

**UNIVERSITY OF CALGARY**

**Evaluating Co-management in the Sahtu:  
A Framework for Analysis**

**by**

**Darwin Bateyko**

**A MASTER'S DEGREE PROJECT  
SUBMITTED TO THE FACULTY OF ENVIRONMENTAL DESIGN  
IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR THE  
DEGREE OF MASTER OF ENVIRONMENTAL DESIGN  
(ENVIRONMENTAL SCIENCE)**

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**FACULTY OF ENVIRONMENTAL DESIGN**

The undersigned certify that they have read, and recommend to the Faculty of Environmental Design for acceptance, a Master's Degree Project entitled **Evaluating Co-management in the Sahtu: A Framework for Analysis** submitted by **Darwin Bateyko** in partial fulfillment of the requirements for the degree of Master of Environmental Design (Environmental Science).

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Date: **September 26<sup>th</sup> 2003**



# **Abstract**

## **Evaluating Co-management in the Sahtu: A Framework for Analysis**

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**Supervisor: Professor Karim-Aly Kassam**

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In theory, co-management is defined as a partnership arrangement in which government, the community of local resource users, and other resource stakeholders, share the responsibility and authority for the management of a resource. In practice, however, co-management has been used to describe a number of resource management regimes, ranging from processes that utilize only community consultation, to partnerships that incorporate equal participant decision-making.

Under Northern Canadian Land Claim Settlements, co-management commonly involves joint decision making and shared responsibility regarding resource planning and management. Although these resource management boards have the financial and legal backing of Land Claim Agreements, their resource management success is largely dependent on the amount of stakeholder support for the process, the function of internal organization activities, and external factors affecting the co-managed region.

This Masters Degree Project proposes and field tests an evaluation framework designed for renewable resource co-management boards and the Sahtu Renewable Resources Board (SRRB) in particular. The framework builds on previous co-management evaluations completed in Northern Canada, as well as other more recent methods of organizational assessment. As a partnership was formed with the SRRB, the framework was tailored to reflect Board input and the specifics of this co-management regime. Field testing this evaluation framework yielded general lessons and suggestions for implementing future co-management assessments, in addition to specific findings and recommendations for the SRRB.

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**Key Words:** Co-management, Sahtu Renewable Resources Board, Sahtu Dene and Metis Comprehensive Land Claim Agreement, Northwest Territories, evaluation framework, renewable resource management, collaborative resource management, traditional resource management.







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Thank you, once again, for everyone who assisted me in undertaking and completing this graduate degree!

Cheers,

A handwritten signature in black ink, appearing to read 'D. Bateyko', with a long horizontal flourish extending to the right.

Darwin Bateyko

# **Table of Contents**

<b>Chapter 1: Introduction .....</b>	<b>1</b>
1.1 the Task.....	3
1.2 Context of the Research.....	4
1.2.1 The Case Study .....	5
1.3 The MDP Outline.....	7
1.4 The Limitiations .....	7
<b>Chapter 2: Methods and Methodology .....</b>	<b>11</b>
2.1 Research Methodology .....	11
2.1.1 Interventionist Approach.....	12
2.1.2 Academics as citizens .....	12
2.1.3 Participatory Research .....	13
2.1.4 Dialogical Approach.....	13
2.2 Principles and Paradigms: Informing the Framework and Approach.....	14
2.3 Methods.....	15
2.3.1 Literature Review.....	15
<i>Collaborative Processes</i> .....	15
<i>Resource Management</i> .....	16
<i>Evaluation Techniques</i> .....	16
<i>Northern Context</i> .....	16
2.3.2 Semi Structured Interviews .....	18
2.3.3 Participant Observation.....	20
2.4 The Case Study .....	21
2.5 The Findings and the Recommendations .....	22
<b>Chapter 3: Northern Context .....</b>	<b>23</b>
3.1 An Historical Overview of the Development of North Western Canada .....	24
3.2 The Land Claim Agreement.....	26
3.2.1 Negotiating the Claim .....	27
3.2.2 The Spirit of the Land Claim Agreement .....	29
3.2.3 The Sahtu Region.....	30
<i>The Districts</i> .....	30
3.3 The Residents and the Communities.....	31
3.3.1 Organizations created under the Land Claim Agreement .....	33
3.4 Conclusion .....	37
<b>Chapter 4: Resource Management .....</b>	<b>39</b>
4.1 Resource Management.....	39
4.2 Knowledge Systems .....	40
<i>Scientific Knowledge</i> .....	41
<i>Traditional Knowledge</i> .....	42
<i>Opposing Knowledge Systems</i> .....	43
4.3 The Modernization and Stewardship Approaches .....	44
4.4 The Scientific Model.....	46

4.5 The Traditional Model .....	48
4.6 Co-management Theory.....	50
4.7 Co-management and Other Management Systems .....	52
4.8 Conclusion.....	54
<b>Chapter 5: Evaluation Theory and Design.....</b>	<b>57</b>
5.1 Evaluations .....	57
5.2 Developing the SRRB Framework .....	59
5.3 Choosing Items to Evaluate .....	62
5.4 The Evaluation Framework Explored .....	63
5.4.1 Formation.....	63
5.4.1.1 Purpose.....	63
5.4.1.2 Scale .....	64
5.4.1.3 Implementation .....	65
5.4.2 Organization.....	66
5.4.2.1 Composition.....	66
5.4.2.2 Board Member Skills .....	67
5.4.2.3 Mandate and Authority .....	68
5.4.2.4 Funding .....	68
5.4.2.5 Accountability.....	69
5.4.3 Operations .....	70
5.4.3.1 Meetings.....	70
5.4.3.2 Staff.....	71
5.4.3.3 Expectations .....	72
5.4.3.4 Access to Information and Education.....	73
5.4.3.5 Communication.....	74
5.4.4 Actions .....	75
5.4.4.1 Issue Identification.....	75
5.4.4.2 Community Involvement and Consultation.....	75
5.4.4.3 Research.....	76
5.4.4.4 Decision Making .....	77
5.4.5 Effectiveness .....	78
5.4.5.1 Adaptive and Ecosystem-Based.....	78
5.4.5.2 Merging ‘Ways of Knowing’ .....	80
5.4.5.3 Stakeholder Support .....	81
5.5 Conclusion.....	82
<b>Chapter 6: Case Study: The Sahtu Renewable Resources Board .....</b>	<b>83</b>
6.1 History of Resource Management in the Sahtu Region.....	84
6.1.1 Traditional Resource Management in the Sahtu.....	84
6.1.2 The Modernization Approach to Resource Management in the Sahtu.....	88
6.1.3 The Present Stage of Resource Management in the Sahtu .....	91
6.2 The SRRB’s Role within the Land Claim Agreement.....	93
6.2.1 The Renewable Resource Councils .....	97
6.3 Board Structure and Operation.....	99
6.3.1 Membership .....	100

6.3.2	Staff.....	102
6.3.3	Board Meetings and Decision Making .....	104
6.3.4	Research and the Harvest Study.....	105
6.3.5	Special Committees .....	106
6.3.6	Public Hearings and Inquiries .....	106
6.3.7	Other Co-management Agreements.....	107
6.4	Conclusion .....	107
<b>Chapter 7: The Evaluation: Findings and Analysis.....</b>		<b>109</b>
7.1	Formation.....	110
7.1.1	Purpose.....	110
7.1.2	Scale .....	112
7.1.3	Implementation .....	114
7.2	Organization.....	116
7.2.1	Composition.....	116
7.2.2	Board Member Skills .....	118
7.2.3	Mandate and Authority .....	120
7.2.4	Funding .....	122
7.2.5	Accountability .....	123
7.3	Operations .....	125
7.3.1	Meetings.....	125
7.3.2	Staff .....	127
7.3.3	Expectations .....	129
7.3.4	Access to Information and Education.....	131
7.3.5	Communication.....	132
7.4	Actions .....	133
7.4.1	Issue Identification.....	133
7.4.2	Community Involvement and Consultation.....	135
7.4.3	Research.....	136
7.4.4	Decision Making .....	138
7.5	Effectiveness .....	140
7.5.1	Adaptive and Ecosystem Based .....	140
7.5.2	Merging Ways of Knowing .....	141
7.5.3	Stakeholder Support.....	142
7.6	Conclusion .....	143
<b>Chapter 8: Recommendations and Conclusion.....</b>		<b>145</b>
8.1	Benefits of Renewable Resource Co-management in the Sahtu.....	146
8.2	Barriers to Renewable Resource Co-management in the Sahtu .....	148
8.3	External Factors .....	151
8.4	Recommendations .....	153
8.4.1	Internal Board Operations .....	153
8.4.2	Community Consultation and Trust Building .....	156
8.4.3	Board Member Capacity Building.....	158
8.4.4	Research and Management Priorities.....	159
8.5	The Evaluation: Challenges and limitation.....	162
8.6	Conclusions .....	164

## **List of Figures**

Figure 1: Map outlining the Sahtu Land Claim Agreement Settlement Area.....	6
Figure 2: Traditional Areas in Northern Canada .....	24
Figure 3: Sahtu Districts and Resource Rights .....	31
Figure 4: Sahtu First Nations Land Ownership Structure .....	34
Figure 5: Sahtu Community Corporations and Councils .....	35
Figure 6: Land, Water and Resource Co-management Boards.....	37
Figure 7: Components of Western and Traditional Management Systems .....	47
Figure 8: Choosing the Criteria to Assess.....	622

## **List of Tables**

Table 1: Break Down of Interviewees .....	19
Table 2: The Different Levels of Authority Transfer .....	51
Table 3: Summary of Assessment .....	60

## **List of Appendices**

Appendix A: SRRB Partnership Letter	
Appendix B: Information Sheet and Interview Protocol	
Appendix C: Preliminary Findings	
Appendix D: Copies of Ethics Approvals	
Appendix E: Frequency of Mention Table: A Synopsis of Interviewee Discussions Related to Research Findings	
Appendix F: Musk ox Decision: Meeting Minutes	
Appendix G: Testing Your Decisions - Allan Savory Center for Holistic Management	

## **Acronyms**

CWS – Canadian Wildlife Service  
CLW – Community Liaison Worker  
DOE – Department of Environment  
DFO – Department of Fisheries and Oceans  
DIAND – Department of Indian Affairs and Northern Development  
GIS – Geographical Information Systems  
GNWT – Government of the Northwest Territories  
HTA – Hunters and Trappers Association  
IBNWT – Indian Brotherhood of the Northwest Territories  
MVRMA – Mackenzie Valley Resource Management Act  
NWT – Northwest Territories  
RRC – Renewable Resource Council  
RRO – Roberts Rules of Order  
RRRC – Regional Renewable Resources Council  
RWED – The NWT Department of Resources, Wildlife, and Economic Development  
SDMCLCA – Sahtu Dene and Metis Comprehensive Land Claim Agreement  
SLUPB – Sahtu Land Use Planning Board  
SLWB – Sahtu Land and Water Board  
SRRB – Sahtu Renewable Resources Board  
SSA – Sahtu Settlement Area  
SSI – Sahtu Secretariat Incorporated



## CHAPTER 1

# INTRODUCTION

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Intensification of natural resource extraction in Canada's north has been accompanied by changes in the political system that governs this unique region. Transformation of the political environment began in the early seventies when Justice Thomas Berger recommended a moratorium on one of the largest infrastructure projects in Canadian history, the Mackenzie Valley Pipeline (Berger 1977). Since that time, the federal government has been actively pursuing Comprehensive Land Claim Agreements with communities in the Mackenzie Valley Region that aim to facilitate aboriginal participation in the land use planning processes (Notzke 1994). First Nation involvement in collaborative planning and management initially were informal or advisory processes. They have since grown to include a wide variety of collaborative models that range from "those that merely involve ... some local participation in government research, to those in which the local community holds all the management power and responsibility" (Berkes *et al.* 1991:12).

One of the processes that grew out of this collaborative approach is the concept of co-management. Federal and territorial governments work together with aboriginal groups to make decisions regarding resource use that are in the best interest of all involved (Berkes *et al.* 1991). Co-management is commonly defined in the literature as a consensus-based approach to resource use and development that is predicated on the sharing of decision-making power and responsibility. At the root of this approach is both the successful combination of scientific and traditional knowledge, and a focus on negotiation instead of litigation as a means of conflict resolution (Campbell 1996, Pinkerton 1992). Co-management has now been legally entrenched as part of several Comprehensive Land Claim Agreements, providing a mechanism for First Nations to retain significant elements of a traditional way of life, and to combine the old and the new in ways that

maintain and enhance their identity and culture while allowing their society to evolve (Berkes *et al.* 1991). Involvement in the planning, development and management of traditional lands and resources, facilitated by the settlement of Comprehensive Land Claim Agreements, provide First Nations with access and control over a land base that will not only nurture their social and cultural life, but provide opportunities for economic development and self government (Muir 1994, Notzke 1994, Bone 1992, Berger 1977).

As co-management processes and boards become more prolific in Northern Canada, and often responsible for decisions that affect public lands, a method to evaluate these organizations as decision-making bodies must be developed. It is the purpose of this Masters Degree Project (MDP) to propose an evaluation framework for gauging the general utility and value of co-management boards in northern Canada. By comparing the theoretical underpinnings of co-management, as identified in academic literature, with the experiences and views expressed by individuals involved in these processes, it is possible to understand the strengths and weaknesses of current co-management regimes, and to develop use-focused recommendations for improving co-management. The evaluation framework and research method will be field-tested using the Sahtu Renewable Resources Board (SRRB) as a case study. Both the evaluation framework and the SRRB will be assessed, and recommendations will be provided for improvement of both the Board (SRRB) and the evaluation process.

It should be noted that many co-management boards established under land claim agreements north of the sixtieth parallel have been in existence for only a short time and have had a limited opportunity to reach identifiable and measurable outcomes. Consequently, many of the components requiring evaluation and comparison to theory are process oriented, hard to identify, and difficult to assess. As pointed out by evaluation professionals Rossi and Freeman (1995), perhaps the most challenging aspect of applying a social science based assessment to the study of societal institutions is the inherent requirement that researchers conduct their work in a continually changing milieu. The evolution of an institution, particularly when it is inexperienced, force assessment processes to be responsive to these changes, and the changes that occur in the

environment or society (Guba and Lincoln 1989). The responsive or adaptive process of assessment should therefore include collaboration with institutional participants to determine the best expenditure of resources in asking priority evaluation questions (Duignan 2002).

## **1.1 THE TASK**

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... assessment and evaluation is basically an idealized problem-solving process that we use to learn about our world so we can take more informed actions (Shadish et al., 1991).

The purpose of this MDP was to design and test an evaluation framework and research approach that explores and assesses co-management boards set up under Land Claim Agreements in northern Canada. Specifically an evaluation and assessment of the Sahtu Renewable Resources Board was undertaken. The primary focus of this research was to design and field test an evaluation framework that builds on prior evaluations of co-management and the recent academic literature, and employs methods and results that are meaningful to the people involved in the SRRB co-management process. An appropriate research approach was critical to ensuring that the methods and results of the research provided maximum benefit for the people involved in co-management processes.

Subsidiary to this main purpose, other broader avenues of inquiry that were explored, included a) external factors effecting renewable resource management and the function of collaborative decision making; and b) the effectiveness of an external evaluation versus an internal assessment structure, or some balance between the two. These additional questions were raised during the research process, where preliminary findings led to different topics of inquiry, and became part of the research, the findings, and the recommendations.

To achieve the purpose of this research project, several research objectives were identified:

1. To develop a framework and appropriate research approach for the evaluation of resource co-management boards, by reviewing former evaluations of co-management and other more recent methods of organizational assessment.
2. To field test the evaluation framework and approach by applying it to a functioning resource co-management board in Northern Canada.
3. To evaluate the co-management functionality of the Sahtu Renewable Resources Board.
4. To provide the SRRB with findings and recommendations about their resource<sup>1</sup> co-management process.
5. To provide comment and suggestion regarding the evaluation of co-management that has been undertaken, by reviewing the framework and approach.

## **1.2 CONTEXT OF THE RESEARCH**

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Resource management, as practiced in the western world, has conventionally been rooted in a modernist perspective, where the actions of individuals and their impact on the environment must be governed by experts who make decisions to protect and preserve the resource of interest (Usher 1987; Sadler 1993). In addition, the concept of ‘evaluation’ has been based on a cognitive construct that requires a decision on what is ‘good’ or what is ‘bad’ and what ‘works’ or what ‘does not work’ based on past experience and social norms (Guba and Lincoln 1989, Merriam-Webster 2002). These ideas will be discussed further in Chapters 3 and 4, but it is important to note that these concepts of good and bad and the action of efficacy are only theoretical descriptions of societal occurrences conveyed by the dominant, and in this case, western culture. The exploration of these concepts, especially resource management, will be undertaken from a different cultural perspective (mainly Sahtu) to balance western scientific views.

In addition to examining co-management on a general level, this research project focused on the detailed operations of the SRRB. Relevant information was collected from a variety of resources, including: a) interviews with residents of the Sahtu Region; b) interviews with SRRB members; and c) review of applicable government documents and other pertinent literature. Consequently, it is anticipated that a balance was struck between the northern traditional viewpoint and the western scientific perspective.

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<sup>1</sup> In the context of the SRRB, the term ‘resource’ refers to a renewable resource, such as animals, fish, or vegetation.

Co-management has been evaluated by a number of researchers in recent years (Roberts 1994, Chambers 1998, Hayes 2000). Building on this work that specifically evaluated co-management practices in Northern Canada, and on further work that focused on the evaluation of Collaborative Resource Management schemes (Coughlin *et al.* 1999; Todd 2001; Moore 1996; and Savory 2003), this project identified a common language and a common approach for evaluating co-management boards. Although this Master's Degree Project (MDP) builds on other evaluations done in the past, board centered, internal methods were explored later in the research process. These methods focused more on designing techniques for evaluation from within the organization, rather than external or outside evaluation (Diez 2001). Internal evaluations remain fluid and flexible, in part, because they need to be applied to all aspects of the organization on a progressive and evolving basis. The strength of internal evaluations lies in the internally designed questions and methods for data collection, and the commitment to organizational improvement through a process that is interactive, contextualized and directed at knowledge building (Duignan 2001, Diez 2001).

### **1.2.1 The Case Study**

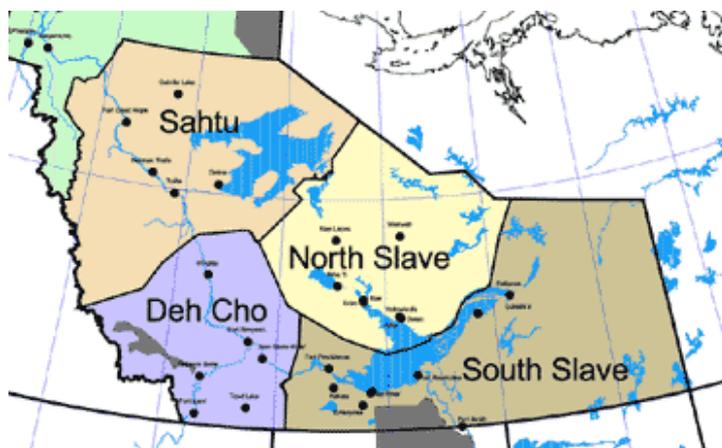
In its eighth year of operation, the SRRB is the “the main instrument of Forestry (sic) and Wildlife Management in the Sahtu Settlement Area” (Sahtu Renewable Resource Board Executive [SRRB]<sup>2</sup> 2002a:1). It was established as a result of the Sahtu Dene and Metis Comprehensive Land Claim Agreement (SDMCLCA) and the Sahtu Dene and Metis Land Settlement Act (Bill C-16) that were signed and received assent September 6, 1993 and June 23, 1994 respectively (SRRB 2002a). The SRRB office is presently located in the community of Tulita, NWT, where all four staff members reside. The six board members reside both inside and outside the Sahtu area, and are appointed by the Sahtu Secretariat Inc. (SSI)<sup>3</sup>, the federal government and the territorial government. Three of the Board members are appointed by the SSI, while the others are appointed by the

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<sup>2</sup> The Sahtu Renewable Resources Board Executive reference will be referred to as SRRB in the remainder of the document.

<sup>3</sup> SSI is the primary co-management organization set up under the land claim - its purpose is to ensure that the land claim is implemented properly. This organization will be discussed in greater detail later in the document.

federal and territorial governments. These members meet at least twice a year to make decisions<sup>4</sup> on the management of resources, Board and regional research, as well as staffing issues.



**Figure 1: Map outlining the Sahtu Land Claim Agreement Settlement Area within the NWT (Department of Resources, Wildlife and Economic Development [RWED] 2002b)**

The Sahtu Region is located in the central Northwest Territories (NWT) (see Figure 1), and encompasses part of the Mackenzie Valley and the Mackenzie Mountains, as well as much of the lakes and lands to the north of, and surrounding Great Bear Lake. Included in the Land Claim Agreement are the communities of Colville Lake, Deline, Fort Good Hope, Norman Wells and Tulita, with a total population of approximately 2800 residents (SSI 2002b). The Sahtu Region has sixteen different eco-zones and great diversity of renewable resources (Sahtu Land Use Planning Board [SLUPB] 2002b). Although there are many resources to deal with in terms of management, the Region's remoteness, lack of accessibility, and the limited amount of development to date has reduced the risk of exploitation of many of these resources (Interview 2002:40<sup>5</sup>).

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<sup>4</sup> SRRB 'decisions' are really 'recommendations' that the Board makes to the Minister of DIAND. Although the Board is considered a decision making body, it only makes recommendations to the Minister, who can agree or disagree with what is suggested. The process of Board decision-making will be reviewed later in the Document

<sup>5</sup> An interview reference, refers to information gained from research interviews. This process will be explained further in Chapter 2.

The initial literature review indicated that the Region's major issues and socio-political makeup have been understudied, and there were few academic resources to draw upon. Some of the most comprehensive information about the Region came from the Sahtu residents themselves, including the Land Use and Planning Board (SLUPB), and the SRRB websites. A considerable amount of spatial and geographical information has also been collected by the Sahtu Geographic Information Systems (GIS) Project<sup>6</sup>.

### **1.3 THE MDP OUTLINE**

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This MDP is presented in eight chapters, the first being the introduction and presentation of the research question. Chapter 2 provides an explanation of the research methodology. Chapter 3 describes the context of the study area, and provides information regarding the concepts and issues prevalent in northern Canada and those specific to the Sahtu Region and SDMCLCA. Chapters 4 and 5 focus on resource management, more specifically co-management, and evaluation techniques. Chapter 4 also outlines the devised evaluation framework. Following these two theoretical chapters, Chapter 6 provides a comprehensive description of the case study. The different stages of resource management in the Region are described, followed by a detailed narrative of the SRRB. Chapter 7 is lengthy as it outlines the findings that resulted from the field testing of the evaluation framework on the SRRB. Chapter 8 details the recommendations directed at the SRRB. It is hoped that the SRRB will find these items helpful and will use them to enhance their performance as a co-management board.

### **1.4 THE LIMITATIONS**

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Several limitations of the project were revealed in the research phase. Application of the evaluation framework to only one co-management board ruled out an intensive multiple board comparison. While the evaluation was comprehensive in relation to the SRRB, assessment of the evaluation framework, and the insights into the operations of the Sahtu Board, would have been more profound had it been applied to a second co-management

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<sup>6</sup> The Sahtu GIS Project will be explained later in the document.

board. To mitigate this shortcoming, previously published evaluations of other co-management boards in northern Canada were carefully reviewed to confirm the ideas and concerns identified as a result of my research.

Another limitation of the study was the lack of local community researchers. Faced with a Caucasian male researcher in a small, predominantly aboriginal community, a few community members expressed concern that no local residents were employed as part of this research. Again, due to limited funding, it was impossible to hire local individuals to assist in the interview process. As a result, in-kind work of select individuals and Sahtu community organizations provided feedback and validation of the results.

A short field season imposed a third limitation on the research. Limited funding and the significant expenses associated with northern research yielded only twenty six days of work in the five different communities. Nevertheless, I was able to conduct over forty interview sessions with residents of the five different communities. This was due, in part, to the contacts that I acquired in the communities prior to entering them. My Committee member, Dr. Norman Simmons, who had worked in the Region for over twenty years and who is an alternate member of the SRRB, accompanied me into four of the five communities and introduced me to many of the interviewees. Additionally, his daughter, Dr. Deborah Simmons, who has worked in the area for five years and continues to work in the community of Deline, made further inquiries and contacts on my behalf. As a result, the trust of many community members was built in a shorter period of time, limiting the effects of a short field season. A short visit subsequent to the twenty six day field season provided me with additional insight into the context of the Region, and some feedback on preliminary findings from study participants.

A further limitation of the study is related to the evaluation framework that was developed for the external assessment of co-management boards in general. A holistic evaluation of a board needs to start within the organization itself (Lackey and Moberg 1997). To implement an internal and participatory evaluation approach, the staff and board members must assess all projects and actions they complete as a public body (Diez

2001). This type of internal and ongoing evaluation takes time to integrate and results from the assessment are not readily available at the beginning of the process. Although a relatively external evaluation was completed, comprehensive internal evaluation needs to be incorporated into the daily operation of the SRRB. Results of the internal evaluation are not available in this document and can only be gleaned from within the organization. This limitation will become more apparent as the methodology and theory behind the evaluation are discussed.

Finally, the study includes few interviews with non-beneficiary stakeholders, who do not have a professional interest or connection to the Board. Since the SRRB is a Public Board, it not only represents the interests of the beneficiaries that signed the SDMCLCA, but all stakeholders that have an interest in renewable resources in the Sahtu. The number of non-beneficiary stakeholders is limited in Sahtu Region and contact with knowledgeable individuals in this category was lacking.



## CHAPTER 2

# METHODS AND METHODOLOGY

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The research undertaken for this MDP was informed and guided by a number of principles and theories that helped focus the research. This Chapter explores these principles and theories and how they have informed the evaluation framework and research approach. It gives a general overview of the process used to complete the study, as well as a technical description of the research methods that were implemented and an explanation of the particular concerns related to conducting research in northern Canada. The rationale for choosing the SRRB as the case study concludes the chapter.

## 2.1 RESEARCH METHODOLOGY

---

Designing a causal model to define phenomena  
vs.  
Designing a method to affect the phenomena purposefully  
(Rossi and Freeman 1985)

As mentioned in chapter one, the task of this project was to design and field test an evaluation framework and research approach to assess co-management regimes set up under land claim agreements. The evaluation framework and research approach appear as separate items to draw attention to the importance of undertaking research in a manner that fits the current context of the research environment. Present discourse within the professional evaluation discipline acknowledges the limitations of rigid top-down, outcomes based, evaluations (Diez 2001, Guba and Lincoln 1989). Instead, some professionals are seeking a more participatory approach to evaluation and assessment, which differentiates it from a strict scientific study:

Both may use the similar logic of inquiry, but scientific studies strive to meet a set of research standards, while evaluations need to be developed in ways that recognize both the policy and program interests of the sponsors and stakeholders, and to be formulated and conducted so they are maximally useful to decision

makers, given the resources, political circumstances, and program constraints that surround them (Rossi and Freeman 1985 :35).

As a result of these competing views, it is important to understand the principles and paradigms that informed this research and evaluation.

### **2.1.1 Interventionist Approach**

Similar to what has been termed utilization-focused or action research, an interventionist approach is inquiry or research in a focused effort to improve quality, performance, or effectiveness (Patton 1997). Bogdan and Biklen (1992:223) define it as “the systematic collection of information that is designed to bring about social change”. The explicit goal of such a project is to make a positive change of some sort or a general contribution to society. The interventionist approach is also one of the foundations for research in the Faculty of Environmental Design:

The Environmental Science program emphasizes creative problem solving to design interventions that are sustainable and helpful to society while providing responsible stewardship of ecological values, resources, and services (Faculty of Environmental Design 2002:21).

### **2.1.2 Academics as citizens**

‘Academics as citizens’ is an emerging concept that argues for a true effort on the part of scholars to leave the disciplinary trappings and academic rewards system behind and extend their services into society in a meaningful manner to balance social, cultural, and economic inequities (Robinson 1995; Ralston Saul 2001; Kassam and Tettey 2003). This concept derives from the ideals of civil society as espoused by authors such as Robinson (1995) and Ralston Saul (2001), and Friere’s belief that people have “the universal right to participate in the production of knowledge” (Smith et al. 1997:27). Kassam and Tettey (2003:155) advocate “that universities be socially responsible, institutional citizens by participating in development initiatives; provide an enabling environment for engagement with communities; and integrate research and teaching in a way that emphasizes community benefit as the essence of objective.”

### **2.1.3 Participatory Research**

Community participation in the research process does not yet possess either a shared meaning or methodology (Durst 1994). Participation in the research process can best be described as a continuum that ranges from manipulative participation, where participation is just a pretense to institute predefined goals, to what is considered self mobilization research or Participatory Action Research, where people define the research question, build local capacity to engage in the research process, and then retain control of the results (Berardi 2002, Ryan and Robinson 1992). The goal behind participatory research can be traced back to community development literature and the idea that the “exploited needed to be helped to become conscious of their situation” (DeKadt 1982:574).

Formerly known as conscientisation, this kind of empowerment attempts to deal with the trappings and difficulties associated with Dependency Theory (Abbot 1995). Overall the common principles of participatory research include the following: 1) The community and the researcher are partners, 2) The expertise of the researcher and the interests of the community complement each other, 3) The researcher gains an understanding of life in the community, 4) There is concern for the tone in which information is presented and meaning is interpreted, 5) There is a commitment to the values of democracy, equity, working within the community defined environment, and community-determination (Berardi 2002).

### **2.1.4 Dialogical Approach**

The term dialogical is derived from Greek term dialogos which can be translated to mean “flowing through” (Ferrer 2003). The dialogical approach is usually associated with the planning profession and views planning as a communicative enterprise (Healy 1992). An incremental approach, it is an interactive and interpretive process that is stakeholder based and concerned with consensus building, mutual learning, and building shared meaning (Stein & Harper 2000). The investigator engages in dialogue with a variety of stakeholders to first understand the problem and the parameters of the issue. He or she then reiterates the concern back to the individuals to demonstrate mutual

understanding of the problem, and it works collectively through conversation to discover causes or solutions (Ferrer 2003; Healy 1992).

These principles and paradigms have guided the development of the research approach and the evaluation framework. From the onset, a belief in the concept of ‘academics as citizens’ and the requirement for a meaningful intervention component guided the research process. It was important to remain flexible enough throughout the research process to see the organization through the eyes of the participants and the stakeholders. The intent was to produce “a description of the program as it exists, to provide understanding of how it is formally pictured and how it is actually conducted, and to explain the differences in the ways it is perceived and valued by the various parties involved” (Rossi and Freeman 1985).

## **2.2 PRINCIPLES AND PARADIGMS: INFORMING THE FRAMEWORK AND APPROACH**

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In the beginning, I reviewed prior evaluations of co-management undertaken by graduate students. As I proceeded with the research project and reviewed literature related to evaluation theory, it became clear that the framework I was developing would need to incorporate elements of a participatory research approach. Recent evaluation literature makes substantial arguments that a theoretical or academic understanding of the phenomena was not as important as developing a practical method to affect the phenomena purposefully (Rossi and Freeman 1985; Guba and Lincoln 1989; Duignan 2002). By involving stakeholders in the evaluation process, there is more potential for evaluative capacity building, and more opportunity for ownership of the results (Duignan 2002). The intervention component of the research was strengthened by an approach that was flexible and that allowed for participant input. Although the idea of evaluation as a fully participatory and empowering process is appealing, the resources required to achieve it are beyond the scope of this work. Balancing the resources available with an appropriate research approach was a constant concern throughout the research.

The goals of participatory research were accomplished through a variety of measures. These included: 1) forming a partnership with the SRRB (see appendix A for Partnership Letter); 2) consulting with community leadership at the initial stages of the research and asking for their input on research focus; 3) presentation to and validation by community members of preliminary research results; and 4) involving a Board member as a committee member. These measures ensured that the focus and results of the research would be of maximum utility to the SRRB and the stakeholder.

Throughout the research a dialogical approach was incorporated to bring to the fore the issues that seemed to be of greatest concern to the organization and the stakeholders. A process of validation and dialogue occurred through encouraging interviewees to identify major issues and to state their concerns and those of others they were aware of. The topics of interest covered by the initial interview protocol acted as a guide to focus the interview on certain topics, but flexibility remained paramount. It was also important to validate the results, as it was anticipated that the culmination of findings would prompt further discussion of the major topics and produce bottom up solutions to these issues.

## **2.3 METHODS**

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This study used three types of research: a literature review, semi-structured interviews, and participant observation. The following provides a synopsis of each research component.

### **2.3.1 Literature Review**

The literature began the research process and was expanded throughout the process in several key areas:

#### ***Collaborative Processes***

Information pertaining to the theory and practice of public involvement were reviewed in order to understand collaborative processes. The theoretical arguments for public involvement in resource management were gleaned from Wondolleck and Yaffee (2000), Notzke (1994), Pinkerton (1989), Howell *et al.* (1987). Additionally, the articles,

documents, and theses pertaining to co-management, Cooperative Resource Management, Collaborative Resource Management, and Traditional Resource Management were included under this area of interest (Chase *et al.* 2000; US Environmental Protection Agency 2002; Kruse 1997; Pinkerton 1993; Usher 1987)

### ***Resource Management***

Information regarding the Scientific Approaches to resource management was collected and reviewed, including theoretical work on Ecosystem Management, Adaptive Management and general resource management principles (Blann *et al.* 2000; Berkes 1999; Berkes 2003; Walters 1986). Although limited in scope, information pertaining to the recent combination of Scientific and Traditional Resource Management under Collaborative Resource Management agreements was also reviewed (Berkes 1999; Notzke 1994; Usher 1997; Berkes *et al.* 1991; Osherenko 1988). Traditional Resource Management was also explored, however, to a lesser extent due to prior experience and academic study in this area.

### ***Evaluation Techniques***

A variety of information regarding evaluation techniques was reviewed. Assessment procedures ranged from general evaluation techniques used to assess private and public organizations, to the specific evaluations designed to evaluate co-management of renewable resources in other land claim agreement regions. Topics of interest included Strength Weakness Opportunity Threat Analysis (SWOT), Results-Based Management, Community Based Evaluations, Business Model Organizational Assessment, Evaluation as Empowerment, Utilization Focused Evaluation and Theoretical and Practical Comparisons (Rossi and Freeman 1985; Guba and Lincoln 1989; Harrison 1994; Patton 2002; Diez 2001; Mackay *et al.* 2002; Greene 1997; Roberts 1994; Chambers 1999; Hayes 2000).

### ***Northern Context***

Once the case study was chosen, literature relating to the Sahtu Region and other similar land claim agreement areas surrounding the Sahtu Region was gathered and reviewed in

order to gain a comprehensive view and understanding of both the Sahtu Region, and of the Dene who inhabit the Mackenzie Valley (DIAND 1993; Blondin 1990; Geirholm 2001; Geirholm 2000; SLUPB 2002; GNWT 1991). Information on other land claim areas was also collected to further understand the similarities and differences of the unique regions that make up the western Arctic and sub-Arctic. The information from other land claim areas was only gathered from academic and government sources and simply consulted in a summary fashion

The majority of reference material consulted for the literature review was of an academic nature. Key searches of several databases were conducted, and the results and literature that was of interest was entered into ProCite, a reference database, and photocopied as a permanent record. Most of the academic literature came from journal articles and prior MDPs on similar topics. Additionally, information was collected from the World Wide Web in the form of conference proceedings and publications.

Legal and policy documents that related directly to the operations of the SRRB and the SDMCLCA were also consulted for the case study, as were documents that provided insight into the cultural, social, political and economic context of the Sahtu Region and the Dene of the Mackenzie Valley. Additionally, literature related to the evaluation techniques by public organizations was collected and reviewed. In addition to consulting academic references, information pertaining to public, or non-governmental organization evaluation, was gathered from training manuals, and case studies (W.K. Kellogg Foundation 1998; Korten 1986).

The literature review also focused on the diverse evaluation techniques that were available to assess public boards and the functions they performed. By taking a broader view of the internal and external evaluation processes, which included examining variables from formal and informal evaluation, common ideas and process were identified and paired up with existing co-management evaluation processes. This also included a review of emerging techniques such as Mainstream Evaluations (Duignan 2001), Participatory Evaluations (Diez 2001), Empowerment Evaluations

(Fetterman 1997) and Evaluation as Advocacy (Greene 1997). Many of the principles and ideas contained within these works, coupled with input from interviewees and work of three previous authors that evaluated co-management (Hayes 2000, Chambers 1999, and Roberts 1994) formed the basis of the evaluation framework.

The goal of the literature review was to understand, compare, and contrast the different types of resource management and evaluation techniques practiced by professionals. The focus was on co-management techniques, the specific tools and information that are commonly used within this management strategy, and the emerging field of internal or participatory evaluations. The collection, review, and analysis of the primary and secondary literature was an ongoing process. While the majority of the literature review was completed prior to conducting the field research, information gaps and a lack of peer reviewed references made it necessary to supplement the data already collected.

### **2.3.2 Semi Structured Interviews**

Field work was undertaken from April 8<sup>th</sup>, 2002 to May 2<sup>nd</sup>, 2002, and complemented by telephone interviews that were conducted in December of the same year. In total, over forty interview sessions were conducted with a variety of people who resided in the Region, were directly affected by the decisions made, and/or were involved with the operation of the Board as present or past members and staff.

Principles of participatory research and a dialogical approach framed the interview methods undertaken. Therefore a semi-structured interview format was chosen for this research project, as it was the best fit for this type of information gathering (Harrison 1994). Once in the field, the interview protocol (refer to appendix B) had to be adjusted to suit the subjects knowledge of the SRRB. Of the interviews undertaken, six of them were audio tape recorded and transcribed, while the remainders were recorded via written notes in accordance with the wishes of study participants. Table 1 below illustrates the break down of the interviews conducted.

**Table 1:  
Break Down of Interviews**

	<b>54 Interviewees</b>
	<b>(44 Interview Sessions - IS)</b>
<b><i>Beneficiaries</i></b>	<b>37 Interviewees (29 IS)</b>
SRRB Staff and Members or Alternates	8 Interviewees (8 IS)
RRC Members (present)	12 Interviewees (7 IS)
Community Organization Representatives	14 Interviewees (11 IS)
Other	3 Interviewees (3 IS)
 <b><i>Non-beneficiaries</i></b>	 <b>17 Interviewees (15 IS)</b>
SRRB Staff and Members or Alternates	5 Interviewees (5 IS)
Other	12 Interviewees (10 IS)

The study participants were chosen in a non-random sampling that was a mixture of: a) snowball sampling, where key individuals were identified in each of the communities, and during the interview were asked to identify other potential interviewees (Bernard H.R. 1995); and b) convenience Sampling, where individuals were selected simply by availability (i.e., meeting a community member on a plane ride) (Hagedorn R. & R. Heldley 1994). It should also be noted that of the forty four interview sessions, seven were in a group setting, and were more focus groups than semi-structured interviews. The results of these group sessions were treated in the same manner as the results of one-on-one interviews. All sessions were given an interview number and were reported throughout the document according to that interview number.

Follow-up telephone interviews were conducted after the field season. Individuals who participated in this phase of the research process were asked to provide feedback on a Preliminary Findings Document that was produced from the information gathered during the field season (see appendix C). This document was presented at the SRRB's September 2002 Board meeting, and faxed to the Dene, Metis, and Renewable Resource Council (RRC) offices in each of the communities. The presentation of these preliminary findings had three goals: 1) to provide the Board and the communities with a chance to view and validate the initial findings; 2) to initiate dialogue within the communities about the difficulties the Board was having; and 3) through dialogue and validation to draw out

recommendations about how the Board could be improved. These interviews generally did not generate any fresh data, as many of the individuals had little new information to add. In the absence of new information and without any indications that the Preliminary Findings were inaccurate, the original data and suggestions for improvement were used as the basis of the recommendations.

The face-to-face and telephone interviews ranged from twenty to eighty minutes in length, with an average of approximately fifty minutes. To ensure anonymity, the names of study participants were not directly associated with the information they provided, and interviewee names and interview transcriptions were stored in separate secure locations. In addition, study participants have not been identified by name within any documents or reports resulting from this research. All primary data gathered as part of this research will be destroyed within five years of the completion of this project, as disclosed in both the University of Calgary Conjoint Faculties Ethics Approval and the Aurora Research Institute's scientific Research License (see appendix D for these documents).

### **2.3.3 Participant Observation**

Participant observation as described by Hagedorn and Heldey (1994:41) is a process where the “researcher takes on the role as an objective neutral observer”. This research technique is important to this type of research because:

- 1) observations take place in a natural setting where findings or results can be validated. In many cases the researcher is observing real life actions, rather than relying on the theoretical or descriptive accounts;
- 2) the observer is able to record context, including the emotional reactions of the subjects, in which behavior occurs;
- 3) first hand experience enables the researcher to gain a sense the emotional and subjective qualities that individuals may have in response to an event; and
- 4) an observer that establishes good relationships with the people being observed may be able to ask sensitive questions that would otherwise be not allowed (Hagedorn R. & R. Heldey 1994:41).

Participant observation during the field season occurred in several ways: a) participating in, and observing an SRRB meeting; b) visiting all the RRC offices in each of the

communities; c) visiting all the local Land Claim Agreement Organization offices in each of the communities; and d) observing general activity of all the communities. These observations were recorded as daily notes in a field book as results for supplementary analysis.

During the research process, further exposure to community organizations in the Sahtu, and other northern settlement regions was ascertained as a result of my employment in these regions. During these subsequent visits through out the fall of 2002, a more in-depth understanding of the socio-political and socio-economic environment of the Sahtu was secured. The information collected during these visits was not formally documented, but confirmed prior observations about the communities.

## **2.4 THE CASE STUDY**

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Case study research is appropriate when a phenomenon is broad and complex, when a holistic and in-depth investigation is needed, and when a phenomenon cannot be compared outside the context in which it occurs (Bonoma 1985). The case study selected for this research was chosen at the advice of Dr. Norman Simmons, who in addition to being an alternate SRRB member, also serves on the Advisory Committee for this research project. This connection with the SRRB, coupled with the Board's status as an organization in a state of transition, made the SRRB an appropriate case study to test the assessment process.

There were significant barriers to completing research in the Sahtu. The first constraint was the high cost of conducting of northern research. The research approach had to be balanced against the budget. Another constraint is the lack of trust community members have in those who are in their community for only a short period of time. Research projects that rely on interview data obtained from community members can be hindered by the lack of trust felt by community members and their unwillingness to share important information with an outsider (Cruikshank 1994). The barriers created by a

short field season were overcome by the immediate trust placed in Drs. D. Simmons and N. Simmons my association with them.

## **2.5 THE FINDINGS AND THE RECOMMENDATIONS**

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The findings and recommendations were broken down into two categories: a) primary findings and recommendations related to the SRRB (see Appendix C); and b) secondary findings and recommendations related to the evaluation framework and assessment techniques. As mentioned previously, the initial findings related to the SRRB were submitted to community organizations in an attempt to validate the information and initiate discussion related to recommendations. Recommendations for improvement of the SRRB were based on two different types of information: 1) suggestions and ideas conveyed by interviewees during the initial field season and feedback from the initial findings; and 2) researcher analysis of interview data and Board documents, coupled with information regarding co-management theory and the practice of co-management in other regions. The recommendations are a culmination of the work carried out during this research and will be submitted to the SRRB and the communities in the Sahtu in the form of a community report and oral community presentations.

The findings and recommendations for the evaluation framework were dealt with differently, as they were not externally validated. In fact, the validity of the framework as a comprehensive evaluation of the SRRB is based on the internal arguments presented or the quality of findings, and ultimately on the willingness of the SRRB to implement the recommendations. At the same time, the general comments about improving the SRRB offered by interviewees provided the basis for some of the final recommendations.

## CHAPTER 3

# NORTHERN CONTEXT

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As a result of European settlement in North America that began in the early seventeenth century, the aboriginal way of life changed forever. European colonial nations established their own forms of governments on this continent and subsequently negotiated treaties with First Nations to define each group's boundaries, rights, and obligations (Bone 1992). In the beginning, peace treaties were signed to ensure alliances if not friendship between the aboriginal groups and the European settlers, but as European settlement swept westward, the federal government adopted policies and programs aimed at assimilating aboriginal peoples into the dominant culture (Department of Indian Affairs and Northern Development [DIAND] 1997). In Canada's north, increasing resource development in the twentieth century forced the federal government to begin re-negotiating treaties with several aboriginal groups, and negotiating with other groups that were never part of the treaty process, to allow for more control of their traditional territories. These negotiations lead to the signing of several land claim agreements that in essence provide claimant groups with an increasing amount of control over their own affairs (DIAND 1997; Elias 1995; Roberts 1994).

The purpose of this chapter is to provide the context of the study area, a brief account of resource development in the north, and an overview of the present Land Claims Agreement that governs the area. This review of resource management in the region examines the historical transitions in resource management, and the co-management processes specific to the Sahtu Region. The first part of this chapter provides an historical overview of the development of northern Canada in general and the events that lead to the signing of the Sahtu Dene and Metis Comprehensive Land Claim Agreement (SDMCLCA) in particular. The second part provides a description of the Sahtu Region today and the layout of the Land Claim Agreement that is currently in place.

### 3.1 AN HISTORICAL OVERVIEW OF THE DEVELOPMENT OF NORTH WESTERN CANADA

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At the end of the last ice age, about 12,000 years ago, it is believed that the Athapaskan people crossed into arctic North America using a land bridge from Asia. These early ancestors of the Sahtu Dene followed an ice free corridor that ran parallel to the Rocky Mountains into what is now Alberta. From there, many of the newcomers followed the retreating glacial ice north into the Mackenzie Valley, and have been residing in the Sahtu Region ever since (over 6000 years) (Morrison 1998; Bone 1992).

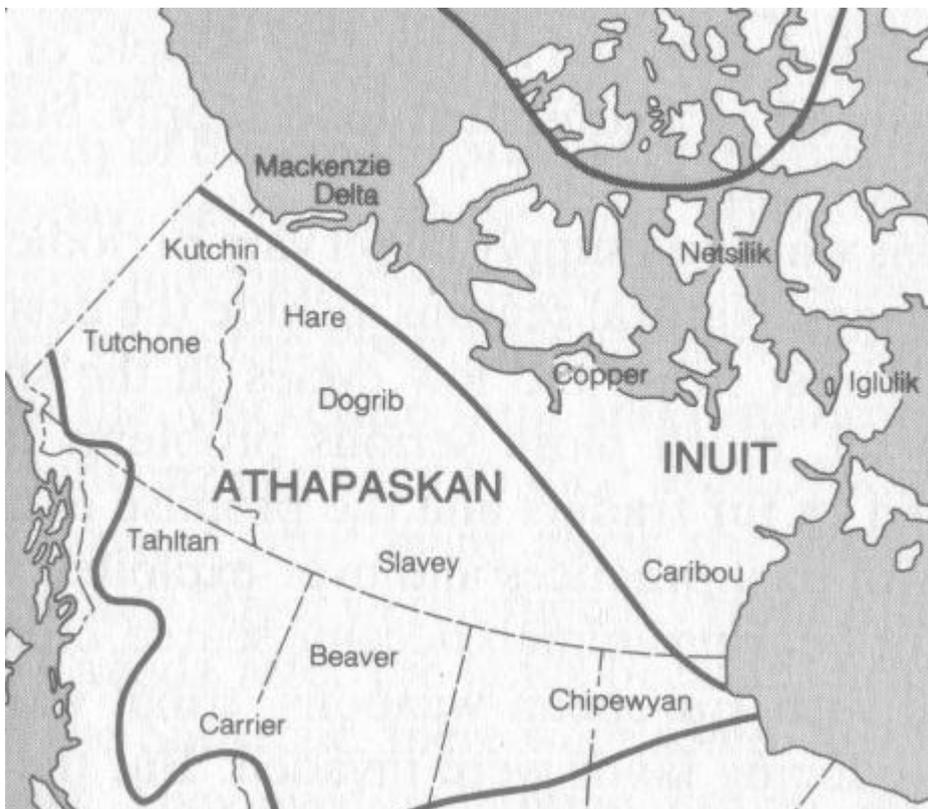


Figure 2: Traditional Areas in Northern Canada (Bone 1992:41)

According to ethnographic literature, the Athapaskan people were:

“viewed as being traditionally organized into four social/territorial bands: the Hare, the Mountain Dene, the Slavey, and the Sahtu or Bear Lake Dene. Membership of these cultural groups was not mutually exclusive, as the region’s people shared cultural traits as a result of inter-group

contact. One might think of [each band area] as areas that were used habitually by a specific group of people who had developed a lifestyle to suit that particular environment.” (Sahtu Heritage Places and Joint Working Group 2000 [Quoted in Geirholm 2001:14-15]).

Each group spoke a distinct dialect and had regional adaptations and detailed knowledge of specific environments (Geirholm 2001).

As a result of European contact in this region, people began congregating in places where they could trade their furs for an ever increasing amount of non-traditional items.

Sustained contact occurred in the early 1800s and resulted from an aggressive increase in the fur trading business by the Northwest Company, which set up trading posts in present day Tulita and Fort Good Hope. This European foray into northern Canada changed the Sahtu way of life from an existence that consisted of small family groups frequently traveling within their traditional territory, to sedentary communities that relied on a mixture of wage economy and traditional pursuits. This sudden shift in lifestyle has had long lasting negative effects on the residents of the Sahtu and is evident today within the Region (Geirholm 2001; Bone 1992). Also inhabiting these new communities were missionaries and the Northwest Mounted Police, each of whom brought an ever increasing amount of infrastructure to the communities (Bone 1992). As a result, the majority of the Region’s communities were well established prior to 1900’s (SLUPB 2002a).

As a result of European contact, intermarriages between the Europeans and the Dene created the emergence of a unique Metis’ culture. Unlike Red River Metis, who were from southern Canada, the Metis of the northern sub-arctic have “certain conditions, socio-economic characteristics and external conditions such as discriminatory pressures combined to give this scattered population ... more enduring significance than that of a mere social category” (Slobodin 1981:361-371 [quoted in Geirholm 2001:12]). Since the patriation of the Canadian Constitution in 1982, the rights of the Métis have been entrenched as one of the three Aboriginal Peoples of Canada (Government of Canada 1982). Sahtu Metis still reside in several of the communities within the Sahtu and under

the SDMCLCA possess the same aboriginal and Land Claim Agreement rights as the Dene (Geirholm 2001).

Dramatic changes in the way the Region was governed began in 1867, when the British government passed the British North America Act which provided the Canadian federal government with exclusive legislative authority over “Indians and lands reserved for Indians” (British North America Act 1867:Sec.91.24). The Indian Act of 1876 further structured the dependent relationship and encouraged First Nations to adopt the political and social ways of mainstream, non-aboriginal society. In 1921, several of the First Nations inhabiting much of present day southern and central NWT signed Treaty 11. The treaty was the governing document for the people of the Mackenzie Valley for the next seventy years and paved the way for development of resources in the Region (DIAND 1996; Roberts 1994).

### **3.2 THE LAND CLAIM AGREEMENT**

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As a result of the changing political climate in northern Canada and the reaffirmation of First Nations rights, the era of comprehensive land claims began. The 1973 Calder decision<sup>7</sup>, in which the Nisga’a First Nation People of British Columbia claimed continued aboriginal rights in their traditional territory, provided a large impetus for present day negotiations. Following the Calder case, the government of Canada settled several comprehensive land claim agreements including the James Bay and Northern Quebec Agreement, the Inuvialuit Final Agreement, and the Gwich’in Agreement. Comprehensive claim agreements were different from the older treaties in that they did not call for the extinguishment of aboriginal rights and title. Rather they began to include and re-affirm wildlife harvesting rights, a share of resource revenues, aboriginal input

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<sup>7</sup> The Calder Case involved the Nisga’a Indians of British Columbia, who were seeking a ruling that their aboriginal title had never been extinguished. They lost their case at the Supreme Court of Canada, although three of the judges acknowledged aboriginal rights based on occupation. This set the stage for modern day treaties as the Governments were prepared to negotiate compensation for native peoples in return for their traditional interests in lands (Treseder *et al.* 1999).

into environmental decision making, and a commitment to negotiate self-government (DIAND 1996).

The other large impetus for the signing of the SDMCLCA was the Berger Inquiry, which transformed the fundamental social relations of native societies in the Mackenzie Valley. Apprehension of the pipeline project, together with new opportunities for communication and organization provided by the Berger Inquiry, prompted the self-organization of Mackenzie Valley First Nations and their emergence into modern politics (Francis 1980). The Calder decision, coupled with Berger's recommendation for a moratorium on the building of the pipeline until all outstanding claims were negotiated, forced the federal government to engage in significant negotiations with all First Nations groups in the Mackenzie Valley (Berger 1977).

The SDMCLCA was originally part of larger negotiation that encompassed most of Mackenzie Valley, but was derailed at the last minute as a result of some outstanding conflicts between the different signatories. A review of these difficulties will provide further context to the region and will illustrate the struggles that occurred and that are still occurring in the region. These external pressures on the SRRB have influenced both its development and structure along with its present operation in the Region.

### **3.2.1 Negotiating the Claim**

The negotiation of the present SDMCLCA can be traced back to the early 1970s. During the initial negotiation, the Indian Brotherhood of the Northwest Territories (IBNWT)<sup>8</sup> agreed to make a single claim with the Metis on behalf of all native people living in the Mackenzie Valley. Progress on negotiating the claim was slow and was dealt a large setback in 1976 when the Metis Association withdrew from the development of a joint claim, stating that they "could not abide the concept of a nation within a nation" (DIAND

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<sup>88</sup> The IBNWT was a group that was established in 1970 and initiated negotiations with the federal government regarding treaty settlement. Their argument was that 1) the treaties were peace agreements, and as such, never represented the surrender of Indian interest in the land, and 2) First Nation persons never received the full benefits outlined under Treaty 11 (DIAND 2002:1-3).

2002:1-3). That same year the IBNWT submitted a claim proposal in the form of a 'Statement in Rights' and an 'Agreement-in-Principle' that sought the establishment of a "Dene government with jurisdiction over a geographic area and over subject matters now within the jurisdiction of either the Government of Canada or the Government of the NWT" (DIAND 2002:1-3). This concept of a nation within a nation was rejected by the Prime Minister in 1977, and in the same year the Metis in the region submitted a formal claim. As a result of separate claims and the separate groups' inability to come to an agreement on a mechanism for conducting joint negotiations, the Minister in charge of DIAND cut off funding to the groups in 1978 (DIAND 2002).

This lull in negotiations was short lived and led to a proposal by the Metis in 1979 that would see the Dene negotiate on behalf of both groups. The three sides made limited progress in the early 1980s, but significant disagreement between the Dene and Metis led them to hire separate negotiators in 1982. This was further complicated by the ensuing development of a pipeline proposed in the 1970s. An 'Interim Agreement on Eligibility and Enrolment' was on the table for ratification in June, 1983. It was initialed by the Dene but rejected by the Metis. Funding for the two First Nations groups was suspended because of lack of progress and the eligibility and enrolment agreement was amended and ratified shortly after (DIAND 2001).

Over the next five years negotiations led to the tabling of an agreement in principle with the caveat that some sixty First Nations issues be addressed by the government. Some of these items remained outstanding and the agreement remained incomplete by the March 31, 1990, deadline. The Minister met with the Dene/Metis Leadership in April, 1990, agreed to several changes, and recommended the agreement be ratified. Voting on the agreement was to take place on March 31, 1991, but before that could occur, a joint Dene/Metis assembly recommended renegotiation, and backed their position with threats that court action would be taken if recognition of their aboriginal and treaty rights were not protected. The Delta Dene/Metis, along with the Sahtu Dene/Metis, disagreed with the vote and subsequently withdrew their negotiating mandate from the Dene/Metis leadership on August 1 and September 29 respectively. Both groups indicated that they

wanted the claim negotiated on a regional basis, and on November 7 1990 the government announced that they would negotiate regional claims. The Region was divided up into 5 distinct areas: the Delta (Gwich'in), the Sahtu, the North Slave, the South Slave and the Deh Cho (DIAND 2002; Simpson 1998).

### **3.2.2 The Spirit of the Land Claim Agreement**

The SDMCLCA was approved by the Sahtu Dene and Metis in July 1993, signed in Tulita on September 6 1993, and took effect on June 23, 1994 (DIAND 1994). The Land Claim Agreement serves a range of purpose. It establishes exclusive trapping rights for beneficiaries in the Sahtu area. It confirms the hunting and fishing rights of the Sahtu people in the Sahtu Settlement Area (SSA). It also guarantees the Sahtu Dene and Metis participation in institutions of public government for renewable resource management, land use planning and land and water use in the SSA. Participation in environmental impact assessment and review in the Mackenzie Valley is guaranteed and the agreement provides for negotiation of self-government agreements to be brought into effect through federal and/or territorial negotiation and subsequent legislation (DIAND 1994:1).

Specifically, the SDMCLCA was to fulfill the following objectives:

- a) Provide for certainty and clarity of rights to ownership and use of land and resources;
- b) Provide the specific rights and benefits in this agreement in exchange for the relinquishment by the Sahtu Dene and Metis of certain rights claimed in any part of Canada by treaty or otherwise;
- c) Recognize and encourage the way of life of the Sahtu Dene and Metis, which is based on the cultural and economic relationship between them and the land;
- d) Encourage the self-sufficiency of the Sahtu Dene and Metis, and to enhance their ability to participate fully in all aspects of the economy;
- e) Provide the Sahtu Dene and Metis with specific benefits, including financial compensation, land and other economic benefits;
- f) Provide the Sahtu Dene and Metis with wildlife harvesting rights and the right to participate in decision making concerning the use, management and conservation of land, water and resources;
- g) Protect and conserve the wildlife and environment of the settlement area for present and future generations; and
- h) Ensure the Sahtu Dene and Metis the opportunity to negotiate self-government agreements. (DIAND 1993a:2)

On June 23, 1994, beneficiaries of the SDMCLCA began taking steps to apply the Agreement according to the negotiated objectives and has been in the implementation phase of the agreement ever since. The implementation phase of the Agreement ends in 2004, when the SDMCLCA and funding formulas will be revisited and re-evaluated (DIAND 1993b). Findings and recommendations resulting from this research have the potential to play an important role when the implementation phase of this Agreement is reviewed. This document will provide the SRRB and the communities with a culminated version of the difficulties facing the Board and often the Region in general.

### **3.2.3 The Sahtu Region**

#### ***The Districts***

At present, the Sahtu Region as defined under the Agreement covers approximately 240 000 km<sup>2</sup> and is divided up into three separate political regions: K'ahsho Got'ine; Deline; and Tulita (refer to Figure 3). The Deline District contains only the community of Deline. K'ahsho Got'ine has the communities of Fort Good Hope and Colville Lake within its boundaries and the Tulita District is host to the community of Tulita and Norman Wells (SLUPB:2002a).

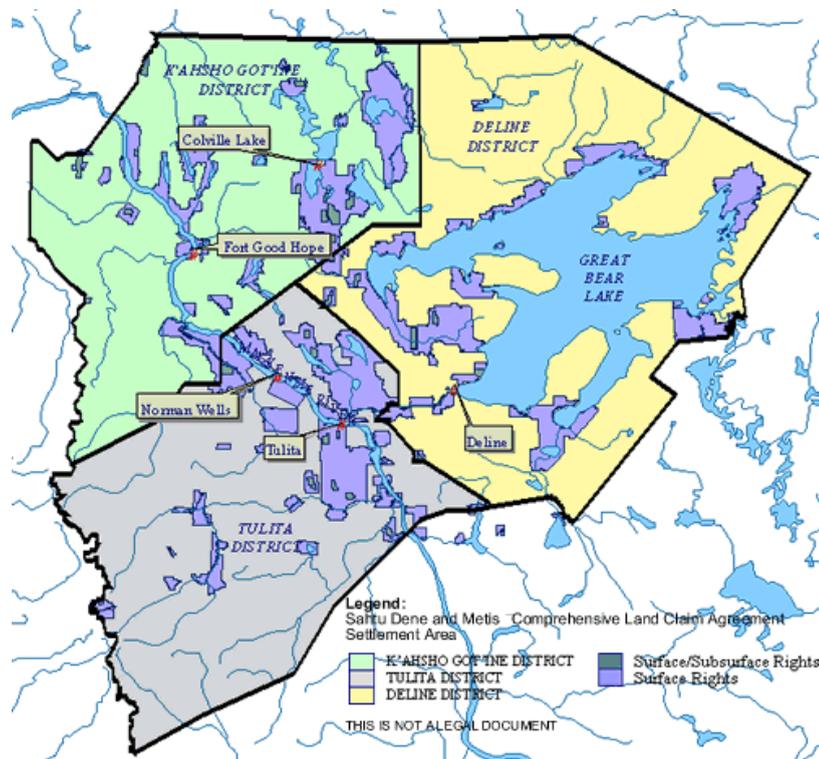


Figure 3: Sahtu Districts and Resource Rights (SLUPB 2002c)

Under the Agreement, the Sahtu Dene and Metis have title to 41,437 square kilometres of land in the NWT, a land mass that is slightly larger than Vancouver Island, including subsurface rights on just over four percent of that land, or 1,813 square kilometres. Accompanying the title of land is a 75 million dollar financial payment, distributed over 15 years, along with a share of the resource royalties accumulated from resource development in the Sahtu Settlement Area (DIAND 1994).

### **3.3 THE RESIDENTS AND THE COMMUNITIES**

The Sahtu Region contains five communities, with a total population of about 2800 residents. Demographic information indicates that First Nations make up roughly seventy percent of the population, most of whom are beneficiaries of the SDMCLCA. The term ‘beneficiaries’ refers to the Dene and Metis people of the Sahtu who have surrendered their rights under Treaty 11 and now have rights under the SDMCLCA. There are three types of ‘non-beneficiaries’ living in the Sahtu area: 1) beneficiaries of other land claim agreements, 2) First Nations members who have Treaty rights, and 3)

non-aboriginal people. In the Sahtu Region, non-aboriginal people make up 30% of the population, and have moved to the Region for employment (as in most communities, their employment rate is above 90%). The longitudinal statistics over the last 10 years indicate that more beneficiaries are being employed or are actively looking for work, while fewer are engaging in traditional pursuits and eating country foods (GNWT Bureau of Statistics 2001). A more detailed description of each of the communities follows.

Colville Lake (Population: 96; Aboriginal % Not Available)

Colville Lake is the smallest and the most recently established community in the Sahtu. It was traditionally a small outpost camp for a few families, but became a community in 1962 after a Catholic Church was constructed on the lake's shore. Today Colville Lake is the most remote community in the Sahtu, with access restricted to air service and a winter road. The community also has the highest percentage of people (56%) engaging in traditional pursuits. (GNWT Bureau of Statistics 2001, Geirholm 2000).

Fort Good Hope (Population 747; Aboriginal 85%)

Fort Good Hope was originally established as trading post for the Hudson's Bay Company in 1805. After a sequence of moves, the community relocated back to its original site in 1839 and has remained there ever since. The community is located 27 km south of the Arctic Circle. It is on the shore of Mackenzie River, and therefore has access to barge services in the summer, as well as air service and a winter road (GNWT Bureau of Statistics 2001, Geirholm 2000).

Deline (Population 645; Aboriginal 95%)

Deline, which means 'where the water flows', is located at the mouth of the Bear River on Great Bear Lake. Originally established as a trading post in the early 1800s, the community was named Fort Franklin, but was changed to Deline in 1993. Although the community is located on the Bear River, it has no barge access, as the River is impassable from the Mackenzie. Therefore, Deline must rely on a winter road and air service for transportation (GNWT Bureau of Statistics 2001, Geirholm 2000).

Tulita (Population 506; % Aboriginal 90)

Tulita, which means ‘meeting place of two rivers’, is located at the junction of the Mackenzie and Bear Rivers. The community was established as a trading post in the early 1800s and was originally called Fort Norman. Since Tulita is located on the Mackenzie River, it has a summer barge service, in addition to having access to a winter road and air service (GNWT Bureau of Statistics 2001, Geirholm 2000). Tulita was also located at two other sites on the Mackenzie River prior to its present location (Simmons 2003:Pers. Comms.)

Norman Wells (Population 882; % Aboriginal 26)

The community of Norman Wells is unique to the Sahtu Region because it has an active oil and gas industry operating within the community. Originally, the area was called *Le Gohlini*, which means ‘where the oil is’, and was formally staked as a claim in 1914. Norman Wells is well known for its summer tourism opportunities and maintains the largest non-beneficiary population in the Sahtu. It also hosts offices of the NWT Government, including the regional Resource, Wildlife, and Economic Development office (GNWT Bureau of Statistics 2001, Geirholm 2000).

### **3.3.1 Organizations created under the Land Claim Agreement**

When the Land Claim was agreed upon, the first organization created was the Implementation Committee, or the Sahtu Secretariat Inc. (SSI). The SSI’s responsibilities are as follows:

- Help members negotiate and enter into arrangements with the federal and territorial governments concerning implementation of the Comprehensive Land Claim Agreement;
- Undertake any other activities related to the interests and concerns of its members, in connection with the implementation of the Comprehensive Land Claim Agreement;
- Engage in and undertake any studies, educational activities or other projects and activities related to environmental impact on the lands, air, water and health of the residents of the Sahtu Region;
- Negotiate with industries and governments whose activities or decisions affect the environment in a manner which adversely affects the interests of the residents of the Sahtu Region; and

- Assist and enable its members to intervene and participate in any hearings, environmental impact assessments, policy or legislative reviews, or other decision making or review processes which relate to the environmental or economic interests and concerns of its members (SSI 2002).

The Secretariat consists of seven directors, one from each of the seven organizations resulting from the Dene Metis Land Claim Agreement. The SSI works to ensure the overall implementation of the Agreement. The SSI has a Chairperson who is chosen by the board members and who is usually a beneficiary (refer to Figure 4).

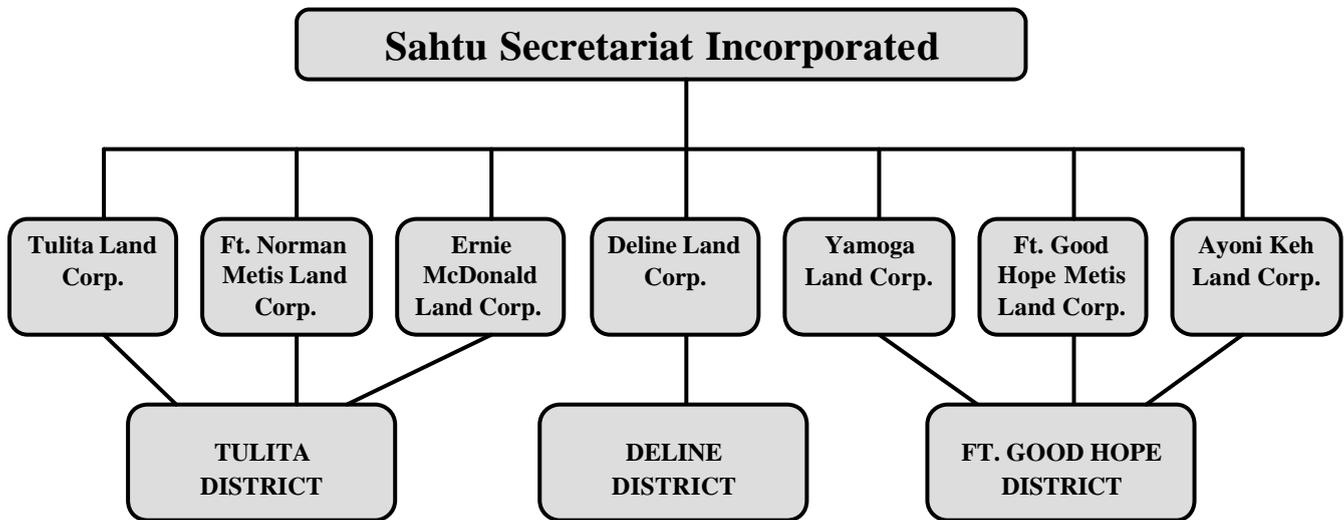


Figure 4: Sahtu First Nations Land Ownership Structure (SLUPB 2002a)

The SDMCLCA set up a series of boards at the community level that would help them manage the lands and finances of each community (refer to Figure 5). Every community has a Land and/or Financial Corporation that consists of elected members who make decisions related to monies and lands distributed as a result of the Land Claim Agreement. In reference to Figure 4, each District has its own unique way of dealing with these matters. In the communities of Tulita and Fort Good Hope, the interests of the Dene and Metis are represented separately by creation of separate boards in the communities. The Dene and Metis Land Corporations are separate entities at a community level and are overseen by the District Land Corporations (Interview 2002:22).

An example of the duties that would fall under the mandate of the Land and Financial Corporations is the Benefit Agreement negotiations that are currently taking place with the proponents of a Mackenzie Valley gas pipeline. This pipeline was an original trigger for the negotiation of the SDMCLCA. As a result of the Land Claim Agreement, each District now has the opportunity to negotiate benefits on behalf of its constituents through its District Land and Financial Corporation. (Interview 2002:40).

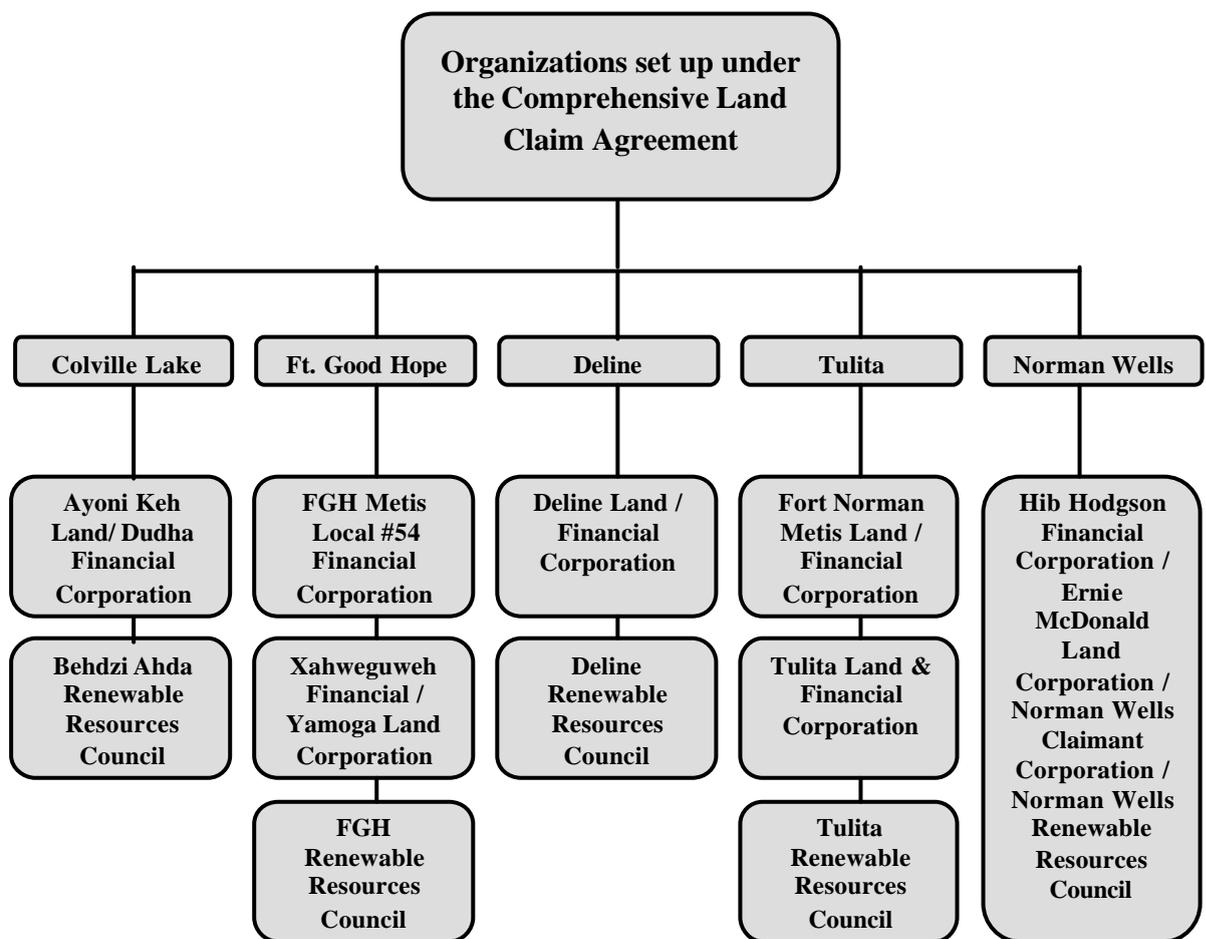


Figure 5: Sahtu Community Corporations and Councils (DIAND 1993a; Interview 2002:37)

Other organizations established under the Land Claim Agreement include the Renewable Resource Councils (RRC). The main purpose of these councils is to “encourage and promote local involvement in conservation, harvest studies, research, and wildlife management in the communities” (DIAND 1993b:69). The RRCs are also responsible

for the tasks that were previously carried out by the Hunters and Trappers Associations that served as their predecessor organizations before the Land Claim Agreement. These councils are controlled by community members who are usually appointed by the local Land Corporations upon nomination by their community peers (Interview 2002:37). The RRCs and their functions related to resource management will be explained in greater detail in Chapter 6, as they are integral to proper resource management in the Sahtu.

Additional boards in the Sahtu are the Sahtu regional co-management boards: the SRRB, the Sahtu Land and Water Board (SLWB) and the Sahtu Land Use Planning Board (SLUPB). The SRRB was set up as a direct result of the SDMCLCA, while the Planning Board and the Water Board are a product of the Mackenzie Valley Resources Management Act (MVRMA) that was proclaimed in 1998 (refer to Figure 6). The MVRMA was set up to encompass and standardize the planning and approval of development projects that were occurring anywhere along the Mackenzie Valley, an idea left over from the early negotiation processes that had all groups within the valley negotiating one claim. The MVRMA also set up two regional boards, the Mackenzie Valley Environmental Impact Review Board and the Mackenzie Valley Land and Water Board to deal with trans-boundary issues between the different Agreement areas. The SLUPB and the SLWB are both made up of four appointees, two from the federal and territorial governments and two from the SSI. Together the four members choose a Chair who is usually a beneficiary (Interview 2002:37; DIAND 2001).

The SLUPB is charged with developing and implementing a land use plan for the Sahtu Settlement Area. Once the land use plan is complete, their role will be somewhat diminished and their main function will be to review and update the plan as required and to engage in drafting specific Resource Management Plans. The SLWB will then use the Plan to administer land use permits and water licenses within the Sahtu settlement area (SLUPB 2002a). The SRRB is the main instrument of wildlife and forest management in the Region. These three co-management boards, along with Secretariat, work together to ensure that public resources are protected within the Sahtu, and that the communities and their residents are involved in the decision making processes (Interview 2002:37).

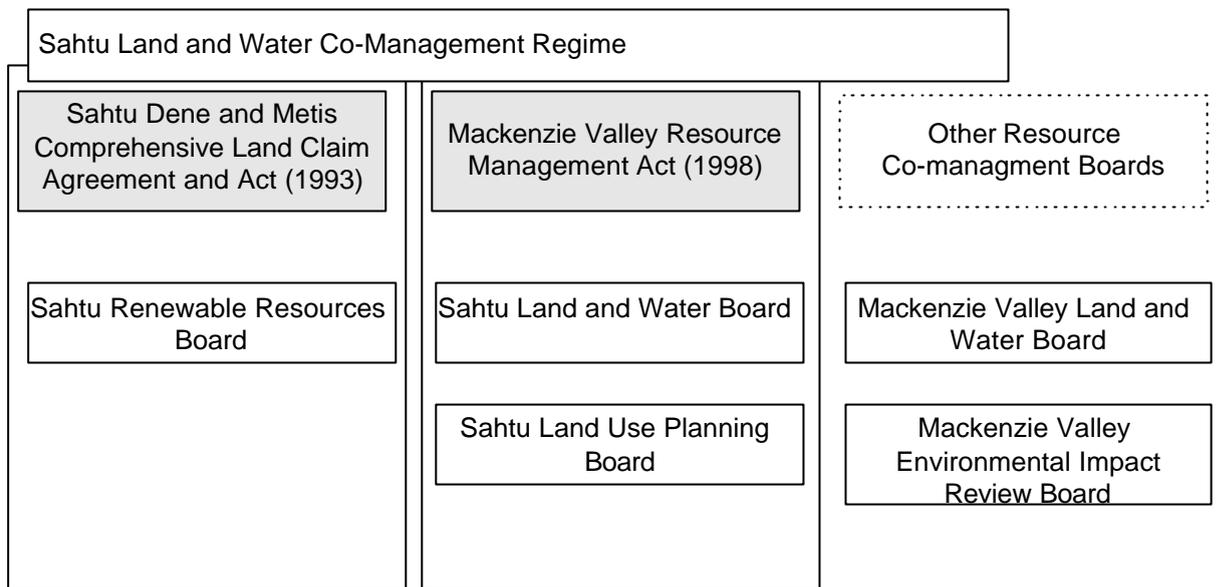


Figure 6: Land, Water and Resource Co-management Boards (SLUP 2002)

### 3.4 CONCLUSION

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Dramatic changes have occurred in the Sahtu Region over the last several hundred years, and have intensified in the last half century. The increasing pressure for resource extraction and development has been followed by an ever-changing social, economic, and political climate that is foreign to the original inhabitants of the Sahtu. On the other hand, the beneficiaries of the Region have been able to maintain many of their traditional practices and, as a result of the SDMCLCA, have legally entrenched some autonomous decision making power, including provisions for setting up self-government in the Region.

The settlement of the Land Claim Agreement introduced the Dene and Metis to more control over their traditional lands, but it has also compounded the bureaucratic processes in the Region. As a result, there are fourteen new organizations that are a direct outcome the SDMCLCA and four that are a product of the MVRMA, not to mention the numerous, cultural, health, education and justice boards that are in existence. These

additional boards, the lack of consistency regarding their set up, and limited understanding of complex legal documents (the SDMCLCA) at a community and organizational level, have diminished the effectiveness of the Agreement. Although the SDMCLCA is relatively new, these items will need to be addressed if the beneficiaries are to be effective on all the decision making boards in their community and to use their powers to the fullest (Interview 2002:27).

## CHAPTER 4

# RESOURCE MANAGEMENT

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Since European contact in the Northwest Territories, resource management has progressed from using a top-down Scientific Model of management to incorporating more of a user-based Stewardship Approach (Notzke 1994). Under the SDMCLCA, this transition has been facilitated by the creation of the regional resource co-management board, such as the SRRB, and community renewable resource councils. Together the regional co-management Board and the community Renewable Resource Councils provide opportunities for local resource harvesters to become directly involved in resource management.

The purpose of this chapter is to provide background to resource management regimes that have been or are currently functioning in the Northwest Territories and the Sahtu Region. A review of the principles and ideas that are the foundation of these diverse resource management schemes will provide an understanding of the present management regime and the range of issues that need to be addressed. Traditional and Scientific Management regimes, along with the general tenets of traditional and scientific knowledge, will also be reviewed to provide some theoretical background to the regimes. The emergence of co-management as the foundation of a new resource management regime will also be reviewed, and other relevant new approaches to resource management that embrace the ideologies of co-management will be discussed.

## 4.1 RESOURCE MANAGEMENT

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According to Usher (1987:6) a model or system of resource management must contain the following crucial elements:

1. An information base and a paradigm, or set of mental constructs, that organizes and interprets this information into useful knowledge;

2. A set of practitioners with a distinct world view or culture that includes both the afore mentioned paradigm and certain normative values;
3. A system of rules, norms and customs concerning rights and responsibilities that are intended to govern the behaviour of all who partake of resources and their benefits;
4. An overall set of objectives which are embedded in the institutions and ideology of the society as a whole.

Generally speaking, the scientific model of resource management grows out of a common property ideology that is attached to natural resources. Practitioners have a duty to manage the resources and ensure that all citizens have equal access (Berkes 1994). The traditional form of resource management also relies on the ideology that resources are communal, but believes that the local harvesting groups must make management decisions based on their own interest in a consensus manner (Osherenko 1988, Pinkerton 1993). Although, these regimes are explored as separate systems in many parts of this document, they are in essence academic distinctions that, practically speaking, are not mutually exclusive of each other. They are explored as two ends of a continuum in order to further understand the theoretical underpinnings of co-management, which is often viewed as the bridge that links the two seemingly opposing ends (Osherenko 1988).

The common requirement for any type of resource management is access to detailed information about the resource being managed and the environment in which it is being managed (Usher 1987; Roberts 1994). This data or knowledge is distinctive to each of the ideal types of management systems (traditional and scientific) and is explored below.

## **4.2 KNOWLEDGE SYSTEMS**

Since the inception of positivism, there has been an increased emphasis on scientific rigor and knowledge, leading to elitist or restricted views about the ways of knowing.

Modernist thought places knowledge systems on a temporal scale where progress, or more accurate ways of knowing, increase with time. Science, since it is the most recent knowledge system in this evolution of paradigms, is therefore the best way of knowing. The domination of Modernist thought in the West has led to a Modernization Model of

resource management that incorporates rational and quantitative techniques based on classical economics (Harper and Stein 1992).

Other knowledge systems have been viewed as less valid and lacking the components of scientific knowledge that allow them to be used in rational management techniques. Attempts have been made to patch traditional knowledge into the Modernization Model, although many of these attempts have tended to pay lip service to the local people and their knowledge systems, and they have not included any institutional change within the foundations of resource management. Since the inception of formalized co-management, attempts have been made to allow for a partnership of equals, where joint decision-making and responsibility are institutionalized. To fully understand traditional knowledge and scientific knowledge, along with their correlating management systems, each type of knowledge must be examined as an ideal type.

### ***Scientific Knowledge***

Scientific knowledge is often referred to as a rational, objective, and quantifiable system of knowledge collection. Klemke *et al.* (1988:14) list five defining criteria by which it can be classified:

- 1) Scientific knowledge has an element of intersubjective testability. In other words, a particular test can be done theoretically by anyone, anywhere, using the same procedure, and obtaining the same results – it has a sense of universality and replicability to it;
- 2) Scientific knowledge is considered reliable, in that information must be evaluated both internally and externally if it is to be accepted within the scientific community (peer reviewed for validity in both methodology and content);
- 3) Scientific knowledge is both definite and precise, illustrating the quantitative nature of science. Data tend to come to some logical conclusion that is supposed to objectively represent the reality of the situation;
- 4) Scientific knowledge possesses coherence or systematic characteristics, meaning that scientific ideas are connected in such a way that one flows from the other, rather than being a jumble of disconnected statements; and
- 5) Scientific knowledge is comprehensive, meaning that within the boundaries of an experiment, everything is explained as well as the data can manage, so as to provide a complete understanding of how or why the hypothesis in question is true or not. Science seeks to have a complete understanding that eventually answers all questions.

Essentially, these five formal criteria describe science as rigorous, methodological, academic, logical, and practical knowledge (Klemke *et al.* 1988). Combined, these characteristics are used to define the scientific method as well as the scientific perspective, which is essentially a reductionist point of view.

### ***Traditional Knowledge***

The traditional knowledge held by indigenous people is difficult to define, as it is not considered a separate category within Aboriginal culture; rather it's intertwined with all other aspects of society. As a result, a variety of terms and definitions are currently being used (Kassam and Graham 1999; Berkes 1999). From the large variety of definitions, five common characteristics have emerged:

- 1) Traditional knowledge is context specific. In other words the knowledge of a certain community is specific to their surrounding environment. Therefore, the knowledge held in one region may differ from that held in another region;
- 2) Traditional knowledge is formed by a worldview and is therefore subjective rather than objective. It is based on how a particular aboriginal group interprets and gives meaning to their environment;
- 3) Traditional knowledge is cumulative. Knowledge from previous generations is built on, rather than replaced by the next generation;
- 4) Traditional knowledge arises from closeness to the land. It is based on the relationships the aboriginal community has with its surrounding environment; and
- 5) Traditional knowledge is oral in nature. Information is both transferred and stored in an oral fashion, through the telling and remembering of stories or legends. (Kassam and Graham 1999:8)

The Traditional Knowledge Working Group set up by the Government of the NWT in 1989 defines it as:

Knowledge that derives from, or is rooted in the traditional way of life of aboriginal people. Traditional knowledge is accumulated knowledge and understanding of the human place in relation to the universe. This encompasses spiritual relationships, relationships with the natural environment and the use of natural resources, relationships between people; and it's reflected in language, social organization, values, institutions and laws (GNWT 1991).

This unique knowledge system is more than simply a collection of knowledge and practice and forms the basis of most aboriginal cultures. Through oral history, place

naming and spiritualism, symbolic meaning aids in cultural identification and in linking the past with the present. Traditional knowledge defines the norms and values of a community, including obligations towards community members, other 'beings' and the natural world in general (Berkes 1993).

### ***Opposing Knowledge Systems***

Theoretically, traditional knowledge can be described as using a system of qualitative measurements for data collection. The use of memory, experience, co-operation and often intuition of an entire community is required in order to accurately collect, store and recollect information for use in informal communal management systems (Mailhot 1993; Agrawal 1995).

On the other hand, scientific knowledge is often developed by an individual researcher or research group attempting to be 'objective' observers. Quantitative methods, site specific numbers, and theoretical models are used to answer specific questions about larger, more complicated questions, in relation to formalized management strategies. The opinions and intuitions of the researcher, through this logical train of thought, are supposed to remain objective (Usher 1987).

Often these two seemingly opposing ways of knowing (traditional and scientific) have competing objectives. Repeatedly these conflicts between knowledge systems, and frequently management systems, can be explained as the differences in preferences and aspirations as they relate to the frontier/homeland dichotomy (Kassam 2001; Berger 1977). Although both have a similar goal of long-term management and sustainability, short-term decisions differ vastly as a result of the different knowledge structures, their approaches or tools utilized for management, and finally their views of economics (Usher 1997; Notzke 1994). The reductionist views of the old style Scientific Managers are in many ways inconsistent with the holistic views of Traditional Resource Managers (Notzke 1994). Co-management builds on the goal of long term management and sustainability and tries to find common ground and build consensus around the areas of disagreement (Pinkerton 1989; Berkes *et al.* 1991).

To appreciate co-management's relationship to both Traditional and Scientific Management and their respective knowledge systems, it is first important to explore two broader approaches to resource management.

### **4.3 THE MODERNIZATION AND STEWARDSHIP APPROACHES**

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#### ***The Modernization Approach***

The Modernization Approach to resource management is based on the premise that natural resources are common property and must be managed to protect public interest. Sometimes referred to as the Missionary Approach to resource management, it was based on the belief that resource managers, using data resulting from the application of the scientific method, best know how resources should be managed, and therefore should make the management decisions. Thus, these professionals should be trusted with the authority to make rational decisions based on quantitative data (Bernhart *et al.* 1993, Usher 1987).

The Modernization Approach is a top down management scheme that is bureaucratic in nature, and is a legacy of the Modernist era where scientific impartiality and rigor were the most important criteria for gathering knowledge. Central to the Modernization Approach was the idea that man was dominant over nature and part of a philosophy of western science that aimed to control the environment (Berkes 1999). Although the Modernization Approach or Missionary Approach was widely practiced in the past (Bernhart *et al.* 1993), growing pressure from stakeholders to be involved in the decision making process has forced scientists and wildlife managers to share their roles with these individuals (Ludwig 2001). Increasing numbers of academics, wildlife managers and resource users are realizing that the ecosystem, which includes people, needs to be managed as a whole and that people are not outside, but part of the ecosystem (Simmons *et al.* 2001; Gunderson and Holling 2002; Kendrick 2003).

### ***The Stewardship Approach***

The Stewardship Approach to resource management is based on the principle that the public, or in the case of northern Canada, the resource user, should be an integral part of the decision making process for resource management (Bernhart *et al.* 1993). It has been argued that the public should be involved because a) the present expectations and attitudes of stakeholders who are demanding public input and scrutiny of wildlife management (Decker *et al.* 1996), b) collectively they have the largest effects on the environment, and having them involved can lead to conservation education and capacity building (Pinkerton 1989; Berkes *et al.* 1991) and c) if implemented properly it can be an effective form of conflict resolution (Jentoft and Kristofferson 1989). By allowing stakeholders, especially resources users, a voice in the process, it is anticipated that they will be more willing to live with the decisions and the decisions will be based on more complete information as local users will contribute their information in the process (Jentoft 1985; Warner 1997; Pinkerton 1989; McCay and Jentoft 1996; Jacobs 1989).

Although these arguments for stakeholder involvement have considerable merit, it is also important to consider both the Social Exchange Theory - people will only become involved in public decision making if the rewards equal or exceed the costs (Hagedorn 1994); and the Social Mobilization Theory – psychological empowerment comes from successful action in social or political organizations, while organizational empowerment comes from collective exercises in individual and organizational learning and trust building (Freidman 1992). Having stakeholders involved in the management of resources is only a viable option if people are willing to participate (i.e., the benefits outweigh the costs), and if an adequate method of involvement is developed. Stakeholders who are not truly interested in participating, or feel the method for involvement is inadequate, will not develop a comprehensive understanding of the process, or develop the skills and ability to add value to the process.

These two approaches to resource management are important to consider because they contain certain assumptions that in many ways dictate their resource management

regimes. Below is an exploration of two models of resource management that Osherenko (1988) refers to as ideal types.

#### **4.4 THE SCIENTIFIC MODEL**

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Usher (1987:3) characterizes the Scientific Resource Management as follows:

... the state assumes exclusive responsibility and capability for managing a resource equally accessible to all citizens. The state manages for certain levels of abundance on a technical basis, and then allocates shares of this abundance to users on an economic and political basis. The system of knowledge is based on a scientific accumulation, organization and interpretation of data, and management problems are resolved in a technical, ahistorical, and 'value-free' framework.

The system Usher (1987) describes is hierarchical in nature and is based on centralized authority that flows from the top down. Often managers are distinct from the harvesters, and resources are further compartmentalized, even to a point where wildlife is separated from the habitat it depends upon. The tools and techniques utilized to manage resources, from a scientific point of view, would also be separated from the resource user. This is intended to ensure value free decisions about the resources (Usher 1987; Freeman 1985).

In the context of the Canadian north, past Scientific Resource Management practitioners have been criticized for formulating strategies and making management decisions based on incomplete or inaccurate scientific data (Fuller 1979). The level of scientific knowledge needed to make sound management decisions is often unattainable, making comprehensive Scientific Management decisions in the North difficult. The other major criticism of past Scientific Resource Management in the Canadian North is that it has focused on managing parts of the environment, instead of the ecosystem as a whole. The reductionist nature of Scientific Management compartmentalizes different resources and fails to study and understand the interconnectedness of the whole system. Perhaps even more critically, this interconnectedness includes the social aspects of man's presence that affect, and oftendictate, resource health (Usher 1987; Freeman 1985).

### Components of Scientific and Traditional Management Systems

<u>Component</u>	<u>Scientific Management</u>	<u>Traditional Management</u>
Rationality	Individual	Collective
Authority	Centralized (Bureaucratic)	Decentralized
Administration	Government managers	Elders and hunting leaders
Goal of Management	Sustainable yield to maintain population levels	Sustainable yield to provide a continuous supply of food, Clothing and shelter
Rules & Enforcement	Regulation driven - written laws and regulations; formal enforcement and regulatory system	Value driven - customary law, unwritten rules; compliance based on cultural values and social controls; lead by example
Decision-making	Made by government managers and politicians	Consensus process involving those with knowledge and experience (elders and hunting leaders)
Allocation	Economic and political rationale; based on ideas of neoclassical economics - optimum use, maximum benefit	Consensus-based community decisions, based on necessity
Harvesting Practices	Selective harvesting focused on protection of females and young of species; individual harvesting and use of resources	Opportunistic, selective harvesting based on the knowledge of the social organization of animal populations; communal harvesting and sharing of resources
Conservation	Conducted by external agencies and based on scientific data	Integrated with management practices and research
Research	Research and management functions compartmentalized; quantitative methodology; focus on numbers	Research and harvesting integrated; qualitative methodology; generation of numbers not important

**Figure 7: Components of Western and Traditional Management Systems (Roberts 1994:24)**

## 4.5 THE TRADITIONAL MODEL

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The words “resource” and “management” imply a human superiority incompatible with the holistic values expressed by many traditional Native people (Shapcott 1989:72)

The Traditional Model of resource management rests on a communal property paradigm, where the manager and the harvester are same, and the activities of harvesting and managing are one task. Traditional Resource Management, as described by the Dene Cultural Institute (1993:11), stems from two factors:

- 1) The possession of appropriate local knowledge and suitable methods/technology to exploit resources;
- 2) A philosophy and environmental ethic to keep exploitive abilities in check, and to provide ground rules by which the relations among humans and animals may be regulated.

Pinkerton (1993:73-78) goes further and outlines several tasks undertaken within a Traditional Resource Management model to achieve a sustainable Ecosystem:

**a) Data Collection and Analysis**

Community members routinely get together and discuss resource harvesting success or failure in particular areas and formulate future resource harvesting plans based on the collection and analysis of a holistic view of their environment.

**b) Allocation**

Allocation in this sense is related to right of access to a particular resource. This management tool is usually controlled by the senior hunters or elders in the community and is often related to the possession of spatial and temporal knowledge related to the resource.

**c) Harvest Regulations**

Controlling who harvests, when they harvest, where they harvest and how they harvest is usually exercised by community elders and senior hunters in the community.

**d) Community Enforcement**

Verbal rules, social norms and taboos related to wildlife and resource harvesting are enforced by the community. Breaking the rules often results in severe consequences being placed on the deviant community member or members. Often, the punishment is ostracism, or banning from community hunts.

**e) Long Range Regional Planning of Resource Harvesting**

Community members adjust their resource harvesting plans and schedules to allow intensely harvested regions to rest and replenishment, leading into cycles of use and non-use. This type of planning is also related to an analysis of seasonal harvesting patterns and incorporated in a holistic fashion.

All of these resource management tools combine with the key aspects of traditional knowledge to constitute a Traditional Management system that has worked for centuries. With changes occurring at unprecedented rates in the Canadian north, a few interview respondents argued that Traditional Management is no longer relevant, as most hunters and gathers have access to, and utilize, modern technology to engage in traditional activity (Interview 2002:40). Osherenko (1988:5) writes “a key problem for the indigenous system arises when rules, once widely followed, are no longer passed down to younger generations.” Couple this with a reduction in the amount of traditional knowledge and an infusion of western media and western economic thinking, and some would argue that Traditional Management is something that no longer functions (Hoare et. al. 1993).

On the other hand it is important to note that knowledge is not static but something that changes and evolves. Although all the traditional knowledge or Traditional Management tools possessed by a group, may no longer be as robust or applicable in the present context, the combination of recent resource user observations and experiences with the traditional knowledge set that does exist, forms what Berkes (1999) considers local knowledge. This knowledge has been used in the recent co-management of several types of resources around the world and will continue to play an important role in informing collaborative management decisions. As knowledge evolves, so do the management systems that use this knowledge (Berkes 1999; Notzke 1994; Maher 2002:Pers. Comms.).

Regardless of questions and doubts that arise when speaking about the existence of Traditional Management in northern Canada, it is important to realize that the involvement of resource users in the management regimes is not only important because it provides access to traditional knowledge, but it also offers the potential for a resource management system that is driven by stewardship and self-regulation. The advantages of a Stewardship Approach became apparent when resource managers create appropriate methods for the inclusion of traditional knowledge, while ensuring that the costs to the participants are reasonable. One such attempt to use the Stewardship Approach can be found in co-management.

## 4.6 CO-MANAGEMENT THEORY

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Co-management is a consensus-based approach to resource use and development that is based on the sharing of decision-making power between the government and other major stakeholders. The other stakeholders may include resource users, other members of the communities, scientists and any other individual or group which may be affected by resource use or development (Campbell 1996). Although a form of co-management began in Canada in the early 1940's, the term was not officially used until 1978 when the Federal Department of Fisheries and Oceans described a process being used by local fishermen and the Department (Chambers 1999). In 1976 the Superintendent of the NWT wildlife service set up the Game Advisory Council to address the communication difficulties that they were having with the public. This seven member council was comprised of 5 aboriginal representatives, a big game outfitter, and a tourist lodge operator, and was charged with advising the Commissioner of research and management issues. This council served as a model for many of the present co-management processes set up in the NWT (Simmons *et al.* 2001). Prior to 1975, most co-management processes were informal arrangements that allowed local resource harvesters a varied amount of input into the decisions made by various government resource managers (Campbell 1996). Although experiencing limited initial success, the James Bay and Northern Quebec Agreement in 1975 legally established the rights of the James Bay Cree to participate in resource management (Chambers 1999; Campbell 1996).

Although there are several reasons for engaging in co-management of natural resources, the two outlined under the Stewardship Approach are of primary interest: 1) Understanding of the ecosystem, and the decisions made about it, will be more comprehensive as a result of the inclusion of traditional or local knowledge; and 2) Decisions are more likely to require only self-regulation and monitoring because resource users are given a voice and avenue for involvement in the process (Jacobs 1989, Pinkerton 1989). Secondary benefits of engaging in co-management can be found in the skill building of the people that become involved in the process, and a more efficient use

of time and money in avoiding legal challenges that come from unilateral resource decisions (Pinkerton 1989).

Pragmatically, co-management agreements allow for the critical evaluation of different perspectives and provide a format that tends to produce creative solutions. Because they rely on the sharing of information, they facilitate the process by which government and local communities can learn from each other. The result can be the formation of an extremely powerful database that combines different perspectives and knowledge. Ultimately the proponents of co-management believe that through the use of both traditional and scientific perspectives, more informed decisions can be made, and as a result, northern resources can be better managed (Interview 2002:22).

Co-management is defined in several different ways and can occur at a variety of different levels. Table 2 illustrates the levels of authority transfer in relation to community involvement.

**Table 2**  
**The Different Levels of Authority Transfer**

1	Partnership – community control	Partnership of equals; joint decision-making institutionalized; delegated to community where feasible.
2	Management Boards	Community is given the opportunity to participate in developing and implementing management plans.
3	Advisory Committees	Partnership in decision-making starts; joint actions on common objectives.
4	Communication	Start of two-way information exchange; local concerns begin to enter management plans.
5	Cooperation	Community starts to have input into management, e.g. use of local knowledge and research assistants.
6	Consultation	Start of face to face contact; community input heard but not necessarily heeded.
7	Informing	Community is informed about decisions already made.

Source: Adapted from Berkes, George and Preston 1991

Many of the co-management arrangements in northern Canada fall into the category of *Management Boards*. These decision making bodies involve the local community and

resource users in a substantive manner, and often provide them with the authority to make management decisions<sup>9</sup>. Although, communities are given decision-making authority, the degree of influence and control a community feels they have over a decision can be low. This partially results from the Government's ability to veto all decisions made by these co-management boards. In the case of the Sahtu, and the SRRB, the Minister of DIAND does retain veto power in management decisions, but has not exercised this to date. Although it would be politically risky to exercise this power, beneficiaries within the Sahtu Settlement area still view this setup as a major stumbling block.

#### **4.7 CO-MANAGEMENT AND OTHER MANAGEMENT SYSTEMS**

Resource managers have made recent attempts to adapt and improve the techniques of resource management. Managers have tried to address the former drawbacks of Scientific Resource Management and are embracing the holistic ideas found in Traditional Resource Management, and the concepts of a Stewardship Approach in an approach called Ecosystem management, which:

- Requires consideration of geographic areas defined by ecological boundaries and the perspectives provided by different spatial scales and longer time frames;
- Requires managers to take into account the complexity of natural processes and social systems and to use that understanding to craft management approaches that take advantage of these processes, rather than work against them;
- Incorporates explicit definition of biological and social goals at both the national and local scales, and elevates maintenance and restoration of ecological sustainability and ecosystem integrity as important goals;
- Emphasizes collaborative decision-making to deal with a landscape owned by many individuals and organizations with different values, interests and capabilities; and
- Uses a process of Adaptive Management to account for the uncertainty inherent in our understanding of the future, and employs a wide range of strategies and policy tools. (Ecosystem Management Initiative 2002)

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<sup>9</sup> As mentioned previously, SRRB 'decisions' are really 'recommendations' that the Board makes to the Minister of DIAND. Although the Board is considered a decision making body, it only makes recommendations to the Minister, who can agree or disagree with what is suggested. The process of Board decision-making will be reviewed later in the Document.

From a scientific perspective, ecosystem management derived from the concept of ecology that began as a science in the 50's and 60's. It did not become popular in practice until the late 80's and early 90's when scientists, land managers and resource policy analysts were looking for better ways to address declining ecosystem conditions (Maltby *et al.* 1999). Conversely, indigenous people have managed resources in a holistic fashion from time immemorial, altering biotic composition of their immediate environment in order to derive benefit and maintain sustainability (Czech and Krausman 1997, Notzke 1994). One of the most significant ideological shifts that must occur within Ecosystem management is from the philosophy of command and control, where precise control of events and outcomes within the environment is possible, to a philosophy that embraces and incorporates uncertainty and complexity (Meffe *et al.* 2002). This approach within scientific resource management literature is termed adaptive management (Meffe *et al.* 2002, Walters 1986) and is widely accepted as part of Traditional management systems (Berkes 1999).

Walters (1986:8) characterizes Adaptive Management as:

...beginning with the central tenant that management involves a continual learning process that cannot be conveniently separated into functions like 'research' and 'ongoing regulatory activities', and probably never converges to a state of equilibrium involving full knowledge and optimum productivity.

Adaptive Management embraces the notion that the amount of data required for true Scientific Management is impossible to achieve. Faced with this predicament, one must be flexible and adaptive to changes that might occur in the resources being managed (Interview 2002:40; Berkes 1999). Presently two forms of Adaptive management are practiced. Active adaptive management applies the scientific method of experimentation to a management setting. The Active form requires the construction of elaborate models based on scientific rigor and objectivity, and a series information feedback loops within those models to promote learning and understanding. Passive adaptive management can be described as documented trial and error. Some aspects of scientific experimentation are missing, but learning and the exchange of information is still a major objective of the activity (Meffe *et al.* 2002).

The theoretical framework for Adaptive Management bears a resemblance to the framework outlined for Traditional Resource Management.

The use of traditional ecological knowledge in an experimental way to learn from management interventions, with subsequent policy changes, makes it a potential tool for Adaptive Management...Both indigenous knowledge and Adaptive Management focus on feedbacks and the maintenance of ecological resistance. (Berkes 1999:30)

Berkes (1999) feels that decisions made within the Adaptive Management framework, combined with an Ecosystem Approach, and governed by co-management regimes holds some of the greatest potential for holistic resource management in northern Canada.

Though in premise, the combination of principles from co-management, ecosystem management, and adaptive management is attainable, the complexity of designing a management method tailored to the specific requirements of the management area, while addressing present management concerns, will make the process difficult. To fully embrace this combination of ideal principles, significant human and financial resources, which are presently limited in northern Canada, are required. Although implementation of all principles at once might be difficult, moving towards this ideal type of management incrementally, with the help of a strategic plan and a clear vision, will make the process more attainable for renewable resource co-management boards.

## **4.8 CONCLUSION**

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It is important to note that changes to resource management are continuous. Implementing any of the philosophies of resource management is dependent upon a) the actions of individuals involved in the process, b) the institutions it operates within, and c) the legal framework it operates under. Although resource management is persistently changing, it is anticipated that recent trends using more of a Stewardship Approach will become more prevalent.

By speaking about these regimes as ideal types, the theoretical information required to further understand resource management in northern Canada can be brought to light. Co-

management as a management regime attempts to bridge many of the differences identified within the Chapter. The review of resource management has identified key aspects of resource management regimes and will provide a starting point for the assessment of co-management. Resource management specific to the Sahtu is further explored in Chapter 6, where a more detailed explanation of this management regime will be undertaken.



## CHAPTER 5

# EVALUATION THEORY AND DESIGN

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Evaluation theory and practice has become more varied and complex over the last several years (Rossi and Freeman 1985; Duignan 2001). Many different assessment tools and philosophies from an academic, health delivery and business model perspective were consulted while designing the evaluation framework. Building from other evaluations of co-management, this framework echoes the work done by Hayes (2000), Chambers (1999), and Roberts (1994), but has been tailored to address specific SRRB issues. The research approach and evaluation build upon a range of evaluation philosophies that include Utilization Focused Evaluations (Patton 1986), participatory evaluations (Manaaki Whenua 1997), fourth generation evaluations (Guba and Lincoln 1989), and mainstream evaluation (Duignan 2001). These evaluation philosophies are more directed toward seeking out information that is useful to the program or organization being evaluated, than toward an evaluation technique simply interested in detecting and assessing the ‘objective truth’ (Guba and Lincoln 1989).

This chapter begins with an overview of the manner in which the evaluation was designed. This will include a summary explanation of the principles used as a basis of the research approach and evaluation framework. Integral to this chapter is an explanation about assessment indicators and criteria, why they are important features of co-management, and how they were assessed. The assessment will be further explored in Chapter 7, where the results of the research are presented.

### 5.1 EVALUATIONS

According to the Webster Dictionary (Merriam-Webster 2002), the definition of the term ‘evaluate’ means to “determine the significance, worth, or condition of, usually by careful appraisal and study.” Professionals in the field of evaluation, such as Guba and

Lincoln (1989) feel that the definition of evaluation is one that evolves and is based on how an evaluation proceeds and what its purposes are. For the purpose of this study the evaluation can best be defined by exploring why the evaluation was undertaken.

The accurate and timely collection of this evaluative information can lead to the growth and development of systems, organizations, and individuals. Whether looking at a board and its staff or the communities and resources co-management boards hope to influence, information occupies a central position in their evolution (Roberts 1994). As a relatively new resource management body, the SRRB must have access to a wide range of in-depth information and the capacity to interpret it in a coherent manner. In undertaking the assessment of the SRRB, it became clear that the Board was dealing with internal and external barriers that were affecting its function as a resource management body. Thus the evaluation focused more on process than clearly identifiable outcomes that business model or performance management assessments are preoccupied with.

To ensure that the information evaluations provide is useful to the organization, a shift in the evaluation paradigm has occurred. Building on the concepts of social mobilization and similar to the concepts underpinnings of a Stewardship Approach or co-management approach, evaluation professionals now argue for more of a grassroots review from within the organization (Patton 1986, Guba and Lincoln 1989, Rossi and Freeman 1985, Duginan 2001). Study participant involvement increases ownership of the process (Guba and Lincoln 1989) and frequently builds capacity in the participants (Duginan 2001). Budgeting and time constraints in the SRRB evaluation required the use of both deductive and inductive research techniques that allowed for community and Board input, but also included criteria from prior co-management evaluations.

The assessment process is presented below in a comprehensive and descriptive fashion. Support for the use of these criteria stems from academic literature, prior evaluations, and interviewee input. Chapter 7 will then reveal what interviewees understood and acknowledged about these criteria or 'points to consider', along with researcher observations, determining the general condition of these points and reporting it in a

descriptive fashion. This information will then be used as the foundation of the recommendations in Chapter 8.

## **5.2 DEVELOPING THE SRRB FRAMEWORK**

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Although it was the aim of this research to produce an evaluation framework that was replicable beyond its initial use in this project, it became increasingly apparent that there was a significant trade off between replicability and applicability. In order for a process to be replicable in a variety of resource co-management regimes, or in the same resource management regime on an ongoing basis, it had to be general in nature and less informative. At the same time, a highly specific assessment tool would only provide a snap-shot of the regime and would not readily lend itself to future evaluations of an evolving management regime. With the required interventionist approach in mind, a balance would be necessary for the evaluation to be meaningful and useful in the long term

The evaluation criteria examined in this framework derive from much of the literature related to the theory of co-management. Pinkerton (1989) and Roberts (1995) outlined many of the theoretical preconditions for the successful operation of co-management, included in this framework. The evaluation framework outline that follows is an adaptation of the work done by Hayes in 2000, when she evaluated co-management in the Yukon. The framework is divided into five sections: Formation, Organization, Operations, Actions and Effectiveness. Within these categories there are a list of factors that were examined and numerous points to consider under each factor. The factors and points to consider form the list of items assessed within the framework.

**Table 3**  
**Summary of Assessment**

	<b>Factors</b>	<b>Points to Consider</b>
<i>Formation</i>	Purpose for Creation	- Proactive or developed as a result of crisis
	Scale of Management	- Small definable area - Definable number of resource users - Control of allocation - Link between landscape and user - Correlation between scale of the management regime and the resources being managed
	Co –management implementation	- Clear outline and understanding of responsibilities in the beginning - Prior resource management effects
<i>Organization</i>	Board Composition	- Board size matches the area being managed - Representatives represent the stakeholders - Continuity: trade off between maintaining skills and becoming stagnated
	Board Member Skills	- Leadership - Confidence - Belief in the process - Time management skills - Cross-cultural sensitivity
	Board Mandate and Authority	- Clearly defined management functions - Mandate and authority correspond - Appropriate stakeholder perception of authority
	Board Funding	- Sufficient to fulfill mandate - Consistent for budgeting purposes - Long-term
	Board Accountability	- Board member - Staff

<b>Operations</b>	Meetings	<ul style="list-style-type: none"> <li>- Location</li> <li>- Timing, frequency and alteration</li> <li>- Facility setup</li> <li>- Appropriate process</li> <li>- Facilitator</li> </ul>
	Staff	<ul style="list-style-type: none"> <li>- Hiring local individuals</li> <li>- Consistency – related to organizational learning and capacity</li> </ul>
	Expectations	<ul style="list-style-type: none"> <li>- Appropriate timelines</li> <li>- Appropriate workloads</li> </ul>
	Access to information and education	<ul style="list-style-type: none"> <li>- Maintaining transparent communication</li> <li>- Education aimed at Board members and staff</li> <li>- Education aimed at community youth</li> </ul>
	Communication	<ul style="list-style-type: none"> <li>- Method of communication</li> <li>- Form of communication</li> <li>- Cross cultural communication techniques</li> </ul>
<b>Actions</b>	Issue identification	<ul style="list-style-type: none"> <li>- <i>Ad hoc</i> vs. formalized method</li> <li>- Grass roots vs. Government/Scientist</li> </ul>
	Community involvement and consultation	<ul style="list-style-type: none"> <li>- Clear and effective link between organization and community</li> <li>- Methods utilized</li> <li>- Participants as equal partners</li> </ul>
	Research	<ul style="list-style-type: none"> <li>- Methods utilized</li> <li>- Setting priorities</li> <li>- Community Involvement</li> <li>- Balancing between scientific and traditional knowledge collection</li> </ul>
	Decision-making	<ul style="list-style-type: none"> <li>- Process for decision making</li> <li>- Equal partners in decision-making</li> <li>- Binding decisions or recommendations</li> </ul>



When choosing items to evaluate, it was important to consider:

1. How the information is going to be gathered, or where the information is going to come from, and
2. How crucial is the item being evaluated, or how important is it to the Board members and stakeholders?

Setting these two items up on intersecting continua can be represented graphically as four distinct sectors (Figure 9). As the research progressed, items of assessment were included and removed from the final analysis based on which sector of the chart they were located in. By forming a partnership with the SRRB, their staff and members were able to provide input through informal conversations and formal interviews on what they felt was important and not important to the evaluation. Direction and input from insiders and community members provided context and enhanced understanding of the Board's operations. The research was strengthened by the partnership that was formed with the SRRB and the input provided into the research and the criteria for assessment. By sanctioning the research and validating the results, the Board was integral to a comprehensive assessment (see appendix A for Partnership Letter). The criteria used in this assessment therefore come from a mixture of sources: Prior evaluations, Interviewee Input, Researcher Input. Together these criteria and their descriptive indicators form the basis of the evaluation and subsequent recommendations.

## **5.4 THE EVALUATION FRAMEWORK EXPLORED**

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### **5.4.1 Formation**

#### **5.4.1.1 Purpose**

There have been several purposes for the formation of co-management or Collaborative Management processes in the past. In Canada, many of the co-management arrangements have been set up either as a response to a crisis, real or perceived, or as a result of a formal agreement, such as a Land Claim Agreement (Pinkerton 1989, Usher 1991). Each arrangement is unique and can range from *ad hoc* processes to formalized, legally entrenched agreements. While there is little agreement among academics whether

formalized agreements or *ad hoc* processes work better, the manner in which the process was formed is important to the overall evaluation (Notzke 1993).

It has been argued that the processes that are created as a result of crisis work better because they help clarify the problem in participants' minds and motivate them to find a common long-term solution (Huntington 1992). On the other hand, formalized proactive processes usually have more adequate resources at their disposal to complete their official mandates (Usher 1991, Pinkerton 1989). Either reason for developing co-management has experienced its share of triumphs and pitfalls (Notzke 1993). Prior research in this field by Roberts (1994) indicates that while formal arrangements can diminish incentive, support, and therefore a mainstay of co-management theory, participation, the clarity of mandate, and access to resources is something that many formal co-management arrangements enjoy. Ultimately, co-management arrangements set up in response to crisis take advantage of the perceived sense of urgency and immediately identifiable outcomes, but should fairly rapidly move to a more organized arrangement (Huntington 1992). The positive aspects related to the concentration on an identifiable problem and outcome can be attained within a formal arrangement as well (Roberts 1994).

As there is not necessarily a right or wrong reason for setting up a co-management arrangement, the conditions used to review the development of the process were based on the comments and feedback of the interviewees.

#### **5.4.1.2 Scale**

The scale of co-management arrangement is crucial to the success of the management body. Building on the work of Pinkerton (1989), Hayes (2000:46) believed that the focus of "management should be a relatively small area defined by direct links between the landscape and the benefits to local users". Pinkerton (1989) believed that this link between the management area and the resource user is important because it provides motivation to remain interested in the sustainable management of their resources - they have a vested interest. Pinkerton (1993) also believes in keeping the number of resource users small and that these resource users must be in constant communication with each

other. She argues that that a limited group of harvesters must be able to control allocation of resources within specified areas to ensure that over-harvesting does not occur. The larger the scale of the management area, the more resource users involved and the larger the ecosystem and its links (Pinkerton 1993).

Recently reviews of collaborative resource management have also identified the need to match the scale of the organization for management with the scale of the resources being managed (Berkes, Colding and Folke 2003)<sup>10</sup>. Carlsson (2003) concludes that small, well organized, local groups, who are closely connected to the landscape, are in a better position to adapt and shape ecosystem change and dynamics than remote levels of government. Although these localized groups are in a better position to detect and learn from changes in the local environment, the presence of overlapping jurisdiction, ecosystems and watersheds that extend beyond their boundary of knowledge, force these local groups to participate in cross scale organizations of resource management (Berkes, Colding and Folke 2003). The presence of multi-scale resource management is a reality, but the important items to concentrate on are 1) whether the management scale matches the scale of governance implemented; and 2) whether there is clear communication between the groups.

#### **5.4.1.3 Implementation**

The implementation of co-management is largely dependent upon the formality of the process and under what circumstances it was initiated. In the case of formalized, proactive arrangements, it is important that the stakeholders involved in the process have a clear idea of what they need to accomplish (Interview 2002:27;08). A lack of clear guidelines and mandate may weaken an organization from its inception, and put it at a disadvantage if clear roles and responsibilities are not spelled out (Staples 1995). There must also be a review of the prior resource management that may have occurred in the Region. The transition phase between co-management and the management that was occurring prior must be investigated. Especially important is the exploration of prior

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<sup>10</sup> When speaking about the scale of the area being managed, it is important to not that in northern Canada, although the management area might be large, the populations living that area tends to be small. Therefore the scale of management needs to be relative to the population, the resources, and the environment.

community level resource management, the structures that were set up during this phase and what became of these institutions during the transition stage (Simmons 2002:Pers. Comms.). Questions include: a) what type of local management was occurring prior to the present management, b) how was this management undertaken and was the community reaction to it, and c) what happen to this management institution during the transition phase?

## **5.4.2 Organization**

### **5.4.2.1 Composition**

The composition of the Board is usually dictated by the size of the area being managed and the number of diverse stakeholders residing in the management area (Pinkerton 1989). Although there is a general agreement that board size should be kept to a minimum (Berkes 1989; Jentoft 1989), decisions made by a co-management organization with representation from the variety of stakeholder groups is more likely to be accepted by a wider audience (Adams *et al.* 1993). There are three important components to consider when assessing board composition: size, representation, and continuity (Jentoft 1989, Pinkerton 1989). Osherenko (1988) suggests that the size of co-management boards should be limited, as consensus decision making becomes difficult and time consuming with large numbers of representatives. The number of representatives on a board should coincide with the range of stakeholder groups claiming interest in the area being managed. Prior co-management evaluations have indicated that an excessive numbers of representatives limits the comfort level that individuals have when speaking at meetings and reduces the amount of effective communication that occurs (Roberts 1994, Chambers 1999).

The quality or integrity of representation is also important to board success, and needs to be considered in two ways: 1) Are the people that sit on the board representing stakeholder group concerns over personal concerns? (Interview 2002:37) and 2) Do all identifiable stakeholder groups have representatives (McCay and Jentoft 1996)? It is crucial that all stakeholder groups feel a sense of connection to the board through their

representative. “Much of the conflict over management of lands and natural resources ... concerns who has a legitimate voice in how those lands are used” (Paulson 1998:311).

The final item that needs to be assessed is member continuity. The timing of membership turnover is important to the collective knowledge and skill that a board possesses (Interview 2002:27). If members are all replaced at the same time, the collective capacity of the board will be reduced as all board members will need to be educated about the operation of the board (Chambers 1999), and trust will need to be rebuilt among the members (Scooter 1991). Similarly, when board members are continually replaced with new members on a yearly or bi-yearly basis, collective capacity will be limited. Conversely, it is important that board members are replaced on an alternating basis to ensure that fresh ideas are introduced and to prevent the board becoming somewhat of a private club (Roberts 1994).

#### **5.4.2.2 Board Member Skills**

The skills and performance of individual members are also important to the co-management process. Board members need to effectively represent the interests of their particular stakeholder group by possessing several different qualities and talents. According to recent evaluations of co-management boards, academic literature and interviewee input, the following were identified as being important: Leadership – they must be seen by their stakeholders as a competent individuals who will represent their interest (Higgelke and Duinker 1993; Roberts 1994); Confidence – members must be confident enough to consult their stakeholders and present their concerns in a public forum (Interview 2002:04); Belief in the process – board members must believe in the process and have a genuine interest in resource management (Pinkerton 1989; Chambers 1999); Time management skills – members must have the foresight and planning abilities to prepare for board functions and duties (Roberts 1994; Interview 2002:37); and Cross-cultural sensitivity – board members must exhibit a genuine interest in, and understanding of cross cultural approaches and solutions (Peter and Urquhart 1991; Interview 2002:39). Although it is difficult to assess these criteria for each and every board member, these items of assessment are integral to the proper function of a board,

and will be addressed at a general level. The information used to assess the general level of skills possessed by Board members came from the common themes and acknowledgements identified from the interview data.

#### **5.4.2.3 Mandate and Authority**

The mandate of a board is important in that it identifies the tasks that the staff and the board members need to be engaged in (Huntington 1992). The mandate of a board also needs to coincide with the authority that it has been given (Pinkerton 1992). A clear understanding of the mandate must be expressed by both the staff and the board members to ensure that the roles and responsibilities entrusted to the board are being fulfilled (Interview 2002:08).

Once the mandate is understood, the board must be able to exercise enough authority to fulfill its mandate. Also, the perception of authority in many co-management regimes does not always reflect the actual authority that a board enjoys. It is the stakeholder perception of authority that needs to be examined in detail to further understand how the mandate of the board and the authority work together (Huntington 1992; Interview 2002:27).

To assess the mandate and authority of the SRRB, the SDMCLCA, IP, and operating procedures were reviewed and compared with the information provided by the Interviewees.

#### **5.4.2.4 Funding**

Board funding needs to be adequate, consistent, and long term (Pinkerton 1989). In order for co-management boards to engage in long term holistic planning, they need to be financially secure. Boards need to have access to finances that will enable them to fulfill their mandate (Osherenko 1988). The funding must be sufficient to cover the costs associated with staffing, office expenses, member and staff training, board member expenses and meeting expenses. (Hayes 2000). Co-management regimes may receive

funding from a variety of sources including government, industry, and non-governmental organizations (Chambers 1999).

To assess funding adequacy and consistency, the SDMCLCA, the IP and general comments of the individuals interviewed guided the findings. The SDMCLA outlined the general responsibilities, the IP outlined in detail the dollar figure allotments per task per *annum*, while the interview data provided qualitative feedback.

#### **5.4.2.5 Accountability**

Board members and staff need to be accountable for the roles and responsibilities that they are entrusted to undertake (Hernes and Sanderson 1998, Interview 2002: 27). They must also be accountable for the budgets dedicated to resource management. In cases where board members are elected by the stakeholders, accountability is taken care of through the election process. Board decisions are tested in public, and the public has the opportunity to register its opinion during the next election process (Hernes and Sanderson 1998). In cases where members are appointed, a mechanism is required for the removal of individuals when they do not fulfill their responsibilities. There must also be a removal process for staff members who do not satisfying their job requirements (Interview 2002: 27; Hayes 2000). Wondolleck and Yaffee (2000:238-239) point out that accountability in collaborative decision-making processes can be enhanced if the decisions are made in accordance with the norms of good collaborative decision making: achieving a representative, inclusive, productive, and credible process. These norms are part of the larger goals associated with co-management and collaborative management regimes, and will be commented on throughout the assessment process.

Accountability was assessed through a review of the SDMCLCA and the SRRB Operating Procedures. Participant interview data provided the balance of the information and feedback on accountability measures within the SRRB.

### **5.4.3 Operations**

#### **5.4.3.1 Meetings**

Meetings are usually the main decision making forum available to co-management boards. Significant attention must be paid to location, timing and setup for board members to feel comfortable (Peter and Urquhart 1991). Frequently, meetings are public events that need to take place in the communities that are located in the specific area being managed. This will ensure that resource users have the opportunity to attend the meetings and feel involved in the process. When there are several communities within the management area, it is important that meetings alternate throughout these communities to limit the perception of favoritism (Wondolleck and Yaffee 2000; Roberts 1994). The board must also be able to meet *in camera* to discuss sensitive staff or board issues in a private setting (Interview 2002:41).

The setup of the meeting room is important to consensus decision making. The arrangement of the table and chairs in a circle can improve communication, while rectangular arrangements can increase tensions among the participants (Kassam 1996). Participants must also have a clear sense of what is going to be discussed at the meeting and enough time to prepare for the agenda (Roberts 1994). Preparation for meetings can be enhanced when members are a) given the opportunity to engage in setting meeting dates, b) are supplied with detailed meeting agendas, and c) are equipped with the relevant skills and data, well in advance of the meeting. The frequency of these meetings must reflect the amount of information that needs discussion. Trade-offs exist between holding too many meetings with little or nothing to decide and holding too few meetings where there is insufficient time for full discussion of topics (Chambers 1999).

The final consideration is whether the meeting is conducted in a manner that is acceptable to the, stakeholders and board members. This point is of particular concern to First Nations who have limited experience participating in formalized meeting processes. If participants are not comfortable with the procedures, or feel that they are working outside the process, their participation will not be effective (Chambers 1999). Roberts Rule of Order is a popular method of conducting a meeting, but is not necessarily effective when

dealing with consensus decision making. Decreasing the formality of the meeting and providing significant breaks, or break-out sessions within the meeting, will increase time spent on specific topics, and allow for more informal conversations.

An adept meeting facilitator or chairperson is integral to the flow of the meeting regardless of the manner in which it is conducted. Facilitators need to be trusted individuals who are regarded as non-biased while being genuinely interested in resource management. They will need to possess patience and a keen sense of cross-cultural understanding (Kassam 1996).

Research notes related to participant observation, interviewee feedback, and a review of the SRRB Operating Procedures are the foundation for the assessment of SRRB meetings.

#### **5.4.3.2 Staff**

Staff members are hired to assist the board in fulfilling its mandate and are crucial to the success of co-management boards. These individuals are employed to perform a multitude of duties for the board and should be hired from the local community, where possible, thus building local capacity (Interview 2002:04; Hayes 2000). According to Chambers (1999), staff responsibilities usually include: logistical planning, meeting agenda preparation, distribution of information relevant to the meeting, meeting minutes, facilitating communication between the members, assisting the Chair and the Executive Committee, facilitating the board/public communication, and dealing with logistics of daily operation. Competent and consistent staff can enhance the completion of these tasks (Interview 2002:08) and lead to increased organizational capacity.

In the case of a formalized proactive board like the SRRB, the staff is in charge of some additional items that are somewhat unique to boards set up under Land Claim Agreements. While I was conducting the study these include an independent research function, the management of a Research Fund, and carrying out a community Harvest Study. These three additional tasks are significant undertakings, and in the case of the

SRRB, account for two of the four staff members hired. The performance and job duties associated with the staff have received limited assessment in prior evaluations of co-management. This is in part due to the difficulty in singling out individuals and assessing them on a personal basis. To overcome this awkwardness, these types of evaluations should take place internally and as part of the daily operation of the board.

As comprehensive staff evaluations should, and do, take place internally, the assessment within this document will be limited to general comments that reflect interviewee feedback, along with a descriptive review of their roles within the organization.

Although, the capacity of the staff is an internal matter, the consistency of membership and the ability of the organization to build capacity and learn can be gleaned from the Interview data.

#### **5.4.3.3 Expectations**

According to Hayes (2000), there are two elements that can be examined: workload and timelines. Many of the problems associated with expectations relate to different cultural perceptions of efficiency.<sup>11</sup> As pointed out by Kofinas (1998) and Morgan (1993), the board needs to strike a balance between respecting community timelines (which includes board member demands to consult their stakeholders) and the pressure to make decisions in a timely fashion. By finding a balance between the two, appropriate timelines for completing tasks can be established.

The other expectation relates to appropriate workloads for board members. Commonly, board members have other demands on their time that result in an overloading of their schedule (Gallagher 1988). This is especially true in small communities that have a limited number of individuals that are qualified enough to sit on the board, and have a genuine interest in resource management. Overloading board members can seriously affect the smooth operation of a board (Interviewee 2002:37).

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<sup>11</sup> The concept of Efficiency is complicated by different cultural definitions of the term. Arthur Okun (1975), an economist, believes that there is significant trade off between efficiency and equality within society. To gain equality within society, a certain amount of efficiency must be sacrificed. Being too efficient in the use of meeting time can come with significant tradeoffs in terms of the perception of equality.

A third expectation from other evaluations relates directly to First Nations and community board members. Commonly, there is an unreal expectation that board members will be able to live fully in both worlds. They are expected to have the written language skills and leadership abilities associated with being a member of a formalized board; but they are also expected to have significant, up-to-date information about the resources they harvest. Balancing the need to be out on the land to maintain their knowledge base, while being a full fledged member of a formalized co-management body is unrealistic.

Expectations placed on Board members were assessed *vis a vis* a review of participant observation notes and correlating data gathered from interviews.

#### **5.4.3.4 Access to Information and Education**

The co-management body must provide some method for the public to obtain information about Board decisions (Cizek 1990). In order for the Board to appear transparent, its processes must be open to the stakeholders (Roberts 1994). There also must be some method that allows stakeholders to become educated about the operation of the board (Chambers 1999). Hayes' (2002) evaluation, points out the importance of getting youth involved in the co-management process through the use of educational programs to build further understanding of the co-management process at the community level.

Not only does there need to be skills training and education available to the stakeholders, there must be specific skills and teambuilding training available to the board members. Without access to training, new board members might remain ineffective for a good portion of their term (Interview 2002: 27). There is the potential for the community to sense that the board is a private club which provides specific training and teambuilding sessions to its members (Chambers 1999). Although this is a valid concern, there needs to be a balance between fiscal responsibility and adequate training. This will often require the exercise of good public relations and transparent board practice to maintain community trust.

Assessing the SRRB's ability to maintain a transparent operation that facilitates trust-building at a board and community level relied on the correlation of comments by the individuals interviewed and a review of the policies the SRRB presently has in place. Information distribution methods and forms were also reviewed. Access to education programs aimed at Board members and youth in the community was examined using interviewee feedback and a review of present and past policy.

#### **5.4.3.5 Communication**

The internal and external communication of a board is tied to the mechanisms it has in place to distribute information. Effective communication must be maintained between a) board members and the public, b) board staff and the board Executive, c) board staff and the public, and d) board members and their stakeholders (Interview 2002:37). To be effective, communication must take place at a level that is appropriate to those involved (Berkes 1989; Pinkerton 1989). This also includes appropriate communication media and a reasonable frequency of these communications. Ensuring that the board is consistent and comprehensible also promotes effective communication (Hayes 2000). Effective communication within and outside the organizations also leads to shared learning and trust-building. Sharing information about the co-management process from different perspectives can create greater understanding among participants, and improve Board operations (Beierle 1999).

The other factor that previous assessments have concentrated on is the process of achieving cross-cultural communication. This is an important point because it relates to co-managements attempt to bring together two ways of knowing – traditional and scientific (Gallagher 1988; Osherenko 1988). The board must be able to find a common ground that is understandable to all participants involved in the process (Hayes 2000, Roberts 1994).

Finally boards must be adept at effectively communicating, with other organizations. Proficient communication at this level can help limit duplication of tasks by other

organizations and prevent conflicts that are consequences of cross jurisdictional boundaries (Chambers 1999).

To understand and assess SRRB communication, participant observation notes, the SRRB operating procedures, and interview data were consulted. Distribution methods and forms were explored to discover whether appropriate cross cultural communication was occurring with the co-management participants, including inter-organizational communication. The assessment was based on the comments of the interviewee participants.

#### **5.4.4 Actions**

##### **5.4.4.1 Issue Identification**

When looking at board operation and decisions it is important to understand who identifies issues and why the issues were identified. Hayes (2000) argues that for a community based co-management process to be successful, stakeholders must be involved in all aspects of the process, including issue identification. “An effective process is one that has been created by and for the people who will be using it” (Cormick *et al.* 1996:8). Community members have the potential to feel disconnected when they constantly deal with issues of no consequence to them. Pinkerton (1989) argues that allowing grassroots issue identification increases stakeholder ownership of the topic and builds this value into the management process. Therefore it is vital to look at the methods utilized to identify issues and determine if they are formalized or *ad hoc*.

To review the method of SRRB issue identification, meeting minutes and interview data were consulted. Assessment of the methods used to identify issues were based on feedback from the individuals interviewed coupled with general participant observations.

##### **5.4.4.2 Community Involvement and Consultation**

Community support and involvement are essential to co-management processes, particularly with respect to ensuring that traditional knowledge is incorporated into management decisions (Osherenko 1988; Berkes *et al.* 1991). Maintaining a clear and

effective link to the community is vital to board operation. Gaining a communities trust is one of the most important tasks that a co-management board must undertake (Chambers 1999). Not properly involving the community early in the process can lead to stakeholder alienation.

Although there are various degrees of community involvement and consultation, the aim should be to consult the public in a manner that results in more holistic decision making. There are many different methods for including the public in the decision making process, each with varying levels of success, dependent on the participants and their skill level. Gallagher (1988) argues that there is often too much weight given to the public meeting. Co-management boards rely heavily on this type of consultation that does not typically have a significant community consultation component to it (Gallagher 1988). In many cases, the public does not attend these meetings unless there is something controversial being discussed or there is some type of reward offered to them for attending. Other methods of community involvement include workshops, training sessions and open houses, which encourage more one to one interactions and consistently allow more opportunities for relationship and trust building (Geirholm 1999).

The process that is used by the SRRB for Community consultation and involvement was assessed based on the general comments of the individuals interviewed and a review of past Board actions.

#### **5.4.4.3 Research**

The gathering and analysis of current and accurate information is one of the key components of resource management. Roberts (1994) indicates that knowledge is the basis of management and whether traditional knowledge is the basis of Traditional Resource Management or scientific knowledge is the basis of Science-based Management, the collection and analysis of accurate data is important to the process. Co-management boards rely on both types of information as foundation for their management decisions, and must solicit further research when the information is lacking (Berkes 1989, Pinkerton 1989). They also need to look at stakeholder perception

regarding the inclusion of local or traditional knowledge and to ensure that individuals at a community level realize how their information is being used. Some co-management boards have an in-house research capabilities that helps the organization gather the relevant information required to make management decisions. Pinkerton (1989) claims that some of the most successful organizations have neither government nor the user groups in complete control of the information, supporting the perception that the information-gathering process has been unbiased.

The other component of research that needs to be considered is whether the research questions are relevant to management. Research priorities need to be set and regularly evaluated to ensure that they match the management priorities (Interview 2002:40). Disconnections between the management priorities of the stakeholders and research priorities of the Board have the potential to affect stakeholder perception of co-managements adversely.

The analysis of current research practices was undertaken via the review of past and present research projects, SRRB policy, and interview feedback. How the research was undertaken, the type of information collected, how research priorities were set, and how the community was involved were all examined as part of this analysis.

#### **5.4.4.4 Decision Making**

Allowing decisions to be made in a shared, consensus based manner is a key element to the proper function of co-management boards (Pinkerton 1989). However, the manner or technique used to reach consensus is not as important as the enduring result. In the end, all participants must be able to live with the results of the decision (Chambers 1999). Consensus decision-making must ensure that there is an equal level of participation in decision-making and that all the participants have equal access to the resources required to make informed decisions (Wondolleck and Yaffee 2000). Chambers (1999:63) outlined the dangers inherent in the process of consensus decision making:

... the consensus process used by the government and industry is best viewed as a public crisis management tool that primarily divides, stymies, and defeats social change activists by protecting the status quo. Unless

participants have equal access to equal resources required to participate effectively, consensus can also lead to coercion disguised as consultation. It is important that the Chairperson understands that silence on the part of a participant when discussing an issue does not necessarily mean agreement since tacit consent by some participants does not constitute consensus. When trust among participants and a healthy group process are lacking, there is a temptation for individuals to use consensus to stall the decision-making process for their own benefit. If participants are incapable of adjusting their position and compromising, a consensus process can also result in decisions that are based on the lowest common denominator.

Chambers (1999) goes on to outline ten principles that are compatible with co-management practice: Purpose driven, inclusive not exclusive, voluntary participation, self-design, flexibility, equal opportunity, respect for diverse interests, accountability, time limits, and commitment to implementation of the decisions reached. The decision-making processes can encompass all of these factors, but if stakeholder perception of the process is skewed, the process can breakdown.

The co-management decision-making process has a great affect on the function of the Board. It is important to understand the difference between the perception and the reality of how decisions are made. The process was examined *vis a vis* a review of the meeting minutes, participant observation notes, and interview data. The information gleaned from these three sources was the basis for the review of the SRRB decision-making process.

#### **5.4.5 Effectiveness**

##### **5.4.5.1 Adaptive and Ecosystem-Based**

One of the more recent approaches to resource management developed in the '60s and '70s is Ecosystem Management (Maltby *et al.* 1999). An Ecosystem Approach requires consideration of geographic areas defined by ecosystem boundaries and the perspectives provided by wider spatial scales and longer time frames. It takes into account the complexity of natural processes and social systems to craft management approaches that take advantage of these processes rather than work against them. It incorporates explicit definition of biological and social goals at both the national and local scales and elevates maintenance and restoration of ecological sustainability and ecosystem integrity as

important goals. The Ecosystem Approach emphasizes collaborative decision-making to deal with a landscape owned by many individuals and organizations with different values, interests and capabilities; and it uses a process of Adaptive Management to account for the uncertainty inherent in our understanding employing a wide range of strategies and policy tools (Ecosystem Management Initiative 2002).

In the case of northern co-management with First Nations groups, the philosophy of Ecosystem Management parallels many of the holistic beliefs and practices important in First Nations resource management. The Ecosystem Approach advocates a long term view of the ecosystem as a whole, which includes human interaction. Effective resource management is seen in a new light when a holistic approach is coupled with an ideology that advocates management of resources involving a continual and adaptive learning process that cannot be conveniently separated into functions like research and ongoing regulatory activities (Blann *et al.* 2000). Within this milieu, Berkes (1999:30) contends that “the use of traditional knowledge in an experimental way to learn from management interventions make it a potential tool for Adaptive Management.”

The use of an ecosystem or holistic approach to management, coupled with an adaptive process for dealing with uncertainty, is an evolving process, and the successful implementation of such an approach is still very limited (Maltby *et al.* 1999). Therefore, an assessment of ecosystem and adaptive management within co-management is difficult for several reasons: 1) the large number of variables that need to be assessed relative to these management approaches requires more research time than was allotted; 2) the relatively recent development of these approaches and discourse about what is required for success (Maltby *et al.* 1999) would require significant research beyond the present scope; and 4) the relatively recent implementation of the SRRB and the various organizational barriers they have been experiencing, would make such an assessment of limited use to the Board.

Consequently, only a few general items related to ecosystem and adaptive management were assessed, including the perception of ecosystem resilience, structures that take into

account social, economic and natural issues, and the use of feedback loops or incremental learning that would indicate adaptive management. Interviewee perception of the Board's ability to deal with a rapid change in the ecosystem was used as an indicator for perceived ecosystem resilience. Co-management's ability to deal with the complexity of the social, economic, and natural systems, and the structures facilitating communication between these topic areas, were assessed using the SDMCLCA, the SRRB operating procedures, and the interview feedback. Participant observation notes and interviewee data were used to review the Board's engagement in passive or active adaptive management.

#### **5.4.5.2 Merging 'Ways of Knowing'**

It is important for co-management regimes to successfully merge different ways of knowing (Osherenko 1988; Berkes 1989). When dealing with northern co-management that involves First Nations, it is expected that all the information available will be placed on an equal footing (Pinkerton 1989). This includes scientific, traditional, and local knowledge.<sup>12</sup> To assess the use of all knowledge, it is important to review the different decisions that management boards have made in the past and assess what knowledge went into making those decisions (Roberts 1994). It is also important to get feed back from queries into areas related to decision implementation and decision support at a community level. Stakeholder reaction to, and support for, a decision can be a strong indicator of the board's success in balancing the use of knowledge.

It is also important to note the specifics related to how local or traditional knowledge is incorporated into the management process. Are there special studies done that include co-management, or is it an integral part of all research considered by the board? Berkes (1999:28) argues that traditional knowledge is critical for resource management generally, but more specifically for:

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<sup>12</sup> Hayes (2000:56) points out that there is controversy associated with the term "traditional knowledge": "The way humans interact or use their environment is a dynamic process. Resource use practices may disappear overtime in a response to technological advances or social change and the ecological wisdom related to that activity will be lost. However, different knowledge generated by new institutions or practices may appear". This is known as local knowledge. There must be recognition and utilization of all types of knowledge to build stakeholder support into the co-management process.

- Biological information and ecological insights
- Conservation of protected areas
- Biodiversity conservation
- Environmental assessment
- Social development
- Environmental ethics

The use of traditional knowledge in these areas is key to discovering whether it is being used in a way that is meaningful to the co-management process. At the same time questions related to the availability of this knowledge must also be considered.

How the different types of knowledge were merged by the Board was examined through a review of participant observation notes, relevant Board documents, and interview data. The information gleaned from these sources informed two main avenues of inquiry: support for the collection of the different types of information and cross-cultural use of information within the process.

#### **5.4.5.3 Stakeholder Support**

Understanding the values stakeholders place on resources and developing strategies that reflect their concerns often dictates how resources will be managed (Grumbine 1997). Stakeholder support is usually tied to the perceived amount of input they have had into the decision process. As stated previously, Gilbert (in Simmons *et al.* 2001) believes that resource management has increasingly become the management of resource users. By using the term ‘people management’ Gilbert (in Simmons *et al.* 2001) is referring to the notion that harvesters will more likely respond to self-imposed rather than externally derived adjustment. When harvesters are given the opportunity to contribute their knowledge and substantively inform joint decision-making processes, they are more likely to support the management decisions made (Roberts 1994). The support stakeholders have for a co-management board in general is integrally related to the decision-making process itself, along with the amount of input and decision-making ability stakeholders have (Osherenko 1988).

Assessing the stakeholder support for the Board is tied to the success of the Board and fulfillment of their duties in an open, collaborative, and efficient process. Interviewee

general comments related to Board success, Board productivity, and Stakeholder ownership of the process were used to assess stakeholder support.

## **5.5 CONCLUSION**

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The focus of this chapter has been the exploration of the evaluation framework that was used to direct this research. In identifying the main components that are theoretically essential to the function of co-management, one can then comment on how co-management regimes are functioning in relation to these criteria. The framework was based on work of numerous authors, but was tailored to suit the present state of the SRRB through input from staff, Board members, and community members. Laying out the factors that were assessed (the points to consider, and how these points were assessed) in a descriptive fashion frames the assessment in a manner consistent with the methodological concerns outlined in Chapter 2. The research approach and the evaluation framework are implemented together to ensure that the findings and recommendations are relevant and useful to the organization.

Although this type of framework might be applicable to similar co-management Boards, or even the SRRB in the future, it must be stressed that co-management is complicated and an ever-evolving process. By nature, resource co-management needs to adapt to the changing resource management demands, changes in membership and staff, and occasionally changes in mandates. Although this framework and the factors considered are applicable to the present functions of the SRRB, significant developments in the knowledge base regarding organizational assessments and evaluations call for participatory and internal processes that are frequent and ongoing. These assessments require more time to implement and in many cases require commitment and change within an organization (Daignan 2001). Individuals within the organization need to be given the training, resources, and time to complete these tasks from within the organization in order to evaluate adapt (Guba and Lincoln 1989; Blann *et al.* 2000). The framework outlined above and the results of this research will produce a starting point for more holistic organizational assessment.

## CHAPTER 6

# CASE STUDY: THE SAHTU RENEWABLE RESOURCES BOARD

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The SRRB was developed as a result of the Sahtu Dene and Metis Comprehensive Land Claim Agreement (13.8) and the Sahtu Dene and Metis Land Settlement Act (Bill C-16). This Organization represents the interests of the public, including beneficiaries<sup>13</sup> and non-beneficiary residents. This organization is the main instrument of forest and wildlife management for the area (SRRB 2002a). As reflected in their mission statement, the SRRB is responsible for ensuring that the “fish, wildlife, and habitat are managed in a manner that meets the needs of both the present and future generations” (SRRB 2002a:1), a reference to sustainability. Referring back to the co-management continuum described in Chapter 4 (Table 2), the SRRB would fall under the classification of Partnership/Community control, with the caveat that the Minister of DIAND has to approve all major decisions made by the SRRB and maintains the “ultimate jurisdiction for the management of wildlife and wildlife habitat” (DIAND 1993a:44).

In order to assess and evaluate the Board overall, one must understand the SRRB’s history and function. Engaging in a holistic look at the Board will allow the reader to better understand why this type of framework and approach was applied, and provide context for the recommendations and findings. This section will include a description of the resource management that was historically practiced in the Region and an account of the SRRB’s function. As the SRRB is still evolving in function, its operations will be described in both theory and practice

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<sup>13</sup> According to the SDMCLCA, a beneficiary is someone of Sahtu Dene or Metis decent and is of (a) “Slavey, Hare or Mountain ancestry who reside in, or used and occupied the settlement area on or before December 31<sup>st</sup> 1921”, or (b) “a descendant of such a person, or who was adopted as a minor by a person in (a) under the laws of any jurisdiction or under any custom of the communities comprised by the person (b) or is a descendent of a person so adopted” (DIAND 1993a)

## **6.1 HISTORY OF RESOURCE MANAGEMENT IN THE SAHTU REGION**

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The evolution of resource management in the Sahtu Region can be broken down into three main conceptual stages: 1) Traditional Management; 2) Government or State Management; and 3) Co-management. These stages are not mutually exclusive and the partitions between them are not precise, but they do coincide with changes to the political environment within the Sahtu Region. Traditional Resource Management in the Region has remained, to some degree, and forms part of the foundation for resource co-management.

Prior to the signing of the Land Claim Agreement, resource management in the area moved from a Traditional or a Stewardship Model to a Government Intervention or the Modernization Model of resource management. Changes in the political climate, which were a response to development pressures, were accountable for the shifting responses in resource management (Notzke 1992). This transition offers insight into why resource management is a collaborative undertaking and what principles of past management have now been united under co-management in the Sahtu region.

### **6.1.1 Traditional Resource Management in the Sahtu**

Literature specifically related to resource management in the Sahtu is limited and consequently the information presented below is a combination of literary information gathered at a general level and field research data. This combination of data presents an overall picture of resource management in the Sahtu. Speaking generally about Traditional Resource Management Osherenko (1988:4) writes:

The indigenous system of wildlife management is a collection of unwritten rules or social norms that govern native hunting, fishing, and trapping. The rules have been handed down by example and by word of mouth (often through stories) for generations. For the most part, compliance based on cultural values, ethics and even taboos is high.

It became apparent during conversations with individuals in the Region that many of the interviewees did not have a comprehensive understanding of what Traditional Resource Management systems were and whether they were being presently maintained or practiced in the Sahtu Region. On the other hand, informal conversations with several individuals reflected many of the key indicators of Traditional Management practices that Pinkerton (1993:73-78) outlines:

**a) *Data Collection and Analysis***

Community members routinely get together and discuss resource harvesting success or failure in particular areas and formulate future resource harvesting plans based on the collection and analysis of a holistic view of their environment.

**b) *Allocation***

Allocation in this sense is related to right of access to a particular resource. This management tool is usually controlled by the senior hunters or elders in the community and is often related to the possession of spatial and temporal knowledge related to the resource.

**c) *Community Enforcement***

Verbal rules, social norms and taboos related to wildlife and resource harvesting are enforced by the community. Breaking the rules often results in severe consequences being placed on the deviant community member or members. Often, the punishment is that of being ostracized, or being prevented from participating in community hunts.

**d) *Long Range Regional Planning of Resource Harvesting***

Community members adjust their resource harvesting plans and schedules to allow intensely harvested regions to rest and replenish, leading into cycles of use and non-use. This type of planning is also related to an analysis of seasonal harvesting patterns and incorporated in a holistic fashion.

Not only did individuals discuss many key indicators related to Pinkerton's idea of resource management, but several had concrete examples of how Traditional Resource Management was occurring on a smaller scale within family and community structures. Two of the most significant examples from the field research are 1) the decision by the community of the Deline and their Renewable Resources Council (RRC) to restrict fur bearer harvesting immediately adjacent to the community because of recent trapping pressure; and 2) the decision by a knowledgeable elder not to show a younger hunter additional moose harvesting areas after this individual was caught being disrespectful to animals (Interview 2002:32;23). Both of these are examples indicate that Traditional Resource Management was and continues to be practiced in the Sahtu Region.

Furthering evidence of Traditional Resource Management being utilized within the Sahtu can be found in 1) the 2001 ethnographic profile created for the SLUPB (Geirholm 2001); and 2) George Blondin's book of traditional stories *When the World was New* (Blondin 1990). These two sources provide numerous examples in the form of traditional stories and interview quotations, where several references are made to all four of Pinkerton's management techniques outlined above. Additionally, Dr. Norman Simmons indicated that when he completed research in the Sahtu during the 1970s, he was familiar with two further examples of Traditional Resource Management:

1) Under indigenous harvesting practices, harvesting is often based on quality of the animal harvested. The spring caribou hunts in the Mackenzie Mountains used to concentrate on pregnant females. They were fatter than bulls and produced foetuses which the old people liked. They reduced the impact on the caribou population by hunting a different herd each year, in rotation. Prior to my arrival in the Sahtu, the NWT government altered that by providing paid-for aircraft to fly meat, intended for the community of Tulita, back from hunting areas located in the Moose Horn (Redstone) River valley. To take advantage of this free transportation, hunters would concentrate their harvests in this area, exerting increased pressure on this herd, altering Traditional Resource Management practices. (Simmons 2003: Pers. Comms.)

2) Under indigenous harvesting practices, aboriginal communities within the Sahtu have their traditional hunting areas and, at least when I worked in the North, each community stayed out of the hunting territory of adjacent communities. There was a mutual respect for each other's area, which allowed hunters to control the allocation of resources. It also allowed them to keep track of the amount of resources harvested, and then use that information for harvest planning. (Simmons 2003: Pers. Comms.)

The logic behind breaking down resource management into definable groups, as was done by Pinkerton, is to make Traditional Management strategies easier to understand for non-native minded individuals (Pinkerton 1993). To truly appreciate Traditional Resource Management, one must observe the process as a way of life that incorporates the First Nations' distinctive world view. As described in Chapter Four, aboriginal relationships with the resources they use is more than a dependency relationship where the resources are there for unfettered harvesting. A recent ethnography created for the Sahtu Region describes the relationship as follows:

The carefully balanced relationship between the Dene and Metis and their natural world was and still is essential for the survival and wellbeing of the people. Through generations and seasons of living on the land, the history of the Sahtu Dene and Metis people is seen on the land itself as cultural landscape. The landscape holds the traditional knowledge of the people. The environment is thus not simply a catalogue of rivers, lakes, flora and fauna, but rather the very fabric of the culture reflecting history, identity and knowledge. (Geirholm 2001:6)

This description of a holistic view of nature that encompasses every part of the Sahtu Dene and Metis way of life provides, to some extent, context to how resource management would have been and still is being practiced today. This is important, as it provides context to the manner in which beneficiaries approach resource management and the co-management process.

The type of resource management outlined above conforms to the Stewardship Approach in that there was a select group of experts or leaders who made the decisions for the community at large, who were an integral part of the community, and frequently the group included the people charged with maintaining the vast amount of ecological knowledge in the region. Ultimately, the people had control of resource management and therefore the regions' resources were held as common property (Pinkerton 1989; Berkes *et al.* 1991). Research completed about the Slavey of the Sahtu indicates that this is also true of the different groups in the region (Geirholm 2001).

This type of resource management was complemented by the fact that the community groups were operating in a closed system where they controlled membership of their own communities and much of the outside access to the resources. Controlling membership and access to resources ensured that harvesters had a similar world view, many of the enforcement techniques and cultural norms could be applied, information gathered from the different regions could be verified within the group, and management decisions and behavioral changes could be evaluated for effectiveness. The public that relied on the resources also managed them, and had a vested interest in protecting them to ensure their own survival (Pinkerton 1989; Roberts 1994).

Only a few of the respondents, both beneficiaries and non-beneficiaries, believed that the abundance of resources in the Region, and the lack of modern technology prior to European contact, negated any substantial need for a complex approach to resource management. It was pointed out that substantial resource management is only a reality today because of the increased pressures on the environment due to technological advances, population increase, and developmental pressures. In other words, the residents of the Region no longer fully control membership in their communities or access to the resources, so there is a need for more complex resource management to prevent damage. (Interview 2002 :40).

Even more surprising, some residents and non-resident professionals working in the Region did not recognize that Traditional Resource Management was still occurring or that this was even a legitimate form of resource management. This provided some insight into a few of the barriers the SRRB is currently encountering.

### **6.1.2 The Modernization Approach to Resource Management in the Sahtu**

European contact in the Sahtu came as early as the 1780s, when the Northwest Company began trading furs along the Great Slave Lake, with occasional trips further north. Contact was furthered in 1789 when Alexander Mackenzie, on his voyage down the Mackenzie River looking for the Northwest Passage, made the discovery of surface oil seepages near present day Norman Wells. This knowledge would play a large role in the development of the Region (SLUPB 2002a). As a result of the fur trade, residents of the Sahtu had access to guns, ammunition, flour, tea and other foodstuffs which made life easier, but they were almost decimated by the diseases that many of these newcomers carried. As the income of the Dene increased, so did their reliance on goods from the trading posts located in the Region. Reliance on southern goods brought with it increased pressure on furbearing animals, which meant more traps, larger dog teams, and infrequent opportunities to harvest other traditional resources. As a result of increased activity at the trading posts, other governmental and non-governmental agencies were being attracted to the Sahtu, including religious organizations, the RCMP, health care workers and finally educational institutions. Traditional meeting areas were transformed first into more

permanent base camps and finally into permanent settlements, providing access to many of the amenities common in the South (Geirholm 2001; Coates 1985).

Changes in the spatial living patterns of the Sahtu were echoed by changes in lifestyle and the political climate. Federal interests in the Sahtu intensified when gold, oil, uranium, and other minerals were discovered in the Region. With the developmental potential of the area looking promising, the federal government quickly moved to sign Treaty 11 to ensure sovereignty over the area. By signing Treaty 11, the residents of the Sahtu became the responsibility of the federal government and consequently fell under the governance of federal Indian agents and the North West Mounted Police (Geirholm 2001; Coates 1985). During this period, wildlife management began to shift officially towards a Missionary Model, where non-government scientists and government agencies began researching and managing wildlife for the people of the NWT.

Before the signing of Treaty 11 in 1922, the federal act that governed the Sahtu area was the Rupert's Land and North-Western Territory Order of 1870 that transferred the title of northern lands from the Hudson Bay Company to the Government of Canada. This marked the beginning of vast political changes in the North that would ultimately affect Traditional Resource Management in the area. Some other government actions that began effecting Traditional Resource Management in the Sahtu Region were as follows:

- ***Migratory Birds Convention Act was signed in 1917.***  
This act limited the spring hunting of migratory water fowl, and placed bag limit restrictions on some of the species (Roberts 1994:118).
- ***Establishment of the Department of Indian Affairs and Northern Development (DIAND)<sup>14</sup>***  
This federal department administered the Northwest Territories Act and the Territories Land Act that provided that department with direct control of the NWT's land and resources (*Ibid*).
- ***Establishment of the Canadian Wildlife Service (CWS).***  
The Canadian Wildlife Service (CWS) and the Canadian Parks Service of the DOE dealt with matters related to migratory birds, wildlife, and national parks in the NWT (*Ibid*).
- ***Establishment of Department of Fisheries and Oceans (DFO).***

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<sup>14</sup> Prior to DIAND, the department was called the Department of Indian Affairs and was under the portfolio of many different Ministries throughout its existence. Prior to the Department of Indian Affairs, the Department of the Interior undertook northern responsibilities.

DFO was established and dealt with matters related to the sea coast and inland fisheries of the NWT (*Ibid*).

All of these changes in the Sahtu political climate had an effect, directly or indirectly, on the resource management that was taking place in the Sahtu Region. The residents of the Sahtu were being exposed to an increasing number of rules and regulations, and this was affecting the manner in which they harvested resources in the Region. Although there were few officers available to enforce the laws implemented by the government, the inconsistent enforcement of these new rules created significant confusion among resource harvesters regarding legal and illegal resource harvesting practices (Interview 2002:17).

According to Simmons *et al.* (2001:4), Scientific Resource Management in the NWT was not welcomed by First Nations in the Region:

In 1975 ...the NWT Wildlife Service found widespread antipathy and even hostility toward wildlife research and management programs, especially amongst the Dene and Metis of the Western NWT.

Although there was a Scientific Management regime officially in place, according to a couple of respondents, the management laws developed by the government had little effect on the manner in which resources were managed. The territory was too large to cover for the individuals charged with enforcing the new wildlife law and frequently, when perpetrators were caught, they were exposed and dealt with by the community in a traditional manner. In other instances, wardens would look the other way when they detected infractions that were committed for spiritual or traditional reasons. In essence, wardens were enforcing a combination of western wild life law and traditional law, while utilizing traditional methods of dealing with the law breakers (Interview 2002:17).

The lack of complete scientific information caused considerable difficulties. As mentioned in Chapter 4, one of the main components of resource management, traditional or scientific, is the collection and analysis of information related to the specific resource or environment being managed. With Scientific Management, complete information is costly to attain, and is sometimes based on erroneous assumptions (Berkes, Colding and Folke 2003). Some decisions that were being made centrally were misguided because a)

they did not reflect what was taking place on a smaller scale due to the lack of complete information, and b) the decisions could not be readily adjusted to temporal and spatial to changes in resource (Freeman 1985). As a result, resource harvesters in the Sahtu questioned some of the motives behind the policies outlined by the government, and this led to non-compliance and misunderstanding (Interview 2002:17).

The government's implementation of the Missionary Model of resource management in the NWT was limited in its success primarily due to the confusion and lack of 'buy in' by the First Nations. There was also a lack of complete scientific information and the lack of enforcement of resource law. These barriers were subsequently reinforced by court decisions (i.e. Calder 1973) and the signing of Land Claim Agreements (i.e. Inuvialuit Final Agreement 1984) that re-affirmed First Nations rights and ensured that they would have more input into decision making processes.

### **6.1.3 The Present Stage of Resource Management in the Sahtu**

The present stage of resource management in the Sahtu is what many would consider a partial return to a Stewardship Approach, where the resource users and the general public have the ability to provide effective input and participate in the decision making process. In the case of the Sahtu, the SDMCLCA guarantees that beneficiaries are able to participate in:

- Management of renewable resources;
- Land use planning in the settlement area;
- Environmental impact assessment and review within the Mackenzie Valley; and
- Regulation of land and water use within the settlement area. (DIAND 1994:2)

Participation in these basic activities occurs through the appointment of beneficiaries to various public boards (the co-management boards) (DIAND 1994). The SRRB is one of the co-management boards set up under the SDMCLCA, and is responsible for wildlife and forest management in the Sahtu area. The SRRB makes decisions based on the best possible information available to them, whether it is scientific or traditional in nature. The Board has access to scientific and traditional knowledge through research and the

expertise of its Board members, as these individuals are chosen based on either scientific or traditional resource management backgrounds (Interview 2002:40).

The SRRB has been in existence for eight years, and during that time has been the main agency for renewable natural resource management in the Region. As there were limited restrictions placed on beneficiaries prior to the signing of the Land Claim Agreement and creation of the SRRB, there have been limited resource management decisions that have adversely affected harvesting in the Sahtu area (Interview 2002:40). Theoretically, the SRRB retains all the qualities of a Stewardship Approach to resource management, and should flourish in communities that have experience with this Approach to management. As with many theoretical models, there are some discrepancies that adversely affect the function of the SRRB.

As mentioned in the section above, one of the key factors in making any management decision, scientific or traditional, is access to accurate information (Roberts 1994). The difficulties related to the collection of scientific information still exist in the Sahtu, but the situation recently improved. The NWT Department of Resources, Wildlife, and Economic Development (RWED) office opened in the 1970s at Norman Wells, and the influx of dollars made available to RWED by the Land Claim Agreement supported research initiatives in the Region. As part of its mandate, the SRRB had the ability to conduct and support independent research in the Region and is responsible for distributing funding from the Wildlife Studies Fund to external applicants (DIAND 1993b). Conversely, the cumulative amount of traditional knowledge in the Region seems to be on the decline, which leads to fewer and fewer individuals with the skills to maintain Traditional Resource Management practiced (Interview 2002:23).

Osherenko (1988:5) writes, “a key problem for the indigenous system arises when rules, once widely followed, are no longer passed down to younger generations”. Recent changes in the Canadian North, and in particular the Sahtu, have widened the information gap between community elders and youth. No longer are community youth maintaining the vast amounts of traditional knowledge that their ancestors accumulated over

thousands of years of living on the land. As one community member indicated, “they are being raised by the government and the television ...staying in town all the time eating white (sic) food” (Interview 2002:23). This sentiment was echoed by many community members and was one of the most significant concerns expressed by elders.

While many fear that these changes in lifestyle are preventing traditional knowledge from being retained, Maher (2002: Pers. Comms.) believes that traditional knowledge is not being lost, but going through an adaptation phase that does not render it any less valid for use in Traditional Resource Management systems. The lines between the knowledge systems, traditional and western, are becoming increasingly blurred. This is reflected in the goals of co-management, where both systems are combined to improve the management of resources (Maher 2002: Pers. Comms.).

In this section it has been acknowledged that a) traditional knowledge is being maintained, to some degree, in the Sahtu Region, b) changes in the political climate in northern Canada have been influenced by resource development in the Region, and c) court challenges, Land Claim Agreements and changes in political climate have resulted in changes in resource management. These changes in resource management have been subtle, and often the ideas and concepts from subsequent stages of management have been borrowed and meshed with the present process. It could be argued that the lines between management systems were somewhat blurred prior to the signing of the SDMCLCA, however, it has only been since the implementation of the Land Claim Agreement that the resource users have legally had the ability to participate meaningfully in the management of the Regions resources.

## **6.2 THE SRRB'S ROLE WITHIN THE LAND CLAIM AGREEMENT**

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The SRRB was one of the first co-management boards set up as part of the Sahtu Dene and Metis Comprehensive Land Claim Agreement. It is the main instrument of forest and wildlife management in the Sahtu Region (DIAND 1993a). Nevertheless, the SRRB's

powers are restricted in a few instances throughout the SDMCLCA. Section 13.3.1 states the following:

The government shall retain the ultimate jurisdiction for the management of wildlife and wildlife habitat. Government shall continue to have the jurisdiction to initiate programs and to enact legislation with respect to the settlement area which is not inconsistent with this agreement. (DIAND 1993a:44)

Building on that premise, the Land Claim Agreement also states that:

13.8.25

The Minister may, within 60 days of the receipt of a decision under 13.8.24, accept, vary or set aside and replace the decision. The Minister must consider the same factors as were considered by the Board and, in addition, may consider information not before the Board and matters of public interest not considered by the Board. Any proposed variation or replacement shall be sent back to the Board by the Minister with written reasons.

13.8.27(a)

The Board shall, within 30 days of the receipt of a variation or replacement from the Minister pursuant to 13.8.25, make a final decision and forward it to the Minister with written reasons.

13.8.28

The Minister may within 30 days of the receipt of a final decision of the Board accept or vary it, or set it aside and replace it, with written reason. The Minister may consider information not before the Board and matters of public interest not considered by the Board. (DIAND 1993a:60)

The Minister retains ultimate control of wildlife management in the Sahtu, but must have documented reasons to overrule a Board decision (DIAND 1993a). Though the Minister has the authority to veto any change in policy or regulation put forth by the SRRB, this type of response would be politically challenging and worsen relations with the Board and the stakeholders (Interview 2002:37).

The SDMCLCA also spells out the responsibilities of the SRRB, providing direction regarding task execution. Specifically, the Agreement indicates that the SRRB has the power to:

- a) Establish policies and propose regulations in respect of
  - i. the harvesting of wildlife by any person, including any class of person;
  - ii. the commercial harvesting of wildlife;
  - iii. commercial activities related to wildlife including:
    - A. commercial establishments and facilities for commercial harvesting; propagation, cultivation and husbandry of fur bearers and other

species; and commercial processing, marketing and sale of wildlife and wildlife products...

- B. guiding and outfitting services; and
  - C. hunting, fishing and naturalist camps and lodges.
- (b) Exercise the powers and duties given to it elsewhere in the agreement;
  - (c) Approve plans for the management and protection of particular wildlife populations, including transplanted wildlife populations and endangered species, and particular wildlife habitats including conservation areas, territorial parks and national parks in the settlement area;
  - (d) Approve the designation of conservation areas and endangered species;
  - (e) Approve provisions of interim management guidelines, park management plans and policies that impact on wildlife and harvesting by the participants in a national park;
  - (f) Approve regulations which may be proposed by government pursuant to ..., except for those in respect of which the Board has already made a final decision pursuant to ...;
  - (g) Establish rules and procedures for the carrying out of any consultation required by these provisions; and
  - (h) Review any matter in respect of wildlife management referred to it by government. (DIAND 1993a:59)

In essence, the SRRB has the ability to review and amend any of the wildlife policies which affect the quality of resource management in the Region, as long as it has consulted the communities and RRCs that might be affected by the change, and thoroughly investigated the ramifications of the policy or legislation change (Interview 2002:37).

Complimentary to the powers outlined above, the SRRB also commonly takes on the responsibility of being the main advisory body in the Region when it comes to wildlife and habitat related issues. Government agencies are required to consult the SRRB on matters relating to the following:

- a) Draft legislation respecting wildlife and wildlife habitat;
- b) Land use policies or draft legislation which will likely impact on wildlife or wildlife habitat;
- c) Proposed inter-provincial or international agreements which will likely impact on wildlife, wildlife harvesting or wildlife habitat;
- d) The establishment of new national parks and territorial parks;
- e) Plans for public education on wildlife, wildlife harvesting and wildlife habitat;
- f) Policies respecting wildlife research and the evaluation of wildlife research in the settlement area;

- g) Plans for Cooperative Management and research relating to species and populations not wholly within the settlement area; and
- h) Plans for training participants in management of wildlife and related economic opportunities. (DIAND 1993a:61)

One of the SRRB's most significant responsibilities under the Land Claim Agreement is to administer the Harvest Study in the Sahtu Region. This study is crucial to resource management because it eventually leads to the calculation of 1) the Total Allowable Harvest – the total number of a particular resource that can be harvested in the Sahtu Region; 2) the Sahtu Needs Level – the amount of a particular resource that beneficiaries of the Sahtu Agreement need, while meeting their minimum food level; and 3) the Sahtu Minimum Needs Level – the absolute minimum amount of a particular resource that the beneficiaries of the Sahtu need to maintain their current lifestyle (DIAND 1993a). It is important to note that once these needs levels are established, they become a crucial piece of information available to the Board when making management decisions. In essence, the Sahtu Minimum Needs Level is directly related to the definition of subsistence harvesting.

In addition to the Harvest Study, the SRRB also had the ability to conduct its own in-house scientific research, as long as it does not duplicate research already conducted, or being conducted, by other agencies (DIAND 1993a). The SRRB has engaged in a significant amount of in-house research and had a fulltime Biologist on staff who coordinated the exchange of information with other organizations and any regional species specific co-management proposed such as the Integrated Fisheries Management Plan for Coney [Inconnu – *Stenodus leucichthys*] (Interview 2002:37). The Board also has access to the biological expertise of the RWED staff located in Norman Wells. The NWT government wildlife staff can engage in more in-depth research projects, as they have a budget that focuses on research, an onsite laboratory, and a contingent of trained and experienced professionals (Simmons 2003: Pers. Comms.).

Promotion of community input, stakeholder ownership, and the use of traditional knowledge in Board decisions is essential to the proper functioning of the SRRB, while

providing the main theoretical arguments for engaging in a Stewardship Approach. Ultimately, the SRRB needs to take its direction from the people of the Sahtu Region. Although the SDMCLCA does not detail the manner in which the SRRB is to consult the stakeholders, the process is carried out in the following manner:

- a) Community members are appointed to sit on the SRRB;
- b) Community RRCs were established in all five communities;
- c) The Board alternates their public meetings through four of the Sahtu communities<sup>15</sup>;
- d) The Board distributes an informative newsletter; and
- e) The Board engages in public meetings. (DIAND 1993a, Interview 2002:40)

The purpose of the SRRB is to provide the tools, expertise and authority necessary to ensure that resources and required habitats are managed in a manner that is consistent with the needs and aspirations of the present and future Sahtu residents. The SRRB's management also needs to satisfy a) the national and international conventions and management commitments that the federal and territorial governments made prior to the signing of the Land Claim Agreement, and b) the regional, species specific co-management agreements that have developed, and will develop as a result of larger management concerns (DIAND 1993a, Interview 2002:40).

It is also worth emphasizing that the SRRB is a 'public' board that represents the interests and desires of all Sahtu residents. The Board is occasionally scrutinized by non-beneficiaries as an institution that has an SDMCLCA beneficiary bias, due to fact that community-appointed Board members are beneficiaries (Simmons 2003: Pers. Comms.). This scrutiny is confounded by the Board's focus on involving Renewable Resource Councils, which are also beneficiary organizations.

### **6.2.1 The Renewable Resource Councils**

The Renewable Resource Council (RRC), a community organization charged with bringing grassroots concerns related to renewable resources to the forefront, is not a new concept in the Sahtu Region. Prior to the SDMCLCA, each community in the Sahtu had

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<sup>15</sup> The community of Colville Lake has not held an SRRB meeting, as there are limited accommodation and restaurant services in the community (Simmons 2003 Pers. Comms.).

their own Hunters and Trappers Association (HTA), which were formed to convey the ideas and concerns of the resource users in the Region to the government wildlife managers. These organizations also assisted resource users in getting out on the land by providing them with gas and supply subsidies (Interview 2002:18). When the SDMCLCA was signed, these organizations were given the option of staying autonomous, or joining the newly formed RRCs and fulfilling both mandates. In the Sahtu, all the community HTAs decided to amalgamate with the RRCs and fulfill both mandates.

The RRCs in the Sahtu Region were set up under the Land Claim Agreement with a mandate to “promote local involvement in the conservation, harvest studies, research and wildlife management in the communities”(DIAND 1993a:63). These councils are made up of a maximum of seven members. Members serve two year terms with the option of re-appointment. In a sense, RRC members are elected by the community, as it is the local Land Corporations that nominate individuals for membership at the annual general assembly in each of the communities. Two thirds of the beneficiaries belonging to that particular Land Corporation need to be in attendance and vote on the motions to appoint representatives (DIAND 1993a; Interview 2002:23).

In two of the communities (Fort Good Hope, and Tulita), the RRCs consist of three Metis members and four Dene members, representing the two distinct groups in the communities. These members were chosen by their respective local Land Corporations. The communities of Colville Lake and Deline only have Dene Land Corporations and the community of Norman Wells only has a Metis Land Corporation (DIAND 1993a; Interview 2002:22).

Under the Land Claim Agreement, the RRCs are charged with the following responsibilities and powers:

- (a) To allocate any Sahtu Needs Level for that community among the participants;
- (b) To manage, in a manner consistent with legislation and the policies of the Board, the local exercise of participants' harvesting rights including the methods, seasons and location of harvest;

- (c) To establish or amend group trapping areas in the settlement area, subject to the approval of the Board, provided that the portion of the Fort Good Hope - Colville Lake Group Trapping Area, which is in the settlement area, may not be reduced in size without the consent of the designated Sahtu organizations in Fort Good Hope and Colville Lake;
- (d) To exercise powers given to Renewable Resources Councils under this agreement; and
- (e) To advise the Board with respect to harvesting by the participants and other matters of local concern within the jurisdiction of the Board. (DIAND1993a:63)

The Agreement further states in 13.9.5 that the SRRB “shall consult regularly with Renewable Resources Councils with respect to matters within the Board's jurisdiction. Government and the [SRRB] may jointly delegate authority to Renewable Resources Councils, upon terms and conditions established by government and the Board” (DIAND 1993a:63). In essence, the RRCs have the ability to direct resource management in their Region of the Sahtu. The RRC has the responsibility of consulting with its own constituents and relaying that information to the SRRB. These issues or recommendations are then brought before the SRRB which holds further consultation with other RRCs in the Sahtu area (Interview 2002 :37). In addition, the council is responsible for collecting and providing data to the “government and the Board, of local harvesting data and other locally available data respecting wildlife and wildlife habitat” (DIAND 1993a:63). To a large extent the RRCs are responsible for collecting and conveying traditional knowledge to the SRRB for management decisions (Interview 2002:22). The RRC is an essential institution set up under the SDMCLCA, and as the key community link for the SRRB, it should play a large role in the proper execution of its mandate.

### **6.3 BOARD STRUCTURE AND OPERATION**

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Funding for the Board is provided through the SDMCLCA, and the Board must submit action plans and budgets to DIAND, to which they are ultimately responsible for their financial accounting (DIAND 1993a). The following section will be a comprehensive description of the Board, its staff and how it fulfills its mandate.

### 6.3.1 Membership

The Board consists of six members, six alternate members, and a Chairperson. Three of the members, who are the community representatives, are appointed by the Sahtu Secretariat Incorporated (SSI), and the other three, the government representatives, are appointed by the Governor in Council of Canada and the Executive Council of the Government of the Northwest Territories. The alternate members are also appointed in the same manner (DIAND 1993a). As noted in the Land Claim Agreement document, there are several other stipulations for appointing Board members:

- One of the government-appointed members and alternate members must be a resident of the NWT but not a participant of the Land Claim Agreement;
- As the Sahtu land mass is divided into three distinct regions, Deline District, Tulita District, and K'ahsho Got'ine District, representatives from each of the regions must be a member and alternate member of the Board;
- Government appointed members are nominated by three different governmental organizations. Each of the following nominates one member and an alternative member to the Board: RWED, DFO, and CWS. Although these members are nominated by these organizations they do not represent the government department that nominated them on the Board;
- Board members are required to pass a criminal record check. Any criminal offence will disqualify them from serving as a member;
- Board members must not be in conflict of interest<sup>16</sup> while a Board member; and
- Board members must be able to serve a term of 5 years. (DIAND 1993a:57; Interview 2002:37)

The Chair of the Board is nominated by the Board members and is required under the Agreement to reside in the area, serving a term of no longer than five years (DIAND 1993a). The Board members have further stipulated that the Chair should be a beneficiary of the SDMCLCA. Once the full contingency has been established, an Executive Committee is appointed to deal with staffing and the daily operations of the Board. The Executive consists of the Chair, a community representative, and a government representative (Interview 2002:37).

Community Board members are appointed through a process that is similar to applying for a job posting. The organization first posts the vacancy in various locations and media

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<sup>16</sup> The board is presently working on Conflict of Interest criteria, but this information was not available at the time of field research.

outlets in the Region, calling for applications for the positions before a particular date. Once SSI has the written submissions, they will review the applicants and ask for RRC input from the district that has the vacancy. Applicants are theoretically selected on their experience as resource harvesters and the respect others in the district have for them. Once an applicant has approval from the district RRC and SSI, that individual's name is submitted to DIAND for a criminal record check and approval. The names of government representatives are also submitted to and approved by DIAND (Interview 2002:37). Board members must agree to act in the public interest. Board members are required to take an Oath. A majority of the members constitutes a quorum of the Board<sup>17</sup>. (DIAND 1993a:57, 58)

To maintain consistency, members that are absent must ensure that their alternates are briefed on the upcoming agenda (SRRB 2002a). Ultimately, Board members should also stay abreast of wildlife issues in the Region, be familiar with their official and unofficial responsibilities as a Board member, and be prepared to voice their expert or community opinions during the decision making process (Interview 2002:40). Added responsibilities for Board members that sit on the Executive Committee include:

- a) Review of all material being considered by the Board;
- b) Consulting with the RRCs and specific individuals on matters being considered by the Board and its activities among the participants;
- c) Assisting with the distribution of information on the Board and its activities among the participants; and
- d) Representing the Board as required. (SRRB 2002a:8)

In addition to the Chair being involved on the Executive Committee, he or she must also be involved in the day to day operations of the SRRB. The Chair needs to work closely with the Executive Director and the Executive Committee to ensure that the Board is on track and functioning at full capacity. The Chair:

- a) Represents the SRRB to Government agencies, other Boards or Committees, the media, and at conferences or gatherings, as appropriate;
- b) Initiates or supervises the preparation of Board correspondence;
- c) Reviews all material being considered by the Board members;

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<sup>17</sup> The decision making process is consensus based, but in the end topics are voted on and majority rules. The spirit of consensus decision making is present in the process and will be explained further.

- d) Authorizes contracts on behalf of the Board;
- e) Supervises, approves and authorizes the activities of the Executive Director in accordance with the advice given by the Executive Committee and as directed by the Board; and
- f) Presides over Board and Executive meetings. (SRRB 2002a:8)

If the Chair is absent or unavailable, the Board members have the ability to appoint a Vice Chairperson(SRRB 2002a).

### **6.3.2 Staff**

At the time of field research the SRRB was staffed by four individuals, an Executive Director, a Biologist<sup>18</sup>, the Harvest Study Coordinator and an Office Manager. Summer students are also hired as required. These individuals all work out of the Tulita office and live in the community. In addition to the staff presently employed, the Board has the ability to hire a limited number of additional staff to fulfill its mandate without overextending its budget (Interview 2002:41). Some of the other positions that existed in the past include an Integrated Resource Specialist, a Wildlife Technician, a Harvest Study Trainee, a Computer Programmer/Administrator, and a GIS Specialist (SRRB 2002e). It is envisioned that staff positions in the Board office will at some point be filled by beneficiaries. Presently only two of the four employees are Sahtu beneficiaries. Part of the mandate of the SRRB is to provide training or mentoring programs to beneficiaries that are interested in taking over staff positions. At the time of field research the SRRB is entertaining applications for the Executive Director trainee program(Interview 2002:22)<sup>19</sup>.

The Executive Director of the SRRB is the principle staff member hired by the Board.

He or she is responsible for the following tasks as outlined in the 2001 job description:

- a) Oversee the day to day operations of the SRRB;
- b) Act as a secretary to the SRRB in relation to the meetings of the Board;
- c) Implement current and long range plans and objectives, as established by the SRRB

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<sup>18</sup> At the time of MDP defence and publication, the Biologist position had been abolished and a Communications Officer had been hired to increase the Boards profile in the communities.

<sup>19</sup> At the time of MDP defence and publication, the Executive Director Trainee position had not been filled and applications for this position will no longer be accepted.

- d) Oversee the adequacy and soundness of the organization's finances;
- e) Monitor day to day operating results of the SRRB administration and ensure that appropriate measures are taken to correct unsatisfactory results related to policy and procedure;
- f) Establish and maintain an effective system of communication throughout the SRRB organization;
- g) Represent the SRRB with co-management partners, government and the public
- h) Evaluate the results of overall operations regularly and systematically and report these results to the SRRB;
- i) Ensure that the responsibilities, authorities and accountability of the SRRB are defined and understood;
- j) Administer the appropriate compliance measures to ensure that no SRRB staff or members are in violation of Conflict of Interest guidelines; and
- k) Supervise, provide guidance, and support the development of an Executive Director Trainee, including development of necessary training plans and implementation.

The Executive Director should have knowledge of natural resource management in addition to human resource or office management, balanced by a keen sense of cultural and northern issues (SRRB 2001). As a result of all the responsibilities the Executive Director maintains, he or she must have exemplary qualifications and experience to ensure that the Board functions well.

The SRRB's Biologist was responsible for designing, implementing, monitoring and evaluating the Board's research program and specific in house research projects. Much of the background that the Biologist brought to the SRRB is technical in nature as he or she needed to be able to conduct and evaluate scientific research that will help inform Board management decisions. Included in the Biologist's list of duties was working with community members to establish community research priorities and acting on those issues identified by the public (SRRB 2002b). The SRRB, and to some extent the Biologist, was in charge of handing out 2.1 million dollars over 10 years from the Wildlife Studies Fund (DIAND 1993b). The Biologist evaluated and recommended research proposals that are submitted to the Board for research funding (Interview 2002:22).

The SRRB receives money to employ a Harvest Study Coordinator and, when required, a Harvest Study Trainee. The Harvest Study Coordinator is responsible for designing,

implementing, and monitoring the progress of the five year settlement area Harvest Study. As a result, he or she must hire local community representatives to collect statistical information on the harvest by the beneficiaries. Once the information is collected and entered into a database to create harvester lists and reports, it is presented to the communities for validation. In many instances, the Harvest Study Trainee would assist the Coordinator in his or her duties (SRRB 2002c; Interview 2002:22).

The SRRB also employs an Office Manager. His or her duties include providing administrative and financial support services to the other staff in the office. The Office Manager ensures that the day to day administrative operations of the office are functioning properly (SRRB 2002d; Interview 2002:22).

All the staff members go through yearly performance evaluations conducted by the Executive Director, who is in turn evaluated by the Executive Committee. The Board receives copies of the reports reflecting the positive or negative comments and recommendations (SRRB 2002a).

### **6.3.3 Board Meetings and Decision Making**

SRRB meetings are held at least twice per *annum*. Board meetings are open to the public unless the Chair and members agree that the sessions should be run *in Camera* to avoid the public airing of confidential information. The SRRB also encourages members of the RRCs to attend. The Board pays travel and honoraria for one member from each community to attend every meeting. As the meetings alternate between all the communities in the Sahtu, RRC presidents and members are given the opportunity to host the meeting in their own communities. The people of each community are also encouraged through local advertising to attend the meetings. To be on the agenda and make a presentation at the meeting, submissions must be made to the Executive Director no less than 14 days prior to the meeting to ensure enough time to distribute the agenda to the members for their review. Meeting minutes are taken to ensure there is a record of issues discussed, decisions made, and attendees. The Chair will complete tasks such as calling the meeting to order and deciding who will speak to what issue (SRRB 2002a).

Any major decisions made by the SRRB must take place through a formal motion at meetings with no less than 4 members (including the Chair) present. The Board strives to achieve consensus on all issues put before it, although the final decision is usually put to a majority vote. RRC and public members in attendance are usually allowed to speak to the issue but cannot vote, and must remain silent during the voting process. Only attending members are allowed to participate in the voting, which usually takes place in public. Individuals usually need to indicate if they vote for or against the particular issue being discussed. *In camera* sessions and Executive Committee meetings follow the same consensus building and subsequent voting decision-making process (SRRB 2002 a).

#### **6.3.4 Research and the Harvest Study**

The SRRB mandate states that the Board will “have an independent research capability, to the extent agreed by the government and which does not duplicate research which is otherwise available to it” (DIAND 1993a; 43). This research is to be directed by concerns outlined by residents of the Region and will be carried out by an SRRB Biologist, other qualified researchers, or some combination of the two. Part of the Board’s mandate is also to maintain a library of research relevant to the Sahtu Region in order to ensure that duplication of research does not occur. The Wildlife Studies Fund exists to assist with research costs in the Sahtu Region. The fund is a one time payout of 2.1 million dollars that is to be managed by the SRRB for any research related to resource management. Part of the fund is distributed on a yearly basis to researchers whose proposals are approved by the Board. The SRRB decides on the projects that should receive funding. The proposals usually exceed the amount of money available on a yearly basis (DIAND 1993b; Interview 2002:22).

The other important research that the Board carries out is the Sahtu Harvest Study. As mentioned previously, this study has been carried out to determine the amount of resources harvested by the beneficiaries in the Sahtu Region. Once these data are collected, the Sahtu Needs Level and Sahtu Minimum Needs Level will be calculated. Presently the Harvest Study is near completion (Interview 2002:22).

### 6.3.5 Special Committees

Participating in special committees is another method the SRRB uses to deal with resource management in the Sahtu Region. More recently all the RRC presidents have been meeting on a regular basis to discuss common resource management issues in the Region. This group is calling itself the Regional Renewable Resources Committee (RRRC) and meets when necessary to discuss priority issues. The SRRB has been consulting this Committee about resource management in the Sahtu. The other special committee that the SRRB is mandated to establish and maintain is the Great Bear Lake Advisory Group. This Advisory Group has representatives from the DFO, the SRRB, the Deline RRC, and RWED. This group deals with management issues on Great Bear Lake, and has been in existence since 1986. When the SDMCLCA came into effect in 1994, the Advisory Group was dissolved, only to be reconstituted under the mandate of the SRRB. Both of these committees exist to aid the SRRB manage resources in a more comprehensive manner (SRRB 2002g; Interview 2002:37)

### 6.3.6 Public Hearings and Inquiries

Although the Board has never used public hearings and inquiries, they are important tools in the Board's possession. Public hearings can be held by the SRRB when they feel that this type of meeting would assist them in formally consulting the public on a particular issue. The SRRB also has an obligation under the SDMCLCA to hold a public hearing when:

... the Board intends to consider establishing a Total Allowable Harvest and a Sahtu Needs Level in respect of a species or population of wildlife which has not been subject to a Total Allowable Harvest level within the previous two years. (DIAND 1993a:59)

The Agreement (DIAND 1993a:59) states that the Board shall have the powers of a commissioner under "part I of the *Inquiries Act*, R.S. 1985, c. I-11. The Board may not, however, subpoena Ministers." This allows the SRRB to conduct investigations into any matter within its jurisdiction and that it deems relevant to resource management.

### **6.3.7 Other Co-management Agreements**

The SRRB also has the ability to enter into any other co-management agreements with other jurisdictions. Since its inception, the SRRB has entertained a few species-specific agreements related to migratory caribou, and can use agreements with other jurisdictions as a means to attain comprehensive resource management of this species (Olsen *et al.* 2001). One such co-management agreement that the SRRB is working on is for woodland caribou that spend part of their time in the Sahtu region. The Board has also engaged in several Integrated Management Plans that include strategies for management of the Cape Bathurst, Bluenose-West and Bluenose-East caribou herds, as well as an Integrated Fisheries Management Plan for Coney.

## **6.4 CONCLUSION**

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The SRRB is the main instrument for renewable resource management in the Sahtu Area. By understanding the history of resource management in the area, and the theoretical underpinnings of those management schemes, one can draw a more complete picture of resource management as it is occurring today. Theoretically the SRRB takes a Stewardship Approach to resource management, but the process is bureaucratic and is governed by an Agreement that many stakeholders disagree with or do not fully understand.<sup>20</sup> Although these barriers have reportedly limited the amount of success the SRRB presently enjoys, co-management in the Sahtu is relatively new and, when compared to regimes in other parts of the world, enjoys the benefits of legal standing and constant funding. Further descriptions and assessments of the Board from a stakeholders' point of view will help illustrate some of the challenges that the SRRB is facing today.

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<sup>20</sup> This point will be further argued in Chapters 7 and 8.



## CHAPTER 7

# THE EVALUATION: FINDINGS AND ANALYSIS

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As discussed in Chapter 5, the evaluation framework was tailored specifically to the SRRB. While this had the affect of producing a much more in-depth evaluation of the Board, to some extent the generality required for universal application was lost. The main tenants of the information gained from this evaluation are a snapshot of how the SRRB was functioning at the time of the study. Although the framework for the evaluation will be useful to guide subsequent evaluations, the evolutionary nature of co-management boards as an institution means that the criteria will need to be reviewed and updated for successive applications.

This section presents the data collected during this case study, as well as general comments about the items that were assessed while undertaking this research. As a result of the approach taken to this research, which included components of interventionist, participatory and dialogical approaches, many of the results are presented in a narrative fashion. Although this approach is sometimes questioned by quantitative thinkers, “such a narrative without reference to measurable quantities, can be sufficiently robust to withstand scholarly scrutiny” (Berardi 2002). To further understand the results that are presented in this section, a ‘Frequency of Mention’ chart provides much of the research data in a condensed fashion and forms the base for many of the research findings (refer to appendix E). This information was used, together with a review of relevant Board documents, participant observation, and validation of results, to ‘triangulate’<sup>21</sup> the

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<sup>21</sup> In social science research triangulation implies the use of different types of measures, or data collection techniques in order to examine the same phenomena. The basic idea is that measurement improves when diverse indicators are used (Neuman 1997).

information presented. The lessons learned from implementing this type of external evaluation will be presented in Chapter 8, along with the recommendations gleaned from the exercise.

## **7.1 FORMATION**

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### **7.1.1 Purpose**

In the case of the SRRB, the Board was established proactively as a result of the SDMCLCA. Under the Land Claim Agreement, the SRRB is to be the main instrument for forest and wildlife management in the area and, as such, is to represent the interests of the public (SRRB 2002a). As mentioned in Chapter 3, the SDMCLCA was: a) initially part of larger negotiation that included the whole Mackenzie Valley; b) in the beginning, negotiated separately for both the Metis and Dene of the Valley; and; c) was based, in the end, on a separate settlement negotiated specifically with the Mackenzie Valley Gwich'in. These three facts about the SDMCLCA have significantly shaped the manner in which the Agreement was viewed, understood, and supported at a community level in the Sahtu.

During the interviews, several beneficiaries and non-beneficiaries noted that there was a general lack of understanding regarding the SDMCLCA. There was also indication from the interviewees that the beneficiaries display a lack of commitment to the Agreement and exhibit limited ownership of the decisions made by the SRRB. Other comments regarding the negotiation of the claim suggested that there was not 100% agreement among the Sahtu Metis and Dene and the Communities of the Sahtu when the Claim was signed:

They want to educate people on the Land Claim book after it was signed. I think quite a few people were unhappy and there was a big dispute in the communities for quite a while, because some were against it. To me it wasn't negotiated long enough. They should have waited and kept negotiating and made it better. (Interview 2002:39)

In some cases the representatives of the Sahtu were not as involved as they should have been in the negotiation... [and therefore] there is a bit of a backlash regarding what the Land Claim contains. (Interview 2002:41)

Almost all of the respondents indicated that there was limited understanding and limited acceptance among the different groups at the time of the signing of the Agreement. Further anecdotal evidence indicating lack of support for the Agreement is found in the 2002 Sahtu Land Use Plan, where an Elder was quoted as saying; “In looking at the map of the Sahtu Region, I am concerned about the fragmentation of land into districts. It doesn’t reflect our land use” (SPUPB 2002:31). On the other hand, the work done to complete the document, and the high quality of the plan, is a direct indication of how these groups and the communities have, worked together under one co-management Board.

As pointed out in Chapter 5, there has been a debate in academic literature regarding the functionality of boards that were set up either as part of a perceived crisis or as part of a proactive process, such as the signing of Land Claim Agreements (Huntington 1992, Usher 1991, Pinkerton 1989). In the case of the Sahtu, Board and staff members indicated that, although it was beneficial to have the funding and a clear set of directions under the Agreement, people were not interested in the Board unless there was a controversial topic or a perceived crisis. This perception has been echoed by beneficiaries and non-beneficiaries. Although there have been no easily identifiable resource management crises that the SRRB has addressed, they have dealt with a few controversial issues that have increased short term interest in the Board. The interest in the SRRB is usually based on getting a single concern dealt with, as though the Board is viewed, by the community, as something they have to deal with for short term decisions, not something they choose to deal with for long term planning and management (Interview 2002:37).

This lack of interest and support for the board reflects lingering sentiments about the SDMCLCA. Having funding, legislation, and formality were identified as positive attributes credited to the proactive purpose of board formation, while dissatisfaction with the Land Claim Agreement and how it was negotiated negatively effects what support the SRRB is able to build.

### 7.1.2 Scale

The area managed by the SRRB is roughly 280,000 square kilometers and encompasses the traditional area of four social/territorial bands. Prior to the settlement of the Land Claim Agreement, this area was managed through a mixture of Traditional and Scientific Management techniques that operated at the community and regional or territorial scale. The formation of Hunters and Trappers Associations in the Region helped bridge the gap between these two scales of management, although the successful cooperation between community residents and regional managers was largely dependent on the cooperation of the people in charge of both the HTA and RWED (formerly known as the NWT Wildlife Service) (Interview 2002:22).

Once the SDMCLCA was signed and the SRRB was established, management was theoretically enhanced at a community level through the formation and establishments of the RRCs in each of the communities. These organizations were to act as the local voices for each of the communities and were to be integrally involved in the wildlife management process for each region. Although it was anticipated that these RRCs would be an appropriate device for implementing management recommendations on a local scale, for various reasons management input has been limited. It is important to note that because of limited input from the community on a voluntary basis, local participation in resource management from a SRRB perspective has been limited. Consequently, the scale of management, and the responsibilities associated with resource management, have significantly increased for the SRRB. Although, in theory the scale of management and the scale of management bodies match, (RRC in every community; SRRB for the region) several barriers limit the cooperation and effective communication of these organizations. These internal and external barriers will be discussed throughout Chapter 7 and 8.

Some of the preconditions related to the scale required for the successful self-management of resources identified by Hayes (1999) and Pinkerton (1989) include, a) a small area defined by direct links between the landscape and the benefits to local users; b) a small number of resource users that are in constant contact with each other; and c) resource harvesters who are able to control the allocation of, and access to, resources.

Under the mandate of the SRRB, all three of these conditions exist, some to a higher degree than others, due in large part to the remoteness of most of the Sahtu Lands. The lack of all-weather roads and a small population have helped the SRRB to attain the first two preconditions. In many traditional areas within the Sahtu, resource users have direct historical and cultural links to the landscape, and use those areas regularly for subsistence harvesting. They perform a type of informal monitoring of the resources in that area, and this information is usually shared within the communities (Interview 2002:40). On the other hand, despite an increased attempt to involve communities and RRCs in the decision making process, there is still the perception that resource users have little input into the actual allocation of resources. According to some beneficiaries, there was a feeling that allocation was not something they could control, but something imposed on them by RWED. “They even have gone as far as telling us we need a permit to cut wood” (Interview 2002:34). Some of the participants also felt that a significant number of resources were being harvested by many people who were not Sahtu beneficiaries. “When the winter road is open we have people coming up with dump trucks to harvest the caribou that are on Sahtu Lands” (Interview 2002: 44).

Information about the precondition of ‘having direct links to the landscape’, was gleaned from two community elders who indicated that people today are losing their connection to and reliance on the land, which in turn is affecting the respect they have for the resources (Interview 2002:23;24). A few other respondents also commented on the number of non-beneficiary guides in the area that offer sport hunting and fishing to southerners. “We don’t know how many animals these people are taking ... we have no control over how many animals they take” (Interview 2002:03). Through other subsequent interviews it was discovered that this activity is in fact highly regulated by RWED and that the outfitters tend to share a genuine interest in protecting their livelihood. “It is usually in the best interest of the guides to protect their economic investment and to take a specific interest in maintaining the resources that are important to their business” (Interview 2002:40). Cumulatively the responses of the interviewees indicate that outside influences and ensuing development are the beneficiaries major

concerns related to management in the region. Increasing development and closer contact with the 'outside' will begin to have serious impact upon these preconditions.

The scale of management is also related to the responsibilities co-management boards have in comparison to their staff and budget. In the case of the SRRB, they are responsible for all renewable resources in the Sahtu Settlement area. According to Board and staff members, the information, research, and especially community consultation requirements associated with the management of all of these resources are more than the present staff can handle. Funding for an extra position is limited and forms one of the external barriers affecting the function of the Renewable Resource Councils and the SRRB.

While a review of theoretical literature (Berkes, Colding and Folke 2003) indicates that the setup of the Sahtu resource management Board and Councils adequately takes into account multi- and cross-scale management concerns, cumulative periphery obstacles in terms of communication and participation negatively effect resource management. Additionally, as reported by many of the interviewees, the development pressure and external resource users also affect resource management in the Sahtu Region. Increased resource users in the region, the reduction in communication between the users, and perceived limited control of the allocation and access, coupled with the effects of periphery obstacles on cross-scale management, cumulatively are having negative effects on management scale.

### **7.1.3 Implementation**

Direction for the implementation of the SRRB is spelled out in the Implementation Plan (IP) for the Sahtu Dene and Metis Comprehensive Land Claim Agreement that was produced at the same time as the SDMCLCA. The plan "consists of documents indicating the activities required to implement the Sahtu Dene and Metis agreement and an estimate of the associated costs. The plan is based upon the division of existing responsibilities between the federal and territorial governments" (DIAND 1993b:1-2). Contained in the document is an action plan for the development of the SRRB, including

significant direction regarding the funding of the organization. Also included in the IP is direction about how RRCs should be established, and their responsibilities. An unfortunate ambiguity exists within the document regarding the relationship between the RRCs and the SRRB. Both were allowed to decide for themselves how they would relate to one another, including the division of responsibilities related to similar organizational functions and goals (Interview 2002:27). Interviewees familiar with the operation of co-management boards identify both positive and negative aspects related to the degree of freedom given to the Board to fulfill its responsibilities. Some argue that the ambiguity allows for a more vigorous grassroots approach to fulfilling obligations, while others feel that there needs to be clearly definable checks and balances that will force these public organizations to engage their mandate to the highest level (Interview 2002:22;40).

Board and staff members generally felt that the flexibility allowed for under the Agreement was more of a disadvantage, exaggerating the struggle with staffing and capacity issues and the complexity their responsibilities. Although a few believe that flexibility is desirable in theory, in practice not having clearly defined roles for the interaction of the SRRB and RRCs is a definite drawback. Although this opinion is common among the Board and Staff members, some individuals at the community level feel that the Board and the councils are too bureaucratic and inflexible to get anything accomplished.

There are too many boards for the people to keep track of ... When people set out to (complete a task) or want to get something going in their community they get frustrated by the amount of offices they have to visit before they can speak with the right person. Then these organizations need to meet with the government and it takes so long for them to make a decision. (Interview 2002:06)

Implementation of co-management in the Sahtu is complicated by the transitions that have taken place at the community level, specifically, the transition from having an HTA to having an RRC. Although this was only identified by two of the respondents (Interview 2002:22;02) as being a significant issue, further researcher analysis of the manner in which these organizations were operating provides insight. While the HTAs had limited funding and official power under the old management scheme, the

community understood the role they were to fulfill and the political impact they could have. Once these organizations were amalgamated with the RRCs, their official responsibilities significantly increased, their funding marginally increased and public perception, including council member perception of their role, remained to some extent static (Interview 2002:05,18). This difficulty in the implementation of the RRCs at a community level continues, and in many ways puts pressure on the SRRB budget and strains some of their management responsibilities. The SRRB presently pays for an RRC member to attend all Board meetings and initiates and pays for the meetings of a regional body, the Regional Renewable Resource Council, in order to consult with these organizations.

Many interviewees recognized that the lack of clearly defined roles and responsibilities, at a time when the Board was experiencing other significant barriers, was a disadvantage. Additionally, a review of the interview data indicated that uncertainty regarding resource management organizations and their related roles, pre- and post-Land Claim Agreement, was detrimental to the present SRRB and RRC operations.

## **7.2. ORGANIZATION**

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Recent developments in the evaluation of public organizations from a business perspective have resulted in a significant number of assessment techniques that could apply to co-management boards. Only significant factors having sufficient data or information available will be discussed in the following section.

### **7.2.1 Composition**

Based on literature from other evaluations conducted by Hayes (2000) and Roberts (1994), and academic consensus that smaller is better (Berkes 1989; Jentoft 1989), the six-member SRRB is a manageable group of individuals, especially when trying to attain consensus. The smaller number of board members also contributes to the comfort level of participants at meetings. In the case of the SRRB, representatives from the RRCs are encouraged to attend meetings, and are compensated for their travel and accommodation expenses. Additionally, the meetings are open to the public, although only two or three

observers attend per meeting<sup>22</sup>. Consequently, there is usually more than just the Board members at the meeting, negating the concern that membership be limited to facilitate a non-threatening atmosphere and encourage participation. Although having more than just Board members at the meeting might intimidate individuals from engaging in frank conversations, maintaining an open relationship with the RRCs and the public is a high priority for the SRRB. The Board needs to ensure they are not seen as an exclusive club (Interview 2002:41). According to Board and staff members, having the RRC's present has added important community input to the Board and has encouraged communication between the organizations (Interview 2002:37).

Representation on the Board was called into question by a few respondents who lived in Agreement areas where two communities worked together under one District and had one representative. The K'ahsho Got'ine District and the Tulita District each have two communities within them, and each has only one representative on the SRRB, a significant issue for a few respondents who felt under-represented. Others in the larger communities of each region did not comment on the number of representatives. Most Board and staff members felt there was sufficient representation from each of the regions and believed that there was an equitable distribution of Board members.

Board membership consistency and succession planning is critical to long term stability. According to the Board and staff members, membership inconsistency and absenteeism has been a problem negatively affecting the function of the SRRB (Interview 2002:38;41;03). Although members are scheduled for replacement at the same time, the government-appointed members have been re-appointed, subsequently maintaining some consistency. "Before this last re-appointment of members we were maintaining some consistency, but now with half the membership new again, we will have to wait and see how things will work out" (Interview 2002:37). It was also suggested that the replacement of members should be staggered to maintain some consistency and capacity, as presently all members come up for replacement at the same time.

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<sup>22</sup> People who usually attend the meetings are either members of the community interested in the topic being discussed or members of the academic/scientific field there to give a presentation.

While the Board and staff members interviewed felt it was advantageous to maintain some consistency, two beneficiaries commented that they would like to see some fresh faces in the government-appointed positions. Their concerns were generally related to the fact that a few of these appointees (members and alternates) did not live in the Sahtu Region, and as such, were outsiders commenting on important issues in the Region (Interview 2002:04,03). Alternatively, Board and staff members felt that the skills and expertise that these individuals brought with them were invaluable to the function of the SRRB (interview 2002:45;40;41).

A review of the interview data and meeting minutes indicates that although a few individuals at the community level felt that Board membership was not completely representative of all parties, most were willing to live with the Board size and representation. The Board's ability to deal with continuity and succession issues had less support from the interviewees. According to the Executive Director of the SRRB, she had written a letter to DIAND regarding staggering membership succession and was waiting for a reply. There was at least acknowledgement of this concern by the SRRB and its members, and a plan to deal with the issue.

### **7.2.2 Board Member Skills**

The competency of Board members has a large effect on the proper function of co-management boards (Roberts 1994). This topic emerged as one of the dominant points of discussion throughout the interviews. Interviewees reported that residents of the Sahtu were somewhat under qualified and were not seeking out the qualifications and skills required to take on the board related positions in the Region. Others noted the sheer number of boards in the Region limited the amount of time Board and council members could spend on their responsibilities, especially if they were representing a number of organizations.

The skills and mindset identified in Chapter 5 included leadership, confidence, belief in the process, time management, and cross cultural sensitivity. According to the Board and

staff members interviewed, cross cultural sensitivity was the one skill that seemed to be shared by almost all of the SRRB members. Members displayed a genuine interest and understanding of cross cultural approaches to management, although they did not necessarily agree on a process that would adequately accommodate diverse knowledge levels. Conversely, respondents indicated that there was a lack of leadership, confidence, and time management skills, particularly among past members. Although this was identified as a drawback by several interviewees, further comments by the beneficiaries indicated that decision-making bodies set up under the Land Claim Agreement were too foreign, or too 'westernized' compared to the way the Sahtu had made decisions in the past. "We are asked to participate but never given the chance to decide how we should participate" (Interview 2002:30).

The same criticism was not leveled at government-appointed representatives. Board and staff members felt that these individuals had sufficient skills and brought a wealth of knowledge, experience, and balance to the SRRB.

Belief in or commitment to the process of co-management is worth extra consideration. Although this mindset was not directly commented on, there seemed to be several indications that a few of the past members had not been interested in participating, or had participated in the process for the wrong reasons.

In the past we would have members show up to the meeting intoxicated and become a distraction to the process. There have also been a few of the members that like to come to the meetings because they receive a stipend for participating ... they sit on as many boards as they can and attend as many meetings as they can (Interview 2002:41)

Although there were several similar comments made by beneficiaries and non-beneficiaries alike, many indicated that it was not harmful to sit on a large number of boards, as long the representatives were genuinely interested in the process and had the capacity to adequately represent the community.

While the commitment to the process had not always been displayed by all Board members, a select group of members and alternates have displayed great interest in the

success of the SRRB. In the Sahtu, the demand for people of leadership quality, with experience and training, far exceeds the supply. A qualified person who is a leader is in demand, and he or she tends to become overextended. This is a major factor influencing the effectiveness of the Boards, the RRCs, and other organizations in the community<sup>23</sup>.

As indicated by the regional statistics consulted, and like many isolated northern Canadian regions, the Sahtu has limited opportunities for employment and some social problems to overcome (GNWT 2001). These difficulties sometimes manifest themselves inside the organizations operating in the Region, become an issue well beyond the basic mandate, and add to the assessment context. These points are noted as part of this research project to illustrate that it is not only important to understand the SRRB itself, but the wider environment it is working within.

### **7.2.3 Mandate and Authority**

Though the mandate of the Board is prominent in many of the legal and technical documents related to the SRRB, understanding of it at a community level seems to be limited. While undertaking this research, it became clear that community members, and occasionally individuals who had significant interaction with the Board, did not have a clear understanding of specific issues related to the SRRB. This lack of understanding related to misconceptions about why the Board was set up, how it made decisions, and most importantly, to whom it was accountable. This general level of confusion did not extend to past and present Board members and staff, who seem to have a good understanding of their function and duties related to mandate and authority, although misunderstandings about the Boards relationship with RRCs and the community did exist.

The lack of general understanding and misconceptions of the SRRB at a community level significantly affected the evaluation. Many of the items about the Board's operations or function that were assessed as part of this study could only be commented on by individuals involved with the everyday activities of the Board. Consequently, it was

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<sup>23</sup> The issue of capacity deficit in the Sahtu is addressed within the recommendations that follow.

difficult to report fully on all aspects of the Board, as only a select handful of individuals were able to provide information.

Considering that the Board's mandate was not fully understood by the public, the perception of authority was skewed or misunderstood. About half of the beneficiaries interviewed believed that the Board was either part of the government, or controlled by the government. The perception of significant government involvement in SRRB decision-making seemed to be tied to what many believed was a somewhat inadequate Land Claim Agreement.

We cannot just speak about the Wildlife Board and how they are doing when the whole system (the Claim) needs to be changed ... we need to have self-government in every community so that we can manage the resources for ourselves. (Interview 2002:29)

Key organizational leaders refused to discuss the SRRB at length because they felt the whole system needed to be evaluated, not just one part. "Recommendations to improve the Board would be useless if it continued to function in a system that isn't working (Interview 2002:30)". This sentiment is important to point out, as it has the potential to skew the results related directly to the function of the Board, as many negative comments about the function of the SRRB might have resulted from frustration with the larger overall process.

Finally, it is important to evaluate the relationship between the Board's mandate and the Board's authority. As mentioned in section 7.1.3, the SRRB was given discretion when deciding on how it would fulfill its responsibilities, even though its mandate and authority were clearly laid out under the SDMCLCA. In the opinion of the few that commented on the Board's authority and operations, it was acknowledged that the Board's authority did go far enough to fulfill its mandate. Although a few questions about authority and jurisdiction did surface from time to time at the community level, these questions were primarily related to the amount of authority the RRCs had in directing what research the SRRB engaged and how the SRRB made its decisions.

A review of the interview data and relevant documents related to mandate and authority indicated that many individuals at a community level did not have a clear understanding of the SRRB mandate and function. Subsequently there was also a disconnect between the actual authority that the Board enjoyed and the perception of authority that beneficiaries attributed to the SRRB. To varying degrees this misunderstanding was also expressed by a few of the past community-appointed Board members. This lack of understanding and misguided perception had a negative effect on the function of the Board.

#### **7.2.4 Funding**

Funding for the SRRB is distributed by DIAND on a monthly basis. Under the Land Claim Agreement and Implementation Plan, the Board will receive approximately 5.5 million dollars for its operating budget over a ten year period. The Board is also responsible for the administration and distribution of the Wildlife Studies Fund, approximately 2.1 million, and the completion of a community Harvest Study, approximately 1 million (DIAND 1993b). Although it manages to meet all its needs, the Board has benefited from long term funding that has allowed it to operate in a financially secure manner. Although the funding has been constant and, upon initial review, would seem adequate for a public body, the cost of doing business in isolated northern communities significantly erodes much of their budget. Travel and staffing costs are two of the largest expenses that the SRRB incurs, and are due to the remoteness of all five communities that comprise the Sahtu Region. The cost of travel is exceedingly high, as is the cost associated with attracting qualified staff to small, isolated, northern communities that have relatively little to offer in terms of amenities (Interview 2002: 37).

According to many Board and staff members, a significant difficulty within the Board's budget results from the under-funding of the community RRCs. The RRCs are intended to be the SRRB's link at the community level, and in theory, are responsible for directing many of the management and research initiatives engaged in by the SRRB. As a result of the RRC funding shortfalls, these organizations have neither the time nor the resources to become involved in resource management as they should or would like to be. The lack of

funds, coupled with a lack of understanding of RRC responsibilities at the community level, levy additional costs on the SRRB, as they are responsible for undertaking an ever increasing role at the community level (Interview 2002:37;41).

The Board, as with most other Land Claim Agreement organizations,<sup>24</sup> incurs additional costs that result from the decentralized approach set up under the Agreement. Under the SDMCLCA, its Implementation Plan, and the Mackenzie Valley Resource Management Act, the Sahtu Co-management Boards are situated in three different communities in the Sahtu. Fort Good Hope has the Land Use Planning Board and the Land and Water Board, Deline has the Sahtu Secretariat Inc. and Tulita has the SRRB. Although this decentralization has helped diversify the economies of each of these communities, the duplication of costs of services for all of these boards has increased their operating costs. According to one of the Board members, some of the successes the Gwich'in Agreement has experienced can be directly attributed to the centralization of all their boards in one community.

These boards are able to interact with each other on a daily basis, and if they need to consult an outside government agency, in most cases they simply walk down the street in Inuvik. (Interview 2002:41)

Although the SRRB has guaranteed, consistent, and long term funding, the cost of doing business in the North and the addition external responsibilities that are on the fringes of their mandate, dilute funding sufficiency.

### **7.2.5 Accountability**

Financial accountability within the SRRB is achieved through the submissions of Interim Activity Reports to the Implementation Committee and the federal government. All budgetary decisions must be approved by both the Board Executive and the whole Board itself, and then the Implementation Committee. The Operating Procedures Manual outlines the policies and procedures related to financial accountability and how the staff and Board members are to deal with financial concerns.

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<sup>24</sup> This includes the organizations set up under the MVRMA.

Specific Board member accountability, including responsibilities, are spelled out in the Operating Procedures Manual. The manual was rewritten in 2002, and in describing Board members conduct and preparation, the manual has been stripped of some of the in-depth descriptions of appropriate conduct and accountability. Overall, the Operating Procedures have been clarified, and the Human Resources section has been expanded to include more detail, while the Board member 'Roles and Responsibilities' section has been significantly abbreviated. The older version of the document provided Board members with a more comprehensive explanation of their duties.

The other item that affects the perception of accountability of Board members is how they are selected for their positions. Board members are appointed, which can lead to accountability and perception of authority problems with relation to the principles of a representative democracy (Hernes and Sanderson 1998). The selection process for the most recent replacement of community-appointed Board members was as follows:

- SSI put out an advertisement that called for individuals to submit a letter indicating that they were interested in becoming a Board member, and highlighting their qualifications;
- Members for each Region submitted their letters of intent
- RRCs were asked for their input in selecting a member and whether they would endorse a specific individual;
- SSI put forth names to the federal government for criminal record and background checks; and
- SSI was advised by government of any individual that did not qualify as a Board member. (Interview 2002:37;27)

This method of appointment is not controlled by the SRRB and was identified as an inappropriate way of appointing people to the Board by many of the Board and staff members. Interviewees felt that the process was cumbersome, lengthy, unfamiliar to community members, and inappropriate for the Sahtu Region. Others identified the Criminal Record check as one of the main stumbling blocks in getting new community-appointed members. Applicants that had a criminal record were immediately disqualified. Consequently, promising candidates who had been guilty of criminal code violations 20 years ago were not eligible to become Board Members (Interview 2002:37;41).

There were also comments by past Board members and beneficiaries noting that stakeholders had no control over the government-appointed members and no method of removing them once they were in place. These respondents felt that the government representatives were not accountable to anyone since the government agencies that appointed took no interest in the operation of the Board (Interview 2002:04;03;08).

The perception of accountability deficiency, resulting from what many interviewees felt was a flawed appointment process, is negatively affecting the SRRB. The process has limited the trust stakeholders have in the people who are appointed to the Board, as it is viewed as a cumbersome and top down, rather than a grassroots, approach<sup>25</sup>. On the positive side, financial accountability issues were not identified as a significant concern by any of the interviewees and a review of relevant Board documents indicated that a number of appropriate checks and balances are in place.

## **7.3 OPERATIONS**

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### **7.3.1 Meetings**

Board meetings are extremely important to the co-management process. The SRRB is investing a significant amount of time and energy into the proper conduct of Board meetings. It ensures that meetings alternate between communities, setting up the rooms in a circular, or at least square arrangement so that members can face each other for discussion. The chairman ensures that people have the opportunity to speak. Meeting dates are set according to Board member availability, while meeting topic summary notes are provided to all members and RRCs prior to the meetings. Food and beverages are provided.

Despite these efforts to ensure that meetings are efficient and effective, the general feeling among Board and staff members can generally be described as pessimistic.

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<sup>25</sup> It is anticipated that once the SRRB raises its profile at a community level, based on the recommendations that follow, understanding and transparency of Board operations will be enhanced.

Community appointed Board members indicated that they were given limited opportunity to speak and that the meeting agendas rarely included the topics that they wanted to discuss. There was also displeasure with the manner in which decisions were made, as many beneficiaries felt that there needed to be more discussion and consultation with the community. On the other hand, government-appointed Board members and staff generally commented on the lack of preparedness of community-appointed members, their lack of input, and the lack of public interest in and attendance at meetings.

In observing one of these meetings, it was apparent that in some instances conflicting personalities would take the meeting off topic, frustrating many of the participants and affecting their participation in the process<sup>26</sup>. Board and staff members reported that this type of interaction occurred on a regular basis because of personality conflicts and a lack of understanding of the process. Two interviewees believed that the meeting chair should take a larger role in stemming these personality conflicts, and that more training for the next Chair would be required (Interview 2002:41;37). Beneficiaries cited frustration with the process and their perceived lack of decision-making authority as part of the reasons for these meeting disruptions. It was suggested by two interviewees that participation at meetings might be enhanced by specifically asking all individuals at the table to comment on specific topics, instead of just opening the floor for comments (Interview 2002:39;22).

Although, the SRRB has invested significant time and energy in Board meetings, few study participants viewed them as productive endeavors. This is a noteworthy barrier to the success of the SRRB, as the Board meeting is the main form of community contact and consultation. As reported by the interviewees, the conditions that decreased the effectiveness of the meetings were related to process unfamiliarity, lack of board member preparation, and personality conflicts.

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<sup>26</sup> The meeting was unusual in that the Board was required to have a meeting to distribute research funds before a certain date, but did not have all their new community Board members appointed or in attendance. Therefore the meeting was Chaired by a government appointed Board member and his alternate sat in to create a contingency of four government appointed Board members. Although, the government members constituted a quorum, two representatives from each RRC were in attendance to provide the Board with feedback on the decisions. The previous Chair and a former community appointed Board member were also in attendance.

### **7.3.2 Staff**

There were four staff positions at the time of the field work; the Executive director, the Biologist, the Harvest Study Coordinator and the Office Manager. The Harvest Study Coordinator and the Office Manager positions were both staffed by beneficiaries, while the Biologist and the Executive Director were both non-beneficiaries who had recently moved to the NWT from south of 60°. According to respondents and the SRRB website, other staff positions also existed. These included an Integrated Resource Manager, a Harvest Study Coordinator Trainee, a GIS Specialist, a Wildlife Technician, various summer students and a Computer Programmer/Administrator. More recently, the Board has been considering additional staff members to assist in consulting with community members and engaging in research that is outside the expertise of the present Biologist. As mentioned in Chapter 5, an in-depth evaluation of each staff member will not be carried out, as this type of evaluation should, and does, take place on yearly internal basis and is outside the purview of this study. Instead, general observations and comments will be reported.

According to the evaluation completed by Hayes (2000), the employment of local people is important to the function of co-management, as it helps build capacity in the community and provides local job opportunities. This sentiment was echoed by two beneficiaries who also felt that having local people employed greatly enhances the function of the Board as it provides an opportunity for cross cultural communication (Interview 2002:03;36). While the SRRB intends to staff all positions with beneficiaries, those who qualify will need to occupy trainee positions prior to taking on the full responsibilities of the position. The Executive Director Trainee position was being advertised at the time of field work. According to two Board members, the difficulty in staffing Board positions with beneficiaries has been finding the time to advertise the job postings and then locating qualified individuals who are young and motivated enough to see the training program through (Interview 2002:41;04).

The isolation of the Sahtu Region complicates this process. Finding qualified individuals in the Region has been problematic. Since the inception of the Board, staff turnover has

been repetitive and, according to the majority of the Board and staff, is one of the main reasons the Board has had limited success to date<sup>27</sup>. Having to go through the expensive and time consuming process of interviewing and hiring on a continuing basis has taken up a significant amount of the Board's budget and time and has put extra pressure and strain on other staff who are required to fill the gaps. This pressure and strain on the staff has been intensified in the SRRB's case because the Executive Director position has experienced some of the most frequent turnover - six Executive Directors in eight years. The Board has been able to maintain their present Executive Director for over two years, in addition to her former experience as the Harvest Study Coordinator with the SRRB. Although the SRRB has enjoyed some recent success in retaining staff, past turnover has significantly diminished the overall effectiveness of the Board during their implementation phase. Unfortunately this continues to be a problem, and as of the end of field work for this research the Biologist resigned, creating yet another vacancy at the SRRB.

General comments by the interviewees about the staff members and their abilities to fulfill their duties were mixed. They concentrated mainly on the fact that staff members were young and perceived as inexperienced for the positions that they held. These perceptions have obvious repercussions, diminishing the confidence and trust that both the community and outside organizations have in the Board. Correcting this perception will take both time and a concerted effort by staff to take more of a leadership role in the Sahtu Communities. Several of the beneficiaries and non-beneficiaries indicated that some of the staff did not appear comfortable interacting with community members, and this was viewed as a significant drawback to the trust and relationship-building the SRRB was trying to achieve. One of the Board members pointed out that the lack of community and personal contact by staff has been exacerbated by the following: a) budgetary constraints and the cost of travel in the Sahtu Region, b) the workloads of staff members, and c) the complications created because of staff turnover. These have combined to put

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<sup>27</sup> At the time of MDP publication and defence, three of the staff members had been with the Board for over 3 years. This has partially stemming the trend of frequent staff turnover and increased the Board's stability and capacity.

the SRRB at a disadvantage, because in the eyes the public there has been little consistency within the Board.

Although the lack of consistency and reduced organizational capacity have been barriers to the Board, the hiring of beneficiaries as staff members has increased the capacity of these community members and improved the cross cultural communication ability of the Board. The incremental learning process that is enhanced with consistent and committed staff members is on the increase as a result of the current executive director, harvest study coordinator and office manager who have been with the organization for over 3 years.

### **7.3.3 Expectations**

Assessing the ability of Board to meet legislative and community expectations is a difficult process. To complete this task, two variables were examined: (1) the ability of the Board to strike a balance between community and western (i.e., business model) timelines; and (2) the workloads of Board members.

The issue of timelines was contentious for most interviewees. In a few cases, beneficiaries felt that many of the Board's decisions were made hastily and required significantly more community consultation and research before being made. On the other hand, non-beneficiary Board and staff members tended to feel that decisions often took more time than necessary to achieve because members were not properly prepared for meetings or were unwilling to commit to decisions (Interview 2002:37;04). The struggle between the two ways of perceiving the effective use of time became apparent at the observed Board meeting, and when interviewees were asked, there was definite disagreement over what efficient use of meeting time consisted of. Non-beneficiaries said that the meeting time was being used for discussing agenda items that should have already been discussed at a community level, as members had been given prior notice of the meeting agenda. Further, meeting time was for tabling future items of discussion or concern, which again could be discussed at subsequent meetings after members had the opportunity to reflect on the topic, and consult the communities (Interview 2002:37;41;42;27). Community appointed members and RRC representatives felt that

the meetings could be used profitably for the informal airing of concerns, as it was not imperative to make a decision on a topic after one meeting (Interview 2002:04;36;38). This dichotomy of views continues to frustrate both the public and Board and staff members. One Board member suggested having the community-appointed members hold public meetings with the RRCs prior to and after every Board meeting (Interview 2002:03).

The question of ‘appropriate workloads’ for Board members is a sensitive and difficult one to answer due to the staffing difficulties the SRRB has experienced to date. High staff turnover increases the time that Board members, and in particular the Executive Director, must commit to internal matters, which in turn decreases the amount of time that can be devoted to Board meetings and other Board responsibilities. The other difficulty contributing to the workload of many Board members is the number of other community boards and organizations that require representatives from the Sahtu Region. Since the signing of the Land Claim Agreement and MVRMA, requests for public representation have significantly increased, straining the schedules of many community representatives.

Additional comments from beneficiaries in the community also provided insight into what they expected Board members to be engaged in:

We never see them here ... they have one or two meetings a year, but never come around to ask us our opinion of things. They need to be out in the community talking to people, letting them know who they are, and what decisions they are making. (Interview 2002:09)

When questioned, Board members acknowledged the need for community consultation, but were unsure how that responsibility could be fulfilled. Government appointed Board members indicated that they receive no funding to travel to communities for consultation, and felt that it was the responsibility of the community-appointed members to consult the communities. On the other hand, community-appointed Board members either indicated that they did not have the time to fill this role, or that there was little interest from community members unless the topic was controversial.

The information relayed by the individuals interviewed indicates that there were divergent definitions of ‘appropriate’ timelines and workloads. The variance of expectation between a few of the government-appointed board members and staff, and many of the community Board members and RRC members, frustrated and complicated many of the Board’s tasks. Unclear and occasionally unrealistic expectations of participants’ roles only serve to exaggerate these problems.

#### **7.3.4 Access to Information and Education**

The SRRB maintains an open policy regarding access to information. This policy is part of the SDMCLCA, and the Board is required by law to engage in a process that is open to the public. Presently the SRRB has three ways the public can access information: Board meetings are advertised and open to the public, and the Board produces and circulates a newsletter and maintains a website. The Executive Director also sends faxes and e-mails to RRCs, Land Corporation offices and Band offices, updating them about meeting places and times, along with any other significant news about the Board. Although this information seemed to have made it to most other organization offices in the Sahtu<sup>28</sup>, beneficiaries still commented that they were unsure of what was happening regarding the SRRB. On the other hand, Board and staff members, along with two of beneficiaries, felt that it was up to stakeholders to seek out this information.

It is not only the responsibility of the Board to distribute this information; it is also the responsibility of community members to read these updates or come to the meeting... it is important for us to take an interest in the Land Claim Agreement and understand the rights we have. (Interview 2002:04)

Although the information about the SRRB was being distributed, the main method of delivering it was in written form instead of in visual or oral form. As many of the beneficiaries come from a culture that is oral and are more familiar with sustained one-on-one interactions, other methods of delivering important information, such as research priority workshops, should be attempted.

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<sup>28</sup> Validated by way of eye witness accounts in several of the community offices.

In addition, the Board has also created scholarships and summer student programs to engage and educate youth. These programs allow youth to become involved in the SRRB process and encourage them to build transferable skills, while providing the Board with much needed community exposure (Interview 2002:45).

Access to education for Board members is also an important SRRB function. Board members need skills to be fully engaged in the decision-making process, and should be able to rely on the SRRB to attain them. In the past, the SRRB has engaged in a capacity building process, but as members are replaced, constant upgrading and workshops need to be a priority. It is also crucial that the Board Chairperson have access to proper skills training. His or her role as a firm and fair facilitator during Board meetings is crucial to the proper function of the SRRB (Interview 2002:03). However, few respondents commented on any training or skill building they received from the Board.

Although the Board has invested significant amounts of time and energy in a transparent operation and communication, information was often not reaching intended audiences. Concentration on text-based information exchange appeared to be the largest barrier. However, it is also the most cost effective manner for delivering information in isolated communities. Misunderstanding related to the Board's approach, which embraces the concept of 'shared responsibility' as opposed to a mindset of 'fiduciary responsibility' at a community level, is also affecting the SRRB and its exchange of information. While access to education and skill building is limited, the staff and Board members do understand the importance of getting youth involved in the co-management process.

### **7.3.5 Communication**

The Board uses website and newsletter are written in plain English and at the Board meetings a translator is provided for members and participants that feel more comfortable speaking Slavey. Although these steps have been taken, many of the beneficiaries interviewed still felt that they were not getting the information they require.

The Staff has the responsibility of communicating with their Board members to keep them apprised of any developments. To facilitate this, prior to meetings members are sent e-mails or faxes of upcoming agenda and are expected to review and familiarize themselves with the topics and attached information. They then have the opportunity to speak with other Board members and staff at the meetings (Interview 2002:37).

Although members and RRC representatives are provided with this information prior to the meetings, few of them indicated that they had read the material prior to meetings.

The SRRB must also be adept at inter-organizational communication. Within the Sahtu, there are several different organizations that require open lines of communication with the SRRB. The SRRB maintains communication with many of these organizations via the annual Sahtu Dene Council general meeting. Attempts by the current Executive Director to initiate a yearly meeting between all the co-management boards in the Sahtu Region could, if successful, greatly augment their communication efforts. The Board is also involved in participating in species specific co-management committees that are cross-jurisdictional (Interview 2002:40). Cross-organizational projects, such as the GIS Project, are also important methods for maintaining, and even broadening, open lines of communication.

Residents and organizations within the Sahtu respond better to more time intensive oral communication techniques as in small informal groups or one-on-one. This type of contact has been limited in the past as a result of staff changes, limited funding, and the misunderstanding of responsibility sharing. The shared learning and trust that is an outcome of effective organizational communication has been diminished as a result of this limited contact.

## **7.4 ACTIONS**

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### **7.4.1 Issue Identification**

Over the course of the SRRB's existence, a variety of issues have been addressed. A review of the SRRB meeting minutes reveals a balance between concerns brought up by

beneficiaries and issues raised by the government and non-governmental scientists and managers. When asked about issue identification, most community-appointed Board members and some knowledgeable beneficiaries felt that there were too many governance issues to discuss. One Board member spoke at length about how a few community members in the past had come to a Board meetings to raise some issues, but got bored with the process and left before they had an opportunity to speak (Interview 2002:04). Although there is no way of knowing how many issues have not been addressed, significant portions of Board meetings are used to address what could be perceived as bureaucratic issues (i.e. staffing issues, budgetary issues). It is important to note that discussing these issues at a public meeting is crucial in maintaining transparency, but they are not the same issues Sahtu Dene and Metis ponder when they consider renewable resource management.

There are no clear guidelines about how issues become a priority for the SRRB. Comments by one respondent seemed to indicate that the Board took much of its direction from what was referred to as the ‘rumbling of the commons’. Occasionally government-appointed Board members would get wind of a potential issue, and discuss it with other Board and RRC members in an informal fashion. If during the discussion it was identified as important to the RRC or the community, government members would encourage RRC representatives and community Board members to pursue the issue (Interview 2002:45). This type of consideration by the Board and staff was observed on several occasions and is a positive indicator, reflecting the tenets common to Stewardship management.

In the end, issue identification within the SRRB seemed to be balanced between issues identified by the community and those identified by scientists and manager. The type of issue identification that the Board is involved in is consistent with a process that builds ownership and understanding. Unfortunately, community members do not fully understand the co-management process, but it is anticipated that the SRRB will increase their visibility at a community level through the recommendations provided in this document.

#### **7.4.2 Community Involvement and Consultation**

According to many of the interviewees, the effective links between the community and the Board is not clearly understood. Other evaluations of co-management point out that effective community involvement and consultation need to be significant parts of a Board's mandate and daily activity to ensure stakeholder ownership of the Board and the decisions that it makes (Roberts 1994). In the SRRB's case, community involvement and consultation has been achieved through the Board meetings. In this regard, the SRRB also provides extra funds to the RRCs to ensure that they are able to attend all the meetings and provide input to the Board. As pointed out by several beneficiaries, the Board meetings do not necessarily present an inviting atmosphere, where people feel like they are interacting as equals. Other options for enhancing stakeholder involvement and ownership, such as community workshops, training sessions, school partnerships/presentations and successive visits to the communities and community organizations, help boards become more visible and identifiable at a community level. Combined, these types of activities could help the SRRB build trust with and garner valuable input from the people and organizations in the communities.

Board and staff members reported that many of these options had actually been tried at one time or another but enjoyed little success. Few people attended or participated, leaving these expensive activities highly unfulfilling (Interview 2002:37,04). More recently, the SRRB has been engaged in research priority workshops with individual RRCs, and will participate in a research project that will provide hunters from all the Sahtu communities with hands-on training on how to identify diseases in subsistence animals. These new types of community contact methods have yet to be evaluated, but they will definitely enhance the visibility of the Board. Although the SRRB is into its eighth year of existence, it still needs to establish stronger community connections and visibility, backed by significant investments of time and money.

Overall, the SRRB has simply engaged in one approach to community input and consultation. Their reliance on Board meetings has limited the amount of information

they have been able to get from community members about resource management issues and the amount of interest in the Board. Although, other forms of community consultation and involvement are more time consuming, the use of less formal forms of consultation and involvement would improve this crucial aspect. This process is also complicated by the lack of funding and capacity at the RRC level. Yet without adequate community consultation, the SRRB will further limit support and trust within the communities.

### **7.4.3 Research**

Research is also another one of the SRRB's major undertakings. The SRRB is in charge of distributing monies from the Research Fund. In-house research occupies a significant portion of the Biologist's time, and the Board is also in charge of Sahtu Harvest Study. Since the Board's creation, in-house research and monies from the Research Fund have primarily been used for the collection of scientific information related to important subsistence species (SRRB 2002f). Much of this research would not have taken place had funding from the Board not been available. These projects have provided the SRRB with a further understanding of the ecosystems in the Sahtu Region (Interview 2002 :40).

Although attempts have been made to incorporate traditional knowledge into many of these in-house or Research Fund projects, much of the work has concentrated on the collected species-specific or summary traditional knowledge. Many respondents reported being interested in collecting and using traditional knowledge, but little has been done to collect it in an organized, holistic fashion. According to one interviewee "the collection of traditional knowledge in general does not fall under the jurisdiction of the SRRB, but if someone wanted to collect it they could apply for Research Fund monies like all the other research projects" (Interview 2002:37). Unfortunately, the Sahtu Region does not have an active group independently funded to conduct traditional knowledge research. This responsibility falls to the Board members, the RRCs, and any other individual that wants to take on the responsibility. Conversely, the SRRB Biologist and RWED employees are actively involved in securing monies to engage in science-based projects supported by the Research Fund. These science-based research projects employ

community members and use traditional knowledge where practical, but as indicated by some of the interviewees, the SRRB does not necessarily use the information in a balanced fashion. Respondents also voiced their displeasure about the research projects and the types of animals studied with money from the Research Fund. A few individuals commented on the amount of studies that were being conducted in the Mackenzie Mountains, in light of the fact that very few of these animals were important subsistence species (Interview 2002:23;04;03).

Conversely, the Harvest Study has been one of the Board's most important and high profile projects. Respondents that initially felt they knew nothing of the Board soon made the connection between the Study and the SRRB. Although a few beneficiaries interviewed reported feeling skeptical about providing the Board with the information, they at least knew about the project and occasionally why the data was being collected. The Study is also coordinated by a beneficiary, and community researchers in all the communities assist with the collection of information. By all indications the Harvest Study seemed to permeate the consciousness of many beneficiaries.

Research priorities were the other item of concern that the Board was struggling with at the time of the field work. The manner in which priorities are set is extremely important to co-management boards, as they reflect what the board believes is important. Many Board members began to question the direction research should be taking in the Sahtu, along with what the research priorities should be and who should be setting them (Interview 2002:17;03;04). The Board now engages in priority setting sessions with community RRCs as a first step in charting research direction. The SRRB might want to consider using the GIS Project to further map out and identify research priorities. This collective Sahtu initiative was also identified by beneficiaries and non-beneficiaries as a great resource that derived from the co-management boards in the Region (Interview 2002:41;03;08).

It is worth noting that the relationship between RWED and the Board seemed to be in a state of flux. At the time of field research, there was explicit disagreement about the role

RWED should play. Although two respondents cautioned against a closer research relationship between the SRRB and RWED, others indicated that the Board needed to balance the perception of independent research with the significant costs of accumulating baseline information (Interview 2002:17,22,40,03).

The collection of relevant management information is one of the major undertakings of the Board, and it is reflected in the amount of time and energy invested in this effort. Although the Board supported some interesting and informative scientific research, the collection of traditional knowledge has been limited. The Harvest Study, on the other hand, has involved local individuals, has collected a significant amount of relevant information, and has built capacity at a community level.

#### **7.4.4 Decision Making**

Major decisions made by the SRRB must be approved by the Minister of DIAND. According to the SDMCLCA, the government retains “the ultimate jurisdiction for the management of wildlife and wildlife habitat” (DIAND1993a:44). The Minister has the right to reject any decisions made by the Board, as they are formally presented to the Minister as recommendations. Although, in the case of the Sahtu, this is unlikely to happen because of the political consequences, it significantly affects the perceptions of beneficiaries towards the SRRB. Two community-appointed Board members emphasized this point, and felt it was an indication of the degree to which the government was actually willing to ‘co-manage’ resources (Interview 2002:04;30). This is an important consideration, but it must also be noted that other functioning co-management regimes have similar caveats, while retaining the stakeholder trust and support.

The SRRB’s method of decision making is one that combines a consensus philosophy and following Robert’s Rules of Order (RRO). The consensus philosophy involves achieving agreement among all the parties by focusing on common interests that all participants share. RRO is the formal method of running meetings where participants have the opportunity to speak to issues, after motions are put on the table and before they are voted on (SRRB 2002a).

According to many of the Board and staff members, the SRRB meetings engage in ‘consensus’ decision-making. While in many ways the idea behind the decision making has a consensus ideology, in the end motions are voted on and the majority rules. “We discuss a topic until people have nothing left to say, and then we vote” (Interview 2002:45). Although Board and staff members generally described this approach as being positive, beneficiaries felt that sometimes they were unfairly outvoted at meetings (Interview 2002:35). In addition, two community-appointed Board members felt that the approach was inconsistent with the way decisions were made by the Dene and Metis in the past. One beneficiary felt that “forcing the Board members to vote in public was intimidating ... they should be able to write their votes down and submit them” (Interview 2002:39).

Consensus decision-making should involve more than just speaking about a topic at length and then voting. Prior to the decision, participants should have access to equal resources to research and understand the topic, along with an equal level of participation during the decision-making process. Additionally, Hayes (2000) makes the case for a strong meeting Chair who is aware of what consensus decision making entails, and who encourages all Board members to comment and share their views on a topic. Although, many of these consensus decision-making criteria are present in the SRRB decision making process, in the end the vote can severely effect the perception of the process and ultimately the outcome of the decision.

On the other hand, Hayes (2000:59) argues that it is not the manner or the technique used to reach consensus, but the “long lasting results... that count. In the end, all participants must be able to live with the results of the decision.” Three Board members touted the success of the SRRB approach in the decision to increase musk ox tags<sup>29</sup> awarded to the local RRCs. They felt that, in the end, consensus was reached through a series of

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<sup>29</sup> The musk ox tag issue was one of the major management decisions that the SRRB made. There was a call to increase the musk ox tags from 11 to 27, and subsequent negotiation between the SRRB and RRCs resulted in the increase (see appendix E for details).

meetings between the Board and the RRCs. This was proof that the process worked and that the SRRB was committed to finding long term solutions (see appendix F).

The decision-making process presently employed by the SRRB is reported by staff and Board members as consensus decision making, but is perceived by some beneficiaries as having limited power-sharing aspects. Community understanding that any Board decision can be vetoed by the Minister and that community-appointed board members can be outvoted, is presently detrimental to the Board's function. The view that the Board is a government agency has added to the mythology. Meanwhile, the SRRB has acknowledged the importance of consensus decision-making, and has pursued solutions that everyone can live with.

## **7.5 EFFECTIVENESS**

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### **7.5.1 Adaptive and Ecosystem Based**

Assessing the Board's effectiveness regarding actual resource management is difficult, as there have been limited management decisions made since its inception. Based on the present track record of the SRRB, Board and staff members feel that the organization would be able to respond to any sudden management issue and promptly deal with the problem, indication that there is some resilience within the system. The Board is also interested in balancing the complexities of the natural, social, and economic issues to achieve results that are broadly beneficial. This became apparent as a result of two Board undertakings: a) the musk ox tag decision, and b) participant observation of a Board meeting debating the cultural, social, economic, and ecosystem issues related to a NWT promotional Mackenzie Mountain grizzly bear hunt. The SRRB is also engaged in collaborative decision making through the co-management process set up under the SDMCLCA, which facilitates this type of understanding and communication

The Board also uses what could be considered passive Adaptive Management to account for uncertainty inherent in the understanding of natural and social systems. One of the staff members indicated that resource management, and the SRRB as an organization,

would not become priorities for the people of the Sahtu until there was a crisis in their environment. Therefore directing a significant amount of SRRB resources at planning, modeling and monitoring specific resources, or a combination of resources, would only occur when the organization was forced to do so. Until then, there would be more Board resources focused on collecting baseline data, making decisions based on the best available information, and learning from these collective decisions on an incremental basis (Interview 2002:40). Although the ideal of ecosystem management and active adaptive management was held by some of the staff and Board members, present priorities and Board resources were focused on collecting baseline data and ensuring that the organization was functioning with stakeholder support.

As a result of interviewee feedback and a review of past research projects, it is apparent that the SRRB has focused much of its resources on the collection of scientific information. Although the Board has made few proactive management decisions that require specific knowledge or data, the concentration on the collection of one type of information has affected stakeholders' perception of the Board.

### **7.5.2 Merging Ways of Knowing**

Important to the co-management of renewable resources is the Board's ability to utilize scientific and traditional knowledge and the systems that allow for the input of both types of knowledge. Although limited traditional knowledge has been used within this Management system, there is a genuine interest in using as much local knowledge as possible. When asked, most beneficiaries believed that traditional knowledge had not been used as much as it should. Non-beneficiary Board and staff members indicated that traditional knowledge had already been used at an informal level, and that any further traditional information that became available would be used to make management decisions.

It would appear that the use of scientific knowledge has a higher profile within the organization as a result of the various scientific researchers that have accessed the Research Fund. In essence, many of these researchers are paid advocates of the pursuit

of science, their forte, but it is equally true that they are encouraged to include as much local or traditional knowledge as practical. To ensure that there is adequate knowledge to merge, the focus and funding of present research, along with the types of research questions posed, need to have truer balance within the SRRB (Interview 2002:03).

Merging the ways of knowing is extremely important to the proper function of the SRRB. By definition, co-management of resources must include the knowledge and understanding of ecosystems that is possessed by resource harvesters within that system (Berkes 1999). Co-management boards must collect traditional or local knowledge, consider this knowledge in their decisions, and ensure that stakeholders are aware of the manner which this information was used. Collecting and using this information not only provides co-management boards with a more holistic understanding of the ecosystem (Berkes 1999), but also builds the trust of stakeholders in the management system

Although, overall support for the collection of both types of knowledge is strong, the amount of scientific information out-weighs the amount of traditional knowledge collected. The SRRB's reliance on the board meeting event as one of its main methods of engaging traditional knowledge remains a barrier to merging different ways of knowing. The SRRB has taken steps to make the meeting process more community friendly, has included traditional and local knowledge in their present research, and is engaging in diverse projects that attempt to break down some of the present barriers that exist. These new initiatives will take time to yield results, but the process will begin to build trust and capacity immediately and incrementally.

### **7.5.3 Stakeholder Support**

Assessing the amount of stakeholder support through the concept of stakeholder ownership in the Sahtu was difficult. In the case of the SRRB, many beneficiaries had a negative view of the Board and its operation, but really seemed to be more frustrated with the whole Land Claim Agreement and not the Board in particular. There was a general lack of ownership felt and much resentment related to the Land Claim Agreement and the government's continuing role in the Region. Some community leaders wanted to limit

the conversation about the SRRB and speak more about the Land Claim Agreement and self-government (Interview 2002:30). Stakeholder ownership in the process seemed to be negatively affected by this overarching concern, coupled with the Board's staffing problems and the Region's capacity deficit.

Interviewee comments about Board success in the region and its productivity can also be described as negative. Although the SRRB has engaged in a process that is collaborative and has attained some milestones related to both resource management (i.e. Harvest Study, Musk ox decision) and community capacity building (Employment of Beneficiaries, Summer youth programs) the prognosis from the interviewees indicated that the Board had some serious barriers to overcome. Stakeholder support for the process is limited and, according to a few interviewees, will remain so until there is a resource crisis (Interview 2002:37;40;04).

## **7.6 CONCLUSION**

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The findings presented in this Chapter are a synopsis of how the SRRB is currently functioning. Included were several discussions of how the Board had functioned in the past and the changes that it has gone through over time. While conducting the field research, it became apparent that respondents were more interested in speaking about the Board's misfortunes and drawbacks than its accomplishments. It must be remembered that the SRRB is relatively new and has encountered some significant barriers it could not control. While there is a considerable amount of information presented in this section, I will not attempt to address each and every barrier, but rather will concentrate on crucial areas of the Board's operation that can be adjusted. The following Chapter will also discuss the shortcomings of this assessment technique and provide recommendations regarding future SRRB assessment and co-management evaluations in general.



## CHAPTER 8

# RECOMMENDATIONS AND CONCLUSION

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Co-management is still relatively a recent arrangement in Northern Canada and is only an eight year old institution in the Sahtu. Although somewhat new to the Region, the evaluation tools used to assess its function need to keep pace with the evolution of co-management regimes. Research findings related to this assessment have, at times, painted a relatively negative picture of co-management in the Sahtu. While the SRRB has encountered many barriers since its implementation, it is relatively young and requires time to mature. Since the field research for this study was completed and the initial findings were presented to the SRRB where they were validated, the Executive Director has engaged in a number of trust building and community involvement exercises that have boosted the profile of the Board within the communities<sup>30</sup>. It is entirely possible that the field research was conducted during one of the lowest points in the Board's morale since its establishment. It is anticipated that the following comments on how the Board can improve its relations with the communities it serves will promote optimism about the future.

The goal of this research was not to try and solve all difficulties identified, but to provide the Board with five or six areas of concentration and no more than ten initial recommendations that could be implemented. Although there is the temptation to provide the Board with summary changes that are easily implemented, some of the following recommendations will require the Board to make important changes to the way it engages in day to day activities.

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<sup>30</sup> Hiring a Communications Officer and engaging in a Research Priority Workshop with the RRCs.

Occasionally, achieving the recommended changes will also require changing Board and staff member attitudes, along with their approaches to achieving certain required goals and objectives. Although these suggestions require the Board to make some significant adjustments, its mandate and legal duties under the Agreement must remain constant. Indeed, the recommendations arise out of a desire by the Board to meet its mandate. It is important to keep in mind that while, they have been initiated within the framework of a Masters project of the University of Calgary, these points of adjustment had significant direction and input from the SRRB.

The Chapter will begin with the general benefits of and barriers to co-management in the Sahtu, and a description of some of the major outside influences on the SRRB. Often, the Board has no control of the external factors that significantly affect how they achieve their objectives. The recommendations will be divided into broad categories containing specific recommendations. Finally, there will be critical review of the evaluation and assessment process. This section includes, in some ways, the most important findings of the research and is linked to the initial recommendations directed at organizational planning and internal evaluation strategies.

## **8.1 BENEFITS OF RENEWABLE RESOURCE CO-MANAGEMENT IN THE SAHTU**

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Although many of the findings confirm negative stakeholder experiences with the SRRB, there are also positive aspects of the co-management of resources in the Sahtu Region. Below is a synopsis of the findings presented in Chapter 7.

The SRRB provides for and encourages community input into resource management decisions. Although this was informally possible before through the Hunters and Trappers Associations, having a legally entrenched method for public participation provides legitimacy and an official commitment to this form of management, regardless of its present success. The Land Claim Agreement has also provided a secure source of funding, adding to the legitimacy and stability of co-management. Government

recognition of the process for co-managing resources is also legal standing for the protection of the Sahtu people, their culture, and their way of life. The SRRB, coupled with the RRCs, has the potential to manage resources in a collaborative fashion, and to ensure that the resources and lands that define the Sahtu Metis and Dene are managed to meet the needs of the present generation without compromising the needs of future generations.

The other significant success of the SRRB is the Harvest Study. Engaging in this extensive research project has provided the Board with a wealth of information and has raised its profile in the communities. Although initial participation in the process by some communities was disappointing, the results from the study have demonstrated that the SRRB and the communities can successfully work together on resource management issues. The Harvest Study has also been a great success for the Board because of the local involvement and employment that it has generated. Individuals from all the Sahtu communities have been hired to collect this information at the community level, collate it, and provide it to the Harvest Study Coordinator, who is also a beneficiary. Presently, the results of this five year project are being compiled and readied for presentation to the communities. Once approved by the communities, the results, if required, can be used to create the Sahtu Needs Level and the Total Allowable Harvest for the future management of Sahtu resources. It is important to recognize that the Harvest Study is a major plank in the foundation of resource management in the Sahtu and that most of the information and human resources are coming from beneficiaries.

Research that has taken place with the support of the Research Fund has also contributed positively to the co-management process in the Sahtu. Although much of the research has been science based, it has involved local hiring of beneficiaries and the use of some traditional knowledge. This fund is a direct result of the SDMCLCA, but is administered by the SRRB and is crucial to providing information to resource managers in the Region. The information has not only been used by local government agencies and the SRRB, but has also contributed to the overall understanding of the ecosystem in the Region.

The other significant benefit of establishing the SRRB in the Sahtu has been the creation of the Sahtu GIS Project<sup>31</sup>. The Sahtu GIS Project was a unique partnership between the SRRB, Sahtu Land Use Planning Board, the Sahtu Land and Water Board, and RWED. This co-funded unit was created to provide GIS and digital cartography services within the Sahtu Settlement Area. Since its inception, the project has been able to assist the SRRB with many of its in-house research projects, frequently providing the Board with digital maps that illustrate the movement of radio collared animals. Although much of the GIS Project's work over the last couple of years has focused on the preliminary Sahtu Land Use Plan, it is an untapped asset for the SRRB. Building on existing geographic information and working more closely with the GIS project to develop new data sets, the SRRB can get assistance in completing tasks related to setting research priorities or collecting traditional knowledge.

## **8.2 BARRIERS TO RENEWABLE RESOURCE CO-MANAGEMENT IN THE SAHTU**

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There have been, and continues to be, some significant barriers to co-management in the Sahtu Region. Although there are many external factors that are beyond the control of the SRRB, some of the items can be dealt with internally. Below is a synopsis of the triangulated findings presented in Chapter 7.

One of the largest barriers to the co-management process has been staff turnover, especially the Executive Director position. This position is an integral part of the Board and adjustment periods required by new Executive Directors and staff has lead to limited internal efficiency. Staffing turnover was also accentuated by the Board's mid-implementation move from the more urban and relatively easily accessible community of Norman Wells, to the more remote rural community of Tulita. Logistically, it was a big step for the Board and added significant responsibilities that included finding housing for staff and a suitable location for an office. One of the largest drawbacks regarding staff

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<sup>31</sup> At the time of MDP defence and publication the Sahtu GIS Project was no longer a partnership between the co-management boards in the Sahtu and RWED. The SRRB, and RWED were the only partners contributing funding to the project.

turnover has been the lack of connection on a personal and organizational, level within the different communities in the Sahtu Region. The lack of sustained and consistent contact by the staff in small northern Dene and Metis communities decreases the understanding, comfort level, and, possibly, the trust stakeholders have in the organization. Relationship building at a community level within the communities needs to become a larger priority for the Board.

The lack of trust and understanding is paralleled by a lack of public interest in and involvement with the Board. Since implementation, the SRRB's capacity to manage resources has been diminished as a result of the lack of public participation and ownership in the process. The Board's participation process presently uses public meetings, supplemented by a few workshops, stakeholder involvement in research projects, and some attempts at one-on-one consultation. Although this has worked in part, the Board has not invested significant time and money in the process because there has been a lack of stakeholder interest and a constant turnover in staff. As indicated previously, communication between the Board and the community is a shared responsibility requiring commitment from both the Board and the community. Unfortunately, the Board tends to be burdened with more of the responsibilities.

The Board needs to review its present stance regarding capacity building and the tangible benefits that this significant undertaking would bring to the Board and to the Region. There is a shortage of qualified people to sit on all the organizations that either preceded or are a result of the SDMCLCA and MVRMA. The lack of capacity often leads to the following situations that directly affect the Board's function: 1) community-appointed Board members are reluctant to participate because they are not confident in their abilities, or 2) community-appointed Board members have the ability, but are overloaded with other responsibilities (i.e., Maintaining a traditional lifestyle or acting as representatives on other organizations). This is detrimental to the Board's operations as members and meetings are the most important links to the communities. Without adequate Board member capacity, the links to the communities are limited.

The other barrier to co-management in the Sahtu Region has been the lack of traditional knowledge available to the SRRB. Although the Board has made attempts to include this knowledge in their research and decisions, there has been no sustained interest in pursuing this type of research in a holistic fashion.<sup>32</sup> As there is no local organization responsible for the care and collection of traditional knowledge, the Board has taken on the responsibility, which has resulted in data being collected in an *ad hoc* manner. While relying on Board members to bring traditional knowledge to the table, most of the SRRB's research has concentrated on science, limiting the Board's ability to build support and trust at a community level. Engaging in traditional knowledge research is costly and would severely affect the budget of the SRRB. On the other hand, taking a leadership role in the promotion of traditional knowledge studies and funding traditional knowledge research would require less of an operational or financial commitment and more an individual commitment by Board members and staff to facilitate a balanced approach.

The final overall barrier to successful co-management relates to the development and active participation of the community RRCs. RRCs need to be integrally involved in the management of resources in partnership with SRRB, but lack the funding and capacity to ensure that they are engaged in a transparent and committed partnership. Although not specifically outlined in the SDMCLCA, these groups have the potential to be community leaders in the areas of community consultation and information dissemination, in addition to providing a collective voice for their respective communities. Unfortunately, this is not the present reality in the Sahtu because the RRCs do not have the funding and capacity to engage in these types of in-depth activities, and there seems to be little understanding of, or belief in the SDMCLCA process at the community level. The SRRB is then forced to complete the community level work, overcoming the misconceptions about their organization and the recurrent negative position regarding the Agreement itself. Although this barrier seems to be external to the SRRB, the Board needs to take an

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<sup>32</sup> Although the Sahtu Land Use Planning Board did engage in a significant amount of community consultation and the collection of a large amount of traditional land use data, the results have only recently been released. The information collected focused on creating a land use plan, but is potentially useful to the SRRB.

active role in finding a solution to this problem as: a) the Board already shares some of these community level responsibilities; b) many of the problems stem from the lack of clarity within the agreement regarding SRRB and RRC relations and responsibilities; and c) it is presently a significant barrier to the Board's operation.

### **8.3 EXTERNAL FACTORS**

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As noted throughout this document, the SRRB does not operate in a vacuum. There are significant external factors that the Board has little or no control over which affect the Board's operation. Although it is tempting to focus much of the attention of this research on these external factors, it is imperative that the SRRB concentrate on those actions that members and staff can take to solve some their own problems. That being said, the SRRB also needs to discuss these difficulties and concerns with the organizations in the Sahtu that are responsible for dealing with these barriers.

The first external item significantly affecting the SRRB's operation is the lack of capacity of residents in the Sahtu Region. Although it is important that the Board do its part to build community capacity, it is really an external factor that needs to be addressed by all organizations in the Sahtu. One beneficiary described it as a vicious circle "...people need education and skills to get education and skills. They have to leave the community to get educated, but rarely return to share that education with others" (Interview 2002:31). Other beneficiaries commented on the need to attract qualified people to the Region, including southerners who could train beneficiaries in their own community. Building capacity in northern Canada is a widespread problem that will require a significant amount of time for community based solutions. Capacity building encompasses the building of organizational and technical abilities, behaviours, relationships and values that enable individuals, groups and organizations to enhance their performance effectively and to achieve their development objectives over time (United Nations Population Fund 2002). The problem will not be solved overnight, but rather will need a long term action plan supported and led by people in the communities.

Although there seemed to be varying degrees of dissatisfaction with this Agreement among the individuals interviewed, the lack of understanding regarding the Land Claim Agreement was apparent. There also appears to be a significant correlation between dissatisfaction with the Agreement and lack of a clear understanding of the SRRB's mandate and/or negative views of the Board's operation. Contributing to this lack of understanding, and/or negativity, was a desire for community self-government. Although the self-government process was at different stages in the various communities, it had the general effect of undermining belief in the SDMCLCA, and in the regional boards that were set up under it.<sup>33</sup> Beneficiaries who were interviewed from two separate communities were more interested in pursuing their own resource management at a community level, rather than participating in a regional Board (Interview 200229;30). This factionalism seemed to be hurting the relationships among the Sahtu Communities.

The other indirect external pressure on the Board is a renewed interest in a pipeline down the Mackenzie Valley, bringing with it increased exploration and development activity in the Sahtu Region. Many community members identified this ensuing development as one of their major concerns for the Region. Although it might not have a direct effect on wildlife management issues, three things were pointed out by respondents as having the potential to affect, or which are already affecting, the SRRB. First, beneficiaries are becoming involved in the pipeline development process as consultants or employees of these companies, siphoning some of the qualified and capacity-laden beneficiaries off to work in the private sector. This can lead to further shortages of qualified Board and staff members, or to perceived conflicts of interest, if these individuals want to work in the private sector and sit on the SRRB. Second, beneficiaries feel that the pipeline and petroleum and mineral exploration will have significant effects on the resources that are important to them. An increase in effects on resources, actual or perceived, will complicate the SRRB's responsibilities in the Sahtu Region and put additional pressure on both their research and management capacities. Third, other organizations in the

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<sup>33</sup> Ironically, although many individuals did not want to speak about the Land Claim Agreement or the Boards set up under it, the Agreement provides some significant arrangements for Self Government. "The Self government arrangements in the Agreement will ultimately make the land claim work" (Interviews 2002: 27).

Region, such as regulatory agencies, other government organizations, and other co-management boards will have increased pressure put on them as a result of this development. With increased responsibilities within the SRRB and these other organizations, collaborative projects and inter-organizational communication will be further diminished. Although it might appear that this development would pull people together and galvanize action to resolve the difficulties facing the SDMCLCA and Boards in the Region, factionalism arising from the self-government process and economic self-interest among the communities and beneficiaries are thwarting this effort.

## **8.4 RECOMMENDATIONS**

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The recommendations are divided into broader categories containing specific recommendations in each of the categories. The first two recommendations related to Internal Board Operations are the most crucial and should be considered the primary recommendations. It is hoped that by following these initial Planning and Evaluation recommendations, many of the subsequent secondary recommendations will be more easily implemented and more support realized.

### **8.4.1 Internal Board Operations**

Since its inception, the SRRB has dealt with several internal and external barriers outlined above that negatively effect its operation. One of the solutions attempted in 1999 included engaging in a strategic planning exercise to help the Board eliminate some of these barriers. From reviewing the document, it appears that the sessions were successful, with several issues identified and subsequent goals or aspirations of the participants documented. Unfortunately, the strategic exercise did not have an action plan that went further to a) identify key people who would take on certain responsibilities, b) layout the responsibilities along with milestones and deadlines, c) outline a list of consequences or further options if these deadlines were not achieved, and d) lay out an evaluation tool or feedback loop that would enable to the participating members to assess progress and setbacks regarding the plan. As a result, almost all of the issues identified by the original strategic exercise manifested themselves as findings in this assessment three years later.

**Recommendation #1:** That the Board needs to engage in a comprehensive Strategic Planning exercise once its full compliment of members is in place. This plan needs to include an internal organizational assessment, a macro-environmental analysis, and the development of a comprehensive plan of action.

The Board needs to engage in a strategic planning exercise that includes substantial community and organization consultation and produces a plan of action that includes all the afore mentioned criteria absent in the initial strategic planning exercise. A strong and specific plan of action, supported by adequate resources and funding, is essential to the success of any Strategic Planning Exercise.

The strategic planning exercise should aim to have the SRRB acknowledge existing barriers and find internal solutions to problems. By engaging in this process with the recently appointed Board members and Chair, fresh ideas are more likely to surface and there is a potential for renewed energy. Alternatives to the process of strategic planning such as a simple Strength, Weakness, Opportunity, Threat (SWOT) Analysis or decision/outcome analysis are too narrow in scope and primarily lack a binding plan of action, as did the original Strategic Plan. The SRRB needs to set aside time to deal with a comprehensive plan that will compel staff and Board members to build on the achievements, and undertake action that will deal with the complex barriers outlined above.

An evaluation tool or feedback loop that would enable the participating members to assess progress is not only an important component to plans that result from strategic planning exercises, but is also vital to the day to day SRRB operations.

**Recommendation #2:** The staff and Board members should begin to engage in comprehensive task or project specific evaluations and assessments. These internal assessments need to be included in any initial planning processes and require commitment by the participants to ensure that once the task or project is complete they can learn from their successes or failures.

Being able to effectively judge the progress or setbacks of a project and understand why they have occurred, and be able to use that information in a coherent fashion, is

invaluable to the operation of any organization. It is suggested that for any SRRB project it dedicates approximately 10 to 20 % of its time to planning, 60 to 70 % of its time to the execution of the tasks, and 10 to 20 % of its time monitoring and reviewing what was done or was not accomplished and why. This type of project execution requires the SRRB members and staff to know why they are engaging in a project, how it will be accomplished, who is responsible for the tasks and whether it was successful. It also requires commitment from these individuals to revisit project successes and failures during the execution of tasks, as well as once the tasks have been completed. Setting up a method to feed back information into task execution and to monitor progress on a continuing basis, will allow for immediate action if something goes wrong (Allan Savory Center for Holistic Management 2003). Although this recommendation is rather vague in how it should be implemented, achieving a focus on any type of introspective assessment will enhance the Board's future operations. The Holistic Management system designed by Allan Savory discusses seven simple questions one should ask when making decisions, and can provide further direction regarding this recommendation (See appendix G).

This type of internal evaluation is what Evaluation Research Literature refers to as Mainstream Evaluation (Duignan 2001). "Mainstream evaluation is ensuring that the organization has the appropriate skills, systems, structures and resources to support them in taking a more evaluative approach to their work... it can be looked at as building evaluative or evaluation capability within the programs and organization" (Duignan 2001:4). Ensuring that the organization has the skills and resources to engage in this type of evaluation is daunting and prohibitive when attempted all at once. An incremental approach to building these skills and allocating time and resources can be part of organizational change. Strategic Planning exercises are opportunities to shift policy and procedure to reflect these types of internal evaluations.

### 8.4.2 Community Consultation and Trust Building

According to the assessment of the factors related to Communication, Access to Information and Stakeholder support, the SRRB needs to engage in exercises that build stakeholder trust at a community level and that involve local resource users on a more informal basis. Although there are many ways that the SRRB can engage in such activities, it needs to ensure that enough resources and time can be focused on this task.

**Recommendation #3:** That the Board hire a Community Liaison Worker (CLW) who will be responsible for meeting with the communities on an informal basis, eliciting information regarding issues of concern and research priorities, and informing and educating the communities on the roles and responsibilities of the SRRB and the RRCs.<sup>34</sup>

This individual will need to sustain contact with each of the communities through active participation in community events and on-going interaction with community organizations. The CLW will also be responsible for the implementation of several of the recommendations outlined in this section, either directly or in partnership with the other staff. The CLW would also be responsible for working with the RRCs on a one on one basis. This individual should be a Beneficiary who is familiar with the communities and organization leaders, and able to use understanding of inter-regional and intercommunity politics to their advantage. It will be challenging to find a beneficiary who holds this unique blend of qualifications, is willing to travel a significant amount of time, and is not presently committed to other responsibilities. The SRRB will need to allocate staff time for the training of the CLW and for working in partnership to contribute to the success of the Board.

**Recommendation #4:** That the Board work with and encourage public school teachers to incorporate the topic of renewable resource management in the school curriculum, specifically in the Sahtu context.

Recommendation #4 is tied to hiring a CLW, as it is envisioned that this individual would be responsible for developing partnerships with Educational organizations<sup>35</sup> in the Sahtu

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<sup>34</sup> It is important to note again that at the time of MDP defence and publication, the SRRB had abolished the Biologist position and hired a Communications Officer.

<sup>35</sup> Education organizations include the local and regional school boards, which will be able to effectively lobby to include this material in the curricula. Support for this type of initiative must be built at a community level and initial investment at the local and regional school board levels will be substantial.

Region, while working to develop appropriate educational materials with Board staff and members and education professionals in the Region. It is important that the youth in the Sahtu understand the process of co-managing resources with the RRCs and SRRB, and recognize the other co-management organizations in the Region and their roles. By educating the youth about these organizations, and how they work together, support will be built not only for the SRRB, but also for the Land Claim Agreement. Informing the youth about the special opportunity that they have been given through the signing of the Land Claim Agreement is important. Educating them about how they can use these organizations and documents to look after their resources, culture, and way of life, will give them further incentive to be engaged in their communities and perhaps even these organizations.

**Recommendation #5:** That the Board engage in substantial contact and frequent visits to community RRCs and the communities as a whole. This will include lending logistical and moral support to these organizations, and developing a healthy relationship between community-appointed Board members, their respective RRCs, and community members in general.

Although the SRRB has already incurred substantial costs by involving RRC members in most of their Board meetings, more needs to be done to actively foster a healthier relationship between the RRCs and the SRRB. The SRRB must also reach beyond the RRCs to the community as a whole, and engage in public meetings and consultation processes aimed at the general public. Although SRRB public meetings and open houses have been attempted in the past, new and innovative ways to exchange information with the general public must be developed (i.e. The current initiative by RWED and the Board to make community presentations on the assessment of wildlife health). Fulfilling this task will be time consuming and will require significant commitment from a staff member, who in this case should be the CLW.

At the time of MDP publication the Biologist had resigned, the position was abolished, and a Communications Officer was hired. The Communications Officer is similar to the CLW and needs to have the freedom and support to complete tasks that are consistent with building trust and understanding in the communities, while lending support to community RRCs, and engaging the general public. Duties formerly assigned to the

Biologist need to be re-assigned to other staff members, Board members, government agencies engaging in similar work, a part time consultant or some combination of the afore mentioned options.

Should the Board have the resources, it would be best to maintain a revamped Biologist's position, responsible for limited in-house research and significant consultation regarding research and management issues, focusing on traditional knowledge. Having the Biologist shift focus from in-house science research to the collection and integration of all types of information would be beneficial to the SRRB. The Biologist and the Communications Officer could work together, significantly increasing the amount of contact the Board could have with the communities and allowing for more ambitious projects. Although this would be an ideal situation, the budgetary constraints within the SRRB might limit the Boards ability to employ of an extra staff member.

#### **8.4.3 Board Member Capacity Building**

According to the assessment of factors related to Board member skills, Meetings, and Decision- making, Board member capacity building also needs to be a priority for the SRRB. Specifically, the community-appointed Board members and the Chair need to be able to engage in Board meetings and community consultation at a substantial level. Although many other co-management organizations continually engage in week-long trust and capacity-building retreats to accomplish this task at a substantial expense, membership turnover and lack of overall community capacity would cripple such ongoing effort. Initially, the Board needs to ensure that its new members have enough capacity and knowledge of the SRRB to actively engage in the process. In the short term, this can be accomplished by adding one or two days to the beginning of a Board meeting to conduct orientation, skill, and team building sessions.

**Recommendation # 6:** That the SRRB ensure that its membership has the capacity and knowledge to actively function as Board Members. This could be accomplished in the short term by holding one or two day orientation and skill/team building sessions prior to every second Board Meeting.

Initially, these sessions will include a review of the Board's mandate and goals, and in some cases might involve hiring trainers and facilitators to lead skill building exercises.

These sessions could also be used to complete and monitor the implementation of a strategic plan. The focus on a short term plan that coincides with Board meetings would be a cost effective way to begin the capacity building effort, as opposed to a one time substantial expense.

Beyond this short term solution to building capacity, the SRRB needs to engage in a long term capacity building program.

**Recommendation # 7:** That the SRRB take a leadership role in seeking a partnership with a northern educational institution to set up Facilitator Proficiency, Board Member Responsibility Awareness, and Capacity Building courses. The SRRB should also build a partnership with other co-management boards in the Region that will support and share in the responsibility of undertaking this project.

This is a substantial undertaking that will require significant commitment from the Board. It is envisioned that once the partnership with the Educational organization is formed and other co-management boards, especially the SSI, are encouraged to contribute to this initiative, the project will take on more of regional focus. Subsequently, the course could be used for the training of all Sahtu co-management Board members, including the training of RRC members. The course would be focused on preparing new Board members for their work with the Board and with the communities they represent, along with educating them about the SDMCLCA and how it applies to their particular organization. The course would need to be designed with input from the community and the participating organization or Board to ensure that the right skills are being taught in a culturally sensitive manner. As demand grows, it is envisioned that the course would be made available within each Sahtu Community at appropriate times and under a schedule that is satisfactory to the participants.

#### **8.4.4 Research and Management Priorities**

According to the information gleaned from factors related to Research, Merging ways of knowing and Community involvement and consultation, the SRRB should also take more of an interest in collectively setting research and management priorities. As mentioned in the findings section of this document, the SRRB has already acknowledged that they

must engage in more community consultation regarding research priorities. In tandem with this task, the Board also needs to complete a review of its management objectives in relation to its research priorities.

**Recommendation # 8:** That the Board develops and engages in research and management priority workshops. These workshops need to take place periodically and at a community level.<sup>36</sup>

The SRRB needs to engage in a consultation process at a community level with the RRCs and other community members to inform them of the research that is already taking place and to gather information about the research they would like to see. These workshops need to be well advertised, and for best results should coincide with RRC meetings. The SRRB might also consider using visual aids from their GIS partners to help clarify research that has already taken place and to identify gaps. The SRRB also needs to take a leadership role in terms of the collection of traditional knowledge. These workshops can review the amount of traditional knowledge that has been collected and set research targets appropriately. Priorities for the collection of traditional knowledge should be encouraged, and the SRRB must limit its focus on scientific research, especially in-house. The focus of the last portion of the SRRB's implementation phase should be one that embraces traditional knowledge research. Once research priorities have been voiced at a community level, an overall priority list must be developed at a regional level, and periodically updated.

**Recommendation # 9:** That the Board develops a strategy to attract independent researchers to the Region to complete research that is in line with its identified priorities.

Once research priorities have been established, the Board must develop a method for attracting third-party researchers<sup>37</sup>. Researchers and organizations must be made aware of the SRRB's priorities and the research funds that are available to them. Ultimately, securing partnerships with a number of education institutions would be one method for attracting researchers to work with the SRRB. Building these partnerships will be time

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<sup>36</sup> It's important to note that the SRRB has engaged in one of these workshops with the RRCs and RWED after the field work was complete.

<sup>37</sup> As third party researchers might be seen as outsiders, ensuring that beneficiaries are kept well informed about the research taking place, and any results or findings, should be a top priority for the Communications Officer.

consuming and financially intensive, and in the short-term these research opportunities should be promoted through advertisements in key University publications, and on the SRRB and other relevant websites. The relationship with the local RWED office should also be improved. Requests for specific research by organizations such as the Department of Fisheries and Oceans, the Canadian Wildlife Service, and the Canadian Forest Service should be considered. Many would argue that, for a co-management Board to make truly unbiased management decisions, it would require access to independent in-house information that would be trusted by all parties. Though this may be a concern, the lack of ownership and interest in the Board displayed by the stakeholders limits the perception of the independent qualities SRRB research might have. Therefore, limiting or eliminating in-house research for the short term will have a minor effect on present stakeholder perception regarding the independence of Board research.

The last recommendation regarding research and management relates to the distribution of money from the Research Fund.

**Recommendation # 10:** That the Board focus on developing a formalized method for evaluating research project proposals submitted under the Research Fund in relation to its management priorities.

Once research priorities have been established and interested parties have submitted their research proposals, the Board needs a standardized method for evaluating the merit and relevance of the research being proposed in relationship to its own management priorities. Presently, the Board engages in discussions regarding research submissions, and each proposal is evaluated according to a variety of factors that may or may not be systematically applied to all applications. To ensure that research proposals are awarded funding based on identified research priorities, the Board should focus on standardizing the method for evaluating fund applications and formalize the manner in which the projects are evaluated, with particular attention to stated management and research objectives. This could be accomplished via a standard checklist and evaluation form that proponents are able to view before and after the funding decisions are made.

Additionally, the Board should evaluate the results of each research project to ensure that the stated goals of the research project are met.

## **8.5 THE EVALUATION: CHALLENGES AND LIMITATION**

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Policy makers are driven by many different pressures in addition to our hard won evaluation results. (Weiss 1977)

This section involves discussions aimed at the actual assessment process conducted as part of this research. It contains valuable information for the both the SRRB as well as other organizations that are looking to design an evaluation program for co-management boards.

As pointed out in recommendation # 2, it is important for Board members and staff to engage in project and task specific self-evaluations on a continuing basis. Combined with a strategic plan and coordinated at an organizational level, this type of assessment structure is key to the success of a variety of other organizations, and is crucial to the proper function of the SRRB. Building on its initial mandate and present core values, the SRRB needs to design methods to assess the effectiveness of their present tasks and to engage in a strategic plan to chart its future direction. The Board needs to build evaluation capacity within the organization and to ensure that individuals are able to recognize the merits of both process and outcomes.

Although external evaluations are important in providing the organization with an outside perspective, external evaluations need to build on internal input and perspective. Without significant internal guidance to determine what questions are to be raised and what information is to be gathered, external evaluations may exhibit a wide, unfocused approach that relies on too many criteria, or on criteria that are not relevant to the organization (Guba and Lincoln 1989). Consequently, the amount of information required and sensitivity or access difficulties can affect the quality and utility of the results (Rossi and Freeman 1985). Contributing to the data collection and management difficulties are the interpretation and reporting sensitivities that are unique to an outsider's perspective. The research approach that was undertaken in this study

endeavored to balance the limiting factors of external evaluations with the amount of time and resources available to the researcher. The balance that was achieved was intended to ensure that the evaluation resources that were available were used to answer priority evaluation questions (Duignan 2002).

Although, this research has contributed noteworthy findings, few were actually novel or shocking to the Board and staff members. Often the findings were common knowledge to many of the individuals integrally involved in the process. Several of the findings were also reflected in the prior strategic plan, but solutions to these difficulties were not sought with proper resources or funding, and the problems remain today. The recommendations provided as a result of this research are similar to the findings and goals provided as part of the last strategic plan in that they are not backed by a specific plan, outlining staff and Board member responsibilities and containing enforceable consequences for inaction. This type of planning needs to take place at an internal level, where key decision makers can identify and allocate available resources, and make key individuals accountable within appropriate timeframes (Recommendations #1 & #2). Outside researchers and consultants will not be able to design a plan that takes into account all the internal variables that are at play as well as key insiders who have significant experience and knowledge of the underlying issues within the organization. Moreover, individuals outside the co-management organization will not be able to attain the same results as a grassroots internal effort, complete with ownership building and enforceability components. This concept is similar to the participatory arguments presented for collaborative resource management. The external assessment advantage of perceived objectivity is severely constrained by the lack of internal solution ownership and enforceability.

Though recommendations 3 through 10 include options available to the Board when overcoming their barriers to success, the SRRB needs to pay particular attention to recommendations 1 and 2. It is anticipated that by engaging in a comprehensive Strategic Planning session, the Board will arrive at many of the same findings and yield similar, if not better, grassroots solutions.

## 8.6 CONCLUSIONS

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Although the assessment of the SRRB resulted in ten key recommendations, the SRRB will need to make the final decision about which items they want to pursue. There are several central barriers and benefits identified as a result of this research that can be used by the SRRB as indicators of where they stand. The Board needs to build on the success of the Harvest Study, review the constructive elements of the musk ox tag decision, and work towards overcoming the barriers to SRRB co-management in the Sahtu. Two of the largest barriers facing the SRRB and the Sahtu Region are the issue of individual and collective capacity and how that affects participation in local organizations, and the effect turnover has on community perception. Although implementing these recommendations can solve some of the Board's difficulties, in the end it is really up to the members and staff to make their own commitments to organizational change, and then to engage in actions that will facilitate these changes.

It is important to note that the SDMCLCA is relatively new, along with the co-management boards that it created. Despite initial setbacks, the SRRB has the legislative power and at least stable funding to manage resources in a manner that is unique to Canada. Review of collaborative resource management outside Canada reveals frequent engagement in co-management at only an advisory, or communication level, if it exists at all. Although initially the SRRB might have gone through some difficult times, the Board enjoys significant legal backing and funding rare in co-management processes elsewhere in the world.

Internal assessments would be just as, or more, important than the external assessment completed as a result of this research. The lack of recommendation planning and enforceability, on an internal basis, limits the utility of completing an external assessment. Therefore, significant resources need to be dedicated to Strategic Planning exercises and internal assessments, to ensure that solutions are found and implemented from within the Board and its administrative structure.

It is hoped that the SRRB, as it moves into strategic planning, will review all the findings of this research and implement many of the recommendations in a timely fashion. Further external evaluations should take place after a comprehensive strategic plan has been implemented over a five year period, and should focus on issues of greatest difficulty. In any event, the SRRB is nearing the end of the implementation phase that was laid out under the SDMCLCA and will have its funding agreement renegotiated. The Board will also be reviewing the Harvest Study data and potentially will be setting up both the Total Allowable Harvest Levels and Sahtu Minimum Needs Levels. Given these complex responsibilities and scheduling, the SRRB needs to ensure that, before it engages in any further responsibilities, it undertakes a strategic plan that will help it fulfill its present mandate.



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***Appendix A:***  
**Sahtu Renewable Resources Board**  
**Partnership Letter**





## SAHTU RENEWABLE RESOURCES BOARD

P. O. Box 134  
Tulita, NT, X0E 0K0  
TEL: (867) 588-4040  
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Website: [www.srrb.nt.ca](http://www.srrb.nt.ca)

April 22, 2002

Darwin Bateyko  
2939 Unwin Rd  
Calgary, AB T2N 4C7  
(403) 289-3150  
[darwin\\_ba@shaw.ca](mailto:darwin_ba@shaw.ca)

**Re: Research Project Support – Evaluating Co-Management**

Mr. Bateyko:

The Sahtu Renewable Resources Board (SRRB) fully supports your research project entitled "*Evaluating Co-Management: A Framework for Analysis*". To improve SRRB effectiveness and efficiency, the board is eager to develop an evaluation system, incorporate best-practice recommendations, and improve its visibility in the Sahtu Settlement Area.

The board and staff will make every effort to assist you with your research efforts. Both individuals and documents will be made available for your use, with the exception of any data or document deemed confidential. All requests for documents or data should be made to Paul Latour, Interim Chair, or to Jody Snortland, Executive Director.

If you have any questions, please contact us at (867) 588-4040 or [director@srrb.nt.ca](mailto:director@srrb.nt.ca). Thank you.

Sincerely,

Jody Snortland  
Executive Director

Cc Paul Latour, Interim Chair



***Appendix B:***  
**Information Sheet and Interview Protocol**



**RESEARCH PROJECT SUMMARY**  
**EVALUATING CO-MANAGEMENT: A FRAMEWORK FOR ANALYSIS**  
**RESEARCH PROPOSED BY: DARWIN BATEYKO**

**BRIEF SUMMARY**

Co-management of natural resources is an important part of the Sahtu Dene and Metis Land Claim Agreement. For public interest in the management of resources to be protected in the Sahtu, co-management must function at a high level. It is felt that by examining co-management in practice, and posing it against the theoretical model, the strengths, weaknesses and limitations of both practice and theory will be discovered. Consequently, there is a need to assess co-management to provide feedback to the individual participants, the general public, and the organizations involved. By establishing a manner in which co-management regimes can be evaluated, further progress can be made in addressing sound management decisions.

**WHO:**

Information will be gained by interviewing (1) past and present Sahtu Renewable Resource Board members, and (2) community members.

**WHERE:**

The research will be carried out in the communities of Fort Good Hope, Norman Wells, Tulita, Colville Lake and Deline - time and funds permitting.

**WHAT:**

The research will focus on collecting information regarding the function of the co-management board and the decisions they make. The information will be used to evaluate both the process and function of the board.

**WHEN:**

It is hoped that field research will commence immediately after the board has granted permission. The duration of the field work is anticipated to take approximately two to three weeks depending on the reception of the interviewees. Validation of the information should occur during the summer of 2002 and the community report should be complete and distributed by the end of 2002.

**HOW:**

Information will be gathered through informal conversations and interviews with interested parties. Indicators designed to measure the successful to the Sahtu Renewable Resource Board, such as attendance records, will also be used. It is anticipated that board and community members will help identify indicators and key informants, as well as validating the information once it has been compiled.

The research outlined is intended not only to fulfill my requirements for graduate school at the University of Calgary, but also to be a genuine contribution to the people that utilize co-management. It is anticipated that by involving local individuals in the planning, data collection and validation process, that results of the research will be of higher quality and will also be of great benefit to the individuals involved in the research.

**CONTACT INFORMATION**

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# INTERVIEW PROTOCOL

## EVALUATING CO- MANAGEMENT: A FRAMEWORK FOR ANALYSIS DARWIN BATEYKO – UNIVERSITY OF CALGARY FACULTY OF ENVIRONMENTAL DESIGN

### **General Background**

- 1) Tell me a bit about your involvement with resource management or the SRRB?
- 2) Do you go out on the land to hunt, fish or trap?
- 3) How long have you been involved in the process? In what capacity?
- 4) Are you aware of how resources were managed before the Land claims Agreement? Did you participate in this process? Were the HTAs successful in managing resources before co-management came into existence? What would you attribute its success to?
- 5) Describe the co-management process and structure to me in your own words. What is your general feeling towards the process?

### **Co-management Development**

- 6) How was the process developed?
- 7) Who were the participants involved in the development?
- 8) Was there community input? How were community members involved?
- 9) Were there any difficulties early on? What were they?
- 10) What was the general feeling towards the process (community members / government)? Were all the communities on side?
- 11) Has the amount of people practicing traditional pursuits increased or decreased since resources have been co-managed? What would you attribute this change to?
- 12) What industrial development was occurring when co-management was introduced? Has development increased? What have some of the effects been?
- 13) Has the process changed significantly since its inception?

### **Management Structure**

#### *Positions*

- 14) How are the board positions assigned? Do you feel this is a fair process for choosing members?
- 15) Are there any special qualifications that board members are supposed to possess?
- 16) How are board members informed about their responsibilities? Is there any specific training given to board members?
- 17) What is the average member turnover?
- 18) Are board members required to consult community members? In your opinion what is the best way to consult community members?
- 19) Are there any actual or perceived drawbacks of becoming a board member?
- 20) Are board members encouraged to travel to conferences or other co-management boards to broaden their experiences?
- 21) What happens when there is a difference between board decisions and community needs (Agency requirements)? Is this a common occurrence?

#### *Government Representatives*

- 22) What is your department's role in the process?
- 23) Are you satisfied with the role you play in this process? How could it be improved?

#### *Decisions*

- 24) How are board decisions made? Is this a fair process? How could it be improved? How would you improve the decision making process?
- 25) Do you feel that decisions made by the board have more support from the community? What are some of the indicators?

- 26) Are board members given enough time to contemplate/research subject matter before making a decision?
- 27) Are they given enough time to consult the agencies they represent?
- 28) How is the community consulted about the decisions made? Is there any type of feedback loop employed related community reaction once a decision has been made?

***Information Dissemination***

- 29) How is information about a specific issue disseminated between board members?
- 30) How is information circulated to the general public?
- 31) Do you feel you receive adequate and accurate information about the board and their decisions? Are the data/figures/options tabled? How could this process be improved?

***Formal/Informal***

- 32) What are some of the informal processes that take place during the decision making process?
- 33) What are some of the benefits of this informal process? What are some of the drawbacks? Do you feel the informal process plays a more important role than the formal process?

**Function**

- 34) Explain to me in your own words what takes place at a typical board meeting? How often do these meetings occur?
- 35) Do you feel this is an adequate structure for board meetings?

***Meeting Process***

- 36) Are community members allowed adequate access/participation during board meetings?
- 37) Is there a formalized method to deal with conflict during the meeting or during a decision? Can you provide me with an example of how this conflict resolution technique was utilized? Did it work?
- 38) Do you think relations among the interested parties have improved as a result of co-management? What are some of the indicators?
- 39) Do you think that environmental and social impacts of board decisions are adequately considered as part of the process? How could this be improved?
- 40) Who is held accountable for the decisions made? Is everyone held equally accountable?

***Social Outcomes***

- 41) Are all board members in attendance when a meeting is held? What happens if they are not?
- 42) How many community members attend the board meetings?
- 43) Since the board meeting has been in existence, have you witnessed an increase in the depth of the discussion?
- 44) Do you feel that traditional knowledge is being incorporated into the decision making process? What measures are taken to ensure that traditional knowledge is incorporated?
- 45) Are board members encouraged to engage in further interaction with each other outside meeting times?
- 46) How many board members occupy other official positions within the community? Could you give me some examples?
- 47) Do community members who work with the scientists on research projects understand more about the SRRB's processes and management techniques?

***Board Members***

- 48) What is the most significant skill you have learnt as a board member?
- 49) If you were to consult with an incoming board member what would be the most significant piece of advice you would offer him or her? Why?

***Resource Management***

- 50) What have been some of the significant decisions made by the board related to wildlife? How have these decisions been received by the community? By government agencies?
- 51) Have the residents residing in the region followed the decision/rules made by the board? What are some of the indicators?

- 52) Have you seen an increase or decrease in the amount of wildlife/resource since the board has been making decisions? How does this perception relate to the amount of people active in this pursuit?
- 53) Has traditional knowledge been utilized when making resource management decisions? Provide me with some specific examples. Is there a particular method within the co-management process to address cultural issues or concerns? How would such issues be addressed?
- 54) Are there any other co-management boards operating within the same area? Are they species specific? How are relationships between the boards maintained? Is there cross membership? Is the other board considered more important in the public's eye?
- 55) Has the board set up any resource monitoring programs that you are aware of? Do they involve local people? Traditional knowledge?
- 56) Have the results of these monitoring programs effected decisions made by the board? Explain how they effected the decision making process?
- 57) Do you feel the board has the capacity to adapt to rapid changes in the environment, such as climate change? What safe guards are in place?

**Research**

- 58) What type of research is the board involved in? What is the largest research project the SRRB has been involved in? Was it successful?
- 59) How are the priorities for research set? How are community members involved in setting research priorities?
- 60) How is the research funded? Who has access to the research funding?
- 61) Have there been any TK studies done in the area? How has this information been documented? Who has access to the information?
- 62) Are researchers encouraged to use community information or community researchers? How is this process undertaken?

**Success**

- 63) In your opinion since the board has been in operation, has it been successful? Provide me with examples of what you feel the board has done successfully and what they could improve on.
- 64) How would you improve the board, their decisions, or their membership to make it more successful?
- 65) Do you feel co-management is more successful than the management technique used before? Why?

***Appendix C:***  
**Preliminary Findings**



# Summary of Preliminary Findings

**Project:** Evaluating Co - management: a framework for analysis

**Case Study & Partner:** Sahtu Renewable Resources Board

**Academic Institution:** University of Calgary

**Faculty:** Environmental Design

**Researcher:** Darwin Bateyko

**Date:** September 2002

## Preamble

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This document is a summary of preliminary findings that will be submitted to the Sahtu Renewable Resources Board (SRRB) for review during their September 2002 meeting. It will also be distributed to the Renewable Resource Councils (RRCs), and Metis/Dene Councils of each of the five communities in the Sahtu, to update them on the progress of the project and present them with an opportunity to provide feedback. The information contained in this document has not been validated by the community or the board and therefore can only be used for the following reasons: a) research update; b) validation of facts; and c) initiation of relevant discussion.

## Research Progress

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As a result of my field season during the month of May, 2002, I had the opportunity to visit all five communities in the Sahtu region and, where possible, speak with a representative from each of the RRCs, the Metis/Dene Councils, and the Metis/Dene Land and Financial Corporations. Over 40 interviews were conducted with a cross section of representatives from each community and others with an interest in the field of research. Unfortunately, I have had little input from individuals who were not beneficiaries and others who did not have some type of professional designation within the communities. Although this group is limited in the Sahtu, further interviews are planned to gather their input.

## Preliminary Findings

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The findings summarized in this section result from three methods of data collection: a) participant observation; b) semi-structured interviews; and c) literature and SRRB document review. Throughout this section reference is made to beneficiaries and non-beneficiaries. The definition of beneficiaries for the purpose of this document is the same as that outlined in the land claim. Conversely, non-beneficiaries refers to others who are either employed in the community or have some interest or connection to the board. Thus, non-beneficiaries include board members, board staff, and others who do not meet the criteria of a beneficiary.

## **Preliminary Findings Continued**

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### **General**

- ♦ Beneficiaries and non-beneficiaries indicated that the “*success*” of the board was limited.
- ♦ Beneficiaries and non-beneficiaries commented that board members had conflicting ideas regarding the board’s vision, mandate, goals, and objectives.
- ♦ Beneficiaries and non-beneficiaries indicated that there was a general disconnect between the Renewable Resource Councils, and the SRRB.
- ♦ Beneficiaries tended not to fully understand the SRRB’s role in resource management.
- ♦ Beneficiaries displayed limited ownership of the SRRB or decisions made by the board.
- ♦ Beneficiaries tended to display keen interest in resource management and wildlife issues.
- ♦ Beneficiaries and non-beneficiaries indicated that the board and its staff should be directly consulting and informing the community more often.

### **Board Members**

- ♦ Beneficiaries tended not to know who the community representatives on the SRRB were.
- ♦ Beneficiaries and non-beneficiaries that were aware of the board indicated that the member selection process was flawed. Specifically, interviewees stated that the process was bureaucratic and cumbersome; all board members were replaced at the same time; and there was no minimum criteria to be a board member.
- ♦ Beneficiaries indicated a desire to communicate with community board members on an informal one to one basis.
- ♦ Beneficiaries and non-beneficiaries indicated they would be in favour of a board member training program.

### **Board Staff**

- ♦ Beneficiaries and non-beneficiaries felt that staff turnover has been too frequent and that the board is still dealing with this negative legacy.
- ♦ Beneficiaries tended not to know who the board staff was.
- ♦ Beneficiaries and non-beneficiaries indicated that there was a need for diversification in terms of staff expertise. In particular, the issues relating to water, fisheries and forestry need to be addressed.
- ♦ Beneficiaries and non-beneficiaries indicated that there needed to be more opportunities for general communication and relationship/trust between the staff and community residents.
- ♦ Beneficiaries and non-beneficiaries comment on the young age of staff members and the perceived lack of experience.

### **Board Meetings**

- ♦ Beneficiaries indicated that they found board meetings intimidating.
- ♦ Beneficiaries tended to feel that the board meeting discussions were too technical in nature.

- ♦ Beneficiaries and non-beneficiaries were often unsure what consensus decision making was, how it differed from voting, and what effects it has on decisions.
- ♦ Beneficiaries indicated that they felt outvoted on occasions when community representatives were not present.
- ♦ Beneficiaries and non-beneficiaries indicated that they would like more direct community consultation before important board meetings.

### **Research**

- ♦ Beneficiaries and non-beneficiaries tended to be knowledgeable about the harvest study and indicated it was an important project.
- ♦ Beneficiaries and non-beneficiaries tended not fully understand the overall research objectives and goals of the SRRB.
- ♦ Beneficiaries tended to feel left out of the research process, including (1) a lack of community input into research conceptualization and design; (2) employment gained from the projects; and (3) research results being presented to the community.
- ♦ Beneficiaries and non-beneficiaries felt that the method for reviewing funding for external research was inconsistent and confusing.

### **Management Decisions**

- ♦ Beneficiaries and non-beneficiaries tended to feel positive about the musk ox tag decisions and indicated that it was an example of how the SRRB could function.
- ♦ Beneficiaries and non-beneficiaries tended to feel that although there has not been a significant resource crisis in the region, resource management has been limited to date.

### **Board Self Improvement**

- ♦ Although the strategic planning session that the board engaged in was a positive process, the document lacks a) an implementation strategy which would outline how the stated goals would be reached, including specific tasks for individual board members and staff; and b) a method to evaluate and update the plan. The strategic plan identified many of the concerns included in this summary of Research Results, which indicates that it has not been successful in overcoming these issues.

### **Land Claim Comments**

- ♦ Beneficiaries and non-beneficiaries indicated that they did not fully understand the land claim document or its practical operation.
- ♦ Presently, there is no regional board or organization that is responsible for collecting and documenting Traditional Knowledge, or advocating its use in resource management strategies within the Sahtu region.
- ♦ Beneficiaries and non-beneficiaries indicated that there were too many boards set up under the claim, which led to the following negative effects: (1) causing unnecessary confusion and bureaucracy in getting things accomplished; (2) difficulty finding qualified individuals to sit on all the boards; and (3) problems with effective communication between the boards.
- ♦ Beneficiaries and non-beneficiaries indicated that the Renewable Resources Councils responsibilities did not coincide with the funding or support they received.

- ♦ Non-beneficiaries suggested that the decentralized nature of the boards operating under the land claim, (boards to operate in different communities) has had the following negative impacts (1) it is inefficient, as it promotes the duplication of staff and office equipment; and (2) it makes it difficult for different boards to communicate.

### **Regional Findings**

- ♦ Beneficiaries and non-beneficiaries indicated that their largest concern was the construction of a pipeline in the area. The four main issues were:
  - a) loss of traditional lands and habitat for wildlife;
  - b) ability of the present form of government and the licensing process to fairly, accurately, and efficiently deal with these developments;
  - c) the construction of a road that would accompany the pipeline and the social problems associated with an all weather roadway;
  - d) the manner in which benefits would be distributed in the community, and what role general community members would play in deciding the distribution formula.
- ♦ Beneficiaries and non-beneficiaries indicated that there was a lack of local human capacity in their communities.
- ♦ Beneficiaries and non-beneficiaries indicated that mistrust existed between the Metis and Dene in the Sahtu region, as well as between the different regions/communities in the Sahtu.
- ♦ Beneficiaries and non-beneficiaries indicated that there was a lack of trust at the community level towards government and the bureaucratic processes.
- ♦ Beneficiaries and non-beneficiaries indicated that traditional knowledge was being lost at an increasing rate and that fewer individuals were engaging in traditional pursuits.

### **Next Steps**

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In the next few months I will continue with the analysis of the data collected. Additionally, I intend to undertake telephone interviews to augment the information already collected and further validate the information with the board and community. It is anticipated that my academic document and the community summary will be completed by spring 2003.

***Appendix D:***  
**Copies of Ethics Approval**



**SCIENTIFIC RESEARCH LICENCE**

**Licence # 13315N**

**File # 12 410 585**

**ISSUED BY:** **Aurora Research Institute - Aurora College**  
Inuvik, Northwest Territories.

**ISSUED TO:** Mr. Darwin Bateyko  
University of Calgary  
2939 Unwin Rd.  
Calgary, AB T2N 4C7  
403-289-3150

**ON:** 21-May-02

**TEAM MEMBERS:** self

**AFFILIATION:** University of Calgary

**FUNDING:** Environmental Design Graduate Research Scholarship & Alberta Learning Graduate Student Scholarship

**TITLE:** Evaluating Co-management: A Framework for Analysis

***OBJECTIVES OF RESEARCH:***

The purpose of the research is to develop a set of recommendations for management practitioners, which will improve resource management decisions within co-management regimes. These recommendations will be based on the field-testing of a methodology designed specifically to evaluate the success and effectiveness of the co-management process of Renewable Resource board in the Sahtu Land Claim region. The three main objectives are 1) develop criteria that can be used to assess co-management processes in three specific areas of social transformation such as information sharing and the establishment of a common language, resource management outcomes and effectiveness and fairness in the decision making process; 2) conduct an in-depth analysis of the Sahtu co-management regime in terms of its management strategy, the manner in which policy is formulated and the role participants play in the process; 3) utilizing the information gained from in-depth analysis, apply the criteria to the Board in an attempt to further develop the overall evaluation process, provide recommendations and insight to the co-management board, based on information gained from the evaluation and provide recommendations to resource management practitioners and academics on a framework for evaluating co-management regimes.

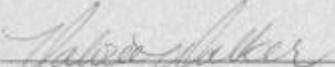
***DATA COLLECTION IN THE NWT:***

**DATE(S):** March - April & July - August, 2002

**LOCATION:** Fort Good Hope, Tulita, Norman Wells & Deline

Licence# 13315 expires on December 31, 2002.

Issued at the Town of Inuvik on Tuesday, May 21, 2002

  
Valdece Walker, Ph.D.  
Science Administration Officer





UNIVERSITY OF  
CALGARY

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CERTIFICATION OF INSTITUTIONAL ETHICS REVIEW

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This is to certify that the Conjoint Faculties Research Ethics Board at the University of Calgary has examined the following research proposal and found the proposed research involving human subjects to be in accordance with University of Calgary Guidelines and the Tri-Council Policy Statement on *Ethical Conduct in Research Using Human Subjects*:

**Applicant(s):** Darwin Bateyko  
**Department/Faculty:** Faculty of Environmental Design  
**Project Title:** Evaluating Co-management: A Framework for Analysis  
**Sponsor (if applicable):**

Restrictions:

This Certification is subject to the following conditions:

1. Approval is granted only for the project and purposes described in the application.
2. Any modifications to the authorized protocol must be submitted to the Chair, Conjoint Faculties Research Ethics Board for approval
3. A progress report must be submitted 12 months from the date of this Certification, and should provide the expected completion date for the project.
4. Written notification must be sent to the Board when the project is complete or terminated

  
Chair  
Conjoint Faculties Research Ethics Board

19 March 2002  
Date:

**Distribution:** (1) Applicant, (2) Supervisor (if applicable), (3) Chair, Department/Faculty Research Ethics Committee, (4) Sponsor, (5) Conjoint Faculties Research Ethics Board (6) Research Services

09/00

***Appendix E:***  
**Frequency of Mention Table**



## Frequency of Mention Table: A Synopsis of Interviewee Discussions Related to Research Findings

The Synopsis was created from the interview data that was collected during research. The General Topics of Discussion correspond with the Findings discussed in Chapter 7.

General Topic of Discussion	Beneficiary		Non – Beneficiary		Board/Staff Member*	
	Total Interview Sessions	(Total 21)	(Total 10)	(Total 13)		
Spoke about a lack of understanding regarding the SDMCLCA. (Includes individuals that revealed through their conversation misunderstanding or spoke directly about the misunderstanding that exists)	16	76%	8	80%	11	85%
Spoke about a lack of understanding regarding the SRRB. (Includes individuals that revealed through their conversation misunderstanding or spoke directly about the misunderstanding that exists)	18	86%	8	80%	11	85%
Spoke about the limited sense of ownership regarding the SRRB. (Includes individuals that revealed through their conversation limited ownership or spoke directly about the lack of ownership that exists)	17	81%	8	80%	11	85%
Commented on the general lack of agreement between the different groups at the time of signing (the SDMCLCA).	8	38%	5	50%	9	69%
Commented that the lack of ownership was due in part to a general lack of agreement between beneficiaries within the area.	6	29%	5	50%	4	31%
Commented that there was only interested in the Board when there was a crisis.	2	10%	2	20%	3	23%
Commented on the limited voluntary input on management issues by the RRCs.	5	24%	4	40%	8	62%
Commented on the inconsistency between the amount of resources the SRRB manages and its' staff and funding.	2	10%	4	40%	7	54%
Commented about the flexibility the Board was given when fulfilling their responsibilities.	0	0%	4	40%	6	46%

Commented on the bureaucracy (too complicated) of the Board and councils.	9	43%	6	60%	5	38%
Commented that one representative for two communities was unfair.	4	19%	1	10%	0	0%
Commented on the lack of capacity in the Sahtu Region.	19	90%	8	80%	11	85%
Commented on the over commitment of qualified people in the Sahtu.	5	24%	4	40%	4	31%
Commented that individuals sat on too many Boards to keep up with the responsibilities required.	5	24%	6	60%	4	31%
Commented on the cross-cultural understanding that exists between the board members.	1	5%	3	30%	6	46%
Commented that there was a lack of skills possessed by board members and that this was adversely affecting the function of the board.	5	24%	6	60%	7	54%
Commented that government-appointed board members had adequate skills.	1	5%	1	10%	6	46%
Commented that some past board members were not genuinely committed to the process.	5	24%	4	40%	5	38%
Spoke about a general misunderstanding of the Board and its mandate, especially as it related to the SRRB-RRC or SRRB-Community member interactions. (Includes individuals that revealed through their conversation a misunderstanding or spoke directly about the misunderstanding that exists)	10	48%	4	40%	7	54%
Spoke about identifying the SRRB as a government institution. (Includes individuals that revealed through their conversation that the SRRB was a government institution or spoke directly about misperception that exists)	11	52%	3	30%	4	31%
Commented that the Boards difficulties were related to concerns with the land claim.	9	43%	5	50%	4	31%
Commented positively on the general match-up between Board authority and mandate.	1	5%	1	10%	5	38%
Commented that the method for appointing Board members was inappropriate and cumbersome.	7	33%	3	30%	6	46%
Commented on the lack of time devoted to discussing important issues during Board meetings.	5	24%	3	30%	5	38%
Commented that decisions were made without adequate community consultation.	12	57%	4	40%	1	8%
Commented on the lack of Board member preparedness at Board meetings	2	10%	4	40%	7	54%

Commented on the limited public interest in Board meetings	2	10%	4	40%	10	77%
Commented that personality conflicts sometimes interfered with Board meetings	2	10%	3	30%	5	38%
Commented that meetings were conducted in a manner that was frustrating to the community participants.	8	38%	2	20%	4	31%
Spoke about decision-making power not in the hands of the community. (Includes individuals that revealed through their conversation that they felt that they did not have decision-making power or that there was a perception that decision making power was not in the hands of the community.)	14	67%	2	20%	1	8%
Commented about the negative effects of staff turnover.	4	19%	4	40%	10	77%
Commented on the Board staff being young and inexperienced for their position.	7	33%	5	50%	0	0%
Commented that the staff had limited interaction with the communities.	12	57%	7	70%	6	46%
Commented that the staff's limited interaction in the community was a major problem for the Board's ability to function.	6	29%	5	50%	5	38%
Commented that decisions should only be made after there was more time to consult their community members.	1	5%			2	15%
Commented that there were too many boards in the Sahtu Region.	9	43%	7	70%	4	31%
Commented on the lack of contact that Board members have with the community.	6	29%	3	30%	3	23%
Spoke about not know what was going on at the Board level. (Includes individuals that revealed through their conversation that they did not know what was going on at the board level, indicated they did not know what was going on at the board level or spoke directly about the lack of understanding at the Board level.)	14	67%	5	50%	7	54%
Commented that there needed to be an effort from all participants when it came to finding out about the SRRB and its operations.	2	10%	2	20%	8	62%
Commented that community members were not receiving the information they required.	16	76%	6	60%	6	46%
Commented that many of the issues discussed were too technical.	8	38%	5	50%	3	23%
Commented that there did not seem to be an effective link between the board and the community.	16	76%	5	50%	9	69%

Commented that they would be interested in collecting and using traditional knowledge.	8	38%	3	30%	6	46%
Commented that traditional knowledge was not used to the extent it could be – there was not a balanced approach.	12	57%	2	20%	5	38%
Commented about the Harvest Study being successful.	9	43%	0	0%	7	54%
Commented that the board engaged in consensus decision-making.	0	0%	0	0%	8	62%
Commented positively about the decision making methods of the SRRB (at the Board Meeting).	1	5%	0	0%	5	38%
Commented negatively about the decision making methods of the SRRB (at the Board Meeting).	5	24%	0	0%	1	8%
Commented about the Board's ability to react to any management crisis.	0	0%	0	0%	6	46%
Commented that traditional knowledge was already informally being used.	0	0%	1	10%	5	38%

\*Note: The Board/Staff Members category includes past and present, beneficiary and non-beneficiary, board and staff members.

***Appendix F:***  
**Musk Ox Decision – Meeting Minutes**



**Musk-Ox Tag Meeting**  
**Tuesday, January 16, 2001**  
**Deline, NT**

**Present:** Raymond Taniton – President, Deline RRC  
Dolphus Tutcho – Deline RRC  
Michel Lafferty – Fort Good Hope RRC  
Margaret McDonald – Norman Wells RRC  
Edward MacCauley – Tulita RRC  
Alexis Blancho – Colville Lake RRC  
Tim Hines – Executive Director, Deline Land & Financial Corporation  
Winter Lennie – SRRB Chairman  
Ben Olsen – SRRB Biologist  
Jody Snortland – SRRB Executive Director

**Meeting convened 10:40 a.m.**

**1. Opening Prayer & Welcome**

- Alexis Blancho
- Winter Lennie asked Raymond Taniton to chair the meeting as the SRRB members were attending the meeting only to provide necessary information and to observe; Raymond accepted

**2. Overview**

- Winter gave a brief overview of the issue.
- In 1996, the Deline Renewable Resource Council (RRC) expressed an interest in big game hunting and asked if the SRRB would be able to do a musk-ox survey and subsequently, establish a quota. In 1997, an aerial survey of musk-ox, completed by DRWED and funded by SRRB, confirmed that the musk-ox harvesting tags could be increased from 11 to 27. In 1998, a letter was written to the Minister of RWED from the SRRB recommending that musk-ox harvesting tags be increased and a change to the current harvesting boundary be made to the current Wildlife Regulation (Motion SRRB 104-1998). To date, no changes have been made due to Sahtu communities' concerns about consultation and tag allocation.

**3. Musk-ox Tag Increase, Harvest Boundary & Tag Allocation**

- For a regulation change to occur, the five RRCs have to agree to the increase in tags and to the change of boundaries so the SRRB can reaffirm its previous recommendations to the Minister of RWED
- SRRB to hold the allotted tags; the five RRCs to meet annually to make a decision where the y are to be allocated (allows for flexibility)
- October 20, 2000 letter written by Dolphus Tutcho – Deline Grey Goose Lodge applying for a Big Game Outfitting Licence; currently stalled because unable to finish business plan with musk-ox issue still not resolved;

- recommend that 15 tags be allocated to Deline (10 for Big Game outfitting and 5 tags for general harvesting)
- Margaret: Norman Wells RRC wishes to support Deline RRC's desire to establish Musk-ox Sport Hunts
  - Everyone in agreement that the RRCs should support one another
  - Winter: Suggests that Deline shouldn't be so specific about how 15 tags to be allocated
  - Margaret: Suggests that each RRC should notify other RRCs if community does not plan to use all of its tags (after six months)
  - Raymond: Suggests that the tag allocations be changed from the original 3 tags per RRC, 10 floating tags, & 2 tags per NWT Resident to the following:
    - 2 tags – Tulita RRC
    - 2 tags – Norman Wells RRC
    - 3 tags – Fort Good Hope RRC
    - 3 tags – Colville Lake RRC
    - 15 tags – Deline RRC
    - 2 tags – Residents (Non-participants)
    - 27 total
  - The breakdown will be 25 tags allotted to the Sahtu Renewable Resources Board with the five Renewable Resource Councils annually deciding where the tags are to be allocated and the remaining 2 tags to stay with RWED – Norman Wells for its annual resident draw

**Lunch break 12:15 p.m.**

**Reconvened 1:15 p.m.**

- Ben Olsen gave a short presentation on how the number 27 was determined for the tag increase (from Preliminary Report)
- 1997 Survey was done by DRWED (funded by SRRB)
  - 182 musk-ox on transect
  - 119 musk-ox off transect
  - Density (number of musk-ox per 100 km x 10 km block)
  - = Approximately 32 musk-ox/1000km<sup>2</sup>
  - 46 calves were classified
  - Population estimate = 1779 musk-ox + 448.5
  - Population ranges from 1331 to 2227 (25% precision)
  - Biologists then determine the sustainable yield, the number of animals that can be harvested that will not affect the population (animals that would die anyway)

Take the minimum population number and multiply it by a conservative 2%

$$1331 \times 2\% = 27$$

**Motion #1:**

To agree to the Sahtu Renewable Resources Board's previous recommendation to increase musk-ox tags from 11 to 27.

**Margaret McDonald moved**  
**Michel Lafferty seconded**  
**Motion carried unanimously**

**Motion #2:**

To agree to make an amendment to the Sahtu Renewable Resources Board's previous recommendation that the zone Unit S, MX/01 for allowable harvest be changed to a new smaller zone that would be bounded on the north by the existing zone, on the southwest by the Hare Indian River and the north shore of Great Bear lake, and bounded on the southeast by the Sloan River. The amendment would allow for the inclusion of the following: Caribou Point Peninsula, Ritch Island (66 ° 52'00"N, 119 ° 18'40"W), Gole Du (Ikanyo Island 66 ° 17'00"N, 123 ° 7'30"W) and ?ek'u Du (Ekka Island 66 ° 19'00"N, 122 ° 26'30"W).

**Margaret McDonald moved**  
**Edward MacCauley seconded**  
**Motion carried unanimously**

**Motion #3:**

To direct the SRRB that the allocation of musk-ox tags for the year 2001-2002 will be as follows:

- 2 tags – Tulita RRC
- 2 tags – Norman Wells RRC
- 3 tags – Fort Good Hope RRC
- 3 tags – Colville Lake RRC
- 15 tags – Deline RRC
- 2 tags – Residents (Non-beneficiaries)
- 27 total

**Margaret McDonald moved**  
**Alexis Blancho seconded**  
**Motion carried unanimously**

- Michel: important to note that traditionally musk-ox and caribou do not get along; that is, where there are musk-ox there are no caribou; he was told this while visiting the Gwich'in; Alexis confirmed this statement **4.**

**Other**

**Items Discussed**

- Grizzly Bear Study

Ben spoke about the following techniques to study bears:

1. Mark/Recapture – traditional method; invasive technique (requires capturing, tagging or collaring bear, and recapturing)

2. Genetic marking – bait stations are set up and are surrounded by barbwire; hair left on barbwire is then genetically tested; difficult as the Barrenland Grizzly Bear range is from North Shore of Great Bear Lake to tree line; very costly

Margaret asked about the Grizzly Bears in the Mackenzie Mountains (outfitters have requested that a Grizzly Bear harvest be opened as a result of an increase of bears (2 defense kills last year (June 2000-June 2001) in the Gwich'in Settlement Area); Ben stated that the SRRB priority for Grizzly Bear research is at Deline, not in the Mackenzie Mountains Further discussions to take place between Deline RRC and SRRB Biologist

- SRRB Research Funding

Winter explained that money is set aside annually to fund research projects; proposals are sent in from applicants (DFO, DRWED, SRRB, RRCs, etc.); at March meeting, RRCs help SRRB to determine which proposals will be accepted/declined. If RRC wishes to develop a study in their area, the SRRB Biologist would work with them to develop a proposal

- GIS maps

Does the money that the SRRB provides to the Sahtu GIS Project cover the cost of providing maps to RRCs? Currently, RRCs are responsible for covering the cost of maps requested from the Sahtu GIS Project

**Meeting adjourned 2:30 p.m.**

***Appendix G:***  
**Testing Your Decisions**  
**Allan Savory Center for Holistic Management**



## **Testing Your Decisions: Are They Economically, Environmentally and Socially Sound?**

The tests are:

- **Cause and Effect** – Does this action address the root cause of the problem?
- **Weak Link**
  - **Social** – Have I/we considered and/or addressed any confusion, anger, or opposition this action could create with people whose support I/we need in the near or distant future?
  - **Biological** (used only when dealing with problem organisms) – Does this action address the weakest point in the life cycle of this organism?
  - **Financial** – Does this action strengthen the weakest link in the chain of production?
- **Marginal Reaction** (used only when comparing two or more actions) – Which action provides the greatest return, in terms of my/our holistic goal, for the time and money spent?
- **Gross Profit Analysis** (used only when comparing two or more enterprises) – Which enterprises contribute the most to covering the overheads of the business?
- **Energy/Money Source and Use** – Is the energy or money to be used in this action derived from the most appropriate source in terms of my/our holistic goal? Will the way in which the energy or money is to be used lead toward my/our holistic goal?
- **Sustainability** – If I/we take this action, will it lead toward or away from the future resource base described in my/our holistic goal?
- **Society and Culture** – Considering all the questions and my/our holistic goal, how do I/we feel about this action now?

Allan Savory Center for Holistic Management  
([http://www.holisticmanagement.org/ahm\\_test.cfm](http://www.holisticmanagement.org/ahm_test.cfm)?)