to current research in adult literacy and Aboriginal learning settings. Then I suggested ways in which the findings could potentially be transferred to other similar situations. This interpretation step can also be described as the ‘lessons learned’ from the investigation.

Trustworthiness

Care was taken to ensure that the voices of the participants were reflected in a balanced manner in the text. Fairness, a characteristic of a trustworthy study, is defined as a balancing of the variety of views so that all voices are included in the text (Guba & Lincoln, 1994). Although I identified consistent themes within the data, I also took care to include additional views that did not necessarily fit within commonly held opinions of the

respondents. Including these views assists in providing a variety of perspectives, leading to improved fairness in the study.

Triangulation refers to verifying data by comparing information from different sources (Merriam, 2002). Obtaining data from a variety of sources such as (1) observation, (2) interviews with learners and (3) instructors, (4) document review, and (5) reflective journal, assisted in ensuring credibility of the findings. The process of triangulation enabled me to discover consistent themes from a variety of sources of information in this case study.

Member checking is a technique in research in naturalistic settings in which the participants have the opportunity to confirm the interpretations derived from the data collected by being asked to comment on the initial narratives. This member checking procedure took place after the initial data analysis and ensured that my interpretation of the data reflects the informants' intentions, thus helping to ensure trustworthiness of the research findings.

In summary, this study followed a qualitative case study design, investigating collaborative learning among adult literacy learners in an Aboriginal setting. The Aboriginal Adult Literacy Centre, the unit of analysis, was chosen as a well-established organization that provided a variety of literacy learning activities. Data was collected through a variety of methods including observation of learning activities, interviews of both learners and instructors, as well as a review of documents and a reflective journal. Then the data was analyzed through the perspective of the three planes of analysis described by Rogoff (1995). Based on this analysis, the study's findings and resulting interpretation will be described regarding collaborative learning in an Aboriginal setting.

CHAPTER 4

Findings

This case study sought to investigate how collaborative learning occurs in an adult Aboriginal learning environment. Consistent with a qualitative research methodology, themes regarding collaborative learning in this setting have emerged through the analysis of the data. This chapter contains two sections, a description of the Aboriginal Adult Literacy Centre and a presentation of increasing learner engagement and participation through an analogy of entering a house of literacy learning. Together, these two sections constitute findings of the study.

Description of the case

The Adult Literacy Centre is located in a town with a population of approximately five thousand two hundred people in North-Western Ontario. The community consists of the main town site of 3500 people, a small village of 200 people about 15 kilometres from the main town site, as well as 1500 people living in the surrounding rural area, all within its municipal boundaries. The town was established in the early 1900's as a logging and transportation hub for the area. During the past fifty years, economic activity from the lumber industry and rail transportation has declined. Today, the town serves as a major centre for healthcare, education and social services to numerous surrounding Aboriginal communities in a widespread geographic region.

The Literacy Centre has been operating for fifteen years and offers a variety of programs designed to meet the needs of the community and its members. Funded by the Native Stream of the Literacy and Basic Services (LBS) Program of the Ministry of Training,

Colleges and Universities (MTCU), the Literacy Centre provides literacy programs to Aboriginal adults living in the community.

The following sections describe the study's findings with relation to the various data sources. Profiles of the learners, instructors and interested others, who were interviewed, are described first. It is useful to gain a general understanding of the backgrounds of these individuals, as this information may provide additional context to the description of the learning activities described in the following section. Finally, a description of findings related to documents that were reviewed are discussed.

Interviews with learners

In conjunction with the observation phase of data collection, individual interviews with learners, instructors and other interested individuals were conducted. The following profiles of the four Aboriginal learners who were interviewed provide a brief summary of their background and motivation in attending the Literacy Centre.

Pauline. Pauline was in a period of transition, which included dealing with leaving an abusive relationship and moving to an apartment of her own. She recently moved to town from a northern aboriginal community and was living in the Women's Shelter with her seven-year-old son. She attended the Literacy Centre every day while her son was in school and was open to participating in all the programs and services offered by the Literacy Centre. She hoped to obtain a job in town and saw that improving her literacy skills would help her to reach her goal.

Elizabeth. At the time of the study, Elizabeth's priority was to work towards regaining custody of her three children. She came to the Literacy Centre as a trainee with the March of Dimes Employment Preparation program. As a trainee, she helped learners who

came to the Literacy Centre in the morning with basic computer literacy questions. She enjoyed computers and was responsible for the set up and maintenance of the Centre's computers. She also attended afternoon and evening literacy programs as a learner. Although she did not have a particular goal in mind as a learner at the Literacy Centre, she expressed an interest in working with computers in the future.

Agnes. Agnes has been coming to the Literacy Centre for some time, taking part in courses and just dropping in to use the computer to check her email and to chat online with friends. She has taken a number of courses both at the Literacy Centre and the Friendship Centre. She enjoys the atmosphere at the Centre. At the time of the study, she was working towards improving her English language skills. She planned to attend university majoring in English and felt that that the pre-GED course at the Centre would bring her up to the level that would be required for post-secondary study.

Robert. Robert has been coming to the Literacy Centre for more than a year. In the past, he has participated in the Thursday Night Thinkers group. He was attending the Literacy Centre on a regular basis, two or three times a week to research areas of interest. He was employed and continued to come to the Centre when he was not scheduled to work.

Interviews with instructors and interested others

Five instructors and two individuals interested in the operation of the Centre were interviewed as a part of the study. The instructors were involved in a variety of roles from formal instruction, informal mentoring, and administration. Of the five instructors interviewed, one was of Aboriginal ancestry. Brief profiles of the instructors and the interested others are described in the following section.

Thomas. Thomas is the director of the Literacy Centre. He is hired and supervised by the Literacy Centre's volunteer Board of Directors. In turn, he hires and supervises staff to provide the programs and services of the Centre depending on the funds available. His role at the Literacy Centre includes staff and board management, public relations, administration, as well as instruction. He is the initial contact for individuals who come to the Learning Centre and is also responsible for learner interviews and assessments. Thomas sees his role as someone who nurtures the motivation of learners at the Centre and encourages them to engage in learning activities.

Andrea. Andrea instructs the distance education programs at the Literacy Centre. During the data collection period, she was the instructor for both the computer-based Teachers Assistant Certificate Training (TACT) program and the English Literacy program at the Aboriginal High School. In addition to her part-time role at the Literacy Centre, she also works on contract for other educational organizations in town. During the study, Andrea was an instructor for the Pre-Trades Employment Program at the Friendship Centre. Although the Literacy Centre was a partner in this program, Andrea was employed directly by the Friendship Centre as an instructor. In the past, Andrea has worked as a literacy instructor individually with learners, with groups, and as an on-line instructor and mentor.

Lucy. Lucy works two evenings per week as an instructor at the Literacy Centre. During the day, she is a teacher at the public elementary school. She is a new instructor at the Centre. She tutors learners who drop in on an individual basis as there are generally not enough learners at the Centre during the evening to facilitate group work. In addition, she acts as a mentor for on-line courses. During these on-line courses, Lucy addresses any technical computer issues and answers questions and encourages learners.

Margaret. Margaret works part-time as the administrative assistant and literacy mentor at the Centre. She is responsible for updating learner files and recording data such as contact hours required by the funder. She assists learners to use software programs and shows them how to log in to AlphaRoute. During the study, she was available to answer any general questions from the learners regarding their lesson or the technical aspects of using the computers or the internet.

Marion. Marion began her involvement with the Literacy Centre as a co-op student in high school. She enjoyed her involvement with the Centre and returned the following summer as a summer student. During the data collection period, Marion was organizing a community spelling bee for children, travelled to the neighbouring community on a weekly basis for a two hour literacy drop-in session and assisted the participants of the Pre-Trades Employment Program at the Friendship Centre.

Carole. Carole is a member of the Literacy Centre's volunteer Board of Directors and has served in this position since the Centre became an independent organization in the early 1990's. Originally from Quebec, she raised a family as a single parent in British Columbia before moving to this Ontario community. Currently retired, Carole is committed to helping individuals who could benefit from improving their literacy skills and enjoys her role as a member of the Board of Directors.

Ann. Ann is a former director of the Literacy Centre and is currently a director of an Aboriginal Health Outreach Program for expectant and new mothers. She previously worked as a staff person and then as director of the Literacy Centre from the mid-1990s until 2004. Although she is no longer directly involved in the activities of the Literacy Centre, Ann continues to have an interest in Aboriginal adult literacy programs.

During the data collection phase of the study, the Literacy Centre offered a variety of adult programs including individual self-study, courses in basic use of the internet and on-line Pre-GED and English classes. In addition, the Centre assisted a college in providing an on-line Teacher's Assistant training program. The following section describes the types of learning activities that were observed as a part of the study.

Observation of learning activities

During the data collection period, I observed learners and instructors participating in four types of learning activities: (1) one-on-one tutoring, (2) Pre-GED classes, (3) Beginner Internet, and (4) Introduction to Japanese classes. A detailed description of these learning activities follow.

(1) One-on-one tutoring. Five one-on-one sessions of approximately 1 to 1½ hours in length were observed. Four of these sessions involved academic subjects such as English writing or geography combined with computer literacy learning. The same learner was involved in each of these four sessions over the course of three weeks. During the learning activities, she used the on-line AphaRoute portal funded by the Ontario Ministry of Training, Colleges and Universities (MTCU). Although she used an on-line learning tool, there was considerable interaction between the learner and instructor during the learning activity. The fifth session involved a learner working to improve her mathematics skills. Both of the learners in the one-on-one tutoring sessions were Aboriginal women. The instructors during these learning activities were non-native.

During the first of four one-on-one tutoring sessions with Pauline, Thomas modelled the use of a word list when writing. Pauline then approximated this action while she used the list. Thomas' actions during this period included directing, inviting Pauline to

respond to questions and repeating an explanation more than once. Pauline sought information from Thomas and then asked questions for clarification.

In subsequent learning activities, Thomas and Pauline engaged in modelling and self-directed learning phases of their cognitive apprenticeship. Thomas continued to demonstrate new concepts (modelling) and began the process of fading by standing to the side, allowing Pauline to work on exercises on her own and being available for questions. Pauline became more confident during the course of the four learning activities. During the later tutoring sessions, self-directed learning and generalizing were observed. Once after one of the later lessons was completed, Pauline explored the AlphaRoute web site for other related exercises and then surfed the internet to find additional information about 'Birds of Ontario' to expand upon the information she had encountered in a science lesson.

(2) *Pre-GED class*. The Literacy Centre offers an on-line Pre-GED program aimed at adults with low literacy skills who wish to complete their GED examination, a high school equivalency qualification. The curriculum for the course offered at the Literacy Centre is based on the Pre-GED Connection Program developed by LiteracyLink, a joint project of the American Public Broadcasting Service (PBS), the National Centre on Adult Literacy and the Kentucky Department of Education. This program focuses on developing basic skills in reading, writing, mathematics, science and social studies at the Grade 6-8 level. It is a supplement to the GED Connection Program, developed by PBS, that prepares adults for the GED. During the data collection period, the Literacy Centre was the only adult literacy program in Canada to offer the Pre-GED program to its learners and the program was considered to be a 'pilot project'.

Once learners at the Literacy Centre complete the Pre-GED course, they can enrol in the 10-week GED preparation course offered by a local college. Upon successful completion of this course, learners can register to take the GED examination. The Pre-GED course was offered at the Literacy Centre in response to the need for community members to prepare themselves more thoroughly for the GED examination. Previously, many of the individuals who wrote the GED test without adequate preparation had been unsuccessful.

The pre-GED courses were offered on Monday evenings through virtual classroom learning. Three classes, 45 minutes in length and offered in successive weeks, were observed during the data collection period. The instructor, located in a community 900 kilometres away, lectured on a particular topic, asked questions and encouraged discussion. Participants could attend a session by logging in to a computer at the Literacy Centre, at home or even from another town. Although learners could participate in the course from home, they generally preferred to take part in the course together in the Literacy Centre's computer room. If a learner missed a class, they were able to 'replay' the instructor's lecture at a more suitable time.

During the first session, the first in a series of writing classes, one learner participated at the Literacy Centre, another learner participated from home in a small village located about 15 kilometres distant from the Centre. The learner attending the class at the Centre was Aboriginal and the learner participating remotely was non-Aboriginal.

The next week, I attended the regularly scheduled session but no learners attended that evening. The instructor, however, recorded her lecture so that learners registered in the class could log in to the Pre-GED information page at any time and review the content that was to be covered that evening.

During the third week, arrangements had been made to have the participants of the Friendship Centre's 12-week Pre-trades Employment Program attend Pre-GED reading classes. The class included both the Pre-trades course participants as well as the learners who registered through the Literacy Centre. Of the six learners attending, two were men and four were women. All were of Aboriginal ancestry.

Although the pre-GED classes were conducted on-line, Lucy, an instructor, was also physically present in the classroom. She stepped in to help learners who were experiencing difficulty with the head sets and microphones, or were needing assistance in recording their on-line responses. The learners were focussed both on their computer screens and on interactions with Lucy and the other learners. Lucy observed the learners carefully and provided assistance when individuals seemed uncertain in their responses. Agnes, a learner experienced in on-line learning, also acted as a mature group member, helping other learners in the technical aspects of on-line learning.

In this class, individuals improved their reading skills and learned about on-line learning. Four phases of cognitive apprenticeship were observed during interpersonal interactions during the pre-GED classes. When a learner was uncertain about the instructions from the on-line instructor, Lucy sat beside them, described and then provided an example of the writing that was requested (modelling). The learner wrote text that was requested (approximating). Lucy stood up and moved away but continued to observe if the learner was encountering a difficulty (fading). After completing a short assignment, some learners moved on to other topics on their own (self-directed learning).

(3) *Beginner internet.* The Literacy Centre offered 'Beginner Internet' classes at the Public Library boardroom from 11 am until noon on Wednesday mornings. As the

Community Access Program (CAP) site for the town, the Library offered internet access to the public for a small fee when the room was not booked for meetings or classes. The Literacy Centre used the Library's boardroom and its eight CAP computers for this class. The computers were located on the periphery of the boardroom with a rectangular table and chairs located in the centre of the room.

On Wednesday afternoons from 1:30 -2:30 pm, the Literacy Centre holds a general Computer Literacy drop-in class at the public library. Both sessions are offered free-of-charge to the general public. The 'Beginner Internet' courses are offered for a period of three weeks. During the data collection period, the instructor and participants in the 'Beginner Internet' group continued to attend these weekly sessions on an informal basis even though the advertised three-week duration of the class had ended. The 'Beginner Internet' participants also attended the drop-in computer class during the afternoon.

For the purpose of data collection and analysis, the 'Beginner Internet' and the general Computer drop-in sessions are described and analysed together as they involved the same individuals and the same content. Often, the afternoon activity during the drop-in session was a continuation of the morning's session. I observed eleven computer literacy sessions, each of which was one hour in length.

A variety of topics regarding internet use for beginners was covered during the computer literacy sessions. These activities included downloading files from the internet, registering for an instant messaging service, burning downloaded music files onto a compact disk, and using a video camera and internet telephony or voice over internet protocol (VoIP).

Three learners attended the sessions on a regular basis. Two women of Aboriginal ancestry attended the six sessions that were observed. One non-native woman attended

during the second three-week period. During the afternoon drop-in session, two non-native men came in on occasion to ask specific questions of the instructor. These two men had previously completed computer courses offered by the Literacy Centre and returned occasionally to ask specific questions.

During computer literacy sessions, Thomas demonstrated the steps in setting up a Hotmail account (modelling) and then coached the learners while they set up their personal Hotmail accounts (approximating). Thomas's presence then faded and the two learners were left to work together. At this point, he gave only small suggestions to them before moving on. Self-directed learning was then evident as the two participants exchanged email messages. Similar to the on-on-one tutoring sessions, the learners moved farther along the cognitive apprenticeship continuum during later sessions. Each week Thomas would introduce a new topic such as using VoIP (Voice over Internet Protocol) and a web cam to communicate in real time with others at a remote location. Once the procedure had been demonstrated, the learners approximated the steps with Thomas adding suggestions as needed (fading). Then the learners engaged in self-directed learning by experimenting with the web cam, asking people at the Literacy Centre across the street to take part in video and audio conversations. During the last two sessions, the learners generalized by engaging in activities independently and spent a period pursuing their own interests. Two learners continued to experiment by conversing with Elizabeth by Hotmail, MSN and Yahoo messenger at the Literacy Centre across the street. Another learner downloaded music and copied files to a CD.

The elapsed time between the first and last observations of the computer literacy classes was eleven weeks. As the three women in this group continued to attend during this

relatively lengthy period of time, analysis of the learning activities could indicate how learning occurs during sustained effort in a community of practice.

(4) *Introduction to Japanese*. Occasionally, the Literacy Centre offers activities that encourage literacy in general but do not fit into the traditional types of activities aimed at improving functional literacy skills. During the data collection phase an ‘Introduction to Japanese’ course was offered on Wednesdays from 5:30-6:30 pm at the Public Library boardroom. This course was offered free-of-charge to the general public but only Literacy Centre learners, staff and individuals supporting the Japanese language teacher attended this course.

I observed the class in week 2 and week 4. The first class was held before I arrived at the Literacy Centre for my second three-week data collection period. Only the instructor and I attended the class in week 3. Five learners attended the two classes. Two learners, Aboriginal women, attended the Literacy Centre regularly on a daily basis. One learner was the Director of the Literacy Centre and one was a non-native community member. The fifth participant was the instructor’s daughter who assisted her mother by translating from Japanese to English.

All phases of cognitive apprenticeships were observed during ‘Introduction to Japanese’ classes sponsored by the Literacy Centre. During these sessions, the instructional style was formal. The instructor directed the conversation and requested a student to ask standard questions. A second student was then prompted to choose a reply from a menu of responses. The instructor spoke in Japanese and prompted answers by repeating simple statements. The instructor modelled the questions and the possible responses, repeating these until there was understanding among the learners. The participants learned by listening

intently to the exchanges between the instructor and other learners. Learners approximated the simple sentences and phrases and then spoke to each other as the instructor faded. This was important as each participant knew that they would have a turn to ask questions and to respond. The learners also practiced responses based on the conversations among other learners. A list of words and phrases was displayed on a flip chart and expanded as the lesson progressed.

The learners engaged in potential real-life situations by learning how to use chopsticks during one session. The instructor first modelled how to use the chopsticks and then the students showed each other how to pick up candies through modelling, coaching and observation. The participants practiced phrases related to eating while using the chopsticks. During another session, the instructor provided origami paper to the learners and modelled the procedure for making a crane. The learners observed the instructor and other learners and then coached each other.

Thomas, an instructor and mature group member during other learning activities at the Literacy Centre, was a complete beginner in this situation. Pauline and Elizabeth, newcomers in other situations, tended to act as mature group members, because they were able to quickly pick up the sounds and word structures of the Japanese language. Elizabeth indicated that she and Pauline were easily able to make connections between Japanese and Ojibwe, their native language, “Like Nippon...it means something in my language and it means something in their language and then me and her are just laughing...I think it is fun!”

In addition to observing of learning activities and interviews with learners and instructors, I reviewed documents related to teaching and learning, and administration of the literacy programs as a part of the data collection process.

Review of documents

A review of documents related to the activities of the Literacy Centre occurred after the data collection phase was complete. Potential themes that emerged from the review of teaching materials, lesson plans, student work and promotional and administrative documents were folded into the ongoing analysis of the data obtained in the observation and interview phases. Some themes that were identified from the analysis of the documents corresponded to categories identified through analysis of other data sources.

In the documents that I collected, I found evidence of a supportive environment for learners within the Literacy Centre. Support for learners within the organization was illustrated by the Literacy Centre's mission statement which describes the organization as "client-centred", providing "free help to all adults". The 'Learn Anywhere' program brochure indicated that "adults learn at their own pace, in their own time and at their own place" with "trained mentors (who) will guide learners through learning activities according to abilities and interests". These documents support the initial theme identified, through observation and interviews, of the importance of a supportive environment in the Literacy Centre

In other cases, the information that I collected did not support the initial categories. I observed a learner working on an on-line crossword puzzle as a part of the AlphaRoute English writing curricula. This crossword puzzle had a Thanksgiving theme and the learner was asked to complete the exercise without an existing reference list of words. She worked on the puzzle using words that were familiar to her such as 'autumn' and 'pumpkin' but was stymied when she encountered a blank space for a word with 10 letters. Both her literacy mentor and I puzzled over the possibilities. We suggested the word, 'cornucopia', which did

fit into the puzzle. It was a word that the learner had obviously never previously encountered. The three of us looked up the word 'cornucopia' in the dictionary and discussed its meaning. Realizing the learner still seemed uncomfortable with this new word, I told her that, although it was a word in the English language, it wasn't really well known and was not used in daily speech by anyone that I knew.

The importance of learning in real life situations is stressed in research and theory of socio-cultural learning. It became apparent that, in this learning activity, there was a disconnect between the learner's real life experiences and the words that were being used as tools to work towards increasing vocabulary. This exercise seemed to be designed to instil information about the mainstream culture through learning vocabulary rather than to allow an individual to learn through their own life experiences.

The previous section has provided a detailed description of the unit of analysis, the Literacy Centre, consistent with a case study qualitative research methodology. This description has included an account of the learning activities that were observed, profiles of the learners, instructors and others who were interviewed, as well as, examples of documents that were reviewed. The second section of this chapter outlines themes revealed from the analysis of the data by through an analogy of entering a house of literacy learning is described.

Entering a house of literacy learning: Themes arising from the data

Four general themes emerged from the data analysis, arriving with hopes and dreams, increasing participation and engagement, developing relationships, and providing a supportive environment for learners. Together these themes can be compared to the process of successfully entering a "house" of literacy learning: (1) standing at the threshold; (2)

walking into the house; (3) sitting around the table with others; and (4) being supported in their efforts.

Standing at the threshold: "I see a great deal of hope for my life"

When an individual approaches the door of a house, they walk up to the entrance and decide whether to knock on the door. On the basis of the response they receive at the threshold, they choose to enter the house or to leave. By approaching the house and knocking on the door, they are expressing a desire for a change in their life. Every person who comes to the door of the Literacy Centre have their own purpose for making their initial visit. Whatever their reasons, these individuals hold hopes and dreams for the future when they prepare to enter.

Pauline had just left her home in a remote northern community and had moved to the town. The following passage is an excerpt from an on-line exercise in which she describes her past life and her hopes for the future,

I got married just to get out of my parents house. I quit school at this time just before I had my grade 12. My attitude had to change a lot from thinking I was worthless to knowing that I am not stupid and that 'I can do it'. I am now able to stand up for myself and only give in when I feel it is right to do so. The power of the message, 'Where There's Life There's Hope' gives me the ability to be a better parent and a better person. I see a great deal of hope for my life.

Pauline had decided to embark on a new path in a new town with a new home and a job. Although she had not previously been employed, she came to the Literacy Centre with the hope that by engaging in learning activities she would be able to obtain employment.

Pauline's dream was to work with children. She stood at the threshold of the Literacy Centre with her dream and decided to enter the next phase of her life journey.

Some individuals come to the Centre with a particular purpose. Agnes had completed Grade 9 in her home community and later obtained her GED. She felt that her skills were inadequate to enrol in a post-secondary course. She was working to improve her English language skills and to increase her self-confidence with the ultimate goal of majoring in English at college. She expressed her dream as,

I would like to come back and teach...mostly natives about English because there isn't so much of that up North. I would like to help people get a better understanding of white society. We natives have to understand the world, too, outside our community. My main goal in taking English and going to college is to help my people.

Some people come to the Literacy Centre with a purpose that is not related to employment or education. Some know that there are computers available for people to check their email or to chat online. Others come because their friends are engaged in literacy activities at the Centre. Training programs in the community or Ontario Works refer individuals who might benefit from increasing their literacy skills. Some people might come once or twice to the Centre, then leave and not return. Andrea, an instructor, suggests that individuals come to the Centre for a variety of reasons,

They are coming in to use the computer, to have a sense of somewhere where they can belong, where they can feel comfortable and relax and talk about things. They're coming to get those goals done that they need to get done.

These individuals may first come to the door of the Literacy Centre with hopes of a finding a safe place or of having a better life in the future.

Elizabeth attended the Literacy Centre as a job placement trainee with an employment training program. In this role, she acted both as a learner and as a mentor to other learners. As a trainee, she was responsible for maintaining the Centre's computers. As a learner, she participated in a variety of courses. Her dream was to have her kids, who were in care, live with her. Elizabeth wasn't taking courses at the Centre with a specific goal in mind. Rather, her purpose in attending was to "show that I am doing something and that I am trying". Participating in learning activities, she felt, would increase the probability of having her children live with her.

In summary, each individual has a learning path in their life. Some people march along their learning paths and carry their hopes and dreams to the doorway of the Literacy Centre. These hopes and dreams may relate to employment, to education or to other personal goals. These individuals may stand at the threshold and just peer through a window, or they may open the door and cross the threshold.

Walking into the house: "They've accepted me because I've accepted them"

Consistent themes that emerged from the data are related to the participation of individuals in learning activities at the Literacy Centre. The learning paths of some individuals are linear, moving directly forward; the learning paths of many other individuals are circuitous and move backward and forward as their life circumstances change.

Learners take four steps from the doorway towards participating fully in the "house" of literacy learning. Each of these four steps takes an individual further into the centre of the house. First, potential learners must feel secure both physically and emotionally. Once they

feel safe, they can begin to think about learning. Second, trust must develop between learners and instructors. Third, once trust has been established, individuals can become motivated to learn. Then, the final step involves individuals participating in learning activities with others who have similar interests and abilities.

A sense of personal safety. The development of a sense of personal security and safety is necessary before learning can begin. Thomas felt that feeling safe was the first step to having people engage in learning activities at the Literacy Centre. Individuals may be dealing with a variety of issues in their life and may not feel physically or emotionally safe. Pauline had left her home community and was living in a women's shelter until she could make arrangements to move into an apartment. Pauline was shy and preferred to work alone because she was anxious in groups. When she first started going to computer sessions, she didn't talk to the other learners because she didn't know them. When I sat down with her to talk about the narrative that I had prepared based on her interview, she was preoccupied by threats that had been made against her, and by concerns about her son's physical safety. As she read and approved the narrative, she was more interested in talking to me about these concerns rather than the content of the narrative.

Despite her reticence, Pauline attended the Centre on a daily basis and took part in all of the learning activities that were available. She talked and joked with others in her classes. Peals of laughter would emanate from a classroom whenever Pauline was present. She also assisted new learners in their class work. By the end of the data collection period, she had developed a sense of personal safety within the literacy learning community.

Individuals move to the town from many remote northern communities. In these communities, people are connected to each other in a complex web of family relationships.

When these individuals move to the town, they encounter many strangers and are initially reserved with people that they don't know. Thomas described how two learners at the Centre began to trust each other,

When they first bumped into each other at the Centre, there was eye contact and a nod, a simple acknowledgement, as they were from different communities. And now all of a sudden, the more reserved learner has said ...OK you are a part of my circle of what I can deal with...and now it has become a very open learning experience for both of them.

Without feeling safe, individuals cannot concentrate on their goals for the future or the steps to reach those goals. Thomas goes on to say, "The feeling of security comes from their relationships with others here and their feelings of comfort and acceptance from these relationships". The relationships among learners was an important factor in assisting individuals to feel of safe.

Development of trust. After a sense of personal security has been established, instructors strive to engender a learner-centred atmosphere at the Literacy Centre by respecting the learners and treating them as adults with their own goals. Thomas describes the intake process for new learners as being respectful of their lives and their motivation,

You get that over with [the intake process] but then after treating people as a person, as adults, with their rights to privacy, with their rights to their own personalities and with their right to grow at whatever speed they want to grow at. That's what we are looking at here and hoping to continue to foster...

The onus is on the learner to decide what to do with their time and the instructors support the learners in what they decide to do. Lucy considers that her role as an instructor is to take her lead from the learner. As an instructor, Lucy can offer information and help when it is requested. Many learners are shy and reticent to ask for help. “I get the feeling from them and take the lead from them about the type of help that they would like. We can sit down and work together if they want or they can do it on their own.” Rather than being prescriptive, the atmosphere at the Literacy Centre is open and flexible, and allows the learner to determine the direction he or she wishes to go at a speed that is comfortable for them.

Increasing motivation. The next step for potential learners is to begin a learning program working towards their goals. Thomas describes how he approaches individuals who express an interest in attending the Centre, “If they have accepted me because I have accepted them, they’ll allow that push to happen a little bit.” Thomas will have a discussion with the individual to determine their interests in learning. He adjusts his approach according to the personalities of the learners. Thomas indicated that one learner at the Centre does not like to be directed, while another says “Come on! Where do I go next?”

Thomas considers his role as an instructor to be motivating potential learners. He chats with them, helps them find a topic of interest, and then encourages them to engage in literacy activities.

Forming groups of like-minded learners. Learners can form groups at the Centre according to their interests and abilities. Formal courses were occasionally advertised in the local community newspaper. At other times groups formed as learners with similar interests came together informally. During the previous year, Andrea had organized the Thursday

Night Thinkers, a group that comprised four men who were improving their English writing skills. Andrea described how the group worked together,

We would generally open with, “How’s your day? How are things? and try to get caught up with people. And that can sometimes take a few minutes or it can sometimes take a whole hour... Then we would hit the books and work together on a Laubach sentence skills workbook. We created poetry and pieces of work that reflected something in (their) lives. They would post their work on an on-line environment from the Thursday Night Thinkers. Learners groups with similar interests and skill levels continued to meet for a while but eventually dissolved as the circumstances and needs of the group members changed.

Not all individuals who express an interest continue to participate in literacy learning activities. At the Literacy Centre, learners can remain at the fringes of the community or they can become more involved in literacy activities. According to Thomas,

We do have a cyclical attendance pattern with some learners. A couple was here earlier in January and are not attending now. When I looked up their files, it seems that there is a pattern of them showing up, starting here, getting into a training program, and then moving to another city.”

This couple will then return at a later time and resume their literacy learning activities at the Centre.

In summary, once an individual decides to cross the threshold, he or she steps forward into the house of literacy learning. The steps to engagement in literacy learning activities, are developing a sense of personal safety, encouraging a sense of respect for the learners, increasing motivation and then forming groups of like-minded learners. By moving through these four steps of engagement, learners increase their participation in literacy learning activities.

Sitting around the table with others: “Aboriginal literacy is all about relationships”

Once learners walk into the house of literacy learning, they notice a large table located in the middle of the room surrounded by chairs. This round table signifies the importance of relationships at the Literacy Centre, a theme that emerged from all five data sources. Ann, a former director of the Literacy Centre, explains that sitting together is very important in any learning environment, but is especially important in a native culture. Ann describes the importance of the development of relationships,

We could eat together, have coffee together, be together. I still see people that I ... worked with years ago and there is still that connection...I believe that’s how people learn. It’s through the connection, not so much through the information.

Ann explains the significance of a large round table of relationships in a house of literacy learning. She maintains that individuals learn through their connections with others, rather than through engaging with information. Andrea concurs, adding, “Literacy learning has so much to do with communication with other people and building relationships”. Lucy suggests that real friendships are developed between learners with similar backgrounds through participation in Literacy Centre activities, “Where some of these people are coming

from and meeting people with some of the same life experiences, perhaps bad life experiences, there is real friendship among the learners.”

Relationships at the Centre sometimes continue after hours. Agnes continues to socialize with her friends during evenings and weekends, “One of the girls at the Centre, I sometimes visit her at her house or watch a movie or go and eat somewhere. I do this with some of the people coming here”. One afternoon after searching all over town, this friend dropped in to the Literacy Centre to give Agnes a gift to mark three years of sobriety, an important anniversary.

Connections are made among learners who are dealing with issues or working towards similar goals. According to Lucy,

Everybody that is here is in the same boat....they are all pretty good about helping each other get through stuff. They're very supportive of each other. The people that I am thinking of in particular they've all come through some pretty bad life experiences and they're all kind of working towards a better life, so they all seem to have that common thread too. They're very supportive about other areas in their life.

Six aspects of building relationships in the Literacy Centre are apparent in the data. Respondents indicated that 1) the role of the instructor as a guide, 2) a relaxed inviting environment, 3) the use of humour, 4) a flexible approach to learning, and 5) considering the cultural values of Aboriginal learners are important conditions for the development of positive relationships. The sixth theme, that is explored, is personal changes resulting from learners' participation in the Literacy Centre community. These six themes are described below.

The role of instructor: A guide on the side. A consistent theme that emerged from the data involved the role of an instructor in an Aboriginal literacy program as a guide rather than a teacher. Both learners and instructors spoke of the friendships formed during their time at the Centre and of the importance of these relationships to the development of trust among the learners. The instructors were aware that their role was different than that of a teacher in a mainstream educational program with formalized achievement expectations. Rather than being a teacher, an instructor at the Centre was a guide and a helper. Andrea describes her view of her role as an instructor,

I see my role as an instructor as a 'guide on the side'. I took that from a paper that I read about online learning communities and learning communities in general where the instructor is no longer the 'sage on the stage' but is the 'guide on the side'. I have kept that in my mind ever since. My job is... I am here to help you... You need to want help... When you are ready, come and find me and I'll come and give you a hand.

This view of acting as a 'guide on the side' (King, 1993) was shared by the other instructors as well. Lucy describes how she perceives her role,

My role as an instructor is to take my lead from the learner to see what it is that they want to do. I can offer information and help when they want it offered. A lot of learners are shy and protective and don't necessarily want a lot of help. I get the feeling from them and take the lead from them about the type of help that they would like. We can sit down and work together if they want or they can do it on their own."

The development of a trusting relationship allows instructors to assist adult learners in the way that they wish to be helped. A 'guide on the side' approach allows learners to take ownership of their own learning at a comfortable pace. The instructors take their lead from the learners and provide assistance as would a mature group member to a newcomer in the group.

Creating an inviting environment. The social atmosphere in the Literacy Centre is relaxed and friendly. The instructors felt that an inviting environment keeps people coming back to the Centre after an initial visit. People coming to the Centre are greeted individually and asked how they are doing. Instructors said that they attempted to make the atmosphere as relaxed as possible so that the learners feel comfortable and want to stay. Andrea relates,

Sometimes registered learners come in to work on their workbooks, or to update their resumé or have seen a job they would like to apply for. I ask them how they are doing and try to make them feel as comfortable as possible.

Learners sometimes prefer to visit with other learners rather than work on their literacy goals. According to Marion, "Sometimes people come in, not necessarily to do work but to have coffee and see how people are doing. The atmosphere at the Centre is friendly, is welcoming and brings a sense of belonging." She adds that the social environment is very relaxed and flexible, "You can work at a table, writing or answering questions out of a book. If you are frustrated, you can stop for coffee and talk about it and stretch out on the couch."

The use of humour to engage learners. The instructors used gentle humour to help create a relaxed atmosphere at the Literacy Centre. The use of humour to engage learners was very evident at the Literacy Centre. Jokes and laughter were consistently present during

one-one-one tutoring as well as in group learning activities. Humorous comments were initiated by the instructors and then, as learners became more comfortable in the group, exchanged between learners. My field notes describe a Pre-GED class, “I hear peals of laughter from Pauline. The atmosphere in the Literacy Centre was welcoming and has a supportive environment”. The pervasive use of humour creates an environment conducive to collaboration.

Humour during learning activities also included gestures. For example, the Japanese language class involved mnemonics to remember specific Japanese words and phrases. For example, ‘ichi’, meaning the number ‘one’ in Japanese, would become ‘itchy’ and would be accompanied by a scratching motion on the arms of participants. When reciting numbers, this group scratching motion was accompanied by much laughter.

Instructors purposefully used humour to engage learners and to make the atmosphere as friendly as possible. Marion indicated that she used humour to provide a relaxed atmosphere with learners, “ I joke around a bit and have a sense of humour to help make things more relaxed”. Humour was used consistently during learning activities and provided a relaxed atmosphere for collaborative learning.

Not a traditional school. “When they come to the Centre, many learners might be scared of a classroom and of learning in general”, Carole says when describing how individuals are affected by previous negative experiences with traditional educational institutions. In some cases, learners have left school after only a few years of attendance. For example, Elizabeth’s last full year of school was Grade 6. She obtained only partial credit for Grade 7 and 8 and had not attended school since. Such experiences may prevent some learners in re-entering a traditional school to resume their education.

In addition to setting an inviting social tone in the learning environment, Literacy Centre staff provide an atmosphere that is different from that of a formal educational institution in order to encourage participation and collaboration among learners and instructors. Staff are sensitive to the words that are used around learning because many learners have had experiences that decrease their motivation to learn. Andrea describes the power inherent in language,

The words ‘school’, ‘learning’ and ‘literacy’ are closely related to residential school or other past negative experiences with education.

The first big step that we try to do at the ...Centre is to ensure that this is not a school environment....We want them to feel like that it is their place and they can come whenever they want. It’s not a learning institution.

Centre staff encourage a relaxed, non-institutional atmosphere at the Centre so that learners can work towards their goals without being hampered by negative perceptions of formal schooling.

Individuals coming to the Literacy Centre may lack confidence in their ability based on their previous negative experiences. Lucy acknowledges the lack of confidence in many newcomers, “A lot of people coming here are embarrassed of where their academics are at”. She indicates that it is important to respect their hesitance, and work with the learners so that they experience success. Carole adds “When they have a positive experience, and feel like they have learned, you can see the relief on their face” indicating that learners can increase their self-confidence through participation at the Centre.

Lucy works as a teacher in an elementary school and as an instructor at the Literacy Centre two evenings a week. Her views of the role of the Literacy Centre and herself as an instructor have changed during her time working with adult literacy learners. According to Lucy,

I thought that people needed to conform to a certain amount of progress because of (my) working in a school setting. Now I look at it with a different approach. It's interesting because I think they will get there, maybe not on a timeframe that I am thinking or thought that was the norm, but it's about building relationships....Here, it's in their time, but once you get that, you kind of get more trust and then they are more open to coming to you.

The Literacy Centre focuses on computer technology to attract adult learners. Thomas indicated that people who move to the town from remote northern Aboriginal communities often know how to use the internet and are accustomed to hands-on learning. He feels that using the internet as a learning tool "fits with our learners because it is very visual and hands-on." The use of the internet as a learning tool may also suit individuals who have not been successful in the traditional mainstream educational system. Thomas adds "And so people who have had a harder time being in a classroom find it much easier to be on the internet learning..... We have a group of non-readers who like it on the internet. So it has become a viable tool".

Literacy Centre staff take care to promote an atmosphere that is different than a traditional school. They avoid the word, 'school' and focus on encouraging adults in an informal environment. Learners take responsibility for their own learning and scheduling

and instructors take their lead from the learners. This creates an atmosphere in which learners decide when and what they will learn, rather than an atmosphere in which the instructors make schedules and determine the appropriate rate of progress.

A culturally appropriate atmosphere for Aboriginal learners. The learners, instructors, and the other interested individuals interviewed as a part of this study were asked about their views regarding the place of Aboriginal culture in an Aboriginal adult literacy centre. Although there were a variety of responses, a consistent theme emerged regarding what native literacy meant to them. When describing native literacy and how it differs from mainstream literacy, Ann suggested that “Literacy is a part of everything else... that is what native literacy is about. It’s not just learning to read and write”. This statement certainly indicates that native literacy, in her view, differs from mainstream literacy and encompasses all aspects of life.

The view that Aboriginal literacy involves all aspects of life was also apparent in the community as a whole. During the town’s Literacy Festival, a number of activities involved students in the elementary and high schools and as well as members of the larger community. During their Literacy Festival open house, students at the Aboriginal high school displayed a decorated birch bark canoe and paddles as a representation of “Aboriginal artistic expression as literacy” (Driscoll, 2006).

The question as to whether a holistic way of learning involving Aboriginal culture and tradition was important was interpreted in a variety of ways by the respondents. Some interpreted the question as asking whether Aboriginal religion should be a part of the Centre or whether Aboriginal traditions should be taught along with literacy activities. Others interpreted the question as asking whether an atmosphere suitable for Aboriginal learners

should be encouraged at the Centre. I was careful not to 'lead' the discussion as I was interested in how the respondents would interpret the question.

In general, the learners and instructors responded that it was not important that Aboriginal culture be a part of the Literacy Centre. As each person responded to the question about Aboriginal culture from their own perspective, there was no consistent definition of the term Aboriginal culture used in the interviews. Agnes suggested that the teaching of Aboriginal culture outside of its particular Aboriginal community is not authentic. In her view, Aboriginal culture is only authentic in the communities where the people live and follow its cultural teachings and that one can not learn the culture away from its community. According to Agnes,

I don't feel that there should be native traditions and culture at the ...Centre. I feel that you shouldn't push the culture on people, especially outsiders, you know, if they are not used to it. I don't follow the traditions myself. If people feel that they want to learn about the culture, they could go back up north to learn more. That's what I think...that anything that is brought outside the community, like for the north, and brought to a community like this that is predominately white, and they bring the culture, it's somehow commercialized. It's my belief, you know, that you need to live among the people to really know what's going on...

In her view, the Literacy Centre is located in a predominately non-native community and, as such, the Centre is unable to reflect authentic native culture.

Thomas suggested that an Aboriginal adult literacy program with a holistic culturally appropriate perspective worked well in a neighbouring First Nation's literacy program

because the program has a clear goal, that being to improve the life of the community and its residents. The Literacy Centre differs from that type of native literacy program in that it welcomes native peoples from many different communities and the focus is on personal development rather than the development of the community as a whole.

Ann, the former director of the Literacy Centre, offered another view. She suggested that more people might attend learning activities if cultural teachings were offered at the Centre, "It has been my experience that quite often people are looking for that". She suggested that native culture at the Centre could be promoted by offering instruction on topics such as hunting and trapping and other information that is relevant to native communities. She was also concerned that topics such as stress management or time management "came from a different place and were not relevant to native culture here". In her experience people were often looking for native culture to be present, but not necessarily to be formally taught, in a learning setting.

Andrea, indicated that culture, in a general sense, is always present in any classroom. As a non-native person, it is important for her to be aware that the mainstream culture is naturally a part of teaching and learning in a classroom. She feels that it is important to examine how she and other instructors interact with learners at the Literacy Centre and to include an Aboriginal way of doing things, rather than just going along with the mainstream way because it is familiar. She mentioned that as a non-native person, she looks directly into the eyes of people when she speaks to them. For Aboriginal people, this is considered to be impolite. The instructors at the Literacy Centre are aware of this tradition and have changed their behaviour in this regard.

Andrea suggests that many of the special characteristics of the Literacy Centre are grounded in the Aboriginal culture or way of being. These characteristics include having a comfortable atmosphere and a social environment in which people are friends and where humour is used. Learning expectations, although concrete, need to be broad and somewhat flexible to account for life's other priorities, "there's going to be a funeral, there's going to be a community event, there's going to be a celebration that's going to take precedence over that learning that you are trying to get done". Individual differences need to be acknowledged and individualized learning needs to be provided.

Instructors in native literacy must ensure that individualized programs for learners are simple and user friendly as learners are easily frustrated. Similarly, when people first enter the Centre, there needs to be a soft entrance with no pressure. If the first impression is not comforting, an Aboriginal learner may get frustrated and may not return.

Once an individual decides to stay in the house of literacy learning, they develop relationships with the instructors and other learners. The social environment is inviting and learners are treated as individuals who determine when and how they would like to learn. They sit around a table with the others around the table that represents a community of literacy practice.

The following section describes accounts of former learners who have experienced personal changes as a result of their participation in a community of literacy learners. Through their experiences of increasing their participation in learning activities, 'walking into the house' and then developing relationships in an inviting environment, 'sitting around the table', these learners have experienced personal transformation.

Personal transformation through participation. The instructors related stories of learners whose lives had changed through participating in learning activities at the Centre. These former learners not only acquired knowledge and skills to obtain employment but also experienced an increase in self-confidence that allowed them to lead changed lives. For individuals who have never held a job, have only lived in subsidized housing or depended on social assistance, changes that result from participation at the Literacy Centre are substantial and life altering. The stories of three former learners, Shelly, Jesse and Norma are recounted in the following section.

Shelly is a former learner whose life changed through her experience with programs at the Literacy Centre. While participating in an employment training program at another organization, her instructors suggested that she obtain additional assistance in literacy. When Shelly first came through the door at the Centre, she was so shy that all that she could do was to say “Hi” and then leave. Thomas, the Centre’s director describes Shelly’s time at the Centre,

Then gradually the contact time became longer and longer. The group she was with allowed her to go for dyslexia training... And that was exactly, what this girl needed... this girl started a learning program with one of the instructors based on the dyslexia books. Wouldn’t let me in the room. Didn’t want anyone to hear her, had absolutely no confidence in herself. At the end of the second month, the instructor... and the girl came and asked me to come into the learning room so she could show me what she’d learned... the third month, her learning experience completely opened. So the first month she could hardly say

hello and...(she) felt she was a complete outsider to the world. Couldn't talk to anyone, couldn't read or write. The third month, she found out all that learning was locked in her brain, behind dyslexia triggers. She went from being a level 1, can't read or write, to basically reading and writing at a high school level. It was all just locked in there and the few keys she got helped her unlock that. And the fourth month, she acquired a boyfriend. The fifth month they moved in (together). She got a full time job, started working 7 days a week. She became an extremely happy bubbly personality. And now they moved to [a larger centre]. I bumped into them, in the fall, on a bus. Talked to them both. And here's this girl who couldn't say hi to anyone and she's talking to me in a different city, on a bus, full of strangers, with her boyfriend, rented an apartment, she's getting a job, she's looking for other experiences.

Through her participation at the Literacy Centre, Shelly not only increased her skills in reading and writing but also opened herself to life's experiences. Her story is about a literacy learner experiencing transformation through participation at the Centre.

The changes in the lives of some former learners have been dramatic. Jesse was referred to the Literacy Centre from Ontario Works, the Province of Ontario's social assistance program. To help recipients in obtaining employment, Ontario Works provides temporary financial and employment assistance to those who are able to work. This assistance includes referrals to adult literacy providers if an individual's reading writing or math skills are not sufficient to find or keep a job.

Jesse never had a job and lived in subsidised housing. He liked coming to the Literacy Centre. He attended regularly and worked hard at improving his English and his math skills. The Centre staff arranged a co-op placement for him at a local garage when he decided he wanted to work as a mechanic. It was explained to the garage management that, although his reading skills were at a very low level, he was actively working to improve them and that he would benefit from verbal rather than written instructions. Jesse has been working steadily at this garage for nearly a year. He rents an apartment and now has a girlfriend and a baby on the way. As Andrea relates, “He is a success story where he came in with nothing and the experience has completely changed him. He comes by to chat because he is grateful in that he knows the part that the (Literacy) Centre played in the fact that he is successful and on his own now”. His experience with the Literacy Centre’s programs has completely changed him from someone who had never had a job to someone who has a bright future.

A young woman from a neighbouring community has attended the Literacy Centre off and on and is now living in Western Canada. Last year, she became very motivated to finish high school and completed two Grade 12 credits while dealing with her addiction issues. Thomas relates, “And so you see that motivation and you see the people learning and attempting to change their lives. And they want to get an accomplishment somewhere. And basically I’m looking at our type of organization becoming more and more a way of finding something that any individual can accomplish so that they can feel that confidence to go and try something else”. Although she continues to deal with the challenges of substance abuse, members of the Literacy Centre community saw changes in Norma’s life through increased participation in Literacy Centre activities.

In summary, instructors related stories of former learners who had transformed their lives through participation in literacy learning activities at the Centre. These learners not only increased their literacy skills but changed their view of themselves in the community. They were able to find and keep employment, increased their self-confidence and worked towards achieving their dreams.

Supporting a community of learners: "To help people prepare for the next step... to help people empower themselves."

For learning to occur in this community of learners and instructors, support from a variety of sources is required. This support could be described as the floor on which the table rests in the house of literacy learning. If any of the floorboards were to weaken or break, the literacy table and chairs would tilt, creating an uncomfortable environment for developing relationships and for learning.

Support from the Literacy Centre. The Literacy Centre is a non-profit organization that originated under the umbrella of an Aboriginal employment training program in the late 1980s. The town's Friendship Centre originally sponsored this training program, which included literacy as an integral part of its activities. At that time, the employment training program's mandate was to improve the employability of young Native people between the age of 18 and 25 through life skills, driver education and basic upgrading in English and math (Ministry of Education and Training, 1993).

In 1991, the Literacy Centre became an independent non-profit organization. Board members of this community organization have a personal commitment to adult literacy learning, in general, and assisting community members in literacy learning in particular. Carole, a long-time member of the Board of Directors describes the satisfaction that she feels

as a volunteer with the organization, “When you see a person who can’t read going to the Centre and learn, that is the greatest gift a tutor or a teacher can receive. Everyone should be able to read and write. That’s everyone’s right.”

Staff members assist learners in scheduled activities at the Literacy Centre, at a satellite classroom in a nearby community, and also respond to unscheduled requests for assistance. Staffing levels depend upon funding levels. During the study period, the Centre employed a coordinator/instructor, a full-time distance education instructor, a part-time instructor, a part-time mentor/administrative assistant and a summer student.

Support from the funding agency: The LBS program. Support from the LBS Program is critical to the success of learners attending the Literacy Centre. In 1991 the Literacy Centre obtained funding from the Native Stream of the LBS Program to provide locally-developed literacy activities that respond to community needs. The LBS Program supports learners at the Literacy Centre by funding literacy, numeracy and essential skills training that help individuals achieve their goals involving further education, employment or increased independence (Ministry of Training Colleges and Universities, 2007) This literacy training is free of charge and focuses on adults whose literacy skills are below Grade 9 in the Ontario Curriculum.

The LBS program funds activities in four streams or areas: Anglophone, Francophone, Deaf and Native. Ontario is the only province that provides funding aimed specifically at Aboriginal people (Johnny, 2005). Native literacy programs were initiated in Ontario to address cultural needs and the functional literacy needs of Aboriginal people through the Native Community Branch in the Ministry of Citizenship and Culture in 1986. These programs focussed on the cultural aspects of aboriginal literacy and were well

established by the time the Ministry of Skills Development assumed responsibility for literacy programs in 1988 (Johnny, 2005). Today, the Native Stream of the LBS Program focuses on functional literacy skills to help individuals attain their educational and employment goals. Responding to LBS priorities, the Literacy Centre has increased its emphasis on preparing adults for employment and further formal education. Family literacy activities provided by the Literacy Centre in the 1990's have since been discontinued.

Individuals can come to the Literacy Centre with particular goals in mind. For those who wish to find employment or to increase skills to obtain their GED, the stated goals of the LBS program fit with their objectives. For individuals whose goals are less well defined, the LBS priorities of increasing employability do not necessarily fit with these learners' objectives for attending the Literacy Centre. Thomas, when describing the tension between the goals of the funder and the goals of the learners, points out,

You know the messages from the funders are completely mixed up...

The funders say that if you come here, you have to want a job. The learners don't want to be told what they have to want. So there is a conflict between the funding direction and the people coming in.

In spite of the LBS priorities, the Literacy Centre continues to provide programs and services, not funded by the LBS Program, that it sees as being priorities in the community. These activities include a spelling bee for children during the town's summer festival, a Trivial Pursuit evening during the town's Literacy Festival and the Introduction to Japanese course observed during the data collection period. They are offered as public relations activities to increase the profile of the Literacy Centre among the residents of the town and as a 'hook' to motivate individuals to participate in other Literacy Centre activities.

Although the Literacy Centre receives funding through the Native Stream of the LBS Program, the Centre is open to all community members who wish to increase their skills. During the data collection period, nearly all of the individuals attending the Literacy Centre and its programs were of Aboriginal ancestry. The LBS Program is the Literacy Centre's major funder. Without this source of funds, the Literacy Centre would not be able to continue to provide literacy services to community members.

Support from the community. As the proportion of Aboriginal people living in the town has increased over the past thirty years, educational programs to serve the needs of Aboriginal adults have proliferated. A total of eight organizations, including the Literacy Centre, provide educational services to Aboriginal people in the town and surrounding area. Cooperative relationships have developed among the organizations, which provide a supportive environment for adult literacy learners at the Literacy Centre and in the community.

These cooperative arrangements include organizations partnering in the provision of adult education programs and working together to increase the profile of literacy learning in the community. At the time of the data collection period, three organizations collaborated with the Literacy Centre to provide programs for adult learners. Confederation College, offers a variety of college-level courses in small communities in North-Western Ontario. The College partnered with the Literacy Centre to provide a distance education Teacher's Assistant Certificate Training (TACT) program.

The town's Friendship Centre partnered with the Literacy Centre to provide a pre-trades employment training program. During this training program, the Literacy Centre provided adult literacy services to the participants. These services included assessing the

participants' reading and writing levels, leading basic sessions in recognizing important words in the workplace, and assisting participants, if necessary, when they wrote examinations. In addition, the training course participants attended pre-GED courses at the Literacy Centre.

The March of Dimes employment preparation program, Achieving Success, was housed within the Literacy Centre. The program participants were encouraged to make use of the Literacy Centre's services and the instructor used the Literacy Centre's resources when she covered job search techniques in the program curriculum. For example, the participants used the Literacy Centre's ResuméMaker software to develop cover letters and resumés to assist in their search for job placements.

The local First Nations Education Authority initiated a community Literacy Festival which has since grown to become a community-wide event held each January, that involves both the elementary and high schools, and organizations involved in adult education. The festival's literacy activities include not only events promoting functional literacy such as a spelling bee and a Scrabble tournament but also events promoting a social view of literacy. During the data collection period, First Nations High School students displayed a decorated traditional birch bark canoe and paddles during the school's literacy open house as a manifestation of "Aboriginal artistic expression as literacy" (Driscoll, 2006).

During the Literacy Festival, I attended an evening literacy event held in the public elementary school gymnasium. Many children and their parents attended and participated in a variety of literacy activities, such as games and storytelling, in a festival-like atmosphere. Displays promoting family literacy and describing learning disabilities provided information

to parents in an entertaining manner. The Literacy Centre's information display describing their programs, was located at the school's entrance and included free helium balloons for all.

The community of adult learners at the Literacy Centre is supported by the Centre's non-profit community organization, its funding agency and other organizations involved in adult learning in the community. These supports may not necessarily be evident to learners on a daily basis, but without these supports, the activities of the Centre could not continue.

In summary, the metaphor of entering into a house of literacy learning was used to describe how learners become a part of a community of literacy practice. Literacy learners come to the house of literacy learning with their hopes and dreams for the future. They stand on the threshold and make a decision to enter. As they walk into the house, they increase their sense of personal safety and their participation in learning activities. The relationships among learners and instructors was key to the development of a community of literacy practice. The importance of the development of relationships is depicted by community members sitting at a round table in the room. Strong positive ties among learners and instructors allowed learning to occur through connections with others rather than through content. Finally, the Literacy Centre organization, its funding agency and the general community are essential supports to the literacy learning community as floorboards are to the house of literacy learning.

CHAPTER 5

Discussion and Contributions.

This chapter discusses the findings of the study in relation to the research question, the sub-question and contributions to research, policy and practice. First, the research questions and an expansion of our understanding of concepts related to collaborative learning are addressed. Then, a discussion of how the study's findings could contribute to research, policy and practice, as well the limitations of the study follow.

The study's findings indicate that collaborative learning occurs in an Aboriginal adult Literacy Centre through a process of entering into and becoming a part of a community of literacy learners and instructors. A metaphor of entering a house of literacy learning was used to describe how learners become a part of a community of literacy practice. Initially, an individual comes to the literacy program with hopes and dreams for the future. Then a potential learner becomes comfortable in the literacy centre environment. He or she feels safe, is respected as an adult, becomes increasingly motivated, and then, if the conditions are right, joins with others in learning groups. In an inviting environment that is different from a traditional school, learners and instructors develop positive relationships. Learning can then occur through connections with others. The literacy organization, the funding agency and other partnering groups in the community support the community of literacy learners.

The following section describes how collaborative learning occurs in an Aboriginal adult literacy learning environment, the principal research question of the study. A clear picture of collaborative learning has emerged after considering the data from Rogoff's perspective of cognitive development through activity. A sub-question posed in the study was 'What are the factors that encourage collaboration in an Aboriginal learning

environment?’ Three factors that encourage collaborative learning in this setting, the instructor’s role as a guide, the use of humour to engage learners, and the provision of a culturally appropriate environment for Aboriginal learners will be discussed.

Can Rogoff’s perspective help to explain how collaborative learning occurs?

Rogoff’s perspective of cognitive development in a socio-cultural context was a useful guide in the design of this study (Rogoff, 1995). Cognitive development in a socio-cultural context involves three components of learning by participating in an activity: the personal, interpersonal and the community (Rogoff, 1995). In the conceptual context of this study, I suggested that the concept of communities of practice was related to the community plane, that situated cognition was related to the personal plane and that the concept of cognitive apprenticeships was related to the interpersonal plane of analysis. Collaborative learning, the focus of the data collection and analysis, occurs primarily in the interpersonal plane. To understand the interpersonal dimension, it is important to gain a sense of the personal and the community as well, as no aspect can be studied in isolation. By considering collaborative learning from Rogoff’s perspective, I was able to consider various aspects of learning in this study.

Looking along the personal plane of analysis

The personal plane, as described by Rogoff (1995), refers to individuals transforming their understanding through participation in learning activities. In Rogoff’s view, participatory appropriation is the “process by which individuals transform their understanding of and responsibility for activities through their own participation” (Rogoff, 1995, p. 150). Participatory appropriation involves changes in an individual that result from participation in an activity and is related to the concept of situated cognition.

Participatory appropriation in learners at the Literacy Centre was difficult to identify during observation and learner interviews during the relatively short duration of the data collection phase of the study. Although the questions asked during interviews with learners were designed to elicit information related to participatory appropriation, little evidence of personal changes were detected. The learners were unfamiliar with the formal interview process and may have been self-conscious in their responses. They may also have been unaccustomed to reflecting on the changes that learning may have precipitated. As a result, they had little to offer regarding how changes in their lives derived from participating in literacy learning activities. During her interview, Pauline spoke about her immediate concerns about personal safety and about her feelings of anxiety in groups, rather than focussing on how her life may have changed through her experience at the Literacy Centre. If I had returned a few months later, Pauline may have been more settled in her personal life and able to reflect upon this question.

Certain changes in learners' behaviour, such as more frequent attendance and an increased level of interest, pointed to potential participatory appropriation occurring on a personal plane. If a learner is drawn to the activities of the Centre, they will attend more regularly. Over three weeks, Elizabeth's participation in learning activities increased and she engaged in many types of learning activities at the Centre. She felt that taking part in learning activities in a positive environment was helping her to realize her goal of having her children return to live with her. Increased attendance and widening interest of learners may indicate that participatory appropriation is occurring.

The instructors related stories of previous learners whose lives had changed through participation in the Literacy Centre community. Initially, Shelly, a former learner, was very

reticent to come in the door of the Centre. As her participation in literacy learning activities increased, she not only improved her skills in reading and writing but also became an outgoing bubbly person with a job and a steady relationship. Jesse, another former learner, realized his goal of working as a mechanic in a local garage as a result of his participation in literacy learning at the Centre. Thus, evidence of participatory appropriation was found in these stories of former learners who had experienced life changes through participation in literacy learning activities.

In summary, evidence of participatory appropriation on a personal plane of analysis was difficult to find in the interviews and observations of learners in this study. Personal changes may be difficult to determine in learners during the relatively short period of time of this data collection period but may be evident in data collected from a study that occurs over a longer time period. Instructors, however, related stories of former learners who had transformed their lives through participation in literacy learning activities. For some former learners, participation in literacy learning activities at the Centre has opened up a new world of possibilities. Thus, evidence was gathered that pointed to participatory appropriation among learners at the Centre.

Situated cognition. Situated cognition refers to the changes in individuals that occur as a result of social interactions within a community. Brown et al. (1989) suggest that cognitive skills such as thinking, representing, and planning can be acquired through engaging in activities of a particular culture or community. When describing the concept of situated cognition, Brown et al. contrast situated cognition with the process of gaining knowledge through classroom activities that are not related to real world situations. They suggest that learners undertake learning activities that are “embedded in the world” (p.41),

rather than engage in traditional classroom activity bearing no relation to how these concepts are actually used in the real world.

The Literacy Centre participants participated in real-life activities during some of their learning activities. For example, during the computer literacy classes, individuals learned about email, instant messaging and how to use an internet videoconferencing camera. Since the duration of the data collection phase was relatively short, little evidence of situated cognition was found during observations of these real life situations among learners. As well, most of the learning activities observed during the study were classroom-based activities rather than real-life situations. Learning activities at the Centre were often designed to improve an individual's literacy skills so they could obtain employment or further their education. During these classroom-based activities, situated cognition would not have occurred as these activities were not necessarily related to real life activities of the community. Longer observations of real-life learning activities in future studies could perhaps lead to a greater understanding of situated cognition in an Aboriginal adult learning environment.

Learning materials reflecting real-life situations encourage cognitive development among Aboriginal adults. In an Aboriginal learning setting, it is important to assess learning materials to ensure that they reflect the actual way of life of the learners. Some of the learning materials reviewed in this study did not reflect the real life experiences of the learners in the community. Learning to spell the word 'cornucopia' in an online crossword puzzle about the Canadian Thanksgiving holiday provides information about the mainstream European culture, but does not reflect the learners' cultural experience in this community.

The lack of learning materials reflecting the lives of Aboriginal learners is a barrier to determining whether situated cognition occurs in this setting.

Evidence of a moderate alignment between the personal plane of analysis, participatory appropriation and the concept of situated cognition, in Figure 1, was found. Further investigation is needed to determine whether the concept of situated cognition can be used to describe cognitive development among Aboriginal adult learners. As the data was gathered during a defined period of time, evidence of participatory appropriation may perhaps be found in a phenomenological or ethnographic study involving adult learners during a longer period of time.

Looking along the community plane of analysis

According to Rogoff (1995), cognitive development occurs through activity in a community. To gain an understanding of collaborative learning from the perspective of the community plane, it is important to consider the participation of learners in the Literacy Centre community. In focusing on the community, Rogoff uses ‘apprenticeship’ as a metaphor to describe the structuring of activities so that newcomers can participate more fully in activities, thereby becoming mature members of a community (Rogoff, 1995).

Learners moved along a continuum from newcomer to mature group member as they increased their participation in literacy learning activities. Newcomers to the Literacy Centre community encounter new people and new information through their learning activities. At the beginning of the data collection period, Pauline was shy and preferred to work alone. By the end of the data collection period, she had moved along the continuum from newcomer to mature group member. Elizabeth also moved towards being a mature group member during the study. Coming to the Literacy Centre, she had an interest in computers and became

comfortable in sharing her knowledge with others who would drop in on a casual basis. As she became more comfortable within the literacy learning community, she helped others when they encountered difficulties. Agnes, a mature group member, had been coming to the Literacy Centre for more than a year. She encouraged a friendly and inviting atmosphere by chatting with learners who had dropped in on an informal basis and helping them with their tasks. Pauline, Elizabeth and Agnes moved towards becoming mature members of the literacy learning community through participation in the literacy learning activities.

Learners moved from newcomer to mature group member and back, depending on the situation. The Japanese language class was a new experience for all of the participants, thus everyone in this group was a beginner. No learner acted as a mature group member because of the lack of Japanese language skills. There was, however, variation as to who took on the role of newcomer and mature group member in this class. The mature members of this group tended to be individuals who had previously learned a second or third language, rather than those with only strong English language skills. Elizabeth and Pauline, who often acted as newcomers in other literacy learning activities, were mature group members in this situation. They were able to easily make connections between words that they knew in Ojibwe and Oji-Cree and the new Japanese words. Thomas, an instructor who generally acted as a mature group member in other situations was a newcomer in this situation, relying on the mature group members for verbal prompts.

In summary, strong evidence was found of the concept of apprenticeship, as described by Rogoff, in the community plane of analysis. Though increased participation in literacy learning activities, newcomers to the community moved towards becoming mature group members. Individuals could change their role in the literacy learning community,

moving from newcomer to mature group member and back, depending on the learning situation. Mature group members not only assisted newcomers in class work but also helped in creating a warm and inviting environment.

Communities of practice. Adult literacy learners became members of a community of literacy practice through participating in the Literacy Centre's activities. Once I began the data collection phase at the Centre, I realized that I needed to expand my focus. Initially, I planned to investigate how learners in a literacy class become a community of practice over time and how the formation of this community assists in learning. But I soon realized that the Centre itself operated as a community of practice. Learners and instructors participated in a variety of formal classes and informal tutoring sessions but were all a part of the literacy learning community. Once I expanded my focus, I considered how cognitive development occurred through the community plane of analysis in the Centre.

Wenger suggests that a community of practice has three defining characteristics, a domain, a community and a practice (Wenger, 1998). A group of people share a common purpose and are committed to learning in a particular subject area or domain. Individuals come to the Literacy Centre to increase their skills in reading, writing and other academic subjects, the domain of the Centre. Members undertake shared activities in their joint learning and form a community. All of the learning activities, including the organized classes and informal tutoring, are the shared activities of this community. Finally, through sustained effort over a period of time, members of a community of practice develop a 'shared repertoire of resources' such as common experiences, stories, tools and vocabulary (Wenger, 1998). The shared repertoire in the community of practice includes the written

work, the in-jokes shared amongst learners and instructors, and the tacit knowledge that is shared among learners informally.

Constraints to learning in this community of practice. Rogoff suggests that learning in the community plane of focus includes institutional and cultural constraints, such as the policies for enrolment in adult education programs, cultural tools, such as pencils, software and language systems as well as jointly-held values about how a group works together (Rogoff, 1995). Institutional constraints in this Literacy Centre community included the tension between the funding agency, the LBS Program and the Literacy Centre. In recent years, the LBS program has moved towards a functional view of literacy. In the Native Literacy stream, there is an increased emphasis on improving skills for employment among adult learners and a movement away from family literacy and native cultural aspects of literacy (Johnny, 2005). It remains to be determined whether functional literacy skills match the objectives of participants.

The LBS Program has increased the administrative requirements related to assessing and tracking learners' progress towards their goals. The issue of increasing administrative requirements of native literacy programs was described by Johnny,

The emphasis on contact hours as a measure of success...rigid policy guidelines on client reporting and tracking, time consuming administrative procedures including monthly reporting mechanisms which are mandatory for participating in community literacy planning processes all place a high burden on practitioners. (Johnny, 2005, p.

48)

The increased administrative requirements at the Literacy Centre were seen by the Centre staff as an impediment to learning, as they spent their time creating and maintaining records rather than responding to learner needs.

Collaborative learning was described by Beder and Medina (2001) as an important factor in contributing to learning in adult literacy programs. In their investigation, collaboration among learners assisted in developing a sense of community which contributed to program completion and academic success. The authors suggested that the sense of community in an adult literacy program was negatively affected by enrolment turbulence, or continuous changes in group membership, a common characteristic of adult literacy programs. Enrolment turbulence, the authors maintained, “made it difficult for teachers to use complex teaching methods, such as project-based learning or peer coaching because the membership of learner groups was so unstable” (p14). The learners participating in learning activities at the Literacy Centre were not placed into formal classrooms as were the students in Beder and Medina’s study. However, the variation in learner participation found at the Centre is similar to enrolment turbulence, described by Beder and Medina and is considered a constraint on the community of literacy practice.

The Literacy Centre responds to a wide range of literacy needs in the town. Programs designed to improve functional literacy skills are funded by the LBS program. As well, the Centre continues to provide programs and services suited to a broader definition of literacy. Participating in the town’s annual Literacy Festival, hosting a community spelling bee and offering Japanese language courses are ways in which the Center responds to the broader literacy needs of the community. It is important for the Centre to continue to consider not

only the functional literacy needs of its community members but also the community's social literacy needs.

Cultural tools in this community of practice. Technology was used as an inducement for people to come in the door of the Centre and as a tool to motivate learners. People in the community knew that computers were available at the Centre to use in job searches or to communicate with friends. After individuals became comfortable coming to the Centre to use the computers, staff encouraged them to 'sign up' and engage in learning activities.

Computer technology was seen to fit well with Aboriginal learners coming from the northern communities because many people were already familiar with using the internet and are accustomed to hands-on learning. Also, the use of computers and the internet as learning tools may suit adults who have had previous poor experiences with the mainstream educational system.

By responding to community needs, the Literacy Centre is able to offer some programs and services that fit locally. The Centre's ability to identify and respond to community needs, even to a limited extent, is important in increasing the profile of the organization and in developing partnerships with other organizations.

Legitimate peripheral participation. Learners in this community of literacy practice act as 'legitimate peripheral participants', as described by Lave and Wenger (1991). Some newcomers to this community participate at the margins of the community of literacy practice. They may attend for a while, leave and then return. Other newcomers become more involved in a variety of the learning activities offered at the Centre and eventually become mature group members through increasing attendance and interest.

The alignment between the community plane of analysis, Rogoff's concept of apprenticeship and the concept of communities of practice was found to be strong. The participants and staff of the Literacy Centre are a community of practice. Learning within a community of practice can be affected by constraints such as relationships between the Centre and its funding agency, as well as, cultural tools such as computers and internet technology. The development of relationships among group members within a community of practice is central to cognitive development through participation in learning activities.

Looking along the interpersonal plane of analysis

Interaction among group members is integral to cognitive development through activity, the interpersonal plane of focus. Rogoff describes the concept of guided participation, a process in which people interact by observing and participating in community activities (Rogoff, 1995). Guided participation is similar to the concept of cognitive apprenticeship, a process by which mature group members assist newcomers in learning activities. Through the analysis of the data, initial patterns of guided participation in an Aboriginal adult learning setting emerged. Moreover, cognitive apprenticeships are an important component of guided participation at the Literacy Centre.

Cognitive apprenticeships. Analysis of interactions among learners and instructors through the interpersonal plane of analysis increases our understanding of how collaborative learning occurs in this community. Rogoff describes guided participation in the interpersonal plane as a process in which people interact by observing and participating in community activities (Rogoff, 1995). Cognitive development occurs as individuals become mature group members through their interactions with both peers and experts. Cognitive

apprenticeships, a particular form of guided participation, focus on an individual's learning from an expert (Taylor et al., 2003).

All phases of cognitive apprenticeships, (1) modelling, (2) approximating, (3) fading, (4) self-directed learning and (5) generalizing, described by LeGrand Brand et al (1993), were observed among learners and instructors during learning activities at the Centre. Consistent with previous studies, collaboration involving peer modelling, mentoring, scaffolding and coaching were essential factors in the formation of communities of practice at the Literacy Centre (Taylor et al., 2007; Taylor et al., 2003). The study's findings indicate that learners moved through the five phases of cognitive apprenticeship towards self-directed learning through increased participation. In both Taylor et al.'s early organizing framework (2003) and model of collaborative learning (2007), learners experienced a shift from guided participation to independent learning. The movement towards independent learning in this framework occurs in an environment where the instructor, philosophically oriented towards cooperation, adopts collaborative teaching strategies and encourages teamwork among learners. Independent learning in this model, may then lead to a personal transformation.

In this study, some evidence of self-directed learning was found. After a computer session about using web cams and microphones had been completed, learners then practiced how to conduct a video and audio conference with friends in another location. This involved troubleshooting when the equipment did not work properly. At times, learners also engaged in activities independently, pursuing their own interests. However, another similar investigation conducted over a longer period of time may detect different evidence of independent learning in this setting. Evidence of personal transformation in the personal

plane was limited. Thus, it is not known if self-directed learning in an adult Aboriginal literacy centre leads to personal transformation among learners.

A metaphor of entering a house of literacy learning was used in this study to describe how learners became a part of a community of literacy practice. This metaphor is similar to the organizing framework for peer collaboration proposed by Taylor et al. (2007). In this framework, the 'collaborative learning set up' is the basis upon which the factors that encourage collaborative learning rest. In this investigation of an adult Aboriginal literacy program, the set up for collaborative learning is a safe and supportive learning environment in a non-traditional educational setting.

In Taylor et al.'s model of collaborative learning (2007), an instructor's predisposition towards collaboration and leadership style is considered to be "central to developing a community of learners" (p.7). Similarly, the instructors' role at the Literacy Centre was found to be an essential factor in encouraging the development of a community of learners. In this literacy program, the instructors acted in a collaborative manner by assisting individuals in their learning journeys, rather than taking on the traditional role of a teacher; acting as a 'guide on the side' rather than a 'sage on the stage' (King, 1993). To provide a comfortable and inviting environment for Aboriginal learners, the instructors intentionally used humour to engage learners and strived to provide an atmosphere congruent with Aboriginal culture.

Although, Taylor et al.'s model does discuss the importance of teamwork in peer collaboration, the importance of interpersonal relationships is not mentioned. The present study's findings indicate that developing positive relationships is a prerequisite in collaborative learning in an adult Aboriginal setting. Development of relationships among

instructors and learners may not only be important in Aboriginal settings, but perhaps is also significant in other cultural settings. Future studies of collaborative learning should investigate how the development of positive relationships contribute to collaborative learning in adult literacy learning.

In summary, strong evidence was found of guided participation in an interpersonal plane of analysis. Cognitive apprenticeships, a form of guided participation were found to occur during every learning activity observed. I wondered, however, if the concept of guided participation in Aboriginal communities described by Rogoff (2003) could expand the concept of cognitive apprenticeships among adult literacy learners.

Patterns of guided participation in an Aboriginal setting. Rogoff suggests that the characteristics of guided participation can vary among communities (Rogoff, 2003). In the planning of this research study, I speculated that guided participation at the Literacy Centre would follow the traditional forms of guided participation that are present in Aboriginal communities. In particular Rogoff described the following as behaviours characteristic of guided participation in Aboriginal communities, (1) learning by 'listening in', (2) intent observation and pitching in, (3) engagement in real-life community activities, (4) respect for silence and (5) conveying indirect messages in stories.

During the observations of the computer literacy courses at the Public Library, I recorded instances of some but not all of the behaviours suggested by Rogoff. The computer literacy courses were conducted over a relatively long period of time. Patterns of guided participation could therefore be observed over a period of weeks in the Literacy Centre community of practice. This is in contrast to other learning activities in which the groups were observed for shorter periods. When the instructor was assisting a learner with a

procedure, such as how to set up VoIP, other learners would stop what they were doing to 'listen in'. They would often ask questions about the procedure to gather information. Also, the individual learner who acted as the 'listener' varied according to the particular task. There seemed to be no pattern as to who acted as a mature group member or the newcomer, the 'listener', during the observation period.

Learners observed both the instruction and the actions approximated by others intently. Learners did not look directly into the eyes of the instructor while watching how to conduct a new procedure. They also carefully observed the steps involved in writing and sending emails and instant messages. Sometimes, two learners shared one computer; at other times, the learners watched while their neighbour completed a task. Learners engaged in real life activities including setting up an email account, sending and receiving messages, attaching photos to messages and downloading music and burning a CD. The learners participated enthusiastically in these activities, and, in some cases, continued the activities at the Literacy Centre on their own.

Rogoff (2003) suggested that respect for silence is a characteristic of guided participation in communities that follow traditional Aboriginal ways of learning. In Aboriginal communities, silence has a greater value than in mainstream communities. In a literacy learning activity, a respect for silence might mean that an individual is free to try something new on their own without suggestions or spontaneous offers of assistance from a mature group member. In traditional forms of Aboriginal learning, an individual learns through 'listening in' and intent observation of real-life situations and then approximating the action on their own. The learner attempts to perform the task repeatedly and learns

through trial and error. The mature group members in this situation values silence and will not offer suggestions and assistance unless asked.

A consistent pattern evident in the data was that both instructors and learners were hesitant to take the lead in showing or telling individuals what they should do or how they should do it. Rather, the instructors allowed individuals to determine what they wanted to learn. The learners decided how they wanted to approach their learning and then asked for assistance. Initially I did not recognize that this reflected the ‘respect for silence’ described by Rogoff. But after finding that this pattern of behaviour was evident in all of the data sources, I realized that waiting for individuals to take the lead in their own learning was in fact the result of a ‘respect for silence’.

Illustrating lessons through story-telling is a traditional form of guided participation in Aboriginal communities. In an Aboriginal setting, when a mature group member tells a story, it is left to the newcomer in the group to choose to take what they want from the story. Newcomers can gain an insight into their current situation based on the story or they can decide not to reflect upon it. Elders share stories in a variety of Aboriginal learning settings in Canada. This traditional form of guided participation is also evident in Aboriginal workplaces and other learning environments.

Telling stories to convey a lesson was not observed during literacy learning activities or referred to in any of the other data sources. Perhaps this behaviour, does occur at the Literacy Centre, either in class or among literacy learners in general. If not, it may be that non-native instructors, although aware of the importance of adapting their teaching practice to this situation, may not naturally be silent rather than talk or to tell stories to indirectly make a point.

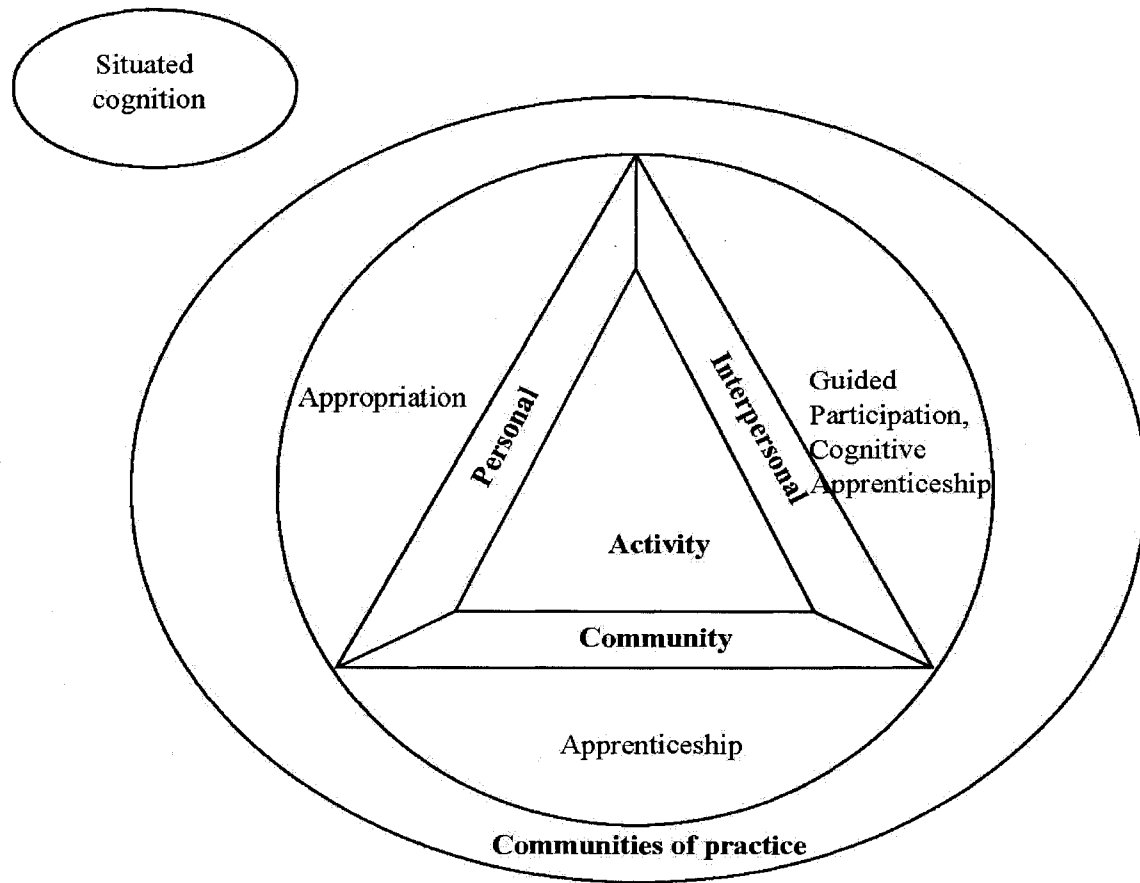
Most of the patterns of guided participation suggested by Rogoff (2003) characteristic in Aboriginal communities were found to occur in this study, (1) learning by 'listening in', (2) intent observation and pitching in, (3) engagement in real-life community activities, and a (4) respect for silence. Relating stories to convey a message, however, was not observed during the study period. These findings provide an initial indication that particular patterns of guided participation are present in an Aboriginal learning environment. Further investigations of guided participation in other settings may provide additional insight into these patterns in an Aboriginal setting. The concept of cognitive apprenticeships could, in the future, expand to encompass distinct patterns of guided participation in Aboriginal communities.

How collaborative learning occurs in an Aboriginal adult Literacy Centre

The findings of this study indicate that there is a strong alignment between the concept of cognitive apprenticeships and Rogoff's concept of guided participation in the interpersonal plane. Of Rogoff's three planes of analysis, the clearest connection has been found between the interpersonal plane, guided participation and cognitive apprenticeships. The relationships between Rogoff's perspective of cognitive development through three planes of analysis and the three related concepts are illustrated in Figure 2 (on page 112). As cognitive apprenticeships are a form of guided participation in the interpersonal plane, it has been placed beside the concept of guided participation in the personal plane.

In describing the conceptual context for this study, I speculated that the concept of situated cognition was closely related to Rogoff's concept of personal appropriation in the personal plane. Cognitive development may be related to the personal plane but little evidence was found in this study to support this supposition. In Figure 2, situated cognition,

Figure 2. Learning through Activity in an adult Aboriginal Literacy Centre



has been moved away from the personal plane and the related concept of appropriation because little evidence of a strong connection between the phenomena was found in this study.

As I was planning this study, I assumed that the concept of communities of practice was closely related to Rogoff's proposed community plane of analysis and the related concept of apprenticeship. After analyzing the data, I realize that the concept of communities of practice was not only aligned with the community plane but was also related to the personal and interpersonal. A community of practice assists in the development of relationships among learners and instructors. Positive relationships provide a solid basis for

cognitive development through connections with others in the interpersonal plane. A community of practice provides a supportive environment in which learners can make changes and potentially transform their lives, relating to the personal plane. Thus, the concept of communities of practice involves all aspects of learning through activity, the personal, interpersonal and community and has been enlarged as a second circle in Figure 2 to encompass all three planes of analysis.

Factors encouraging collaborative learning in an Aboriginal learning environment

A sub-question considered in this investigation was, what are the factors that encourage collaboration in an Aboriginal learning environment? Themes emerged from the analysis of the data that encourage collaboration in an Aboriginal learning setting. These themes were found to encourage collaborative learning in this setting were grounded in the Aboriginal culture or way of being: 1) the role of the instructor as a guide, 2) the use of humour to engage learners and 3) the provision of an appropriate learning atmosphere for Aboriginal learners. Rather than acting in a traditional role of teacher, literacy instructors take their lead from learners and provide assistance as would a mature group member to a newcomer in the group. Humour is used purposefully by instructors and Aboriginal cultural values are present to provide a relaxed community atmosphere.

The instructor as a 'guide on the side'

The instructors at the Literacy Centre considered that their role is assisting learners was to be a 'guide on the side', rather than the traditional role of teacher or 'sage on the stage' when the instructor is considered to be the source of all knowledge. The term, 'guide on the side', originated from a description of an effective role university instructors in an environment where learners are "expected to think for themselves, pose and solve complex

problems, and generally produce knowledge rather than reproduce it” (King, 1993). A ‘guide on the side’ approach was described in this situation one where instructors “facilitate students' interaction with the material and with each other in their knowledge-producing endeavour” (p.33).

Rather than prescribing specific programs or curricula, the instructors took the lead from the participants regarding how their learning was to be approached. Instructors waiting to be asked for assistance by learners is an example of the concept of non-interference, the dominant ethic in Aboriginal culture (Ross, 1992). “Understanding the ethic of non-interference, the belief that it is not right to tell another what to do is ...integral to comprehending Aboriginal world view” (Wihak & Price, 2006). By practicing the principle of non-interference, the instructors were acting in a manner consistent with Aboriginal cultural values. Thus the role of a literacy instructor as a ‘guide on the side’ assists in developing relationships among learners and instructors in an Aboriginal learning setting.

The use of humour to engage learners

Humour was used by instructors to encourage a relaxed atmosphere. Jokes and laughter were consistently present at the Literacy Centre. In a previous study, Aboriginal learners indicated that humour was an important component of an effective learning environment (Tremblay & Taylor, 1998, p. 43). Tremblay and Taylor’s findings regarding the importance of humour in an Aboriginal learning setting are confirmed in the present study. The appropriate use of gentle humour fits well with an Aboriginal world view that emphasizes connectedness (Wihak & Price, 2006). Thus, the appropriate use of humour can be considered a factor in encouraging an atmosphere consistent with Aboriginal cultural values.

A culturally appropriate atmosphere for Aboriginal learners

The respondents held a variety of opinions regarding the place of Aboriginal culture in a native literacy program. Some considered that Aboriginal cultural practices taken out of the communities where it originates means that it is no longer authentic. According to Antone, the inclusion of Aboriginal culture in a native literacy program strengthens traditional cultural values and, in turn, stronger First Nations communities (Antone & Córdoba, 2005a). Although the presence of traditional Aboriginal cultural practices may have a place in literacy programs located in a First Nation community, the inclusion of such practices may not be considered authentic in a predominately non-native community.

One respondent offered a different view and suggested that many native people want to attend programs that offer traditional cultural teachings and that attendance might increase if Aboriginal spirituality was present. Obviously there are a variety of opinions regarding the place of traditional Aboriginal cultural teachings and that this issue needs to be considered when planning or managing such programs.

At the same time, respondents felt that it was important to provide a learning environment that was congruent with Aboriginal culture and respectful of the learners potentially negative previous experiences with formal education. This includes a comfortable, relaxed social atmosphere, a flexible schedule, and broad but flexible expectations, consistent with Tremblay and Taylor's findings regarding the characteristics of a native literacy program.

Contributions to Research, Practice and Policy

The findings of this study may have application in research, practice, or in policy related to collaborative learning, adult literacy, and learning in Aboriginal settings. First, the

potential contributions to research of the findings will be examined. Potential contributions to practice and to policy will then be explored.

Contributions to Research

The potential contributions of this study include adding to a social perspective of literacy and adding to the scholarly knowledge of cognitive apprenticeships in an Aboriginal setting.

Using Rogoff's perspective in expanding our understanding of collaborative learning.

Rogoff initially proposed a view of cognitive learning through activity to assist in an explanation of how cognitive development occurred in children (Rogoff, 1995). Until now, there has been no analysis using Rogoff's perspective in adult literacy learners. Rogoff's three planes, and the related concepts of situated cognition, communities of practice and cognitive apprenticeships, were useful in guiding the analysis of the study's findings as a clear picture of collaborative learning in an Aboriginal adult Literacy Centre emerged from the data.

Current research of collaborative learning from a social perspective of literacy involves investigations of how peers learn from each other and the teaching strategies to support this learning (Taylor et al., 2007; Taylor, Evans, & Abasi, In press). This research considers issues of identity and community membership from the social perspective of literacy, proposed by Barton and Hamilton (2000). As the issues in this research involve personal, interpersonal and community aspects of learning, Rogoff's view of cognitive development through activity could, therefore, provide strong explanatory power in future investigations of collaborative learning in adult literacy learners from a social perspective of literacy.

Adding to a social perspective of literacy. In the present study, learning through connections with others was a key factor in cognitive development among Aboriginal learners. Strong positive relationships allowed learning to occur through connections with others rather than through content. Learning through connection with others is illustrative of a social theory of literacy, as described by Barton and Hamilton (2000), where participating in social practices with others is more important than the particular skills that are attained. When learners talked about what they were learning, they discussed academic subjects or specific skills, evidence of a functional view of literacy. When they talked about how they were learning, they discussed the importance of connections with others. Thus, literacy learning in an Aboriginal learning environment occurring within a community of practice with strong positive relationships among members provides evidence of a social perspective of literacy.

Barton and Hamilton (2000) have illustrated a social perspective through observations of literacy practices of community members in a working class neighbourhood in the United Kingdom. Subsequently, the authors highlighted the similarities between a social perspective of literacy and the concept of communities of practice (Barton & Hamilton, 2005). The findings of this study suggest that developing relationships within a community of practice is important in learning through connections with others, in a social view of literacy. As well, the study investigated literacy learning in a specific cultural setting, involving Aboriginal learners. The study's results, therefore, suggest that the development of a community of literacy practice through the development of strong positive relationships could add to a social perspective of literacy.

Further investigations of real life literacy practices of Aboriginal adults could assist in providing additional insight into how the development of strong positive social connections assist in cognitive development, not only within a literacy program, but also in the larger community.

Expanding the understanding of cognitive apprenticeships. A specific pattern of guided participation grounded in Aboriginal cultural values was found to occur. Rogoff (2003) suggested that particular patterns of guided participation can occur within cultural groups. She suggested that in an Aboriginal setting, five characteristic behaviours assist in guided participation. Four of these occurred in the present study. Future investigations in other Aboriginal learning settings that extend over a longer period of time may provide evidence that telling stories to illustrate a point as well as other patterns of behaviour are present in an Aboriginal learning setting. The study's findings suggest that there are particular patterns of guided participation in an Aboriginal learning setting but further investigation is needed to determine the exact nature of these patterns in an Aboriginal adult learning environment. Once the nature and scope of particular patterns of guided participation are found, these patterns could be added to our knowledge of cognitive apprenticeships in an Aboriginal learning environment.

Contributions to Practice

The study findings highlight factors that influence cognitive development in an adult literacy program. Through the description of these factors that assisted learning in this study, literacy instructors could consider whether or not these could apply to their own situation and their own practice.

Increasing participation of Aboriginal adult literacy learners. Collaborative learning occurs in an Aboriginal adult Literacy Centre through a process, metaphorically speaking, of entering into a house of literacy learning. This process involved coming to the Centre with hopes and dreams for the future, developing feelings of safety and respect, increasing motivation to learn and then joining with others in groups. These steps were employed in sequence to engage adults, many of whom are extremely hesitant to attend the Centre or to participate in literacy learning activities.

Many Aboriginal adults leave formal educational institutions before completing high school having had poor experiences. In other cases, an individual's personal issues such as substance abuse, sexual abuse or pregnancy can preclude them from completing school. For example, one individual indicated that she had completed Grade 6 and had attended both Grade 7 and 8 without completing the requirements for either grade. Antone (2003) suggests that mainstream educational institutions do not take into account Aboriginal ways of being, resulting in Aboriginal students feeling out of place and dropping out. Whatever the reasons discontinuing formal schooling, many Aboriginal adults are concerned about their personal safety and are lacking confidence in their ability to learn in a formal setting.

The low participation rate has been identified as a pressing issue in adult literacy programs in Ontario (Sussman, 2001). Nineteen percent of adults in the province were found to have very low literacy skills and were placed at IALS Level 1. In spite of the relatively high proportion of adults in the province who could benefit from increased literacy skills, a low proportion of adults actually participate in literacy learning activities. Although the proportion of Aboriginal adults in this group is unknown, the metaphor of entering into a house of literacy learning outlined in this study may provide a starting point for literacy

instructors to consider when they are considering how to engage beginning Aboriginal adult learners in literacy activities.

The use of computers to aid learning. Computers were used at the Literacy Centre in the delivery of literacy programs, as well as a tool to assist in the development of a community of practice. Many of the learning activities at the Centre involved computer technology. The availability of computers acted as an incentive for interested individuals to come to the Centre. They knew that there would be opportunities for them to improve their computer skills and to take part in learning activities.

The study findings suggest that using computers as a learning tool in an Aboriginal learning environment may fit well with an Aboriginal way of learning. Learning in traditional Aboriginal communities involved learning by doing through hands-on activities. The use of computers in literacy learning among Aboriginal learners may provide a modern day equivalent of hands-on experiential learning that is a part of the traditional way of learning in Aboriginal cultures.

Adding to knowledge of a positive learning environment. Both an inviting atmosphere and the consistent use of humour helped to shape an environment that was comfortable for Aboriginal learners. Sometimes individuals attended the Centre just to chat rather than to engage in learning activities. The Centre was seen as a place to visit with other learners and instructors. Some learners chose to come to the Centre to participate in on-line courses even though they could have taken the course with their home computer.

A warm, comfortable, non-threatening atmosphere where fun and humour were also an important part of the setting contributed to a positive learning environment in a native employment preparation program (Tremblay & Taylor, 1998). These attributes of a positive

learning environment for native learners are similar to findings of the present study which indicate that an informal, inviting atmosphere where humour is used are important in engaging Aboriginal adults in participating in learning activities.

Both learners and instructors in the Aboriginal Adult Literacy Centre stressed the importance of a physically and emotionally safe environment as the first step in engaging potential learners in participating in learning activities. As Tremblay and Taylor investigated a community-based employment preparation program located on one First Nations reserve, many of the participants would perhaps have known each other before becoming a student in the program. The Literacy Centre is located in a small urban centre and draws its participants from many communities. The adult literacy learners would not necessarily be familiar with each other and may feel the need for a safe environment before feeling comfortable in engaging in learning activities.

Both studies stress the importance of a warm inviting atmosphere in encouraging a positive learning environment for Aboriginal adult learners. A variety of Aboriginal adult literacy programs are offered across the country. Whatever the literacy program, practitioners can consider how to encourage a positive learning environment through the provisions of a warm inviting atmosphere to engage Aboriginal adult learners.

Contributions to Policy

There is a proliferation of adult literacy and employment training programs in Canada designed to address the gaps in educational and economic attainment between Aboriginal peoples and Canadian society as a whole. Although many programs are in place to address these gaps, it is important for policymakers to consider how adult learning in Aboriginal settings occurs when developing programs to address these gaps.

Contributing to knowledge of Aboriginal learning. The Canadian Council on Learning (CCL) was formed to disseminate current information about learning in Canada. Existing information about learning in Aboriginal communities is limited in that it tends to focus on educational deficits rather than successes, young people rather than adults and the formal educational system rather than other types of learning (Canadian Council on Learning, 2007a). The findings of this study can contribute to knowledge of learning in an Aboriginal setting in that it describes successes in an Aboriginal adult learning environment that is not a part of the traditional school system. A description of factors that encourage collaborative learning may begin to address gaps identified by Aboriginal organizations in Canada.

The CCL has developed a Holistic Lifelong Learning Models for First Nations, Métis and Inuit peoples in consultation with the Aboriginal Learning Knowledge Centre and learning professionals and researchers across Canada (Canadian Council on Learning, 2007a). These models were developed to “articulate and explore - and for non-Aboriginal people to appreciate - the value of Aboriginal holistic lifelong learning” (p.3). A model of a tree describes First Nations learning. The roots of this tree represents an individual’s relationships with others, the natural world and experiences with their culture. The four branches represent the four aspects of personal development, spiritual, social, economic and political. Learning in the tree’s trunk draws upon an individual’s influences in the roots and provides nourishment for aspects of personal development in the branches.

Both indigenous and Western knowledge are found at the core of the tree’s trunk, a complementary relationship which “affirms the importance of integrating Western and Indigenous knowledge and approaches to learning” (Canadian Council on Learning, 2007a, p. 2). Both indigenous and Western approaches are needed for people to affirm their own

ways of knowing and to gain the ability to participate fully in Canadian society. This study investigated how learning occurred in an Aboriginal setting involving Western knowledge. The findings may therefore lead to a strengthening of the 'Western knowledge' portion of the tree's core among Aboriginal people.

Considerations regarding urban adult Aboriginal learners. The study was conducted in a town that is a part of the migration of Aboriginal peoples from isolated rural communities to larger urban centres. Many people leave small isolated northern Aboriginal communities to seek employment and educational opportunities, to escape abusive relationships or to obtain specialized medical care in larger centres. The proportion of Aboriginal people living in the town where the study was conducted has increased during the past four decades. According to 2001 Census data, approximately 25% of the town's population identified themselves as having Aboriginal ancestry, an increase from 2% in the 1961 Census (Sider, 2005; Statistics Canada, 2001).

People move south to this town from the isolated northern Aboriginal communities and then, at times, back to their home communities. People also move to larger urban centres, both in Ontario and in other provinces. Aboriginal people from these larger centres are also moving to this smaller town because they perceive that this community is a safer place to raise their families, with less violence and fewer gangs than in large cities. Both the increase in the proportion of Aboriginal people living in the town and the movement from community to community and back again affects the types of educational programs and services needed by and offered to Aboriginal people.

Aboriginal people in Canada are migrating from their reserve communities to larger urban centres across Canada. Currently 70% of Aboriginal people live off-reserve and 54%

live in urban centres (Statistics Canada, 2008). It is important to consider the voices of Aboriginal adults living in urban centres, away from their home communities, regarding their views about Aboriginal adult literacy as their needs may differ from individuals living in Aboriginal communities.

Aboriginal adult literacy is considered to be “a distinct philosophy of learning” which involves a holistic approach that involves the four aspects of life, cognitive, physical, emotional and spiritual (Antone & Córdoba, 2005a; George, 2003). Although traditional Aboriginal cultural teachings were not present at the Literacy Centre, Literacy Centre staff did endeavour to involve the four aspects of life described by George in the Literacy Centre’s learning environment. An atmosphere that incorporated an ‘Aboriginal way-of-being’, involving a respectful, inviting environment with broad but flexible expectations may provide a guide for designing programs for Aboriginal people living in urban centres.

Limitations of the study

Limitations of the study include issues of transferability and trustworthiness. The study’s findings may be transferable to other similar Aboriginal adult literacy programs. Triangulation and member checking were processes that were used to verify the data to ensure trustworthiness of the findings and resulting interpretations. Other potential limitations to the study’s findings included not using an audio recorder for some interviews, not proceeding with the talking circle data collection phase and issues of class, race and distance.

Transferability

This case study provides an initial picture of collaborative learning in an Aboriginal adult literacy program. The findings of this study and the resulting implications for both

theory and practice are limited to the data obtained from this Aboriginal Adult Literacy Centre. Care must be taken in assigning transferability of the findings to other literacy programs. If a similar study were to be conducted in another Aboriginal literacy program with other individuals, the data and findings may differ from those of this investigation as the perceptions of other individuals may not be similar to those reported in this study. Also, the results may have varied if the study had investigated a literacy program located in a First Nations community or if a larger number of informants had been interviewed.

The results of this study are not necessarily transferable to a larger group of Aboriginal adults since the study's respondents may not have similar perceptions to those of Aboriginal adults in general. The results of this study may be transferable, however, to other similar situations, as the study took place in a real-life setting. The thorough description of the case provided in this investigation allows others to ascertain whether the case described in this study can be applied to their situation.

Trustworthiness

Both triangulation and member checking are processes by which data can be verified in a qualitative research design. Although I attempted to verify the data by both of these processes, the study's findings are limited both by a lack of triangulation of some data and an inability to complete member checks for all narratives. The data collected may also have been affected by recording some interviews on paper rather than electronically and not including the proposed talking circle methodology.

Triangulation. Verification of the findings was attempted by triangulating data from multiple sources. During the individual interviews, for example, the instructors related similar stories about personal transformation of former learners. The accounts of personal

change in former learners varied very little among respondents and were essentially similar. Some of the data was received from one source and could not be verified from other data sources. For example, Agnes's opinion that traditional Aboriginal cultural teachings loses its authenticity when it is moved from its original communities was not verified by other data collected in this investigation. Her viewpoint was included in the findings as it reflects the voice of an Aboriginal learner and points to potential areas of further research in learning in an Aboriginal setting.

Member checking. Although efforts were made to have the respondents approve or suggest revisions to their narratives, either in person or by email and telephone, not all of the respondents approved the narratives of their interviews. Once I had left the community at the completion of the data collection phase, it was difficult in some instances to obtain an approval of a respondent's narrative who had moved from the community or had no email address. If these narratives could have been verified by the respondents, the findings and resulting interpretations may have varied although minimal changes were requested by the participants who did approve them.

Lack of use of an audio recorder. Many of the respondents, both learners and instructors, were unfamiliar with individual interviews. As a result, some respondents felt self-conscious when the audio recorder was running. These feelings of discomfort may have limited the information that they were willing to share during these interviews, potentially changing the data. I understood that some respondents felt uncomfortable speaking to me with an audio recorder as they seemed to relax, ask me questions and offer new information once the machine was turned off. Although I was careful to record a summary of these post-recording conversations, an audio recording is a more reliable record than field notes

recorded after the interview. Also, three respondents, who agreed to be interviewed, declined to use the audio recorder. In those instances, I conducted the interview and then wrote a narrative based on my notes of the interview, which is a less reliable method of collecting data.

Talking circle. In my original plan for the data collection process, I had planned to include a talking circle or group interview once the observations and individual interviews had been completed. During the data collection phase, the group interview did not take place. Although organized classes were offered at the Centre during the data collection period, attendance fluctuated and there was little opportunity to have learners attend a group interview.

The lack of a talking circle as an additional source of data is a limitation. Data collection in a talking circle would have allowed me to pursue a particular theme or topic with the participating individuals that emerged from the observation and interview phases. Without this additional data, I was unable to check my perceptions of emerging themes directly with the respondents. If a talking circle had occurred, I had hoped that its process would have been familiar to the participants. This focus group methodology may then have provided an opportunity for individuals to respond more freely and openly than in an individual interview which proved to be an unfamiliar experience for some respondents.

Issues of class, race and distance. It is important to acknowledge that as a non-native middle class woman who came from a university located in a distant city to gather data at the Literacy Centre, there were barriers, of class, race and distance between me, as the researcher, and the respondents. Although I consciously attempted to be approachable during the data collection period, these differences may have altered the data that was collected.

Another researcher who was of Aboriginal descent, or was living in the community may have collected data that differed from this study.

Concluding statement

Rogoff's perspective of cognitive development through activity was useful in investigating how collaborative learning occurs in an Aboriginal adult Literacy Centre. By considering three planes of analysis, the personal, community and interpersonal, a picture of collaborative learning emerged. This picture involved the Literacy Centre as a community of practice with group members learning through participation in literacy activities. As learners moved through all phases of cognitive apprenticeship in a variety of learning situations, they experienced personal changes through increased participation in the literacy community.

During the literacy learning activities, particular forms of guided participation were observed. These patterns included 'learning by listening in', 'intent observation', 'engagement in real-life activities' and 'a respect for silence'. These findings provide an initial indication that specific patterns of guided participation are present in this setting and may be characteristic of guided participation in Aboriginal communities in general.

The themes that were found to encourage collaborative learning in an Aboriginal learning setting were grounded in an Aboriginal culture or way of being. Rather than acting in the traditional role of teacher, the instructors acted as a 'guide' to literacy learners, assisting them on their learning journey. Humour was used purposefully and Aboriginal cultural values were present to provide a relaxed, comfortable atmosphere.

The potential contributions to research include the use of Rogoff's perspective in expanding our understanding of collaborative learning, adding to a social perspective of literacy and expanding our understanding of cognitive apprenticeships in an Aboriginal

setting. Literacy instructors in Aboriginal adult settings may consider the findings related to increasing participation, the use of computers, and factors that encourage a positive learning environment helpful in their practice. Finally, the study's findings may assist policymakers by contributing to knowledge of learning in an urban Aboriginal setting.

REFERENCES

- Aboriginal Healing Foundation. (2002). *The healing has begun: An operational update from the Aboriginal Healing Foundation*. Ottawa: Aboriginal Healing Foundation.
- Advisory Committee on Literacy and Essential Skills. (2005). *Towards a fully literate Canada*. Ottawa: Minister of State for Human Resources Development.
- Alfred, M. (2002). The promise of sociocultural theory in democratizing adult education. In M. V. Alfred (Ed.), *New directions for adult and continuing education* (Vol. 96, pp. 3-13). San Francisco: Jossey Bass.
- Antone, E. (2003). Aboriginal peoples: Literacies and learning. *Literacies*, 1, 9-12.
- Antone, E. (2005). Reconciling Aboriginal and non-Aboriginal perspectives in Aboriginal literacy practice, *Proceedings from the First Nations, First Thoughts Conference*, (pp. 1-11): Centre for Canadian Studies, University of Edinburgh, Edinburgh.
- Antone, E., & Córdoba, T. (2005a). Re-storying Aboriginal adult literacy: A holistic approach, *Proceedings from the 24th Annual Conference of the Canadian Association for the Study of Adult Education (CASAE)* (pp. to confirm). University of Western Ontario, London ON.
- Antone, E., & Córdoba, T. (2005b). Re-storying Aboriginal literacy. *Literacies*(6), 9-11.
- Antone, E., Gamlin, P., & Provost-Turchetti, L. (2003). *Literacy and Learning: Acknowledging Aboriginal holistic approaches to learning in relation to 'Best practices' literacy training program*. Toronto: Ministry of Training, Colleges and Universities, Government of Ontario and the National Literacy Secretariat.
- Antone, E., & Imai, J. (2006). Defining Aboriginal health literacy in a Canadian context: Bringing Aboriginal knowledge into practice, *Proceedings from the 25th Annual*

- Conference of the Canadian Association for the Study of Adult Education (CASAE)* (pp. 7-12). York University, Toronto ON.
- Auditor General of Canada. (2004). *2004 Report of the Auditor General of Canada: Indian and Northern Affairs Canada, education program and post-secondary student support. Report to the House of Commons*. Ottawa: Minister of Public Works and Government Services.
- Barton, D., & Hamilton, M. (2000). Literacy Practices. In D. Barton, M. Hamilton & R. Ivanič (Eds.), *Situated literacies: Reading and writing in context* (pp. 7-15). London: Routledge.
- Barton, D., & Hamilton, M. (2005). Literacy, reification and the dynamics of social interaction. In D. Barton & K. Tusting (Eds.), *Beyond Communities of Practice* (pp. 14-35). New York: Cambridge University Press.
- Battiste, M. (2005). *State of Aboriginal learning: Background paper for the "National Dialogue on Aboriginal Learning"*. Saskatoon: Aboriginal Education Research Centre, College of Education, University of Saskatchewan.
- Battiste, M., & McLean, S. (2005). *State of First Nations Learning*. Saskatoon: Aboriginal Education Research Centre, College of Education, University of Saskatchewan.
- Bazylak, D. (2002). Journeys to success: Perceptions of five female aboriginal high school students. *Canadian Journal of Native Education*, 26(2), 134-151.
- Beder, H., & Medina, P. (2001). Classroom dynamics in adult literacy education. Retrieved October 22, 2004, from <http://gseweb.harvard.edu/~nscall/researchrep/18.pdf>
- Bonk, C. J., & Cunningham, D. J. (1998). Searching for learner-centered, constructivist, and sociocultural components of collaborative educational learning tools. In C. J. Bonk &

- K. S. King (Eds.), *Electronic collaborators: Learner centered technologies for literacy, apprenticeship and discourse*. Mahwah, N. J.: Laurence Erlbaum.
- Bougie, E. (2008, January 7). Literacy profile of off-reserve First Nations and Metis people living in urban Manitoba and Saskatchewan: Results from the International Adult Literacy and Skills Survey 2003. *The Daily* Retrieved January 8, 2008, from <http://www.statcan.ca/Daily/English/080107/d080107a.htm>
- Brown, J. S., Collins, A., & Duguid, P. (1989). Situated cognition and the culture of learning. *Educational Researcher*, 18(1), 32-42.
- Brunnen, B. (2004). *Working Towards Parity: Recommendations of the Aboriginal Human Capital Strategies Initiative*. Calgary: Canada West Foundation.
- Canadian Council on Learning. (2007a). *Redefining how success is measured in First Nations, Inuit and Métis learning*. Ottawa ON: Canadian Council on Learning.
- Canadian Council on Learning. (2007b). *State of Learning in Canada: No time for complacency*. Ottawa ON: Canadian Council on Learning.
- Canadian Human Rights Commission. (1998). Canadian Human Rights Commission 1998 Annual Report. Retrieved October 17, 2004, from http://www.chrc-ccdp.ca/publications/1998_ar/page7-en.asp
- Canadian Institutes of Health Research, Natural Sciences and Engineering Research Council of Canada, & Social Sciences and Humanities Research Council of Canada. (2005). Tri-Council Policy Statement: Ethical Conduct for Research Involving Humans. Retrieved July 27, 2007

- Christie, J., & Stone, S. (1999). Collaborative literacy activity in print-enriched play centres: Exploring the "zone" in same-age and multi-age groupings. *Journal of Literacy Research, 31*(2), 109-131.
- Collins, A., Brown, J. S., & Newman, S. E. (1989). Cognitive apprenticeship: Teaching the crafts of reading, writing and mathematics. In L. Resnick (Ed.), *Knowing, learning and instruction: Essays in honour of Robert Glaser* (pp. 453-494). Hillsdale, N.J.: Laurence Erlbaum Associates.
- Cooke, M., Beavon, D., & McHardy, M. (2004). *Measuring the well-being of Aboriginal people: An application of the United Nations' Human Development Index to Registered Indians in Canada, 1981-2001*. Ottawa: Strategic Research and Analysis Directorate, Indian and Northern Affairs.
- Demetrian, G. (2001). Concerning the contexts of adult literacy education: Theoretical reflections and practical applications. *Canadian Journal for the Study of Adult Education, 15*(2), 104-127.
- Dowdall, A. (2003). Work/education Yukon: Is there a place for local skills in a small world? *Proceedings from the 2003 Changing Face of Work and Learning Conference* (pp. to confirm): The Work and Learning Network Conference, Edmonton, AB.
- Driscoll, M. (2006, Wednesday, January 25). Function Meets Fashion. *Sioux Bulletin*, p. 13.
- Fenwick, T. (2000). Expanding conceptions of experiential learning: A review of the five contemporary perspectives on cognition. *Adult Education Quarterly, 50*(4), 243-272.
- George, N. P. (2003). The rainbow/holistic approach to Aboriginal literacy. *Canadian Journal for Native Education, 27*(1), 29-40.

- Greeno, J. G. (1998). The situativity of knowing, learning and research. *American Psychologist*, 53(1), 5-26.
- Guba, E. G., & Lincoln, Y. S. (1994). Competing paradigms in qualitative research. In N. K. Denzin & Y. S. Lincoln (Eds.), *Handbook of Qualitative Research*. Thousand Oaks, CA: Sage.
- Hamilton, M., & Barton, D. (2000). The International Adult Literacy Survey: What does it really measure? *International Review of Education*, 46(5), 377-389.
- Human Resources and Skills Development Canada, & Statistics Canada. (2003). *Building on our competencies: Canadian results of the International Adult Literacy Survey* (No. 89-617-XIE). Ottawa: Human Resources and Skills Development Canada and Statistics Canada.
- Human Resources and Skills Development Canada, & Statistics Canada. (2005). *Building on our competencies: Canadian results of the International Adult Literacy Survey 2003* (No. 89-617-XIE). Ottawa: Human Resources and Skills Development Canada and Statistics Canada.
- Indian and Northern Affairs Canada. (2002, October). An Evolving Terminology relating to Aboriginal peoples in Canada. Retrieved November 8, 2006, from http://www.aboriginalcanada.gc.ca/acp/site.nsf/LaunchFrameSet?openagent&RefDoc=ao04426.html&URL=http://www.ainc-inac.gc.ca/pr/pub/wf/index_e.html&altlang=http://www.ainc-inac.gc.ca/pr/pub/wf/index_f.html&disp=en&FrameSize=&end

- Indian and Northern Affairs Canada. (2003, April 24, 2003). Backgrounder - The Residential School System. *Canada's Aboriginal Action Plan* Retrieved November 8, 2006, from http://www.ainc-inac.gc.ca/gs/schl_e.html
- Indian and Northern Affairs Canada. (2005). *Comparison of socio-economic conditions, 1996 and 2001: Registered Indians, registered Indians living on reserve and the total population of Canada*. Ottawa: Indian and Northern Affairs Canada.
- Indian Residential Schools Resolution Canada. (2006, May 10, 2006). The Residential School System Historical Review. Retrieved November 8, 2006, from <http://www.irsr-rqpi.gc.ca/english/history.html>
- Johnny, M. R. (2005). *Policy implications for native literacy in Ontario*. Trent University, Peterborough ON.
- Kegan, R., Broderick, M., Drago-Severson, E., Helsing, D., Popp, N., & Portnow, K. (2001). Toward a new pluralism in ABE/ESOL classrooms: Teaching to multiple 'cultures of mind'. Retrieved October 22, 2004, from <http://gseweb.harvard.edu/~nscall/researchrepa.pdf>
- King, A. (1993). From sage on the stage to guide on the side. *College Teaching*, 41(1), 30-35.
- Kirshner, D., & Whitson, J. (1997). Editors' introduction to situated cognition: Social semiotic, and psychological perspectives. In D. Kirshner & J. Whitson (Eds.), *Situated cognition: Social semiotic, and psychological perspectives* (pp. 1-16). Mahwah, New Jersey: Laurence Erlbaum and Associates.
- Lave, J., & Wenger, E. (1991). *Situated learning: Legitimate peripheral participation*. Cambridge: Cambridge University Press.

- Lee, C. D., & Smagorinsky, P. (2000). Introduction: constructing meaning through collaborative inquiry. In C. D. Lee & P. Smagorinsky (Eds.), *Vygotskian perspectives on literacy research: Constructing meaning through collaborative enquiry* (pp. 1-15). Cambridge: Cambridge University Press.
- LeGrand Brandt, B., Farmer, J. A., & Buckmaster, A. (1993). Cognitive apprenticeship approach to helping adults learn. In D. D. Flannery (Ed.), *Applying cognitive learning theory to adult learning: New directions for adult and continuing education* (Vol. 59, pp. 69-78). San Francisco: Jossey-Bass.
- Mendelson, M. (2004). *Aboriginal people in Canada's labour market: Work and unemployment, today and tomorrow*. Ottawa: Caledon Institute of Social Policy.
- Mendelson, M. (2006). *Aboriginal peoples and postsecondary education in Canada*. Ottawa: Caledon Institute of Social Policy.
- Merriam, S. B. (2002). *Qualitative research in practice: Examples for discussion and analysis*. San Francisco, CA: Jossey-Bass.
- Merriam, S. B., & Simpson, E. L. (2000). *A guide to research for educators and trainers of adults* (2nd ed.). Malabar, FL: Krieger.
- Ministry of Education and Training. (1993). *Empowering the spirit of the native people: The native literacy movement in Ontario*. Toronto ON: Ministry of Education and Training, Literacy Branch.
- Ministry of Training Colleges and Universities. (2007). *Employment Ontario: Ontario's employment and training network*. Toronto.
- Movement for Canadian Literacy. (2005). *A 10-year, results-based national literacy action plan 2006-2016*. Ottawa: Movement for Canadian Literacy.

- O'Reilly-Scanlon, K., Crowe, C., & Weenie, A. (2004). Pathways to understanding: 'Wâhkôhtwin' as a research methodology. *McGill Journal of Education*, 39(1), 29-44.
- Packer, M. J., & Goicoechea, J. (2000). Sociocultural and constructivist theories of learning: Ontology, not just epistemology. *Educational Psychologist*, 35(4), 222-241.
- Quigley, B. A., Folinsbee, S., & Kraglund-Gauthier, W. L. (2006). *State of the Field Report: Adult Literacy*. Ottawa ON: Canadian Council on Learning.
- Rogoff, B. (1995). Observing socio-cultural activity on three planes: Participatory appropriation, guided participation and apprenticeship. In V. W. James, Pablo del Rio & A. Alvarez (Eds.), *Sociocultural studies of mind: social, cognitive and computational perspectives*. Cambridge: Cambridge University Press.
- Rogoff, B. (2003). *The cultural nature of human development*. Oxford: Oxford University Press.
- Rogoff, B., Matsuov, E., & White, C. (1996). Models of teaching and learning: Participation in a community of learners. In D. R. Olson & N. Torrance (Eds.), *The handbook of education and human development*. Oxford, UK: Blackwell.
- Rootman, I., & Ronson, B. (2005). Literacy and health research in Canada. *Canadian Journal of Public Health*, 96(S2), 62-77.
- Ross, R. (1992). *Dancing with a ghost: Exploring Indian reality*. Toronto: Reed Books Canada.
- Sider, D. (2005). *A sociological analysis of root causes of Aboriginal homelessness in Sioux Lookout, Ontario*. Toronto: Canadian Race Relations Foundation.
- Statistics Canada. (1996). *Reading the future: A portrait of literacy in Canada*. Ottawa: Statistics Canada.

- Statistics Canada. (2001, January 2, 2007). 2001 Community Profiles. *2001 Census*
Retrieved May 8, 2007, from
http://www12.statcan.ca/english/profil01/CP01/Search/SearchForm_Results.cfm?Lang=E
- Statistics Canada. (2003). *Aboriginal Peoples Survey 2001 - initial findings: Well-being of the non-reserve Aboriginal population*. Ottawa: Statistics Canada.
- Statistics Canada. (2008). Aboriginal peoples in Canada in 2008: Inuit, Métis and first Nations, 2006 census. Retrieved January 18, 2008, from
<http://www12.statcan.ca/english/census06/analysis/aboriginal/urban.cfm>
- Sticht, T. (2001). The international literacy survey: How well does it represent the literacy abilities of adults? *Canadian Journal for the Study of Adult Education*, 15, 19-34.
- Sussman, S. (2001). The demographics of low literacy. In M. C. Taylor (Ed.), *Adult Literacy Now!* Toronto: Irwin Publishing.
- Taylor, M., & Abasi, A. (2005). Developing communities of practice through collaborative learning, *Proceedings from the 24th Annual Conference of the Canadian Association for the Study of Adult Education (CASAE)* (pp. 256-262). London, ON.
- Taylor, M., Abasi, A., Pinsent-Johnson, C., & Evans, K. (2007). Collaborative learning in communities of literacy practice. *Adult Basic Education and Literacy Journal*, 1(1), 4-11.
- Taylor, M., & Blunt, A. (2001). A situated cognition perspective on literacy discourses: Seeing more clearly through a new lens. *Canadian Journal for the Study of Adult Education*, 15(2), 79-102.

- Taylor, M., Evans, K., & Abasi, A. (2006). Towards a learning and teaching model in adult literacy: A close-up look at experiences in Canada and the United Kingdom, *Proceedings from the 25th Annual Conference of the Canadian Association for the Study of Adult Education (CASAE)* (pp. 227-232). York University, Toronto, ON.
- Taylor, M., Evans, K., & Abasi, A. (In press). Understanding teaching and learning in adult literacy training. *Literacy and Numeracy Studies*, 1(1), 4-11.
- Taylor, M., King, J., Pinsent-Johnson, C., & Lothian, T. (2003). Collaborative practices in adult literacy programs. *Adult Basic Education*, 13(2), 81-99.
- Tremblay, P., & Taylor, M. (1998). Native learners' perceptions of educational climate in a native employment preparation program. *Adult Basic Education*, 8(1), 30-46.
- United Nations Development Program. (2006). *Human Development Report 2006*. New York: United Nations Development Program.
- Vygotsky, L. (1978). *Mind in society: The development of higher psychological processes*. Cambridge: Harvard University Press, (Cole, M., John-Stiener, V., Scribner, S., Souberman, E., Eds).
- Weber-Pillwax, C. (1999). Indigenous research methodology: Exploratory discussion of an elusive subject. *Journal of Educational Thought*, 33(1), 31-43.
- Wenger, E. (1998). *Communities of practice: learning, meaning and identity*. Cambridge: Cambridge University Press.
- Wertsch, J., del Rio, P., & Alvarez, A. (1995). Sociocultural studies: History, action, and mediation. In J. Wertsch, P. del Rio & A. Alvarez (Eds.), *Sociocultural studies of mind* (pp. 1-34). London: Cambridge University Press.

- Wihak, C., & Price, R., E. (2006). Counselling across cultures: Working with Aboriginal clients, *NATCON 2006*. Ottawa: National Consultation on Career Development.
- Wilson, S. (2003). Progressing toward an Indigenous research paradigm in Canada and Australia. *Canadian Journal for Native Education*, 27(2), 161-178.

Appendix 4. Coding Sheet

1. Community Focus of Analysis -

a. Mutual Engagement

Domain	Yes	Comments
Reading		
Writing		
Numeracy		
Oral Communication		
Other		

Community Maintenance

Physical Arrangement	Y/N	Comments	Social Climate of Group	Y/N	Comments
Formal			Humour		
Informal			Respectful of difference		
Instructor as focus			Supportive environment		
Other			Other		

b. Joint Enterprise

Characteristics of Learners

Learners	Aboriginal	Non-Aboriginal	Total	Comments
Male				
Female				
Age (approx)	() 16-24	() 25-35	() 36-45	() 46-55 () 56- 65 () 66+

Negotiated Activity (How a task is interpreted and meaning is negotiated)

Behaviour	N→M	M→N	Instructor as M?	Comments
Directing				
Inviting				
Assisting				
Repeating				
Compromising				
Self-correcting				
Seeking information				
Gathering resources				
Other				

N= newcomer, M=mature group member

c. Shared Repertoire – Practice

Repertoire Developed by Group	Yes	Comments
Shared experiences		
Stories		
Tools		
Jokes		
Recurring problems		
Learning materials		
Actions		
Gestures		
Other		
Other		

B. Interpersonal Focus of Analysis - Guided Participation

Phases of Cognitive Apprenticeship	M	Comments	N	Comments
Modelling				
Approximating				
Fading				
Self-Directed Learning				
Generalizing				
Patterns of Guided Participation				
Learning by 'listening in'				
Intent observation and pitching in.				
Engagement in real-life community activities				
Respect for silence				
Conveying indirect messages in stories				

N= newcomer, M=mature group member

2. Personal Focus of Analysis

Describe individual efforts in observation and participation of activities

.....

.....

.....

Appendix 5. Participant Observation Protocol

A. Community Focus of Analysis - based on Wenger (1998, p.58) and Taylor et al. (2003)

a. Mutual Engagement - Domain

Reading

.....

Writing

.....

Numeracy

.....

Oral Communications

.....

Other

.....

Community Maintenance

Physical arrangement of the room

.....

.....

.....

Social climate of the group (social interactions that promote group cohesion)

.....

.....

.....

b. Joint Enterprise – Community

Characteristics of Learners

Number of learners: M _____ F _____

Aboriginal _____ Non-Aboriginal _____

Negotiated Activity

Describe how a task is interpreted and meaning is negotiated

.....

.....

.....

c. Shared Repertoire – Practice

Shared experiences, stories, tools, jokes, recurring problems, gestures, actions, or learning materials developed by the group

.....

.....

.....

B. Interpersonal Focus of Analysis - Guided Participation – based on Rogoff (2003)

Describe the newcomers

.....

.....

.....

Describe the mature group members

.....

.....

.....

Phases of Cognitive Apprenticeship - based on LeGrand Brandt et al. (1993) and Taylor et al. (2003)

Modelling (demonstrating)

.....

.....

Approximating (coaching)

.....

.....

Fading (increasing competence, decreasing assistance)

.....

.....

Self-Directed Learning (competence demonstrated)

.....

.....

Generalizing (apply learning to new situations)

.....

.....

Patterns of Guided Participation in Aboriginal Communities – adapted from Rogoff (2003)

Learning by ‘listening in’

.....

.....

.....

Intent observation and pitching in

.....

.....

.....

Engagement in real-life community activities

.....

.....

.....

Respect for silence

.....

.....

.....

Conveying indirect messages in stories

.....

.....

.....

C. Personal Focus of Analysis – Personal Appropriation

Describe individual efforts in observation and participation of activities

.....

.....

.....

Appendix 6. Learner Interview Guide

Time of Interview:

Date:

Place:

Interviewer:

Participant:

1. Introductory
 - Could you describe what normally happens during a literacy learning session?
(Ask for an example or story to illustrate)

2. Community
 - How does the physical set-up of the room help learners to learn from others in the group? (Provide an example). Hinder learners? (Provide an example)
 - How does the social atmosphere help in learning from others in the room?
(Provide an example) Hinder learners? (Provide an example)

3. Interpersonal
 - Can you describe examples of times when learners helped others?
 - When learners helped each other, who did the helping and who was helped?

4. Personal
 - Can you describe how you have increased your understanding of a certain topic or way of doing things through your participation in literacy learning activities?
 - Please describe examples.

Appendix 7. Instructor Interview Guide

Time of Interview:

Date:

Place:

Interviewer:

Participant:

1. Introductory

- Could you describe what typically happens during a literacy learning session? (Ask for examples or stories to illustrate).

2. Community

- How does the physical set-up of the room help learners to learn from others in the group? (Provide an example). Hinder learners? (Provide an example)
- How does the social atmosphere help in learning from others? (Provide an example) Hinder learners? (Provide an example)

2. Interpersonal

- How do you see your role as an instructor in this setting?
- Can you describe an example of when learners helped others?
- When learners helped each other, who did the helping and who was helped? (Provide an example)
- Can you describe an example of how you assisted learners to help each other in learning?
- Can you describe an example of how you assisted learners to increase their understanding?

4. Personal

- Can you describe how you perceive learners have increased their understanding of a certain topic or way of doing things through their participation in literacy learning activities?
- Please describe examples.