Informing Indigenous Marine Protection in Gitga'at Territory

by

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Abstract

Many Indigenous communities in the world have established protected areas to assert control over and protect areas in their traditional territories. Canadian policymakers are also examining how such Indigenous Protected and Conserved Areas (IPCAs) may advance marine conservation goals. However, the experience with IPCAs in marine settings in Canada is limited. This research project examines the marine conservation efforts of the Gitga'at First Nation on the west coast of Canada as a case study. The Gitga'at people are exploring the possibility of a marine IPCA in their traditional territory. I conducted interviews to investigate Gitga'at marine conservation values and management preferences, and used the results to develop a draft management plan for a prospective IPCA for the Gitga'at. Based on the case study, I identify challenges and make recommendations for the Gitga'at and other Indigenous communities to consider in the establishment of marine IPCAs.

Keywords: Indigenous Protected and Conserved Area; Marine Protected Area; Gitga'at First Nation; Indigenous and Community Conserved Area; Indigenous marine protection

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BC	British Columbia
CBD	Convention on Biological Diversity
DFO	Department of Fisheries and Oceans
GOLD	Gitga'at Oceans and Lands Department
ICCA	Indigenous and Community Conserved Areas
ICE	Indigenous Circle of Experts
IPA	Indigenous Protected Area
IPCA	Indigenous Protected and Conserved Area
IUCN	International Union for the Conservation of Nature
LUP	Land Use Plan
MaPP	Marine Planning Partnership
MPA	Marine Protected Area
MUP	Marine Use Plan
NSB	Northern Shelf Bioregion
OEABCM	Other Effective Area Based Conservation Measure (under Aichi Target 11)
PMZ	Protection Management Zone
PNCIMA	Pacific North Coast Integrated Management Area
QIA	Qikiqtani Inuit Association
SLUPA	Strategic Land Use Planning Agreement

Chapter 1.

Introduction

1.1. Research Context

Canada borders three different oceans, each of which is a source of ecological, cultural, economic and social value. With increasing pressures from activities such as fishing and shipping, it has become imperative to protect significant areas in the marine environment. Many Indigenous communities in the world have established protected areas to assert control over and protect marine and terrestrial areas in their traditional territories. Under such "Indigenous Protected and Conserved Areas" (IPCAs), Indigenous communities have a primary role in decision making and can protect and conserve culturally and ecologically significant areas in traditional territories based on their values and traditional laws (ICE, 2018). Several Indigenous First Nation communities in Canada have established IPCAs to protect their traditional territories and to assert their Aboriginal rights and title. For example, several tribal parks in British Columbia (BC) have been established by First Nations as protected areas, including the Dasiqox Tribal Park declared by Tsilhqot'in Nations (Gilchrist, 2016b) and the Tla-o-qui-aht Tribal Parks declared by the Tla-oh-qui-aht First Nation (Dorward-Seitcher et al., 2013).

Canadian state policymakers are also beginning to recognize the value of IPCAs, and especially their potential to help meet Canada's marine conservation commitments. In 2010 Canada committed to protecting 10% of its marine and coastal areas by 2020 in accordance with the United Nations Convention on Biological Diversity's (CBD) Aichi Biodiversity Target 11. Canada reached its interim domestic target of protecting 5% of marine and coastal areas by 2017 through the establishment of several marine protected areas (MPA) (DFO, 2017a). With less than 3 years until the 2020 deadline, Canada is currently at 7.75% protection (DFO, 2018b). To meet the commitment under the CBD Canada will need to continue to establish MPAs along its coasts.

Coastal Indigenous communities rely on the marine environment to sustain their cultures and livelihoods and are therefore heavily affected by the presence or absence

of state-established MPAs. Concerns from coastal Indigenous communities regarding the establishment of MPAs by non-Indigenous governments include: lack of control over resource management and conservation in their traditional territories; insufficient use of traditional and local knowledge in MPA establishment and management processes; and restrictions that external MPA designations may place on their access to marine resources (Ayers et al., 2012; Ban et al., 2008; CPAWS, 2009) .

The management and governance of MPAs in Canada is evolving in response to such concerns raised by Indigenous peoples and as Canada advances reconciliation efforts with Indigenous communities. Recent efforts to advance Indigenous involvement in MPA establishment include the Pacific North Coast Integrated Management Area (PNCIMA), the Marine Planning Partnership (MaPP) and the Northern Shelf Bioregion MPA Network Strategy (NSB) processes in British Columbia, and an increasing number of co-management agreements for Canada's protected areas. Moreover, Canada recently formed the Indigenous Circle of Experts (ICE), a committee tasked with leading efforts to provide recommendations and guidance on IPCAs. In March 2017 federal Environment Minister Catherine McKenna publicly acknowledged the important role that IPCAs will play in Canada's commitment to meet protected area targets under the CBD's Aichi Target 11 (Weber, 2017).

Despite these efforts, there is limited experience with IPCAs in Canada, and there is even less experience with IPCAs in Canada's marine environment. Therefore, IPCAs in the marine environment are less understood than those in terrestrial environments. Furthermore, marine jurisdiction in Canada is complex, and further complicated by uncertainties about Aboriginal rights and title in a marine context. With the growing attention that is being given to IPCAs in the context of reconciliation and marine conservation commitments, it is important to investigate how Indigenous communities can establish and benefit from IPCAs, particularly in a marine context. By exploring one Indigenous community's approach to a prospective marine IPCA, my research highlights some of the key challenges and opportunities for marine IPCAs and generates a set of recommendations for Indigenous communities and governments considering the establishment of marine IPCA.

1.1.1. The Case Study

The Gitga'at First Nation is an Indigenous community located along the Northern Coast of BC, with many values that are contingent on a healthy marine ecosystem. The Gitga'at rely heavily on the marine environment to sustain the Nation's economic viability, and for the development, retention, and transmission of Gitga'at culture. The harvesting, processing and sale of marine resources are cornerstones of Gitga'at culture and economy (Gitga'at First Nation, 2011). Gitga'at leaders are exploring Indigenous-led marine protection as part of a strategic management objective to reinvigorate their authority and cultural practices throughout their traditional territory. In particular, establishing marine protected areas is a response to numerous development activities, including various tenure-based activities such as log-handling and lodge development, shipping traffic and commercial and recreational fishing. If poorly located or managed these activities are incompatible with Gitga'at's strategic objectives and values.

The Gitga'at have been involved in several marine planning and protection processes with the Government of Canada and the Province of BC. These processes include the PNCIMA, MaPP and NSB MPA Network Strategy; however, the protection outcomes from these various processes are still uncertain or limited.

The Gitga'at are continuing to explore the options available to them to protect culturally and ecologically significant areas, including cultural keystone species (Satterfield et al., 2011), in their traditional territory. Among these options, the Gitga'at are exploring IPCAs through Indigenous-led protection of a priority and pilot area in their marine territory by developing a management plan for a prospective protected area. This management plan may then be used by the Gitga'at to pursue the establishment of an IPCA, either independently or in partnership with other governments.

By investigating the opinions and values of the Gitga'at people for the marine environment and the potential marine IPCA, considering the results in light of existing literature on IPCAs, and developing a draft management plan for a Gitga'at IPCA, this study identifies potential challenges and opportunities for the Gitga'at as they investigate the possibility of a marine IPCA. This study also makes recommendations for the Gitga'at and other Indigenous communities to consider in the establishment of marine IPCAs.

1.1.2. Research Objectives

Through a case study of the marine protection efforts of the Gitga'at First Nation and the perspectives of Gitga'at people on marine areas and marine conservation, this study examines how the protection and conservation needs and priorities of this and other BC Indigenous communities can be met through marine IPCAs. More specifically, this research aims to:

- Conduct interviews with Gitga'at community members to identify Gitga'at marine use and management values and management preferences.

- Use interview results along with the literature on IPCAs to design a draft management plan for a prospective marine IPCA in Gitga'at traditional territory.

- Using the Gitga'at experience as a case study, identify potential challenges and opportunities, and generate a set of recommendations for the Gitga'at and other Indigenous communities that are considering the establishment of marine IPCAs to meet their marine conservation goals.

1.2. Background

1.2.1. Marine Protected Areas

Marine protected areas are typically instituted as a key component of strategies for marine conservation and their application varies widely to address numerous and area-specific issues. An MPA can broadly be described as an area where human activities are restricted or managed for the purpose of conserving and enhancing marine environments (IUCN, 2018). MPAs can take several different forms and be managed for a variety of different ecological and socio-economic objectives, including the conservation of fishery resources, preservation of unique marine habitats and cultural sites, and the recovery of endangered and depleted species (IUCN, 2018). A common MPA management measure is the establishment and enforcement of no take zones, where extractive activities such as recreational and commercial fishing are prohibited (Day et al., 2015; Sala & Giakoumi, 2017). In addition, many MPAs include restrictions on resource development and shipping activities within their boundaries and promote restoration activities. However, depending on the legislative context and protection objectives, MPAs do not always include restrictions on specific uses, and may even

allow industrial activities and the harvesting of biological resources within the boundaries (Jessen et al., 2016).

The research on MPAs shows that they can provide numerous ecological and socio-economic benefits. Ecologically, MPAs can protect the species and their habitat within the MPA boundaries, as well as providing substantial protection for mobile species (White et al., 2017). Furthermore, MPAs have been shown in some cases to reduce the presence of invasive species (Malherbe & Samways, 2014), and contribute to improved ecological resilience (Sala & Giakoumi, 2017). Socio-economically, MPAs can contribute to global food security by protecting and recovering aquatic food sources and can economically benefit local communities by providing opportunities for sustainable economies such as ecotourism, recreation and replenished food fisheries (Rees et al., 2013; Rocklin et al., 2011). However, while many MPAs have shown success in meeting conservation objectives, some MPAs are subject to poor design, management and enforcement and fail to meet such objectives (Edgar et al., 2014; Halpern, 2014).

In addition to individual MPAs, conservationists advocate the importance of MPA networks. An MPA network can be defined as "a collection of individual marine protected areas that operates cooperatively and synergistically, at various spatial scales, and with a range of protection levels, in order to fulfill ecological aims more effectively and comprehensively than individual sites could alone" (IUCN, 2008). Coordinating and integrating marine protection over larger scales enables greater protection of ocean ecosystems given their interconnectedness.

1.2.2. Marine Conservation in Canada

In Canada, MPAs are being increasingly used to protect Canadian waters, in part as a result of international and national commitments. The most notable commitment at the international level is Canada's responsibility under the Convention on Biological Diversity. As a signatory to this convention, Canada has committed to protecting 10% of its marine and coastal areas by 2020 through networks of protected areas and other effective area-based conservation measures, as part of the CBD's Aichi Target 11. Canada has affirmed and supplemented its commitments on several occasions, including in 2015 with the adoption of the United Nations General Assembly's 2030 Agenda for Sustainable Development – Goal 14 to conserve and sustainably use the

oceans, seas and marine resources for sustainable development (Canada, 2018) – and in the 2016 Joint Statement on Climate, Energy, and Arctic Leadership (DFO, 2017b).

In addition to international marine conservation commitments, Canada has set out a number of domestic targets. First, in response to international commitments under the CBD's Aichi Target 11, Canada adopted the "2020 Biodiversity Goals and Targets for Canada" (Canada, 2016). Of these targets, Canada Target 1 reaffirms Canada's goal to protect 10% of marine and coastal areas by 2020. Second, in 2015 the Liberal government led by Justin Trudeau was elected on a platform that committed to an interim target of protecting 5% of Canada's marine and coastal areas by 2017 (Liberal Party of Canada, 2017). Canada has made progress towards these international and domestic goals. Canada met its interim domestic target of protecting 5% of marine and coastal areas by 2017 with the establishment of 3 new marine protected areas (DFO, 2017a), and is more than 70% of the way toward meeting its international commitments under the CBD and Canada Target 1, currently sitting at 7.75% protection (DFO, 2018b).

While Canada has made quantitative progress towards its international and domestic conservation commitments, the quality and effectiveness of MPAs in Canada have been criticised in the literature (Ban et al., 2014; Bujold et al., 2018; Heck et al., 2012; Robb et al., 2011). For example, some MPAs may allow for industrial extractive activities including oil and gas development to occur within their boundaries (Watson & Hewson, 2018). Alternatively, studies have suggested that effective MPAs are those that have community support (Dehens & Fanning, 2018) and consist of well enforced no take zones (Edgar et al., 2014).

Canada has outlined a strategy for how it will meet Canada Target 1 and the international CBD commitments. The Department of Fisheries and Oceans Canada (DFO) is responsible for leading the marine component of Canada Target 1. In order to meet the marine target of 10% protection by 2020, DFO has outlined a five point plan that centers around the quick and effective establishment of MPAs (DFO, 2018b). DFO recently established an advisory committee co-chaired by Indigenous leaders to gather information to provide advice on the development of categories of standards for allowable and prohibited activities within Canada's MPAs (DFO, 2018a). Similarly, Canada created "the Pathway" led by Parks Canada and by Alberta Environment and Parks to lead the terrestrial component of Canada Target 1. The Pathway has outlined a

broad strategy for how the terrestrial component of Canada Target 1 will be met, called "Pathway to Canada Target 1," and the intention is to release a more detailed plan in 2018. A key component of the Pathway to Target 1 is the investigation of how Indigenous Protected and Conserved Areas can contribute to Canada's protection and conservation efforts (The Pathway, n.d.). IPCAs are being explored as a means of contributing to marine conservation commitments as protected areas, or as other effective area based conservation measures (ICE, 2018). As part of the investigation, the federal government established the Indigenous Circle of Experts (ICE), a committee responsible for providing recommendations and guidance on IPCAs. The ICE is comprised of Indigenous experts from across Canada and representatives from federal, provincial and territorial jurisdictions. In 2018, the ICE released a report that contained recommendations and guidance on IPCAs, and encouraged Canada to continue to explore IPCAs in a marine context (ICE, 2018).

Legal Framework

Canada has a variety of legislation across levels of government available to establish MPAs. Such agreements can include provisions regarding marine resources and marine regions, including provisions outlining the planning and management for protection of marine regions (e.g. the Nunavik Inuit Lands Claims Agreement). In addition to Aboriginal title, First Nations may also have other Aboriginal rights, such as the right to harvest marine resources and the right to fish for "food, social and ceremonial purposes" or commercial purposes. Claims to these rights have been tested, both successfully and unsuccessfully, in the courts (e.g. *Lax Kw'alaams Indian Band v. Canada (Attorney General), 2011; R v. Gladstone, 1996; Ahousaht Indian Band and Nation v. Canada (Attorney General, 2009)*.

Table 1.1 summarizes the various jurisdictions and MPA capacities of different governments.

Federal government

At the federal level, there are three main authorities with the mandate to establish MPAs. Parks Canada can establish National Marine Conservation Areas under the *National Marine Conservation Areas Act* (S.C. 2002, c. 18) to protect representative examples of Canada's natural landscapes and seascapes. Environment and Climate

Change Canada can establish Marine National Wildlife Areas under the *National Wildlife Act* (R.S.C. 1985, c. W-9) to protect habitat for a variety of types of wildlife, including migratory birds and species at risk. Finally, Fisheries and Oceans Canada can establish Marine Protected Areas under the *Oceans Act* to manage and protect fish populations and fish habitat.

Outlined in Canada's international commitment under Aichi Target 11, the federal government can also employ "other effective area based conservation measures" (OEABCM) to achieve marine conservation. OEABCM are still poorly understood and what constitutes an OEABCM is uncertain. The government of Canada has issued guidance on the definition of what an OEABCM is, stating that an OEABCM is "a spatially-defined management measure in coastal or marine waters […] that provides biodiversity conservation benefits" (DFO, 2016). As such, measures such as fisheries closures, the identification of critical habitat for species at risk, and IPCAs (even if not formally recognized by the federal or provincial governments as protected areas) may classify as OEABCMs, and therefore may contribute to Canada's marine protection goals.

Provincial and territorial governments

At the provincial and territorial levels, MPA legislation differs across the Canadian provinces and territories. Provincial jurisdiction under the Canadian constitution typically extends over foreshore/tidal and estuary regions of the marine environment, and may include inland marine waters if they are within a province's boundaries. In BC, there are five pieces of legislation that codify MPAs: *Park Act (*RSBC 1996, c. 344), *Protected Areas of British Columbia Act* (SBC, 2000, c. 17)*, Ecological Reserve Act* (RSBC 1996, c. 103)*, Wildlife Act* (RSBC 1996, c. 488) and the *Environment and Land Use Act* (RSBC 1996, c. 117) (BC Parks, 2007).

Indigenous governments

Many coastal Indigenous communities in Canada claim traditional territory in both terrestrial and marine environments. Indigenous communities can claim Aboriginal title to a marine area and other site specific Aboriginal rights. A specific claim to Aboriginal title on land has recently been upheld by the Supreme Court of Canada in the *Tsilhqot'in Nation v. British Columbia* ([2014] S.C.C. 44) decision. The question of Aboriginal title in

marine environments, however, has not yet been decided in Canadian courts and remains uncertain. However, modern treaties and land claims agreements typically outline ownership and management over land, which can create the appropriate authority for Indigenous nations to create and govern their own protected areas. Such agreements can include provisions regarding marine resources and marine regions, including provisions outlining the planning and management for protection of marine regions (e.g. the Nunavik Inuit Lands Claims Agreement). In addition to Aboriginal title, First Nations may also have other Aboriginal rights, such as the right to harvest marine resources and the right to fish for "food, social and ceremonial purposes" or commercial purposes. Claims to these rights have been tested, both successfully and unsuccessfully, in the courts (e.g. *Lax Kw'alaams Indian Band v. Canada (Attorney General), 2011; R v. Gladstone, 1996; Ahousaht Indian Band and Nation v. Canada (Attorney General, 2009).*

Table 1.1.   Authority to Establish Ocean Protected Areas by Jurisdiction in Canada

Government	Jurisdiction	Legislative basis
Federal	Offshore waters and inland marine waters outside of provincial boundaries; fisheries; navigation and shipping; marine pollution	Oceans Act Canada National Marine Conservation Areas Act Canadian Wildlife Act Migratory Birds Convention Act
Provincial and territorial	Foreshore areas and inland marine waters within provincial boundaries	Various (province/territory dependent)
Indigenous	Traditional territories	Aboriginal Rights and Title Treaties and Land Claims Agreements

Indigenous Involvement in MPAs

Most current protected area establishment processes in Canada involve lengthy consultations and engagement with stakeholders and other governments, including coastal Indigenous people (ECCC, 2017). Coastal Indigenous communities typically rely on the marine environment for cultural practices and livelihoods and are therefore particularly affected by the presence or absence of MPAs in their traditional territories. Concerns from coastal Indigenous communities regarding the establishment of MPAs in their traditional territories include: lack of control over resource management and

conservation in their traditional territories; insufficient use of traditional and local knowledge; and restrictions that external MPA designations may place on their access to marine resources (Ayers et al., 2012; Ban et al., 2008; CPAWS, 2009). Restrictions can prevent coastal Indigenous communities from participating in traditional activities and harvesting food for sustenance, and can also adversely affect the economic benefit received by communities from these areas (Bennett et al., 2017). While there is concern about certain MPA management measures, MPA objectives are generally supported by many coastal Indigenous communities. For example, First Nations regularly support the recovery of depleted species and the sustainable harvesting of traditional resources (Ban et al., 2008), and share concerns over the status of and threats to marine resources (CPAWS, 2009).

The management and governance of MPAs in Canada is evolving in response to concerns raised by Indigenous communities and as Canada advances reconciliation efforts with Indigenous peoples. Efforts to increase Indigenous involvement in MPA establishment and governance are evidenced by recent undertakings by the federal and provincial governments in Canada. For example, in 2009 the federal government, in collaboration with the province of BC and several First Nation governments, launched a collaborative planning partnership for the Pacific North Coast Integrated Management Area (PNCIMA), and in 2011 the province of BC and 17 First Nation communities formalized a marine planning partnership (MaPP) for the North Pacific Coast (MaPP, 2017; FLNRO, 2011). Most recently, in 2012 the Government of Canada, the Province of British Columbia and 17 First Nations began working together to develop a coast wide network of marine protected areas in the Northern Shelf Bioregion (MPA Network, 2018). In addition, First Nations are cooperatively managing several protected areas in Canada with federal and provincial governments as set out in co-management agreements. For instance, the Gwaii Haanas National Marine Conservation Area Reserve was established using a co-management model with the Haida Nation and the Canadian federal government (Schulte, 2017). Furthermore, Canada recently formed the Indigenous Circle of Experts, a committee tasked with leading efforts to provide recommendations and guidance on Indigenous Protected and Conserved Areas. In March 2017 federal Environment Minister Catherine McKenna publicly acknowledged the important role that IPCAs will play in Canada's commitment to meet protected area targets under the CBD's Aichi Target 11 (Weber, 2017).

1.2.3. Indigenous Protected and Conserved Areas

Scholars and governments are increasingly recognizing that areas conserved by Indigenous communities contain significant levels of biodiversity, and that the traditional knowledge, practices, values and laws of Indigenous peoples have contributed to conservation of ecosystem, species, and genetic diversity (Kothari et al., 2012). IPCAs can broadly be described as areas where protection and conservation efforts are led by Indigenous peoples based on their values and traditional laws (ICE, 2018). IPCA is the specific term that the ICE has adopted in its efforts to inform the pathway to Canada Target 1. This broad description means that IPCAs may materialize in a variety of ways and take on various forms. For example, they may be supported through partnerships with other governments (e.g. co-management arrangements, see section 2.5.2), or they may be established without external support or recognition (e.g. tribal parks, see section 2.5.1). How an IPCA materializes and is governed will depend on the Indigenous community involved and its unique circumstances and preferences. A key common factor defining IPCAs, however, is that Indigenous communities have the primary role in decision-making. What primary decision making means, however, is unclear and may be interpreted in a variety of ways. For instance, it may be interpreted as the Indigenous community governing without state involvement, or having veto powers in a shared decision making arrangement. The ICE describes four types of possible IPCA governance types:

- Indigenous government–Crown government partnerships
- Indigenous government–non-governmental partnerships
- Hybrid partnerships (multiple parties, government and non-government)
- Sole Indigenous governance (ICE, 2018)

Other common elements of IPCAs include that they represent a long-term commitment to conservation and they elevate Indigenous rights and responsibilities (ICE, 2018).

Application of IPCAs in Canada

IPCAs are not yet explicitly recognized as a protected area classification in any federal or provincial laws in Canada. However, while Canada's laws do not provide explicit recognition of IPCAs, there are laws and declarations that effectively support

IPCAs. For example Canada recognizes and affirms Aboriginal rights in the Canadian *Constitution Act, 1982*, and is a signatory to the United Nations Declaration on the Rights of Indigenous People. In addition, a number of Canadian court cases have set important precedents with regards to Aboriginal rights, including Aboriginal title to land. In the *Delgamuukw v. British Columbia* ([1997] S.C.C. 1010) case the Supreme Court of Canada determined that "absent a valid extinguishment, indigenous people have sui generis aboriginal title to the land they exclusively occupied prior to the establishment of British colonial sovereignty, and aboriginal title is protected by the Constitution of Canada." Similarly, a specific claim to Aboriginal title to land was upheld by the Supreme Court of Canada in *Tsilhqot'in Nation v. British Columbia* ([2014] S.C.C. 44). IPCAs represent a modern application of constitutionally defined Aboriginal rights and title (ICE, 2018).

Canada's current set of laws provides a platform on which to build recognition of IPCAs and work is underway to formally recognize these areas in legislation. For example, the ICE was formed and tasked with leading efforts to provide recommendations and guidance on IPCAs. The ICE has since organized four regional gatherings across Canada with Indigenous communities and produced a report and recommendations for IPCAs in Canada (ICE, 2018). Generally, the report notes that IPCAs present an opportunity to pursue reconciliation and relationships built on respect for cultural differences; to appreciate and acknowledge Indigenous peoples' knowledge systems and use of the areas, and the value this has for conservation; and to recognize Indigenous stewardship responsibilities and Indigenous rights, including rights to territory, self-determination, and cultural integrity (ICE, 2018; Stevens, 2013). Furthermore, the ICE provides 28 recommendations targeted to the Canadian federal government, one of which includes the suggestion that IPCAs in a marine context be further investigated and supported.

With the growing attention that is being given to IPCAs in the context of reconciliation and marine conservation commitments, understanding how Indigenous communities can establish and benefit from IPCAs, particularly in marine settings where there is still substantial uncertainty, is important. Learning from the experiences of Indigenous communities with IPCAs will continue to be a key step in facilitating and encouraging the establishment of more of these areas.

Chapter 2.

Indigenous Protection and Conservation

2.1. International Experience with Indigenous Protection and Conservation

Experience with conservation led by Indigenous communities, in both marine and terrestrial areas and in many places in the world, has been well documented in the literature. For the purposes of this research, Indigenous Protected and Conserved Areas are defined as areas where "Indigenous governments have the primary role in protecting and conserving ecosystems through Indigenous laws, governance and knowledge systems" (ICE, 2018). At the international level a more commonly used term for these areas is Indigenous and Community Conserved Areas (ICCA) as defined by the International Union for the Conservation of Nature (IUCN). ICCAs are defined by the IUCN as "natural and/or modified ecosystems containing significant biodiversity values, ecological services and cultural values, voluntarily conserved by Indigenous peoples and local communities, both sedentary and mobile, through customary laws or other effective means" (IUCN, 2010). This broad definition captures the variety of types of, and names for, these areas across the world, including IPCAs. However, while ICCAs include bottom-up conservation from both local and Indigenous communities, IPCAs focus on conservation led by Indigenous communities, although a co-management or other joint arrangement may be involved.

ICCAs have three defining characteristics:

1. The community has a <u>strong cultural relationship</u> with the area or depends on it for their survival or livelihood;

2. The purpose of the management of the area is to <u>conserve the area's ecological and cultures features/values</u>;

3. The community is the <u>primary decision maker </u>(*de jure* and/or *de facto*) in the establishment and management of the area (Kothari et al., 2012).

The first two of the three defining characteristics are typical of Indigenous cultures and practices. Indigenous peoples often understand ecological principles and the interconnectedness of the environment; use adaptive strategies for monitoring, enhancing, and sustainably harvesting resources; maintain respectful and interactive attitudes and philosophies with the environment; have close ties with ancestral lands; and hold beliefs that recognize the power and spirituality of nature (Berkes, 2012; Turner et al., 2000). These characteristics are present with Indigenous communities in marine environments as well (Lepofsky & Caldwell, 2013). The third characteristic determines the level of Indigenous involvement in governance of protected areas and distinguishes ICCAs from other protected areas that involve Indigenous communities to a lesser degree.

Worldwide, ICCAs are referred to locally using a multitude of different names, and they take on different forms depending on the local social, ecological, cultural, economic and political context in which they are established (Kothari et al., 2012). For example, in Australia Indigenous communities have established protected areas called "Indigenous Protected Areas" that are recognized in Australian law (Ross et al., 2009), while in Canada Indigenous First Nation communities have established protected areas called "Tribal Parks" that may receive little to no legislative recognition from federal and provincial governments (Krindle, 2014). In various other articles, reports, websites and documents, ICCAs have been referred to using a wide variety of terms such as Indigenous Protected and Conserved Areas, Community Conserved Areas, Locally Managed Marine Areas, and Indigenous Protected Areas, each with slight variations in process and legal underpinnings, but each maintaining the three defining characteristics of an ICCA (Kothari et al., 2012). The term used may depend on the context or scale in which these areas are being discussed. For instance, in Canada the national term that was adopted by the ICE was IPCA; however, there are a series of different names used at the local scale, such as Tribal Parks. The ICCA Consortium, an international association under the Swiss Civil Code and a leading ICCA resource, recognizes the diversity in terms used to describe ICCAs, and encourages the use of local or customary names for specific areas (Kothari et al., 2012). The term ICCA is convenient to use for general communication about these areas in international and intercultural contexts. Table 2.1 provides a list of examples of ICCAs worldwide and showcases some of the diversity in ICCAs.

Table 2.1.   Examples of ICCAs Worldwide

Name	Marine or Terrestrial	Location	Description	Reference
Locally Managed Marine Areas (LMMA)	Marine	Fiji	149 LMMAs are governed by communities and recognized by law.	(Day et al., 2015)
Marine ICCAs	Marine	Spain	230 local governance bodies manage the common use of all coastal fisheries in the country.	(Day et al., 2015)
Indigenous Protected Areas	Terrestrial	Australia	Protected areas managed by Indigenous communities and that are included in the National Reserve System (recognized by law).	(Davies et al., 2013; Ross et al., 2009; Stevens, 2014)
Sacred National Sites	Terrestrial	Mexico	Areas managed by Indigenous communities with the goal of protecting culturally important sites, but that do not have clear legal status.	(Martin et al., 2011)
Tagal fisheries	Marine	Borneo	Fisheries are managed according to traditional Indigenous laws. Governments support this management practice through research, training and material assistance.	(Vaz & Agama, 2013)
Indigenous Biocultural Heritage Areas	Terrestrial	Peru	Local empowerment of five Indigenous Qeshwa communities has transformed the area into one cohesive community-based enterprise.	(Day et al., 2015)
Community based subsistence fishing areas	Marine	Hawaii	Native Hawaiian traditional management techniques are used to create place specific management rules supported by the government.	(Vaughan & Caldwell, 2015)
Khumbu Indigenous Conservation Territory	Terrestrial	Nepal	Private land enclave within the Sagarmatha National Park in the Himalayas that the Sharwa people conserve through their cultural values and customary law.	(Stevens, 2013)

2.2. ICCA Governance and Political Contexts

ICCAs are distinct in their governance structure in that the Indigenous community is the primary decision maker and the protected area is typically governed under traditional Indigenous institutions (Kothari et al., 2012). For example, Indigenous village officials, or nawa, in ICCAs in Nepal are tasked with enforcing traditional conservation practices and all households participate in decision making by taking turns as nawa (Stevens, 2013). In some ICCAs traditional institutions are modified to fit modern contexts. For example, in Australia Indigenous communities develop management plans for their ICCAs to provide a basis for an agreement with the state government and to ensure that their ICCAs are accepted or seen as legitimate by stakeholders (Davies et al., 2013).

Governance structures may share decision making among various parties, including other governments or private parties, but with the Indigenous community retaining primary decision making power within the political context in which the ICCA is established. The various types of ICCAs worldwide fall along a spectrum of different legal underpinnings, from receiving full recognition and support from state governments (de jure), to receiving no official recognition and support but still exercising some degree of practical control over the conservation area (de facto), to somewhere in between. For example, in Australia Indigenous Protected Areas (IPA) are a component of the National Reserve System and are recognized by the state. The IPAs are voluntarily declared and managed by traditional owners and are supported by a range of government and non-government parties (Ross et al., 2009). According to Stevens (2014), the IPA program in Australia has empowered communities and provided significant environmental, economic, social, and cultural benefits. However, despite receiving state recognition and support, these areas only receive funding on a yearly basis. The availability of long term funding is a challenge for Indigenous traditional owners and can lead to ineffective land management (Stevens, 2014). Nonetheless, Stevens (2014) argues that the IPA program in Australia has been more successful than government supported Indigenous consultations because of the entrenched power of state conservation agencies in consultations, and the lack of commitment by states in these circumstances.

Conversely, there are ICCAs that do not receive state recognition and support. For example, in Fiji local Indigenous communities manage an MPA Network while the

state maintains ownership over the area. As such the MPAs do not have formal protection status under national law, and the management decisions by Indigenous leaders do not hold national legal standing (Ban & Frid, 2018; Clarke & Jupiter, 2010). ICCAs that fall on the de facto end of the political spectrum face a number of challenges because of the lack of legal recognition by national governments. These challenges include, but are not limited to, non-compliance by stakeholders that can be exacerbated by a lack of capacity to pursue enforcement, and imposed development and resource exploitation by the state government (Berkes, 2009; ICE, 2018; Kothari et al., 2012). The ICCA in Nepal managed by local nawa, as described earlier, has also not received state recognition, but Stevens (2013) found that effective protection came as a result of social solidarity, shared faith, customary law, and social pressure. In this same ICCA, leaders are continually working to increase awareness and support of ICCAs at the local level with the creation of an NGO, at the national level with the creation of a national network and participation in national meetings, and at the international level by attending international conferences (Stevens, 2013). Additionally, despite the legal limitations faced by the Indigenous communities managing MPA Networks in Fiji, the success of the MPA Network can be attributed to the national laws that recognize traditional fishing rights by customary landowners, and the broader community in the area that respects the Indigenous communities' traditional authority (Ban & Frid, 2018; Clarke & Jupiter, 2010).

A number of ICCAs fall somewhere in between receiving full support from national governments and receiving no legal recognition. Examples include the co-management arrangements for the management of marine protected areas in New Zealand (Dodson, 2014) and Hawaii (Vaughan & Caldwell, 2015), and Tagal fisheries in Borneo. Traditional Tagal fishing practices are supported by Borneo governments through research, training and material assistance, and Tagal fishing practices are recognized as a type of resource management system in state-led conservation practice and law to encourage stakeholder participation (Vaz & Agama, 2013). With these types of ICCA arrangements, a commonly cited challenge is that although predominant decision making power appears to rest with the Indigenous community, ultimate decision-making power may actually rest with the state (Ban & Frid, 2018).

2.3. Socio-economic, Cultural and Ecological Contexts

ICCA management is largely driven by the unique socio-economic, cultural and ecological contexts in which these conservation areas are established. For example, ICCAs might be managed to preserve unique habitats and ecosystems, to protect culturally significant landscapes and species, to foster ecotourism, or to foster sustainable management for commercial harvest. Typical motivations for ICCA establishment and management include securing land tenure, securing sustainable provision of resources, concern for the protection of wildlife and ecosystems, sustaining cultural identity and needs, providing security against emergencies, and generating revenues (Berkes, 2009; Kothari et al., 2012). Understanding the social, ecological and cultural context in which an ICCA will be established is repeatedly cited in the literature as being a contributing factor to success, as it helps managers to identify values and determine common goals, and build momentum and support within the community (Berkes, 2009; Gaymer et al., 2014; Katikiro et al., 2015; Martin et al., 2011; Springer, 2006).

While the socio-economic, cultural and ecological circumstances that face Indigenous communities shape ICCA management, these circumstances can also pose challenges. For example, social tensions and a large proportion of young people within a community can act as internal challenges to successful ICCA management. Social tensions within a community can lead to difficulties in reaching consensus on management decisions; for instance, on the level of protection and acceptable uses within the ICCA (Katikiro et al., 2015b; Mahajan & Daw, 2016). The literature suggests being transparent in decision-making, investing in facilitation for community engagement and decision making, and sharing information and educating community members as ways to mitigate these social tensions and to build the capacity of the community to participate in the process (Clifton & Majors, 2012; Gaymer et al., 2014; Katikiro et al., 2015b; Mahajan & Daw, 2016).

Shifting community demographics may also pose a challenge to successful ICCA establishment and management. As the proportion of the younger generation grows in a community, this may result in loss of capacity and loss of cultural knowledge to contribute to management (Berkes, 2009; Kothari et al., 2012). Younger generations may not be as motivated to engage, or may not have the traditional knowledge to do so.

Therefore, when establishing ICCAs the literature suggests that it is important to engage younger generations and build capacity within the community to ensure long-term commitments to the protected areas (Clifton & Majors, 2012; Gaymer et al., 2014; Govan et al., 2006; Mulrennan et al., 2012; Vaz & Agama, 2013).

In addition to social challenges, economic challenges may inhibit effective ICCA management. Lack of economic resources may prevent effective management by limiting a community's ability to enforce management actions and pursue management objectives (ICE, 2018; Kothari et al., 2012). On the other hand, high demand for the potential economic benefits that could be derived from resource extraction in the conservation area may impede conservation efforts.

2.4. International Experiences in Marine ICCAs

International experiences with marine ICCAs are more limited than for those on land. One study found that of 13 case studies of Indigenous peoples' involvement in MPAs, only five could be considered an ICCA where the community held primary decision making power (either community led, or community led and supported by the state) (Ban & Frid, 2018). All of these five cases were located somewhere in Oceania, where customary marine tenure systems are strong, and the only case study identified in Canada was the Gwaii Haanas National Marine Conservation Area, which uses a co-management model. Other studies have found more than 500 marine ICCAs in the Philippines alone (Berkes, 2009). The discrepancy in marine ICCAs examples may be a result of how ICCAs are defined and reported jn the literature. The challenges for Indigenous led MPAs are similar to those identified in terrestrial ICCAs and include non-compliance, and lack of state support and Indigenous decision making power (Ban & Frid, 2018). Other examples of marine ICCAs are listed in Table 2.1.

2.5. Canadian Experiences of Indigenous Protection and Conservation

ICCAs in Canada have gained recognition in light of Canada's international commitments under the CBD, domestic targets under Canada Target 1, and efforts to advance reconciliation with Indigenous peoples. In 2018 the ICE adopted the term Indigenous Protected and Conserved Areas to represent ICCAs in Canada (ICE, 2018),

but IPCAs are not yet formally part of Canada's protected area framework. Indigenous communities in Canada, however, were protecting and conserving areas in their traditional territories long before this concept emerged formally in federal government initiatives. Examples of ICCAs in Canada are listed in Table 2.2.

Table 2.2.   Examples of ICCAs in Canada

Name	Location and community	Description	Reference
Duu Guusd Tribal Park	Council of Haida Nation, British Columbia	Declared in 1981 by the Haida Nation and subsequently recognized by the BC provincial government in 2008 as a heritage site and conservancy. Both the Haida Nation and the Province of BC drafted the current conservancy management plan.	(BC Parks, 2011; Hume, 2011)
Tla-o-qui-aht Tribal parks	Tla-o-qui-aht First Nation, British Columbia	Series of 4 tribal parks that began with the declaration of the Meares Island tribal park in 1984. The parks nearly cover the entire territory of the Tla-o-qui-aht and are zoned for appropriate uses. None of the tribal parks have received recognition from the BC government and the parks continue to receive pressures from commercial logging and mining operations.	(Dorward-Seitcher et al., 2013; Hume, 2011; Raygorodetsky, 2017)
Gwaii Haanas National Park Reserve and National Marine Conservation Area	Council of the Haida Nation, British Columbia	18 protected area sites that are co-managed by the Haida Nation, the Government of Canada and the Government of British Columbia. The site was originally declared as a Haida Heritage site in 1985, and received national recognition in 2010.	(Gladu et al., 2003; ICE, 2018)

Name	Location and community	Description	Reference
Asatewisipi Aki Management Plan	Poplar River First Nation, Manitoba	A protected park established under the Manitoba Provincial Parks Act protecting most of the Poplar First Nation's traditional territory. A management plan for this area, as well as the remaining unprotected portions of their territory, was created by the Poplar River First Nation in 2011 that outlines Indigenous governance and management roles, and was given legislative protection under the East Side Traditional Lands Planning and Special Protected Areas Act.	(Poplar River First Nation, 2011)
Walpole Island Land Trust	Walpole First Nation, Ontario	The Walpole First Nation in Ontario registered the Walpole Island Land Trust in 2008 as a charity. It was the first land trust in Canada established by an Indigenous community. The land trust was established to help conserve and protect ecologically significant habitats and species at risk within Walpole traditional territory.	(Oosthoek, 2010; Walpole Island Heritage Center, 2010)
Kih'tsaa?dze Tribal Park	Doig River First Nation, British Columbia and Alberta	Tribal park declared in 2011 that crosses BC and Alberta borders. Park established to protect the area from resource extraction (petroleum and logging). Tribal Park has received resistance from both Alberta and BC provincial governments.	(Gilchrist, 2016a; Hume, 2011)
Dasiqox (Nexwagwez?an) Tribal Park	Tsilhqot'in Nations, British Columbia	Tribal park declared in 2014 shortly after Aboriginal title recognized by the courts (tribal park established outside of title lands) and in response to mining and logging pressures in the territory. Despite park declaration, demands for mining in the area remain. The park is not yet recognized by the provincial government and has been criticized by the mayor of a nearby town.	(Gilchrist, 2016b)

Name	Location and community	Description	Reference
Tallurutiup Imanga/ Lancaster Sound	Qikiqtani Inuit Association (QIA), Nunavut	Canada is soon to establish it's largest national marine conservation area in close coordination with the QIA. Parks Canada and the QIA are negotiating an Impact Benefit Agreement, under which the QIA are seeking full management of the MPA.	(Cruickshank, 2017)

2.5.1. Indigenous Governance of Protected and Conserved Areas

Tribal parks are a prominent example of Indigenous governance of protected areas in Canada. Tribal parks are a type of protected area established by a First Nation, in which traditional activities, such as harvesting and processing traditional foods, are encouraged, but the area is protected from intensive industrial activities, such as mining and logging (Paquet, 2013). Tribal parks have also been described as unilaterally declared protected areas that are managed under First Nation's traditional laws (Krindle, 2014). Tribal parks are typically founded on Aboriginal rights and sovereignty in traditional territory, but in some cases such parks have also eventually received federal or provincial designations. Indigenous leaders have described the value of tribal parks as a way of signaling to government and industry that these are important areas and are part of the minimum territory required to continue exercising Aboriginal or treaty rights (Gilchrist, 2016b).

The Tla-o-qui-aht First Nation initiated the tribal park movement in Canada when they established the Meares Island Tribal Park (Wah-nuh-jus – Hilth-hoo-is) in BC. The tribal park was established in the 1980s in response to large scale logging threats in Tla-o-qui-aht traditional territory (Dorward-Seitcher et al., 2013; ICE, 2018). The Tla-o-qui-aht have since established three more tribal parks in their territory: Ha'uukmin Tirbal Park, Tranquil Tribal Park and Esowista Tribal Park. While the boundaries of the parks do not explicitly include marine areas (Murray & King, 2012), the Tla-o-qui-aht First Nation has suggested that the parks are managed holistically to include both aquatic and terrestrial protection (Gilpin, 2018). Other examples of tribal parks include the Dasiqox Tribal Park, K'ih tsaa?dze Tribal Park and the Duu Guusd Tribal Park (see Table 2.2).

Tribal parks in general, and especially those that include marine areas, such as the Tla-o-qui-aht Tribal Parks, have little publically available information.

Many First Nation communities have Indigenous Guardian programs to help promote Indigenous governance of their traditional territories, and enforce protection and conservation objectives. Guardians patrol their traditional territories and protect the lands and waters according to traditional laws. The Haida Nation's Haida Gwaii Watchmen, the Heltsik First Nation's Coastal Guardian Watchmen Network, and the Gitga'at First Nation's Gitga'at Guardians in British Columbia, and the Lutsel K'e's Ni Hat'ni Dene program in the Northwest Territories are examples of such programs. While Guardian programs may not formally establish a protected area, they are an example of Indigenous protection of lands and waters based on customary values and laws (Bhattacharyya & Whittaker, 2016).

Other notable examples of Indigenous governance for protection and conservation in Canada include the Asatewisipi Aki Management Plan in Manitoba and the Walpole Island Land Trust in Ontario (see Table 2.2 for further description).

2.5.2. Shared Governance in Protected and Conserved Areas

In addition to establishing tribal parks that are predominately managed by Indigenous communities, First Nations in Canada have worked with provincial and national governments to establish management partnerships, or shared governance, to co-manage protected areas. Co-management of a protected area does not alone constitute an ICCA. Ideally, co-management arrangements should offer Indigenous communities operational rights within a protected area, and also grant collective choice rights (i.e. the right to participate in a meaningful way in decision making) (Wilson et al., 2003). Moreover, co0management arrangements typically refer to equitable or balanced sharing of decision making power (Wilson et al., 2003; Zurba et al., 2012). To fit within the ICCA classification, co-management agreements must include collective choice rights that grant primary decision-making power to the Indigenous community for the protected area. The IUCN has differentiated between co-managed protected areas and ICCAs in their protected area categories; however, the ICE report indicates that in Canada IPCAs may include areas that are co-managed (Borrini-Feyerabend et al., 2004; ICE, 2018). Others have argued that because all conservation is guided by government

legislation, and requires the cooperation of multiple stakeholders and governments, all ICCAs will be in effect co-managed (Berkes, 2009).

Possibly the most advanced, and perhaps the only, examples of co-management of a protected area in Canada where the Indigenous community's decision-making power could be considered "primary" are the Gwaii Haanas National Park Reserve and National Marine Conservation Area (Gwaii Haanas), and the Duu Guusd protected area. Gwaii Haanas contains 18 protected area sites that are co-managed by the Haida Nation, the Government of Canada and the Government of British Columbia (Gladu et al., 2003; ICE, 2018). The protected areas are cooperatively managed through the Archipelago Management Board and are based on both Haida and Canadian law (ICE, 2018). The Management Board has an equal number of representatives from the Haida Nation and the Government of Canada (ICE, 2018). The Haida Nation recognizes the sites as Haida Heritage sites and manages them according to Haida Stewardship Law and the Government of Canada and province of BC recognize the sites as either ecological reserves or conservancies and manage the sites according to federal and provincial legislation (ICE, 2018). The Duu Guusd protected area is managed by the Haida and the province of BC in much the same way. The Haida Nation and the province of BC use their respective lawmaking authorities to enact management plans and actions, and have agreements on land use and reconciliation (BC Parks, 2011).

2.5.3. IPCAs in Canada's Marine Environment

In the marine environment, Canada's experience with ICCAs is limited. No tribal parks have been documented in marine environments, and co-management of MPAs, with the exception of Gwaii Haanas, does not typically grant primary decision-making power to Indigenous communities. However, Canada is soon to establish its largest MPA (specifically, a national marine conservation area) in Lancaster Sound in Nunavut (Parks Canada, 2017). This MPA is being established in close coordination with the Qikiqtani Inuit Association (QIA), an organization that represents the local Indigenous communities (Parks Canada, 2017). Parks Canada and the QIA are negotiating an impact benefit agreement, and the QIA are seeking full management of the MPA (Cruickshank, 2017).

Other examples of Indigenous protection and conservation in a marine context include Indigenous fisheries closures. The Heiltsuk, Kitasoo/Xai'Xais, Nuxalk, and Wuikinuxv First Nations have recently imposed, under Indigenous law, commercial and recreational fishery closures at ten sites in their territories. The of Department of Fisheries and Oceans Canada chose not to recognize and legislate the closures, and so the Nations communicated the closures to commercial and recreational fishers and conducted patrols where they requested fishers to refrain from fishing in closed sites. Frid et al. (2016) found that, despite the lack of support from DFO, Indigenous law and communication between First Nations and the public effectively contributed to marine conservation and the recovery of depleted species. Once again, while these fishery closures don't formally establish a protected area, they are an example of Indigenous protection of waters, albeit short term, based on customary values and laws.

Chapter 3.

Case Study: The Gitga'at IPCA

3.1. Case Study Objectives

Through a case study of the marine protection efforts of the Gitga'at First Nation, this study examines whether, and if so, how the marine protection and conservation needs and priorities of BC Indigenous communities can be met through marine IPCAs. Specifically, this research aims to:

- Conduct interviews with Gitga'at community members to identify Gitga'at marine use and management values and management preferences.

- Use interview results along with the literature on IPCAs to design a draft management plan for a prospective marine IPCA in Gitga'at traditional territory.

- Using the Gitga'at experience as a case study, identify potential challenges and opportunities, and generate a set of recommendations for the Gitga'at and other Indigenous communities that are considering the establishment of marine IPCAs to meet their marine conservation goals.

3.2. Introduction to the Gitga'at First Nation

The Gitga'at First Nation are part of the Tsimshian cultural group, one of the largest First Nations peoples who occupy much of British Columbia's north coast (Marsden, 2012). The Gitga'at, meaning "People of the Cane", reside primarily in Prince Rupert or in Txałgiu, also known as Hartley Bay. Hartley Bay, located approximately 145 km southeast of Prince Rupert, is one of the most remote Indigenous communities in BC and is only accessible by floatplane or boat (Coast Funds, 2015; Gitga'at First Nation, 2011). The traditional territory of the Gitga'at, however, includes portions of the BC mainland, coastal islands, marine areas and many of the nearby channels, bays, inlets and rivers (Gitga'at First Nation, 2011). As a coastal nation, the Gitga'at rely heavily on the marine environment for their culture and livelihoods. The marine resources, including food and medicinal plants, are the physical materials from which the Gitga'at's culture and identity are formed and sustained (Satterfield et al., 2011). Key traditional marine

resources harvested by the Gitga'at include salmon, halibut, herring, cockles, clams, seaweed, geoduck, crabs, seals, ducks and several species of groundfish (Gitga'at First Nation, 2011). The harvesting, processing and consumption of these marine resources are at the heart of Gitga'at culture and are critical to the continuance and transmission of that culture (Satterfield et al., 2011). Also, many Gitga'at people depend on the sale of marine resources for their livelihoods. Therefore, Gitga'at culture and society depend on the health of the marine environment and the abundance of its natural resources.

3.2.1. Gitga'at Marine Protection and Conservation

The Gitga'at have undertaken multiple conservation planning activities throughout their territory and are actively engaged in ongoing planning initiatives. Recent Gitga'at land and marine use planning activities began in 2003 with the finalization of the Gitga'at Land Use Plan (LUP). In 2007 the Gitga'at began coordinated planning activities for the development of a marine use plan (MUP) for the marine portions of their traditional territory. The MUP covers 2,900 kilometers of shoreline and 8,400 square kilometers of ocean area (Gitga'at First Nation, 2011). The MUP describes the Gitga'at's marine vision:

> The health of the marine environment in Gitga'at Territory is maintained and where needed restored. Our people access, enjoy, use and manage our marine environment in ways that sustain our culture, society and economy. Marine resources and opportunities in our territory contribute to development of an environmentally sustainable economy that provides benefits to our people and other local communities. (Gitga'at First Nation, 2011)

The MUP also identifies marine use zones, and outlines core strategies to accomplish planned outcomes for their marine territory.

In 2011 the Gitga'at established the Gitga'at Guardians as part of their Gitga'at Guardian Watchmen Program (Coast Funds, 2015). The Guardians work to:

- Protect and conserve Gitga'at cultural and traditional properties and resources;

- Ensure sustainable management of the lands, waters and natural resources on Gitga'at territory;

- Gain greater access and control over the benefits that flow from the development and use of the lands, waters and natural resources on Gitga'at territory;

- Assist the Gitga'at community to develop and implement land and marine use stewardship plans;

- Conserve and sustainably manage land and marine cultural resources; and

- Respect and accommodate Gitga'at rights and title (Coastal First Nations, n.d.).

The Gitga'at Guardians are also involved in a number of resource monitoring and scientific studies that help to better understand and document changes in the environment and that inform conservation in the territory (Coast Funds, 2016). Research includes tracking the effects of vessel traffic and industrial development activities, and conducting various wildlife and fisheries surveys in Gitga'at territory.

PNCIMA, MaPP, NSB MPA Network, and Conservancy Planning

The Gitga'at participated in the Pacific North Coast Integrated Management Area (PNCIMA) process as well as the provincial Marine Planning Partnership (MaPP) for the North Pacific Coast and are currently engaged in the Northern Shelf Bioregion MPA Network Strategy. In 2009 integrated oceans management planning for the PNCIMA was undertaken through a collaborative agreement between the Government of Canada, the Province of BC, and various First Nations. The PNCIMA plan provides a high level ecosystem based management framework for the area but does not include the establishment of MPAs (Vandermoor, 2017). In 2011 the Marine Planning Partnership was formalized to complement and build on the PNCIMA plan. The MaPP set out to develop and implement plans for marine uses on BC's North Pacific Coast (MaPP, 2015). The partnership includes the province of BC and 18 First Nations, including the Gitga'at First Nation. The Gitga'at and other First Nations put forward several areas for protection during this process and several areas were designated as Protection Management Zones (PMZ) as a result (see Figure 3.1). PMZs are defined as "space primarily for conservation purposes or objectives, and may provide a basis for protecting localized conservation values" (MaPP, 2015). This designation affords the highest level of protection under the MaPP process; however, the designation does not equate to that of a federally designated MPA, as the management plans apply exclusively in areas under provincial jurisdiction. Plans have been completed for four sub-regions: the

Central Coast, Haida Gwaii, North Coast, and North Vancouver Island, and implementation agreements have been signed between the Province of BC and the participating First Nations that outline an agreement to co-lead implementation of the plans (MaPP, 2016). Gitga'at territory is encompassed in the North Coast Plan.

The federal government initiated a similar marine planning and protection process in 2012 called the Northern Shelf Bioregion MPA Network Strategy. This initiative is a collaborative effort between the federal government, the province of BC and 17 First Nations (Gitga'at included) to develop an MPA network in the Northern Shelf Bioregion as depicted in Figure 3.2 (MPA Network, 2017). The process is currently developing a set of conservation priorities for the network, including ecologically and/or culturally significant species or sites/areas. Priority areas will be informed by the PMZs identified through the MaPP process, subject to further consultation and evaluation.

In addition to Gitga'at's involvement in MPA planning processes, the Gitga'at are engaging in marine planning through the collaborative management of conservancies. The Gitga'at have worked with the Province of BC to establish several conservancies in their territory. Conservancies are a BC Parks designation that recognizes First Nation use and are collaboratively managed by the Province of BC and First Nations (Rutherford et al., 2015). Many of the conservancies collaboratively managed with the Gitga'at extend into foreshore marine environments.
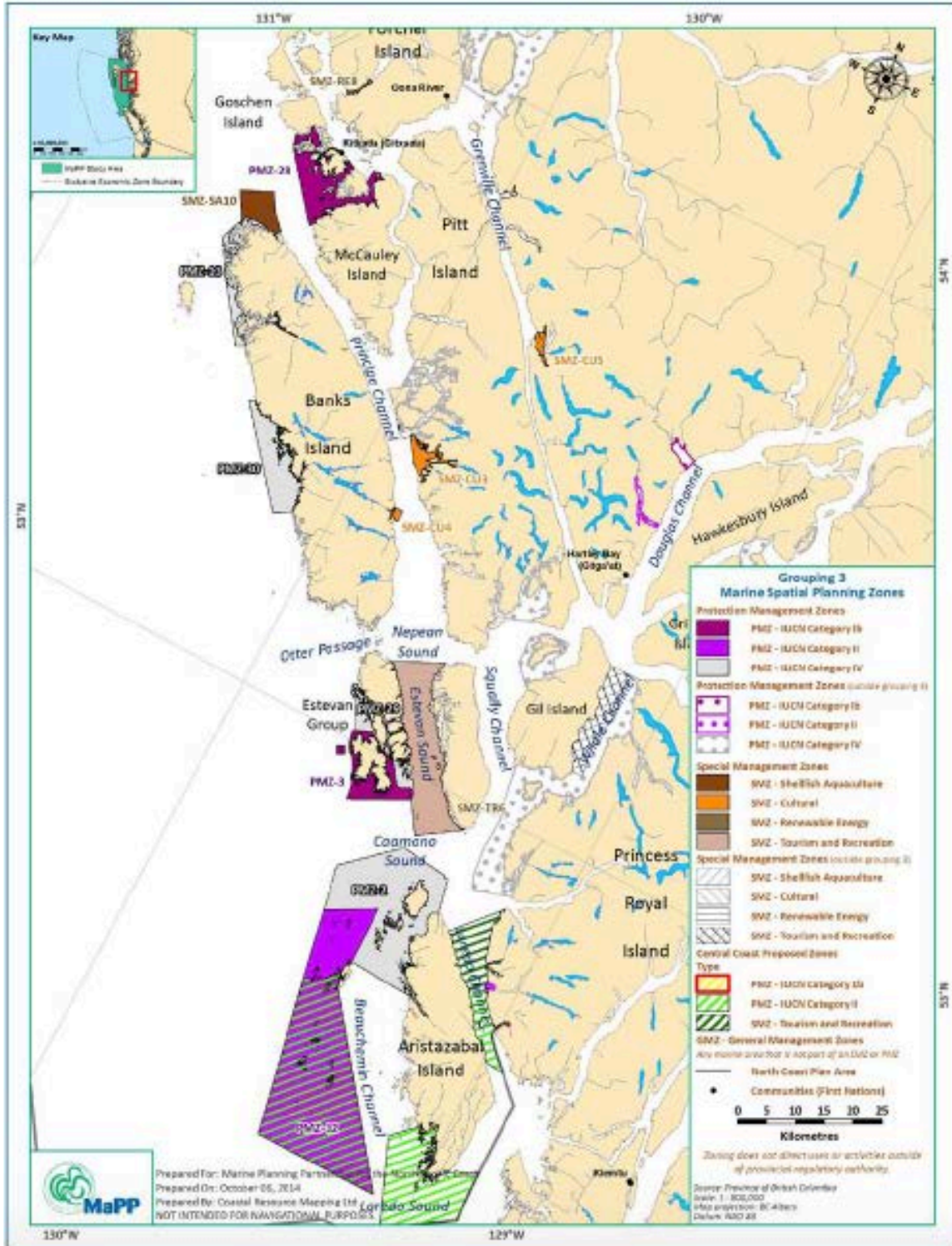
Figure 3.1. **Marine Planning Partnership for the North Pacific Coast, Group 3 Planning Zones (Source: MaPP, 2017). Map being used with permission from rights holder.**

Figure 3.2.   Northern Shelf Bioregion MPA Network Planning Area (Source: MPA Network, 2017). Map being used with permission from rights holder.

Gitga'at's Prospective Marine Indigenous Protected and Conserved Area

To advance the efforts to protect culturally and ecologically significant marine areas in Gitga'at traditional territory, the Gitga'at are moving forward with efforts to designate areas in their traditional territory as "protected" and are exploring various options available to them to do this. These efforts may fit within provincial and federal MPA processes or other existing protection efforts, or may result in the unilateral designation of a protected area by the Gitga'at. The Gitga'at are particularly interested in exploring IPCAs given the primary role of the Indigenous community in the decision making for these areas. The Gitga'at are exploring Indigenous-led protection of a priority and pilot marine area in their territory by producing a management plan for a prospective IPCA. The prospective IPCA is mainly marine but also includes terrestrial areas, given the Gitga'at's holistic view of the area of interest, and the environment more generally. The intent in preparing a management plan is to document how the Gitga'at value the area and envision its management, and to specify objectives and strategies that will guide Gitga'at actions, outreach, decisions about development proposals, negotiations with other governments in various processes, and potential Gitga'at investments and infrastructure developments.

IPC Planning Area

At the request of the Gitga'at, the identity and location of the specific area for which the Gitga'at are seeking protection and drafting a management plan are not disclosed in this report. Instead, this area is referred to as the "IPC Planning Area". This area is profoundly significant culturally and ecologically to the Gitga'at, and may be included or affected by other protection efforts, including the MaPP and NSB MPA Network processes.

The IPC Planning Area encompasses both terrestrial and marine components. Currently, terrestrial portions of the IPC Planning Area are under various levels of existing protection with partnerships and commitments existing between the Gitga'at and the province of BC for the management of these areas. Therefore, the focus of much of the Gitga'at's planning efforts for the IPC Planning Area is on the marine environment where there is more flexibility and potential management actions aren't limited by existing commitments. However, the intent in developing the management plan for the

IPC Planning Area is to take a holistic approach to management that includes both marine and terrestrial components, consistent with the Gitga'at's perception of the area.

3.3. Case Study Methods

The research methods for this study were developed in collaboration with Gitga'at First Nation staff. A community-based case study approach was selected, to encourage community member involvement and generate community interest in IPCAs through informal discussions and the creation of a draft management plan. The community-based case study approach also allowed for an enhanced understanding of the unique contextual challenges, opportunities and other nuances and complexities involved in Indigenous protection and conservation in a given setting.

3.3.1. Interview Components and Design

The objective of the interviews was to collect information that could inform a management plan for a prospective IPCA for the IPC Planning Area. Interview topics and themes were designed based on a review of publically available management plans for similar types of protected areas, and a review of internal Gitga'at documents related to the IPC Planning Area. Based on a review of management plans, information was initially organized into two broad categories: management framework and implementation. The management framework category includes information pertaining to management objectives and strategies, and the implementation category includes information pertaining to governance arrangements for implementation and enforcement of management rules. These categories were carried forward to organize interview topics and research results, and to structure the Gitga'at's management plan. The review of documents relating to the IPC Planning Area provided guidance on the types of current and potential activities and concerns that interview participants might have specific opinions about. The findings from this review were used to formulate interview topics and to guide conversations with Gitga'at community members during interviews.

Interviews were conducted as informal discussions that covered topics including historical use of the area, current and prospective threats or uses in the area, Gitga'at governance structures, and enforcement possibilities. Generally, questions encouraged participants to present their experiences with the IPC Planning Area, raise concerns with

current use and management, describe their vision or expectations, and suggest possible management actions and how those actions could be implemented, enforced and/or monitored.

3.3.2. Participant Selection

Interview participants were selected by Gitga'at staff as having important knowledge and experience of the IPC Planning Area, or were self-selected after attending a community meeting in which the proposed research was discussed (see section 3.3.4). According to Gitga'at staff, all interviewees were members of the Gitga'at First Nation. Participants included leaders, knowledge holders and decision makers, and included representation from women, elders, and members living in both Prince Rupert and Hartley Bay. Although the views of these individuals do not necessarily represent the full range of views, opinions, and knowledge of the broader Gitga'at community, this sample of community members was selected because of their particular knowledge of, experiences with, and interest in the IPC Planning Area.

3.3.3. Interview Administration and Data Collection

I conducted fourteen informal interviews with 21 Gitga'at First Nation members during the summer of 2017. All interviews were conducted in accordance with the ethics protocol approved by Simon Fraser University and the Gitga'at First Nation for this research project. Consent was obtained from each interview participant and a copy of the consent form is included in Appendix A. Interviews were carried out individually (11 interviews) or in small groups ranging between two and six people (three interviews). Interviews lasted between 45 minutes and 2 hours and took place in the Gitga'at First Nation Band office, at the participant's residence, or at another location depending on the participant's preference and availability. Six interviews (11 participants) were conducted in Prince Rupert, and the remaining eight interviews (10 participants) were conducted in Hartley Bay. A Gitga'at First Nation staff member, who is also a collaborator on this research project, was present at 11 of the interviews to provide Gitga'at marine planning context to participants, to aid in responding to participant questions and to facilitate communication. I audio recorded and transcribed 12 interviews, and I took hand written notes for the remaining two interviews that I later typed up electronically.

Interviews typically began by providing participants with an overview of Gitga'at marine planning efforts to date and information on the objectives of this research project. Some participants were already familiar with Gitga'at's marine planning processes (i.e. elected council members or Gitga'at staff) and did not need an overview prior to beginning the interview. I then engaged in informal interviews with participants that encouraged them to present their experiences with the IPC Planning Area, raise concerns with current use and management, describe their vision for the area, and suggest possible management actions and how those actions could be implemented, enforced and/or monitored. The discussion in each interview varied depending on the concerns and opinions of the participant, and discussions focused on those areas where the participant felt the most passionately. For example, some participants were passionate about describing their personal experiences with the area, while others focused on how they thought the area should be managed in the future.

3.3.4. Community Meetings

In addition to conducting interviews, Gitga'at staff and I hosted two community meetings to inform Gitga'at community members of the research project, solicit feedback and encourage members to participate more formally. Community meetings were advertised by Gitga'at staff through social media, internal radio and in the Gitga'at newsletter. Meetings were held in Prince Rupert and Hartley Bay and typically lasted an hour. No data were recorded or collected in these meetings for the purposes of this research; instead the community meetings were aimed at informing the broader community of ongoing marine planning efforts and encouraging formal participation through an interview.

3.3.5. Data Analysis

I transcribed audio-recorded interviews verbatim, and electronically typed up handwritten notes for those interviews without audio recordings. I analyzed interview transcripts to identify common responses and themes and important areas of difference. The interview design and general management plan structure were used to designate two broad categories as previously discussed: 1) management framework, and 2) implementation. Data were organized into each category and then further coded through iterative reviews of interview transcripts. Data from the first two categories were divided

into sub-categories. The sub-categories for management framework were management objectives and management strategies. Management strategies were further organized into four categories: recreational use, commercial use, environmental protection and cultural use. The sub-categories for implementation included governance and enforcement. I recorded qualitative descriptions of the interview participants' attitudes and opinions for each of these sub-categories.

3.3.6. Draft Management Plan for the IPC Planning Area

Based on interview responses and other supporting Gitga'at marine planning documents, I prepared a draft management plan for the IPC Planning Area for the Gitga'at First Nation. In addition, I prepared a supplemental report to accompany the management plan that details the methods used to complete the plan. The management plan is in a draft stage, and will require subsequent rounds of community engagement and review by Gitga'at leadership before it is finalized and possibly approved by the Gitga'at. Therefore, the management plan is confidential at this time and is not included in this report. A high level summary of the management plan, however, is provided in Appendix B. I also use some selected examples from the draft management plan to illustrate the case study results discussed below.

3.3.7. Limitations of Research

A number of limitations to my research exist, including:

- The small proportion of Gitga'at members interviewed may result in some opinions not being captured, and may limit the generalizability of the research results to the community level.

- Despite providing interviewees with an overview of relevant Gitga'at conservation planning processes, interviewees' knowledge and understanding of these processes varied, which may have influenced their responses. Moreover, the lack of clarity surrounding some aspects about IPCAs (e.g. political uncertainty) limited the information I could provide to interviewees about the research project and its implications.

- I am an outside researcher and new to the Gitga'at First Nation. My presence may have influenced interviewee behaviour and responses. Despite the presence of a Gitga'at staff member, interviewees may have been uncomfortable or hesitant in sharing their opinions with me. Similarly, the presence of a Gitga'at staff member may also have influenced interviewee behaviour and responses.

- Research based on a single case study, such as this, and in recognition that each Indigenous community is unique and faces their own set of distinct circumstances, is limited in its ability to generalize results to situations outside the specific research case. However, the Gitga'at case study presented in this research provides insight into the IPCA planning process for Indigenous communities and may be beneficial for those communities who are able to draw similarities.

3.4. Case Study Results

Results from this research are derived from participant interviews, and supported by Gitga'at marine and land planning documentation, including the Gitga'at First Nation Marine Use and Land Use Plans. I used the results to inform a draft management plan for the IPC Planning Area, and to develop a set of recommendations for the Gitga'at and other Indigenous communities interested in pursuing marine IPCAs. Results include both marine and terrestrial portions of the IPC Planning Area; however, as previously noted, the Gitga'at retain most flexibility in management over the marine components. Nonetheless, to support holistic ecosystem scale management consistent with Gitga'at views, terrestrial and marine components were incorporated into the plan and are discussed in the results below.

3.4.1. Management Framework

Management Objectives

Interview responses were used to guide the development of a vision and objectives for the IPCA. The vision and management objectives were derived from other Gitga'at planning documents and from respondents' descriptions of their vision and objectives for the IPC Planning Area, including desired use and management. The vision and objectives also took into account respondents' expressed concerns about current use and management. Generally respondents indicated that they wanted to maintain Gitga'at cultural use of the area, restore and preserve the area's ecological abundance, and limit or control recreational and commercial use by non-Gitga'at individuals. I translated these results into a vision for the area and, subsequently, into three overarching objectives as shown in

Table 3.1. The vision and objectives derived from this research for the IPC Planning Area are consistent with the general vision described in the Gitga'at's Marine Use Plan (see section 3.2.1).

Table 3.1.   IPCA Planning Area Management Draft Vision and Objectives

Vision	Objective
We maintain and use [IPC Planning Area] resources and the area continues to be fundamental to our economy and way of life. The community regularly visits [IPC Planning Area] for the harvesting of traditional foods, and other social, ceremonial and cultural activities, contributing to its protection and conservation.	Maintain and increase Gitga′at traditional use of the area.
[IPC Planning Area]'s beauty and abundance are sustained and regenerated. Fish and wildlife populations are healthy and continue to reside in their natural habitat. Both the terrestrial and marine environments of [IPC Planning Area] support a wide variety of species and ecosystems are thriving.	Ensure protection and restoration of local environment.
Recreational users visit [IPC Planning Area] with Gitga′at consent. Recreational activities cause no harm to the ecosystem nor do they impede Gitga′at traditional activities. Non-recreational uses of natural resources are limited and are consistent with the Gitga′at First Nations cultural use of resources, recreational values, and natural values.	Manage recreation and natural resource use and development in the area in a way that is consistent with Gitga′at values and supports Gitga′at economic viability and sovereignty.

Management Strategies

Management strategies were informed by management objectives and respondents' concerns and attitudes towards current and prospective uses and activities in the IPC Planning Area. Management strategies were organized into four categories: cultural use, recreational use, non-recreational/commercial use, and environmental protection. Recreational use includes non-guided leisure activities and non-recreational/commercial use includes for-profit activities, including tourism and guided operations. Appendix C shows the number of participants who supported or opposed various options for cultural use, recreational use, commercial use and environmental protection.

Table 3.2 lists the concerns raised by participants for each of the above categories, some of which are discussed below. Table 3.3 summarizes interview participants' management values and preferences for the IPCA Planning Area for the various categories of activities. I discuss each of these categories and for each one provide an example of a draft objective and strategy used in the management plan.

Recreational use

Respondents were asked what recreational activities occur in the IPC Planning Area, if and why any of these activities are of concern, and how they would like these activities to be managed in the future.

The area's natural beauty and abundance attracts many recreational users engaging in activities such as wildlife viewing, recreational boating, fishing, hunting and camping. According to respondents, sport fishermen comprise one of the largest groups of recreational users. Sport fishermen fish primarily for salmon and crabs. Respondents noted that on several occasions, the community has witnessed illegal crabbing activity in the area that has impeded Gitga'at use, and has contributed to depleted stocks:

> You do get poachers. Every few years (they) will go in there and set a string of commercial gear and clean it out and we definitely notice when that happens, 'cause it's harder for our guys and all the big ones are gone (referring to crabs) - Kyle Clifton

All respondents said that they did not support uncontrolled recreational fishing by non-Gitga'at users in the IPC Planning Area. Respondents noticed that recreational fishing often impedes on Gitga'at use and may be contributing to depleted stocks of important Gitga'at fish. Those who were not explicitly against recreational fishing (10/20 respondents) conditioned their response to include some measure of control or monitoring. For example, four respondents noted that sport fishing by non-Gitga'at users could be permitted if annual stock assessments indicated that the numbers were healthy enough to support some level of recreational fishing activity.

According to respondents, powerboats are commonly use by recreationists in the IPC Planning Area to fish or for recreational boating purposes. Respondents raised concerns about power boaters, including the disturbance to sediment in the estuarine portions of the IPC Planning Area and therefore to salmon spawning areas, and the safety of boaters who are unfamiliar with the area. For example, respondents observed

that the area can experience severe weather and quickly changing conditions which can be dangerous for users who do not know the area well. Respondents also noted that powerboats can be a nuisance to Gitga'at users who come to enjoy the area in peace. Almost all respondents who referred to the issue (7/8 respondents) wanted to discourage power boaters in the area, or to have the use of powerboats controlled or monitored by introducing speed and size limits.

In the terrestrial portions of the IPC Planning Area, hunting for bears, deer and waterfowl by both Gitga'at and non-Gitga'at users is a common activity with several guided operations using the area. All respondents were against hunting in the IPC Planning Area, with the exception of hunting by Gitga'at hunters for community food purposes. Respondents cited concerns over incidents where they had witnessed illegal poachers, suspicious activity related to guided hunting operations and users disrespectfully discarding animal carcasses. One respondent expressed concerns over the safety of hunters, including Gitga'at hunters, and suggested the development and enforcement of safety protocols for the use of firearms. Other respondents mentioned that hunting in the area could make it unsafe for Gitga'at use, especially for children and Elders, if there are people hunting and using firearms nearby.

Example objective and strategy in draft management plan:

Objective: Minimize recreational use of the protected area.

Strategy: Enforce a Gitga'at traditional use period during which non-Gitga'at users are discouraged from entering the protected area. Work to ensure provincial and national government agencies are informed of Gitga'at traditional use periods when necessary.

Non-recreational and Commercial use

> We're looking after it because of what it is and what it means to our people. Other people are using it only to make money from it so there's going to be a divide there and people are not going to see eye to eye– Cameron Hill

Respondents were asked to discuss their opinions about various commercial activities that occur in the area and how they would like to see these activities managed in the future.

The area's beauty and abundance make it attractive for commercial use, especially for resource extraction industries and eco-tourism operations. There are guided wildlife viewing and hunting operations in the area, including wildlife viewing operations led by Gitga'at guides. Respondents expressed concerns about the disrespectful use of the area if tourists are allowed to enter without permission and noted instances of theft and littering that have occurred in the past. All respondents were open to continued eco-tourism activities if they were controlled or supervised; for example, by Gitga'at issued permits. Notably, there was a difference in opinion among respondents between merely allowing eco-tourism and actively encouraging it. The majority of community members (17/21 respondents) expressed their support to encourage ecotourism through a Gitga'at run tourism lodge or ecotourism operation that could provide employment opportunities and income to the community. The remaining respondents expressed no opinion regarding a Gitga'at run tourism operation or voiced their disapproval of the idea. One participant was particularly concerned that an increase in use of the area by tourists could prevent increased use by the Gitga'at for cultural purposes, and may introduce increased competition over resources.

Apart from guided eco-tourism operations, there are currently no other regularly active permitted commercial uses in the area. Previous and potential commercial activity includes logging, commercial fishing and shipping. In the early 1980's much of the terrestrial portion of the IPC Planning Area was heavily logged, and as of 2012 the log handling tenure was still active (although no logging has occurred since the 1980's) (BC MCA, 2012). Respondents noted that the deforested area is slowly growing back and pioneer species such as alders are growing over old logging roads. Respondents noted impacts from the previous logging activity both on land and in the water. For example, some respondents explained that they have seen cables and other logging materials left in the area, and woody debris buried in the sediment from the log dumps. All respondents were against any additional logging in the area.

The area is closed to commercial crabbing but open to other commercial fishing operations, such as for herring. Respondents noted, however, that it is uncommon for

commercial fleets to fish in the IPC Planning Area. Nonetheless, all respondents were against commercial fishing. The reasons included that that the stocks are not healthy enough to support that level of harvesting and that commercial fishing operations impede Gitga'at use.

Several development projects are currently proposed in nearby areas that have the potential to significantly increase shipping traffic passing through or by the IPC Planning Area and bring more recreational users to the area. These projects include the Pacific Future Energy Refinery proposed in between Kitimat and Terrace (Pacific Future Energy, 2016), the Kitimat Clean oil refinery proposed for Kitimat (Hatch, 2016), and the LNG Canada Export Terminal project proposed for Kitimat (Stantec, 2013). There are also numerous development projects proposed in or adjacent to Prince Rupert. Respondents expressed concerns about the increased risk of oil spills and their potential impacts to the marine environment, the accelerated erosion of the shorelines, and the danger posed by the large wakes of passing ships to Gitga'at and non-Gitga'at users. Some respondents (3 respondents) felt that there is not much that can be done to stop shipping from occurring, but that there are measures that can be used to mitigate the impacts. Suggested measures included monitoring, introducing speed and wake limits, implementing no-anchorage for vessels, and having spill response equipment available nearby.

Example objective and strategy in draft management plan:

Objective: Discourage natural resource use that is inconsistent with Gitga'at values.

Strategy: Establish no-go zones for commercial fishing, sport fishing, hunting, mining and forestry.

Cultural use

> Nowadays I use it, I have my own boat and everything, so I actually go in here (referring to the IPC Planning Area) to harvest the salmon, I go in here to hunt moose - George Fisher

> You can't describe the feeling that you get just going back to a place like that where I know that my ancestors before me, my family before me all stepped and harvested and did things on that same ground that

I inevitably am going to get my kids to be apart of. So it's a very special place – Cameron Hill

Respondents were asked to discuss what activities they pursued when visiting the IPC Planning Area, what limits them from currently undertaking these activities, and what activities they desire to undertake. Respondents described that the Gitga'at visit the area to hunt, fish and gather plants and animals for sustenance. The area is important for sustenance hunting of moose, deer and duck, food fishing for coho salmon and crab, and picking berries for making jams and jellies. The area provides an abundance of traditional food that is often distributed among elders or shared with the entire community at feasts and the harvesting and consumption of which is critical to the maintenance and transmission of Gitga'at culture. Several community members have houses in the IPC Planning Area that they and other community members use when participating in food, social or ceremonial activities.

All respondents expressed a desire to see greater Gitga'at presence in and use of the IPC Planning Area. Specifically, respondents wanted to see more community traditions and ceremonies, more harvesting of traditional foods and resources, and more participation of elders and youth in these activities. Respondents cited lack of interest, proper infrastructure, time and access as the largest barriers to pursuing these desired activities. For example, several respondents (19/21 respondents) noted the need for more or restored infrastructure to support cultural use of the IPC Planning Area. Suggestions for improved infrastructure included re-building some of the existing houses and maintaining a series of trails to enable easier access to and around the area. Other suggestions included scheduling trips to the area escorted by the Gitga'at Guardians, and rebuilding traditional infrastructure like fish traps and smokehouses to encourage traditional activities.

When asked about community use in the IPC Planning Area, all respondents mentioned the need to engage younger generations. Respondents wanted to see the youth in the community participating in cultural activities and learning traditional practices and about their culture. Respondents expressed concerns that there was a lack of interest among the youth to visit the area and learn about its history and what types of activities can be and have been done there. The most common suggestions (17/21 respondents) to encourage youth participation were to incorporate field trips to

the area into the school curriculum and to implement a student internship program.

> Example objective and strategy in draft management plan:
>
> Objective: Provide for and promote increased community traditional and sustenance uses and harvesting activities in the area.
>
> Strategy: Create and maintain infrastructure for Gitga'at use including building new and renovating existing cabins, and maintaining a series of trails.

Environmental protection

Many respondents discussed what kinds of environmental protection activities they would support or encourage, including activities related to restoration and environmental monitoring. As previously discussed, most respondents supported limited extractive activities in the IPC Planning Area including no commercial fishing, limited to no sport fishing, and no forestry.

Currently, the Gitga'at Guardians conduct monitoring activities in the IPC Planning Area. Monitoring activities include conducting stream walks to monitor salmon stocks as well as to oversee any hunting and fishing activity that may be taking place by non-Gitga'at users. Previously, the Guardians typically spent a week in the fall monitoring in the IPC Planning Area, however, in recent years the Guardians have increased their presence to monitor the area more regularly from spring to fall. All respondents supported continued monitoring in the area by the Guardians, noting the importance of monitoring several species that are new to the area that have been observed recently, as well as the species whose numbers are depleted. One respondent noted the importance of Gitga'at harvesting in the area to maintain healthy populations:

> The more you harvested them the healthier they were (referring to crab apple orchards) (...) and there's this human nature relationship - that human placement there actually made that land healthier in some areas. Certain plants, certain animals, just like fish- if you're not harvesting the fish, they're going to over spawn and it'll kill them out eventually. So we need to harvest – Spencer Greening

In addition to environmental protection, all respondents noted the importance of protecting the cultural resources in the area. There are several unique areas that contain cultural and archaeological resources that respondents said are deteriorating as a result of non-Gitga'at use of the area. Respondents suggested documenting and keeping an inventory of these areas, and monitoring them closely to ensure that they do not further deteriorate.

Table 3.2.   Gitga'at IPC Planning Area Management Concerns

Recreational Use
Safety of Gitga′at and non-Gitga′at users
Disrespectful use of the area by non-Gitga′at users
Illegal harvesting of resources (crabs and bears)
Competition for resources between Gitga′at and non-Gitga′at users
Powerful recreational lobby groups
Depleted stocks as a result of overharvesting
Risk of forest fires as a result of irresponsible activities
Disturbance to sediment and fish habitat from power boats
Drinking and partying is part of many recreational cultures
Use of Gitga′at resources by other Indigenous communities
Damage to cultural sites and theft of cultural and archeological resources

Non-recreational and Commercial Use
Illegal harvesting of resources
Risk of oil spills, damage to shorelines from wakes, and damage to seabed from anchoring from increased shipping activity
Improper decommissioning and damage from previous commercial logging
Gitga′at taking on environmental risk from government and/or industry actions

Cultural Use
Similar traditional foods that can be harvested in the area are more easily accessible elsewhere
Safety concerns over lack of familiarity with the area, and changing weather conditions
If the Gitga′at aren′t accessing the area regularly, then they don′t know what activities occur there
Need to pass down knowledge to the youth and get them involved
Need to sustainably harvest resources to maintain healthy populations
Disrespectful use by community members
Lack of proper infrastructure to support long term visits (existing infrastructure is run down and in need of repairs)
People are busy and do not have the time to go, or have no means to get there

Environmental Protection
Declining number of species for harvest including salmon and berries
Introduction of new species as a result of habitat destruction in surrounding areas

Table 3.3.   Gitga'at Protected Area Management Values and Opinions for the IPC Planning Area

Activity or use	Values and Opinions
Environmental Protection	
Monitoring & Restoration	Conduct annual resource monitoring, especially for new and at risk species (such as salmon, bears, crab apple trees, and moose) Make sure deforested area is replanted properly, and restore damage from logging operations Monitor impacts of climate change
Recreational Use	
Recreational/sport fishing	Close the area completely to sport fishing, except for Gitga'at use Restrict the area completely until Gitga'at can properly monitor fishing activity Conduct annual stock assessments and use data to inform decisions around sport fishing Allow controlled sport fishing (i.e. set and enforce limits per boat, limit the number of boats entering through permits) Allow sport fishing but priority is given to Gitga'at food fishing
Power boats	Place restrictions on size and power, and as to where and when they can be used No power boats permitted, except by Gitga'at Allowed with Gitga'at permission
Tourism	Allowed but controlled/with Gitga'at permission Permitted if it doesn't conflict with Gitga'at harvesting season and use Supported Gitga'at ecotourism operation with possible Gitga'at tourism lodge that could provide jobs and a source income to the community May contribute to healthy harvesting of resources if appropriately managed Area is too dangerous to support tourism, and puts too much liability on the Gitga'at
Commercial Use	
Commercial fishing	No commercial fishing Only designated licenses for Gitga'at commercial fishers if populations are healthy enough
Shipping	Have minimum wake zones and speed limits for passing ships Charge the ships for passage Have spill response equipment ready to deploy Discourage any projects that would increase the number of ships Have passing ships call ahead to let Gitga'at people know that they are coming Install breakwaters Monitor the impacts of the ships and act accordingly

Activity or use	Values and Opinions
Forestry	No forestry
	Reclaim previously forested areas
	Only culturally modified removal of trees for Gitgaʼat use
Hunting	No sport hunting, except by Gitgaʼat hunters
	Need safety regulations for all hunters, Gitgaʼat included
Cultural Use	
Gitgaʼat use	More infrastructure needed to support greater community use
	Build a facility for the students to use/for educational purposes and incorporate the area into the school curriculum
	Encourage more community use, like food fishing and a fall harvest, traditions and ceremonies
	Extend cultural time off for Gitgaʼat employees
	Record the history of the area with the elders
	Organize escorted trips for community and elders
	Prevent disrespectful use of the area (like partying and drinking)
	Re-build traditional infrastructure like fish traps and smokehouses

3.4.2. Implementation

Governance and Decision Making

In response to questions about how they would like to see the IPCA Planning area governed, all respondents discussed who they think should be making decisions about the IPC Planning Area and how those decisions should be made. Governance proved to be the topic with the widest diversity of answers among respondents. There were four main governing or decision-making bodies identified by respondents: hereditary chiefs, elected chief and council, elders, and the community as a whole. The most common suggestion (8/19 respondents), however, was that some sort of an area management committee with representation from each of the above decision makers should govern the IPC Planning Area.

The following were suggestions for the composition of such a management committee for the IPCA:

- Include members from the community at large (especially those who have spent a lot of time in the IPC Planning Area historically and recently), hereditary chiefs, elected Chief and council, and Gitgaʼat harvesters and elders to represent community diversity, knowledge and tradition.

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- Include a special role for or recognition of the hereditary chief of the IPC Planning Area in the management committee.

- Set up a smaller or sub-management committee that would report to the hereditary chiefs for final decisions. Chief and council would carry the information and decisions forward to other governments and the Gitga'at Land and Marine Services Department would carry out the management decisions.

Hereditary chiefs are part of the traditional governance system for Gitga'at territory. Traditionally, all of Gitga'at territory was sub-delegated to one of four clans, over which the hereditary chief of that clan held primary responsibility (Satterfield et al., 2011). Respondents who wanted to see a role for hereditary chiefs in the decision making of the IPC Planning Area (7/19 respondents) spoke to the role that these individuals have traditionally played in the management of the area, and their knowledge of the area:

> Our chiefs and our stories, our [Sm'oogyit], our [Sm'oogyit] all of our truth tellings are held within our chieftainship. Our chiefs have been brought up differently than the rest of us. They've been brought up to look after what we have around us. What better people to be making a decision? – Cameron Hill

Some participants (3/19 respondents) noted that governance should balance the traditional role of the hereditary chief with the broader community's desire to engage in decision-making. These respondents noted that decision-making should be shared with others in the community, including elders. Some respondents (5/19 respondents) wanted to have elders as decision makers because of their wealth of knowledge about the area from having spent a lot of time there growing up.

Some participants (2/19 respondents) discussed the role that they thought the elected Chief and Council should play in the governance of the IPC Planning Area. Specifically, they noted the power that these elected individuals hold outside the Nation and in communicating with other governments. While no participant thought that Chief and Council should be making decisions exclusively, some thought it was important to include them in decisions so that they could communicate these decisions to other governing bodies.

Participants noted other important considerations for decision making about the IPC Planning Area, including:

- Ensure representation from each clan in the governance structure, where a clan representative is responsible for reporting back to their clan members about decisions.

- Include younger generations in the management of the area so as to "pass the torch" and ignite a sense of ownership and involvement in the protection of the territory.

- All decision makers should be knowledgeable about the area.

Despite the diversity in opinions regarding decision making of the IPC Planning area, many respondents expressed their desire for transparency in a governance system. At this stage, no particular governance structure has been recommended in the management plan for the IPC Planning Area. Instead, several options have been outlined and will likely be presented back to the community and leadership for further discussion.

Gitga'at has completed important work for the governance of their territory that will set the context for IPC Area Governance. In 2017, the Gitga'at hereditary chiefs and elected council signed the Gitga'at Oceans and Lands Protocol which sets out provisions for the cooperative governance and management of Gitga'at lands, oceans and resources. They also established the Gitga'at Oceans and Lands Department, which includes a Gitga'at Leadership council. The Gitga'at Leadership Council is a council with representation from both hereditary leadership and elected council leadership. This council is responsible for establishing mandates, strategic goals and working objectives for oceans and lands program activities; providing ongoing direction and political support to oceans, lands and resources program activities; and making final decision on oceans and lands agreements, plans, policies and use permits.

Enforcement

> The part that gets me mad is how I look at it being disrespected by outside sources. (...) We've been very vigilant in trying to keep an eye on it as best we can – Cameron Hill

Respondents were asked to discuss how they thought the various management strategies and rules could be executed and how those strategies and rules could be enforced for Gitga'at and non-Gitga'at users. Most commonly, respondents mentioned

the Gitga'at Guardians as key players in enforcement activities given their previous experience and training (17/21 respondents). The Guardians already participate in enforcement activities by patrolling the territory, and have received various forms of training to help them effectively do this, such as training on how to safely and effectively approach and communicate with operators of vessels of concern. Respondents noted that the Guardians should have a more substantial presence in the IPC Planning Area, and should be stationed there throughout the year, or at least during peak seasons.

Some respondents suggested that enforcement should also be the responsibility of the Gitga'at community at large. They said that increased presence in the area simply through increased Gitga'at use would discourage other users from inappropriately using the area. One participant noted that physical presence in the area might not be needed at all times, but instead Gitga'at presence could be communicated to other users by installing signage and securing warning tags to suspected illegal or non-compliant activities (such as crab pots).

Enforcement strategies suggested by respondents included:

- Conducting daily patrols to monitor and track user activity.

- Tagging illegal activity with Gitga'at Lands and Marine Resource cards.

- Approaching vessels and people of concern and advising them of the objectives of the IPCA.

- Maintaining a permanent presence in the area during peak usage periods.

- Installing appropriate signage around the protected area that communicates appropriate use and prohibited activities.

- Working with federal representatives (e.g., Canadian Coastguard) to delegate authority to issue fines and permits within the IPCA.

Several respondents (12/21 respondents) noted the need for additional infrastructure to support effective enforcement for the area. Suggested infrastructure included a viewing tower to oversee activity in the area, ATV trails for easy travel throughout the area, and additional cabins for overnight or extended use.

Some of the discussions concerning enforcement brought up issues related to jurisdiction and the community's ability to enforce management strategies (6/21 respondents):

> Where does our jurisdiction stop? Where does our authority end? And we've had boats question our (referring to the Gitga'at Guardians') authority and just push us off because we don't have that authority. So I would like to see our Guardian program gain more authority and rights – George Fisher

These uncertainties prompted discussions relating to the role of the federal government and the possibility for partnerships to aid in enforcement activities:

> But with the partnership with Canada they can have that Parks guide working and then the Guardians enforcing it. Like the parks guy can phone them up, and 'can you check this out?' – Henry Clifton

The draft management plan lays out enforcement strategies for the IPC Planning Area, including the role of the Gitga'at Guardians and the community in general. This area of the plan may evolve as decisions are made with regard to potential shared governance structures and agreements with other governments.

3.5. Discussion

3.5.1. Future Directions for the Gitga'at

With a draft management plan for a prospective IPCA complete, there are many options open to the Gitga'at if they decide to realize the area as an IPCA. Given the other marine planning efforts of the federal government in the area, there is an opportunity for the Gitga'at to pursue a shared governance arrangement with the federal government through a co-management or form of partnership agreement. Alternatively, the Gitga'at may also choose to pursue unilateral establishment of the IPCA, and move forward with an internal declaration without support from the Canadian or BC governments. Nevertheless, the draft management plan and information collected from community members as part of this research project can be used as a tool in discussions and negotiations with other governments, and to guide Gitga'at actions and investments.

3.5.2. Application to Other Indigenous Communities in Canada

The context of the Gitga'at's conservation planning has strongly influenced the draft management plan for the IPC Planning Area and other Gitga'at marine planning efforts, and will ultimately influence the design of any Gitga'at IPCA. This unique context

includes the ongoing and previous marine and terrestrial planning and conservation initiatives in the area, the previous planning work the Gitga'at have completed themselves, the presence of real and perceived future threats to the area, and the specific characteristics of the Gitga'at people and community. The Gitga'at are an isolated community with tight ties to their culture and their traditional land and waters. Other Indigenous communities interested in pursuing marine IPCAs will need to navigate their own sets of unique circumstances, as the Gitga'at have, in their efforts to pursue marine IPCAs. Nevertheless, the marine conservation and management values and opinions expressed by the Gitga'at are similar to those identified in other studies of Indigenous marine priorities, suggesting that the results and lessons from this research are relevant beyond the Gitga'at First Nation (Ban et al., 2008; CPAWS, 2009; Lepofsky & Caldwell, 2013). For example, Indigenous communities in Canada typically have both cultural and ecological goals for marine conservation, including the assertion of Aboriginal rights and title and the recovery of depleted species (Ban & Frid, 2018). Furthermore, the Gitga'at's management plan encompasses both marine and terrestrial aspects, and therefore results may also be applicable beyond marine IPCAs and may also apply to terrestrial IPCAs. In the next section I discuss specific challenges for marine IPCAs that I identified from this case study and my literature review, and I make recommendations for addressing these challenges, again based on the case study and literature.

3.5.3. Challenges and Recommendations for Marine IPCAs

While the ultimate outcome of the Gitga'at's IPCA has not yet been determined, the Gitga'at have experienced challenges and successes as they have pursued marine conservation and developed a draft management plan that can be used to inform the actions of other Indigenous communities interested in pursuing marine IPCAs. Each Indigenous community will face distinct conditions when approaching community-led marine conservation, but the following discussion may help to inform and guide those communities encountering issues and complexities similar to those of the Gitga'at case. Many of the challenges commonly identified in the literature were also experienced in this case study and are reiterated and discussed here. Four main types of challenges are discussed: 1) Challenges with regards to governance, both internally and externally;

2) Managing expectations within the community; 3) Working within modern and traditional institutions; and 4) The novelty and lack of information available about IPCAs.

Challenges were identified during the interviews and throughout the development of the draft management plan. The challenges discussed were what I identified, for example, to be areas of uncertainty or disagreement in the interviews, persistent obstacles or delays to the research and draft management plan, or questions that required special attention to answer. Challenges are paired with recommendations identified in the literature or that have appeared to be successful in the Gitga'at case study. A summary of challenges and recommendations for the development of marine IPCAs is presented in Table 3.4.

Challenge #1: Finding the Right Governance Regime

Challenges with governance exist both externally with other governments, and internally within the community. Externally, issues of governance are closely interlinked with issues of jurisdiction. Some Indigenous communities in Canada have unilaterally declared terrestrial IPCAs in areas where they claim Aboriginal title (for example, some tribal parks in BC). While Canada has laws that may support the establishment of IPCAs (see section 1.2.3.1), IPCAs are not formally recognized in any Canadian legislation. This political context leaves questions as to who has the authority over these areas and under whose jurisdiction these areas lie. These matters are even more complex in marine environments given the added uncertainties about Aboriginal title in these areas since there is no explicit legal precedent in Canada recognizing Aboriginal title (such as with the *Tsilhqot'in v. British Columbia* case for terrestrial environments). Further, proving Aboriginal title in marine areas may be difficult given the difficulties in proving exclusive occupation in marine environments, and considerations such as whether Aboriginal title rights includes the possession, occupation, use and enjoyment of the land and waters to the exclusion of others (Quig, 2004). Another difficulty on the Pacific coast is that the exact location of the marine boundary of the province of BC has not been resolved for some regions. On the other hand, there are likely fewer issues related to private property rights and ownership in the marine environment than there are in terrestrial settings (Ng'ang'a et al., 2004). The uncertainties concerning jurisdiction and authority can make it difficult for coastal Indigenous communities who claim title over

marine territories to effectively govern these areas, either independently or as part of a shared governance arrangement.

From an Indigenous perspective, having primary decision making authority and responsibility may be the best way to see an area protected according to their values given that Indigenous communities tend to have higher standards of conservation than many other governments (Bhattacharyya & Whittaker, 2016). However, primary or exclusive responsibility and authority may also result in capacity issues in that an Indigenous community may not have the resources to fully enforce and implement conservation strategies, and the responsibility may pose a legal risk that a community may not be willing to take on (Krindle, 2014). Partnerships with other government agencies, if possible, may increase credibility with some stakeholders, help with the enforcement of management strategies, and alleviate legal risk.

The Gitga'at First Nation experienced challenges and trade-offs with governance and jurisdiction. The conservation objectives of the Gitga'at are described in the draft management plan, and if the plan is approved the Gitga'at must decide on the best governance structure to realize these objectives taking into consideration the various trade-offs (see section 3.5.1). For example, the regional conservation context in which the Gitga'at are operating makes a shared governance arrangement a strong possibility, but also presents challenges to a Gitga'at IPCA. The other marine conservation efforts of the federal government (e.g., the MPA Network Strategy for the NSB, and Canada Target 1) offer an existing platform for the Gitga'at to negotiate within, and may provide an opportunity to bring the Gitga'at's objectives into a larger marine conservation initiative. Alternatively, these external conservation efforts may pose challenges to the effectiveness of a Gitga'at IPCA. For example, the Gitga'at are considering the establishment of a specific marine IPCA while there are ongoing discussions about an MPA Network in the area. The independent establishment of a marine IPCA by the Gitga'at could conflict with the MPA Network processes by introducing additional protections and prohibitions that some stakeholders may disagree with and that may result in backlash from these stakeholders.

Ultimately, each Indigenous community must decide on the appropriate external governance structure for their community given their unique circumstances and the regional context in which they are operating. Helpful questions to consider include:

- What is the primary goal of the IPCA (i.e. declaration of sovereignty, conservation, other)?

- What other conservation efforts are taking place in the area? Can the Indigenous community work collaboratively with these initiatives? Or does the Indigenous community wish to enforce a different standard of protection?

Whether pursuing shared governance of an IPCA or not, an Indigenous community must also determine how decisions on behalf of their community will be made internally concerning the IPCA. These internal governance structures, which may also be the ultimate governance structure of the IPCA, can be challenging but are important for the establishment of an IPCA (Plotkin, 2018). In the case study with the Gitga'at First Nation, governance was the interview topic that had the most diverse range of answers among respondents. However, there was wide support among respondents for a transparent governance structure that engages the community. While internal governance was a contentious topic among participants, it is also one of the most important parts of an IPCA management plan. A governance structure facilitates effective decision-making, and adds credibility to the plan for external organizations and governments. For example, the IUCN has suggested that for an area to be recognized as a protected area, it should have some kind of management body in place (Borrini-Feyerabend et al., 2004).

The literature suggests that effective community-based governance systems are accountable for their commitments, are transparent in decision-making, and provide opportunities for community engagement (Gaymer et al., 2014; Katikiro et al., 2015b; Martin et al., 2011; Plotkin, 2018; Vaughan & Caldwell, 2015). Accountability ensures that commitments are honoured so that social capital is maintained and the work of the community is not undermined (Gaymer et al., 2014; Katikiro et al., 2015b). Transparency ensures that the community is kept well informed of management decisions and allows the community to set realistic expectations with regards to the timeliness of outputs and as to who has authority over decision-making (Vaughan & Caldwell, 2015). Many Gitga'at respondents emphasized the importance of transparency in decision-making. The case study with the Gitga'at further indicates that their preferred governance structure should reflect the diversity in the community, as respondents noted the importance of various potential decision making bodies including hereditary chiefs, elders, and elected chief and council. The Gitga'at's GOLD institutions provide a basis for reflecting diversity in the community as they incorporate different decision-making

bodies into the structure. IPCAs in Canada that have established internal governance structures can provide examples to the Gitga'at. For instance, the Poplar River First Nation incorporated a community decision-making framework into the governance structure in their management plan for the Asatiwisipe Aki Protected Area. The framework outlines the role of each of the identified management bodies, represents the diversity of the community, outlines how engagement with the community is to be undertaken and demonstrates the accountability of the various parties (Poplar River First Nation, 2011).

Recommendation 1: Establish a community governance regime that is accountable, transparent and promotes community participation; and consider the regional conservation and political context in decisions about external governance arrangements. This may include giving consideration to other conservation planning activities occurring in the area; exploring how these activities might interact with the IPCA; investigating existing provincial, territorial, or national models; and contemplating how stakeholders and other governments may react to the establishment of an IPCA given the political setting and legal precedents.

Challenge #2: Managing Expectations

The case study with the Gitga'at reveals a variety of community opinions concerning protected area management. For the most part the interviewees from the Gitga'at community shared a similar vision for the management of the IPC Planning Area, but had differences in opinion as to how that vision should be implemented and what strategies should be used. Interview participants indicated that they wanted to maintain Gitga'at cultural use of the area, restore and preserve the area's ecological abundance, and limit or control recreational and commercial use by non-Gitga'at individuals. Notably, the topic with the greatest variety of opinions was governance (see section 3.4.2.1).

Managing expectations so that management actions are appropriately identified, implemented and accepted, requires an accurate understanding of community perspectives and a decision making process that respects and incorporates community views. For the case study with the Gitga'at, understanding the expectations of community members required a combination of outreach, information sharing, and encouragement of community participation. The community was informed of the

research and were encouraged to participate, and were informed of the ongoing marine conservation efforts that the Gitga'at have been previously and are currently involved in. The literature suggests that when engaging the community, it can be helpful to use a facilitator, have a neutral and local community champion, host regular community meetings, and understand any power discrepancies and social tensions prior to engaging with the community so as not to reinforce or create inequalities (Mahajan & Daw, 2016; Vaughan & Caldwell, 2015). Engaging the community in such a way to understand their expectations helps establish a collective vision prior to implementation that fosters community support and participation. Plotkin (2018) suggested that building and facilitating access to the land (and water), in addition to engaging community members in planning and governance process, can help establish a collective vision for an IPCA. The Gitga'at's vision has been progressively established and refined through the engagement processes involved when developing their marine and land use visions in their marine and land use plans, and while creating a site-specific vision for the IPC Planning Area through this research project. Although the views of the individuals that contributed to this research project do not necessarily represent the full range of views, opinions, and knowledge of the broader Gitga'at community, results presented in this research are consistent with results from previous community engagement processes that engaged a wider variety of community members. The community vision was used as foundation for further development of objectives and management strategies for the IPC Planning Area. To continue to manage community expectations, the Gitga'at will need to develop a governance structure that respects and incorporates the diversity of community views.

An added challenge for managing community expectations is presented by capacity constraints. Throughout the interviews, participants suggested management strategies and actions to achieve objectives such as building infrastructure, increasing monitoring, and organizing field trips. These types of management strategies come with budgetary considerations, and therefore may or may not be achievable in the near or long term. Having a clear and collective vision for an area, however, can help to understand the underlying motivations of the community and help identify alternative realistic or feasible management actions to achieve that vision. Moreover, the Gitga'at's approach of starting with a small-scale pilot area may help to build capacity in the community while asserting authority over the territory.

Recommendation 2: Create a collective community vision to guide management objectives and actions and start with small pilot areas. This may involve facilitating access to the land and waters and hosting regular community meetings and engagement activities throughout the process. Having a governance regime that is transparent and promotes community engagement, as suggested in recommendation 1, would support the development of a collective community vision.

Challenge #3: Aligning Modern and Traditional Institutions

The Gitga'at are pursuing marine conservation within their traditional institutions by seeking holistic protection and management of the IPC Planning Area according to their laws and values. The Gitga'at are, however, simultaneously working within modern institutions of other governments and stakeholders as they are participating in ongoing discussions with other governments about marine protection. Numerous challenges arise when trying to work within two or more sometimes-conflicting sets of institutions, including different views and management styles concerning the environment, and adhering to regulatory or institutional requirements such as management plans.

One of the challenges faced in the case study with the Gitga'at was reconciling the difference between the Gitga'at's holistic views of the environment and the jurisdictional separation of land and water established by Canadian legislation and policies. The ecologically artificial jurisdictional boundaries of national and provincial governments and their agencies do not align with Gitga'at's beliefs and views about the environment, especially the view that everything is interconnected. Specifically, the Gitga'at view the IPC Planning Area as a single entity that contains both terrestrial and marine components. This was mentioned numerous times in the interviews; for example, when discussing the impacts of the previous logging activity and when discussing increased community use in the area (see section 3.4.1.2). It was clear that when respondents discussed the IPC Planning Area they talked about both the marine and terrestrial components. The draft management plan for the IPC Planning Area was therefore designed to reflect these Gitga'at holistic views and management approaches. Conversely, the Gitga'at have and are participating in various external protection planning processes in and around the IPC Planning Area that each deal with either a marine or terrestrial component separately. For instance, the Gitga'at have commitments with the province of BC for the management of some of the land within the IPC Planning

Area, but are discussing marine portions of the area with the federal government. The Gitga'at are trying to protect the area in a holistic manner but are required in other ongoing discussions to separate the area based on the institutions of other governments. Nonetheless, the Gitga'at's management plan, and IPCAs more generally, provide a unique opportunity to bridge jurisdictional gaps and engage in protected area planning that is more holistic.

Adhering to state regulatory or institutional requirements, such as the development of management plans for Canadian federal and provincial protected areas, can be inconsistent with the institutions and traditions of Indigenous communities. Consequently, Indigenous people may elect to modify traditional institutions to adapt to modern contexts. Such was the case with the Gitga'at. The Gitga'at partly developed a draft management plan for the IPC Planning Area to provide a basis for negotiations with governments and to help to ensure that their IPCA is accepted or seen as legitimate by stakeholders. Development and adoption of a management plan has been central to the process through which governments have recognized voluntarily declarations of protected areas and invested resources in their management (Davies et al., 2013). However, in the Gitga'at case it was sometimes difficult to incorporate the type of knowledge and stories of the respondents into a management plan format. For instance, it was challenging to bridge the gaps between marine and terrestrial environments and include traditional names and stories. On the other hand, conforming strictly to modern management formats may make it feel like the plan doesn't belong to or come from the community. The literature has suggested that multiple documents or plans could be created for different purposes and different audiences, or that single documents could use many different types of knowledge such as traditional knowledge and western science. In the Gitga'at's draft management plan, the text includes Sm'algyax (Gitga'at language) words and terms and Gitga'at oral histories.

Recommendation 3: Create management frameworks that bridge jurisdictional scales (e.g. of land and water, or areas of responsibility) to include more integrated and holistic planning that is consistent with Indigenous perspectives of the environment, and incorporate various information types (e.g. traditional knowledge and western science) into the planning and establishment of the IPCA to help bridge discrepancies between modern and traditional institutions.

Challenge #4: The Novelty of IPCAs in Canada

There are numerous examples of ICCAs in the world, but IPCAs are still a relatively new concept that is being explored in Canada. The Canadian government is just beginning to investigate approaches to appropriately recognize these areas, which leaves a lot of questions unanswered concerning what these areas mean legally. Because IPCAs are not yet specifically recognized in Canadian law, and because of the added challenges with governance and jurisdiction in marine environments (see Challenge #1) many of the discussions with interviewees in the Gitga'at case were underlain with uncertainty. One respondent indicated the need to gain more authority for enforcement activities because efforts thus far have seen limited success, while others indicated that these types of decisions were not up to them but rather up to other governments, or referred to agencies currently responsible for these decisions. These topics also brought up larger questions about Aboriginal rights and title and Indigenous sovereignty:

> They (referring to Canada) don't recognize our ownership of the territory (…) because there is a lot of, I don't know, limbo in Aboriginal rights and law, so how do we exercise and push the boundaries to a place that we believe we should rightfully be at? – Spencer Greening

The implications of IPCAs as they are currently recognized are uncertain, especially for those IPCAs that are unilaterally declared by Indigenous communities (such as tribal parks). What these areas mean from a legal perspective, how they can be effectively enforced and what the best processes are for Indigenous communities interested in pursuing these initiatives are still questions that need to be answered. Answering these questions is further complicated by the fact that there is little publically available or published information on IPCAs in Canada. While the amount of information is increasing with the work of the ICE, and as IPCAs gain momentum and more are established, there is currently little reference material for Indigenous communities interesting in pursuing IPCAs. In recognition of the capacity constraints that Indigenous communities often struggle with, sharing resources and knowledge with others will be important to see these areas become more successful and prevalent. Furthermore, the ongoing work in Canada to better understand and recognize IPCAs provides a good opportunity for Indigenous communities to provide input into how they want to see these areas recognized and supported by other governments. For instance, the work that the ICE undertook was largely aimed at gathering Indigenous perspectives on IPCAs to

make recommendations to the Canadian government (ICE, 2018). Participation in these processes is an opportunity to provide input and to share knowledge, but also to increase awareness and support of IPCAs. As was the case with the ICCA in Nepal (see section 2.2), participation in local, national and international meetings, conferences and processes helped increase awareness and support for voluntarily and independently declared ICCAs (Stevens, 2013).

While information sharing is important, there are risks that accompany making certain types of information more readily available. Studies have noted that "First Nations worry that the public sharing of Indigenous spatial knowledge applicable to MPA network design could have unintended consequences, such as increased fishing pressure in biologically-rich or culturally-significant areas that they had intended to protect" (Ban & Frid, 2018). Similarly, the attention given to IPCAs as they become publically recognized as ecologically and culturally significant areas may result in increased interest and presence in the area. This risk was a factor that contributed to the decision to keep the area under consideration in this research project unidentified. Therefore, while it is important to share knowledge and experiences, and let the public know that these areas are being protected, the dissemination of information must be done with care and only shared with appropriate audiences in appropriate settings. For example, Indigenous communities could share their experiences with each other and within the confines of IPCA initiatives.

Recommendation 4: Encourage knowledge sharing amongst Indigenous groups and coordinate with and participate in other IPCA initiatives.

Table 3.4.   Summary of Challenges and Recommendations for Indigenous Communities and Marine IPCAs

Challenge	Recommendation
Finding the right governance regime Various trade-offs exist with both shared and independent governance arrangements. Community governance structures are important, but can be challenging to establish given diversity and variety of opinions.	Establish a community governance structure that is accountable, transparent and promotes community participation; and consider the regional conservation and political context in decisions about external governance arrangements.
Managing community expectations Addressing a variety of opinions regarding management of IPCA.	Create a collective community vision to guide management objectives and actions, and start with small pilot areas.
Aligning traditional and modern institutions Artificial jurisdictional boundaries between land and water inconsistent with Indigenous perspectives on the environment Writing a management plan can be inconsistent with oral traditions and Indigenous knowledge.	Create management frameworks that bridge jurisdictional scales and incorporate many information types.
The novelty of IPCAs in Canada Lack of information to guide communities interested in establishing IPCAs Risks associated with sharing of Indigenous knowledge.	Encourage knowledge sharing amongst Nations and coordinate with and participate in other IPCA initiatives.

3.6. Conclusions

Engaging in a community-based case study of the Gitga'at First Nation's preliminary efforts to explore the development of a marine IPCA in their territory has revealed a number of challenges and opportunities for the Gitga'at to consider as they pursue further protection efforts. Interviews with Gitga'at members over the management and protection of the IPC Planning Area supported a holistic approach to management of the area that allows continued Gitga'at use and limited use by non-Gitga'at people, with some potential for sustainable economic development. Results further demonstrate that the Gitga'at are developing a protected area management plan within a unique cultural, political and social context, but that the management priorities are similar to existing studies of other Indigenous marine protection priorities. Consideration of the challenges and recommendations provided by this research may help Indigenous communities interested in pursuing marine IPCAs navigate their unique circumstances and will contribute to the growing list of references available regarding IPCAs in Canada.

The Gitga'at are still reviewing the draft management plan and the final outcome of whether and how the IPCA will be established and managed is yet to be determined. The Gitga'at will likely face further challenges moving forward, for instance with enforcement and ongoing negotiations with other governments, but have made great strides to advance the protection of this area in a way that is consistent with their community's values.

Uncertainties remain as to whether and how these areas will be recognized in Canadian legislation and courts of law in the future, and how IPCAs might contribute to Canada's marine conservation commitments. Nonetheless, the Gitga'at are an example of how the planning for marine IPCAs can be initiated, and the Gitga'at's draft management plan can provide insight into how IPCAs could be managed, and how IPCAs might be able contribute to the protection of culturally and ecologically significant areas that is consistent with Indigenous values and laws.

> I'd like to make a change (...) and if we can make a change by starting within our system here, (...) we can show them how it's supposed to be done – Cameron Hill

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Appendix A: Consent Form for Interviews

My name is Taylor Groenewoud and I am a graduate student at Simon Fraser University in the School of Resource and Environmental Management. I am undertaking research with the Gitga'at First Nation regarding marine protected areas. The research will gather information to help the Gitga'at in marine conservation and management, and will also be part of my Master's degree. As I explain below, I'll be writing reports for the Gitga'at Leadership Council and staff, and I will also be writing a thesis based on this research, which is a document that will be made publically available.

I am working under the supervision of Dr. Murray Rutherford from Simon Fraser University, and we are conducting this research project in collaboration with Chris Picard who is the Science Director for the Gitga'at First Nation and Hussein Alidina of World Wildlife Fund (WWF) Canada. The research is funded by WWF Canada and MITACS (a federal academic research funding program).

Why Should You Take Part in This Study?

The goal of this research project is to gather information and knowledge from members of the Gitga'at community about marine conservation and management and the value of marine areas, in order to develop recommendations and a draft management plan for a possible community-led marine protected area (MPA) in Gitga'at traditional territory. This project will help advance the goals of the Gitga'at for marine protection and community prosperity, and should contribute to more effective marine conservation consistent with community values.

This research will help us learn more about what Gitga'at community members value about marine conservation, what you would expect from a community-led MPA, what experiences you have had with marine conservation, and which marine areas in Gitga'at territory you would like to see protected.

Your Participation is Voluntary

Your participation is voluntary. You have the right to refuse to participate in this study. If you decide to participate, you may still choose to withdraw from the study at any time without reason and without any negative consequences to you. If you choose to

drop out of the study, then none of your data will be used in any publications, reports or presentations, unless it has already been released or published, or you consent to us continuing to use the data.

How is the Study Done?

The interviews are designed to last between 30 minutes and 1 hour. I will ask you questions about your knowledge and experiences regarding the management of marine resources, the values you consider most important to preserve and foster in the management of marine resources, and your expectations about possible management of a community-led MPA in Gitga'at territory.

I would like to have your consent to digitally audio record this interview. If you consent to having the interview audio recorded, then I will transcribe the audio recording in the months following the interview. If you give me your email address or other contact details you will be given the opportunity to review and provide comments on a transcript of your interview before I use the information from it in any reports or publications. If you do not consent to have the interview recorded, then I will take written notes of the interview.

Potential Risks of the Study

There is minimal risk to you in participating in this study. If any of the questions I ask involves information that you feel is sensitive or personal, or if you are uncomfortable answering any question, you may choose not to answer, without any negative consequences.

Confidentiality

I am asking for your permission to reveal your identity in the report that I give to the Gitga'at Leadership Council and staff based on the transcription and notes of this meeting, and also in my Master's thesis and other reports or publications or academic presentations based on this research. You are free to decide not to have your identity disclosed, in which case you will not be identified by name in any reports of the completed study.

The audio files will be deleted once the interview has been transcribed. The digital transcript of the interview will be stored as an encrypted file on SFU Vault, a SFU hosted private and secure file storage platform, and accessed by a password-protected personal computer. If you elect to have your identity remain confidential, all personal identifiers will be replaced with a code and only I will retain a copy of the list linking codes to participant information. Any notes of the interview that I write on paper will be stored in my locked office or my supervisor's locked office at SFU. Electronic copies of the transcripts and notes will be given to Gitga'at Leadership Council and staff who will retain them for their archives. Two years after the completion of my research project, all transcript files and notes will be deleted from SFU Vault, and all paper data will be shredded. Digital files will be shared via encrypted digital transfer, and paper data will be scanned to digital files and transferred in the same way.

If you consent to provide your email address, I will use that address to send you your interview transcript for review. I cannot guarantee the confidentiality of correspondence by email.

Study Results

The results of this study will be used in a report to the Gitga'at Leadership Council and staff, and will be reported in a Master's thesis. The results may also be published in journal articles and other reports, and presented at academic conferences.

Consent

If you consent to participate in this project, please complete and sign the following:

I _____ agree to participate in this project, "Informing Indigenous Marine Protection in Gitga'at Territory."

I understand that my participation is voluntary and that I may withdraw from the study at any point without negative consequences.

If you consent to the matters listed below, please check the boxes:

☐ My identity, participation, statements and views may be used, represented, published or made publically available in any project outputs.

☐ I consent to having the interview digitally audio recorded

☐ I consent to being re-contacted by the researchers. My email address is:
 _____

_____   _____

Participant Signature   Date (yyyy/mm/dd)

(or Parent or Guardian Signature)

Appendix B: Summary of Draft Gitga'at Management Plan for the IPC Planning Area (July 2018 Draft)

The following provides an overview of the organization and structure, and brief summaries of the various sections, of the Gitga'at's draft management plan for the IPC Planning Area that I prepared as part of this research. The actual management plan is written in the first person from the perspective of the Gitga'at, and includes pictures, diagrams, maps, and quotes from the community.

1.0 Introduction

This section of the plan introduces the purposes of the Gitga'at's IPCA and the purpose of the management plan, introduces the IPC Planning Area and provides the regional context of the IPC Planning Area in light of other Gitga'at conservation planning activities.

1.1 Management plan purpose

This subsection describes the purpose of the IPCA and the management plan. These purposes are to:

- demonstrate the Gitga'at's on-going efforts to assert governance authority and revitalize title, language, environmental stewardship, and spirituality;

- outline Gitga'at's protection and preferred use of the IPC Planning Area;

- provide a holistic management framework that considers all marine and terrestrial components of the IPC Planning Area; and

- provide a framework to be considered by other governments in their planning and decision-making, and by the general public for awareness, appreciation and use of the protected area.

1.2 Planning Area

This subsection introduces the IPC Planning Area, and presents the boundaries and features of the IPCA. This subsection also includes a description of the significance of the area to the Gitga'at, including its history, archaeological features, and its ecological resources. Gitga'at oral histories and western science are used to paint a complete picture of the IPC Planning Area and its significance.

1.3 Conservation Planning

This subsection outlines other Gitga'at conservation planning activities and how they relate to the IPC Planning Area. Conservation planning activities described include Gitga'at's marine and land use plans, Gitga'at's involvement in the PNCIMA, MaPP and NSB MPA Network Strategy processes, and collaborations with the province to establish conservancies and develop a strategic land use planning agreement. In describing these various activities, this subsection provides the regional conservation context in which the IPC Planning Area falls, including what parts of the territory and IPC Planning Area are under various levels of existing protection or commitments. This subsection also provides a chronology of how the Gitga'at came to want to protect the IPC Planning Area, why they are seeking protection of the area and what the various options are that are available to the Gitga'at to protect the IPC Planning Area.

2.0 Background

This section describes the current and prospective future uses and threats to the IPC Planning Area. The need and urgency for protection are highlighted.

2.1 Current Uses

This subsection describes the current activities that occur in the IPC Planning area including Gitga'at use, tourism and recreation, and commercial use. The description of Gitga'at use highlights the various values in the area for the Gitga'at, such as a variety of marine and terrestrial species and resources that the Gitga'at harvest there.

2.2 Potential Future Threats

This subsection describes the potential future activities and threats to the region and how they might affect the IPC Planning Area. Activities include increased development in surrounding areas, climate change and other active tenures in the region.

3.0 Management Framework

This section includes a vision statement for the IPC Planning Area, a description of management objectives and a table of management strategies. Three broad

management objectives are derived from the overall vision, and each objective has a series of smaller or sub-objectives. Sub-objectives are paired with strategies that are targeting at achieving the objectives. Management objectives and strategies are presented in tables and organized into the categories described in this research: cultural use, recreational use, commercial use and environmental protection. Paired with the management objectives and strategies is a table of preferred activities and uses. This table presents a list of current and potential activities in the IPC Planning Area, and what the community acceptability of each use is based on community interviews. Uses are categorized as follows:

N	Not an appropriate use in this zone	It has been confirmed during the management planning process that this use is not appropriate in this zone. This may be an existing use which the management planning process has determined is no longer an appropriate use in this zone.
Y	Appropriate use in this zone support	Indicates that some degree or scale of this use (existing or new) may be appropriate subject to continued community support. For new or expanded uses, this does not constitute approval. This indicates that the use may be considered for further evaluation and possible approval.
M	May be an appropriate use in this zone	Indicates that the management planning process was inconclusive on this use (no consensus on "support for" or on "not support for" this use among the community). The proposed or existing use will require additional consultation with the Gitga'at community before any conclusions are drawn.

4.0 Plan Implementation

This section contains information pertaining to how the management plan will be implemented, including descriptions of external governance through possible government-to-government agreements, internal governance within the Gitga'at community, enforcement and communication measures, monitoring and plan validity and review.

4.1 Government-to-Government Agreements

This subsection outlines the various possibilities for institutional arrangements for implementing the Gitga'at management plan, including partnerships with the Province of BC and the Government of Canada. Details on the advantages and disadvantages of each of the options described in this section are discussed in the supplemental report that I prepared for the Gitga'at and accompanied the management plan.

4.2 Governance

This subsection outlines the internal Gitga'at community governance structure that will be used for implementing the management plan. The governance structure outlines who will be making decisions and how those decisions will be made. This subsection outlines the roles of various parties and how they will interact to govern the IPC Planning Area, at both a strategic and operational level. The GOLD and the Gitga'at Leadership Council are responsible for strategic level decision-making, and a management committee is proposed for operational level governance based on the results from community interviews (although the composition of this management structure and associated details have not yet been finalized).

4.3 Enforcement and communication

This subsection outlines the various enforcement activities that will be used to ensure that the objectives and strategies outlined in the management plan are implemented and followed. The role of the Gitga'at Guardians including specific enforcement strategies and required training are described. This subsection also describes the role of protocol agreements with resource users and introduces a communication strategy for the IPCA.

4.4 Monitoring

This section outlines the various monitoring activities (resource and human activity) that should occur in the IPC Planning Area and how this monitoring should inform future decision making about the area.

4.5 Plan validity assessment and review

This section describes the review process for the management plan. The management plan will be reviewed and revised as necessary to address advances in local and regional knowledge and the results of management and monitoring. If management operations or monitoring reveal issues that need to be addressed, the governance structure that is set in place will decide how to resolve those issues. In order to ensure that the management direction for the IPC Planning Area remains relevant and effective, the management plan will be assessed by Gitga'at on a regular basis. In

addition, consultations with the community will be held to address whether the process for managing and setting up work plans is satisfactory.

Appendix C: Number of Interview Participant's who Expressed Positive or Negative Opinions for Management Activities in the IPC Planning Area

Activity	Opinion			
	Positive	Conditionally Positive	Negative	No Response
Recreational use				
Power boats	1	4	4	12
Recreational fishing	0	10	10	1
Commercial activity				
Tourism	1	20	0	0
Commercial fishing	0	0	16	5
Hunting	0	0	19	2
Forestry	0	0	10	11
Shipping	0	14	2	5
Environmental Protection				
Monitoring & Restoration	12	1	0	8
Cultural use				
Gitga'at use	20	1	0	0