

Northern Imaginaries:
Tracing the Northern Landscape through Canadian Culture
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Abstract

Canadians have been inundated with images and ideas about the northern landscape which has led to the development of sets of collective settler Canadian images and ideas that we use to represent the northern landscape. These images and ideas shape and inform what we think the North is and should be before we ever have any actual experience with the northern landscape, which poses potential problems for settler Canadian landscape architects working in northern Canada. This practicum identifies the three most common images settler Canadian culture uses to portray the northern landscape – North as Myth, North as Resource, and North as Change. It then answers three questions for each of the identified images – What are the characteristics of the image? What are the ideologies associated with the image? What are the potential problems for landscape architects in perpetuating the image as identified? It concludes with a proposal of ways for settler Canadian landscape architects to incorporate more diverse images into their understanding of North.

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Introduction

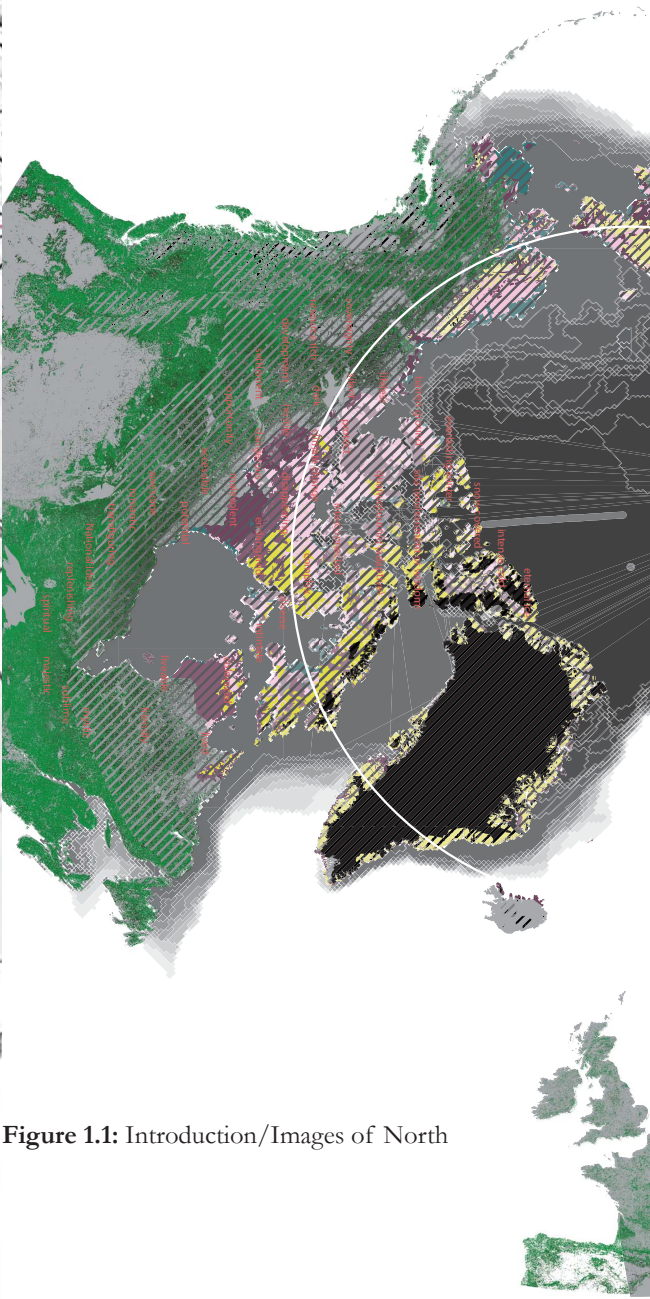


Figure 1.1: Introduction/Images of North

Introduction | Why I am Interested in the North

I, like most settler Canadians who live along the southern border of our country, have spent the majority of my life indifferent to the people, places and landscapes that make up what we call the Canadian North. The Yukon and Northwest Territories were on the maps I studied in grade school but English place names and geographical locations were the limit of my knowledge about them. The North existed for me as lines on a map that I knew little to nothing about and felt generally comfortable disregarding. That all changed when I read the book *Canada and the Idea of North* by Sherrill E. Grace where she asserts that Canadians “see nordicity as our uniquely defining quality”¹ and explores the relationship between the idea of North and the construction of the Canadian identity. Grace’s book fascinated me, and her insistence that Canadians have a collective identity shaped by a northern geography and northern environment² intrigued and challenged me, because I had always identified myself as a prairie kid and had never particularly thought of myself as northern, or Canadian for that matter. My identity has been shaped more by long, hot summers spent outdoors,

grain trucks and combines, field parties, 4-H, and the local rodeo than anything “northern” like cabins in the forest and wilderness adventure. The notion that I was missing some quality of ‘Canadianess’ due to my lack of experience with the northern landscape that supposedly so strongly shapes the Canadian identity just made it more interesting to me. In an effort to satisfy my curiosity about this elusive North Grace spoke of I centered my regional studio in graduate school on complexity and change in the northern landscape and I took a study/travel course to Churchill, Manitoba. But, rather than satisfying my curiosity these forays into the north (both figurative and literal) have only made me want to know more, hence the impetus for this practicum, which seeks to delve further into the northern Canadian landscape in the only way I am currently able to – through books.

In books on the North, both fiction and non-fiction, the concept of the northern landscape being formative of the Canadian identity became a repeated refrain.³ It is argued that generations of Canadians had a constant, physical engagement with the landscape and this meant

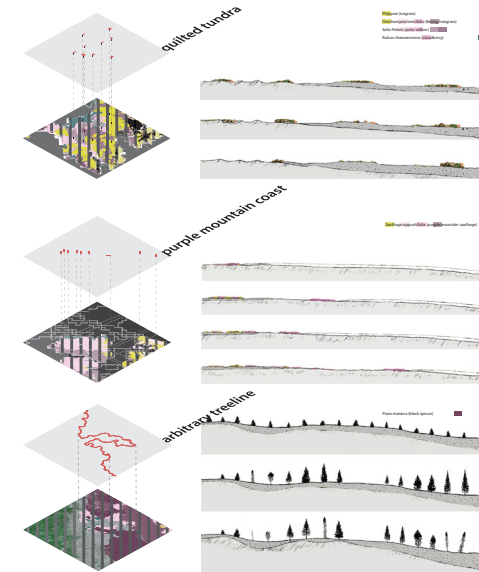


Figure 1.2: Previous Work on the North/
Regional Studio



Figure 1.3: Previous Work on the North/
Churchill Travel Study Course

geography and landscape played an integral role in who they were.⁴

However, as we progressed through the 20th century with immigration making Canada a more pluralistic society with varied backgrounds and identities, and living in cities became the norm rather than the exception, the northern landscape became less formative of Canadian identity than it perhaps once was.⁵ Yet, even though we have moved away from a monistic idea of who we are as Canadians and what has shaped us, we cannot seem to shake monistic images of what the northern landscape is.

One thing my research made apparent is that there are sets of collective settler Canadian *images* and *ideas* that we use to represent the northern landscape and these representations continue to inform, not so much who we think we are, but what we think the *North* is and should be.

These collective images and their associated ideologies have taken shape over long periods of time through the arts, science, politics, history and many forms of representation and, for many of us, these representations of North are our only experience of a landscape from which we are quite far removed.

*“There are sets of collective settler Canadian **images** and **ideas** that we use to represent the northern landscape and these representations continue to inform, not so much who we think we are, but what we think the **North** is and should be.”*

Figure 1.4: Why the North is Interesting to Me

Introduction | Why This Work is Important

In the six years that I have been a graduate student in the Landscape Architecture department at the University of Manitoba I have seen a marked increase in interest in northern Canada both within the faculty and within the larger context of design in Canada as a whole. Within the faculty, multiple recently published master's practicum projects in both the Department of Architecture and Department of Landscape Architecture have focused on locations and issues in northern Canada,⁵ individual studio projects in the Landscape Architecture department have also focused on northern contexts and issues, including my own work, in 2014 studios in the Department of Architecture participated in the *Arctic Adaptations: Nunavut at 15* exhibit for the 2014 Venice Biennale, and in the winter term of 2017 a graduate level regional studio in the Landscape Architecture department was centered on the town of Churchill and surrounding area in northern Manitoba. Within the larger design community in Canada I have found two notable examples of increased interest in northern Canada. The first is the entry for the Canadian pavilion for the Venice Biennale 2014 International



Figure 1.5: Example of Increased Interest in the North/*Arctic Adaptations: Nunavut at 15*

Architecture Exhibition – *Arctic Adaptations: Nunavut at 15*. The exhibit, composed of models, photographs, and soapstone carvings, was created by the design-research studio Lateral Office and the project attempts to bring awareness to an unseen modern North for a southern audience while exploring issues of housing, health, education, arts, and recreation through architecture.⁶ The second is a newly created Northern Research Bursary Fund administered by the Landscape Architecture Canada Foundation (or LACF). The stated purpose of the fund is to “promote interest in and advancement of research in northern Canada, defined as all regions of Canada north of the 55th parallel” where projects must “increase the body of knowledge of landscape architecture and related professions as it pertains to the north; increase the visibility of landscape architects in the north; and make positive changes for people of the north.”⁷

“If landscape architects are embarking on a concerted effort to increase the amount of work we do in the North, ... we have a very serious responsibility to assess our ideas and biases about this environment before we begin that work.”

Figure 1.6: Why This Work is Important

When taken together, I believe these examples show a considerable increase in interest in the North by design professionals, and more importantly by landscape architects. If landscape architects

are embarking on a concerted effort to increase the amount of work we do in the North, and thereby the amount of influence we have on the environment and people of the North, I believe we have a very serious responsibility to assess our preconceived ideas and biases about this environment before we begin that work. Whether we are aware of it or not, as Canadians we have been inundated with images and ideas about the northern landscape which, without ever having any actual experience with that landscape, shape both our understanding of it and the people who live there. When we design we may perpetuate certain images or ideas about the North without even realizing it. If, as landscape architects, we are going to be working on projects in the northern parts of Canada, we need to become aware of when and how these images and ideas influence the design decisions we are making as well as the ways they shape our perception of reality in order to assess whether they are helpful or harmful to our design work.

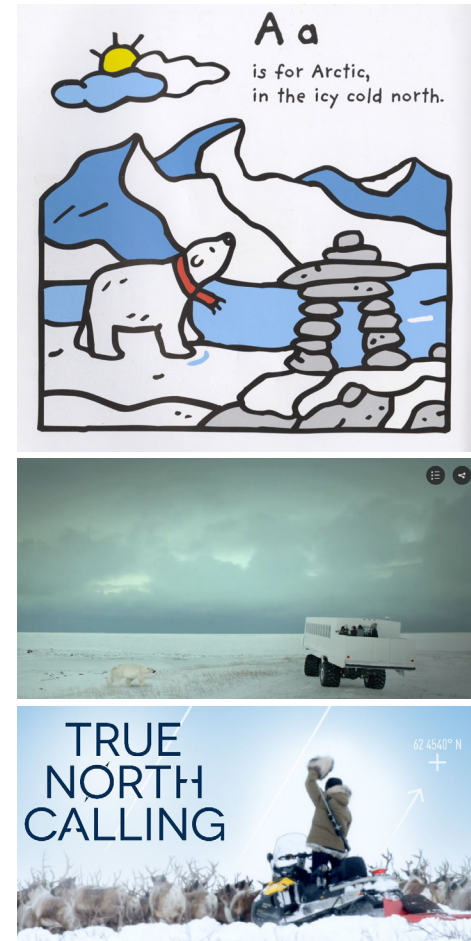


Figure 1.7: Images of the North that Inundate Canadians

Introduction | A Practicum Synopsis

What follows in this practicum is an identification of the most common images settler Canadian culture uses to portray the northern landscape – North as Myth, North as Resource, and North as Change. I then answer three questions for each of the identified images – What are the characteristics of the image? What are the ideologies associated with the image? and What are the potential problems for landscape architects in perpetuating the image as identified?

In Chapter One I explore the North as Myth image; the dominant image of the northern landscape found in literature and the arts. In this image North is either a hostile or spiritual wilderness that is portrayed as white and empty or forested and never-ending. Within this image men, indigenous people, the landscape, and animals become symbols portrayed in specific ways to discuss either human superiority to the natural world or our destruction of it.

In Chapter Two I discuss the image of North as Resource, which is found most often within the political sphere and in history books. In this image the North is thought of as a source of economic wealth in

1. Identify an image of the northern landscape:

- *North as Myth*
- *North as Resource*
- *North as Change*

2. Outline characteristics of the image.

3. Explore ideologies associated with the image

4. Propose potential problems for landscape architects in perpetuating the image as identified.

Figure 1.8: Practicum Synopsis

the form of natural resources and envisioned as maps constructed with points and lines on a plane. The intent of this image is to define and describe physical features of the North in order to bring them into the realm of human use. Western notions of land possession and progress underpin this image and the development of natural resources can be linked to a desire for respect and prestige both within and outside of Canada.

In Chapter Three I explore the image of North as Change; an emerging image developing within the last fifteen years. In this image the North is thought of as a frozen landscape undergoing catastrophic melting due to anthropogenic climate change and is envisioned, understood, and described as interacting physical processes. Northern animals, especially polar bears, figure predominantly in this image as their survival is being challenged by these devastating changes to the landscape and the landscape itself is seen both as a victim of climate change and a harbinger of the potentially devastating consequences to unmitigated climate change for those of us who live in southern latitudes. Within

the image there is a strong tone of impending doom and a call for recognition that climate change is not only having devastating ecological consequences but, for the inhabitants of the North, devastating cultural consequences as well.

Introduction | The Research Process

To begin my practicum I combed through Grace's *Canada and the Idea of North* looking for descriptive sentences of the North. When this was complete I grouped the descriptions into themes or narratives based on commonalities of the descriptions and added a narrative I felt was missing due to the date of publication of her book. The narratives I developed at that time were Mystical North – a forbidding, frozen wasteland of ice and snow out to starve, freeze, drive mad, or kill men who had gone North to explore and conquer the landscape; Spiritual North – a deeply spiritual place of majestic beauty where men go to be restored or find peace, truth and salvation; Friendly North – a livable

and abundant place of natural resources where men go to make their fortunes and which Canada uses to become a great and prosperous country; Norths – a diverse and complex place composed of a multitude of voices, distinct experiences, and various locales; Magnetic North – the North as understood, imaged, and created by Indigenous people who lived there prior to settler colonial invasion and who continue to live there; and the Vanishing North – a frozen, cold, and ice covered landscape that is quickly disappearing due to climate change and must be saved.

In conjunction with defining and categorizing possible narratives I also identified books that Grace used as examples in relation to the descriptive sentences. In this way I created a reading list for each of the narratives. Once I began reading the books on my list it became clear that within each narrative there was a very specific image of the northern landscape created by the text and artwork contained within them and I shifted the focus of my work from a discussion of the narratives to a discussion of the ways the northern landscape is imaged and how these

1. *Developed narratives from Grace's Canada and the Idea of North*

- *Mystical North*
- *Spiritual North*
- *Friendly North*
- *Norths*
- *Magnetic North*
- *Vanishing North*

2. *Created reading lists for each narrative*

3. *Shifted focus from narratives to how the northern landscape is imagined within the narratives*

4. *Streamlined scope of work*

Figure 1.9: Research Process/Steps One Through Four

images are used to put forth and perpetuate specific ideologies about the northern landscape and the human relationship to the landscape. Because of the shift in focus, the labels of previously identified narratives were adjusted to reflect the way the landscape is being imaged in each. At this time it also became apparent that I would need to narrow the scope of my work in order to complete it in a timely manner. Due to this, some of the narratives were set aside in order to concentrate on the three images I feel are the most common within contemporary settler Canadian culture. Norths and Magnetic North were dropped while Malevolent North and Mystical North were collapsed into North as Myth (northern landscape as mythical wilderness), Friendly North became North as Resource (northern landscape as resource), and Vanishing North became North as Change (northern landscape as altered landscape from climate change).

The reading lists were also adjusted to reflect my new focus with some books being aligned under one of the three new headings and others being set aside. Assessment of the reading material was similar to my assessment of *Grace's Canada and the Idea of North*. For each

book I noted places where the landscape was described or discussed. I then pulled these quotes out of the books and arranged them into groups based on commonalities of their descriptive characteristics and assessed any visual depictions produced within the books for common characteristics in order to identify the general characteristics of each of the three images. Finally, I arranged any quotes that were espousing a specific belief about the landscape or the human relationship to landscape into groups based on commonalities in order to identify ideologies associated with the image. The final section in each chapter – potential problems for landscape architects in perpetuating the image as identified – is my personal assessment of how these images may affect the decisions or perceptions of a settler Canadian landscape architect who is undertaking work in northern Canada.

I would like to note that the assessment for the North as Myth chapter is slightly different than the other two chapters as some of the books I read for this chapter are secondary sources written by literary, art, and cultural critics whereas the books assessed for the other two

5. Assessed books on reading lists noting where the landscape was described or discussed

6. Arranged quotes into groups based on commonalities to identify characteristics and ideologies of each image

7. Identified ways the images may affect the perceptions and decisions of landscape architects

Figure 1.10: Research Process/Steps Five Through Seven

images are all primary sources. Hence, the characteristics identified in the North as Myth chapter are developed from the ideas of others whereas the characteristics identified in the North as Resource and North as Change chapters are developed from my own assessment of the books.

Introduction | Caveats

Before I jump in to the discussion of the identified images there are a couple of important points that need to be made. First, the images and associated ideologies in this practicum are *my* interpretation of how the North is portrayed in a very specific set of books. It is likely that the identified images would be different if alternative books on the North were included in my reading lists or if I had also assessed movies, television shows, music etc. in conjunction with books.

Second, I recognize that the process of identifying standardized images and the short length of this work means that the discussion of images and their characteristics are often over simplified. Because I was

assessing such a large body of work I strove for breadth rather than depth and chose to stress similarities rather than differences between works. However, as with anything that stresses similarity I have stripped reality of complexity and nuance and many deviations from the standard can be found. I do not see this as a failing but rather as a recognized limitation which offers opportunity and potential work for both myself in the future or for anyone else who wishes to produce work in the same area. This practicum is just a beginning and I welcome people to dive more deeply into any one of the images I have identified and suss out the nuances of each image and its associated ideologies. Perhaps that is what I will do next.

Finally, Grace stresses within her book that themes rarely, if ever, exist as distinct narratives in one work; there are no clear boundaries.⁸ In any book about the North, multiple ways of imagining the northern landscape can be present. A book that emphasises climate change will also, necessarily, discuss issues of resource extraction and a history book that emphasises resources and development may also contain ideas and

*“North is multiple, shifting and elastic; it is a **process**, not an eternal fixed goal or condition.”*

– Sherrill E. Grace

Figure 1.11: No Clear Boundaries of North

images more commonly found in the North as Myth image. I also do not believe the chapters compiled here to be a comprehensive accounting of all possible images and ideologies relating to the Canadian North; I left two images I previously identified out, and there are likely more I have not identified. The three images discussed here are the ones I found to be the most common ways of thinking about the North within settler Canadian culture and therefore the most important to begin with.

Introduction | Where is North?

One final bit of housekeeping. Most books on the North, published after 1960, provide a definition of where the author locates the North. This is because the location of North has shifted spatially throughout the centuries. I believe I must do the same to avoid confusion. North (lowercase n) is a direction. For a landscape architect *the* direction because it guides our relationship with and visualization of site. As direction, north is relative to a person's location on the planet

and is a tool for locating oneself. The North (Uppercase N) on the other hand, is an idea or imagined place with shifting boundaries of space dependent on by whom it is being used and at what point in history it is being used.⁹

Where Canadians locate the North has steadily shifted ever further west and north along with the boundaries of European settlement.¹⁰ For early French settlers the *pays d'en haut* or *Le Grand Nord* was a relatively small stretch of land running west and north from the inhabited area of settlement along the eastern seaboard and St. Lawrence River.¹¹ Its boundaries were the extent of land that had been explored and they could scarcely imagine how much further north they had to go. For pre- and post-confederation politicians and businessmen of British North America, the North was the land of the Hudson's Bay Company – the North West Territories and Rupert's Land – that eventually became the prairie provinces.¹² Their interest in the North was purely commercial and as such it was often only thought of as the lower half of the prairie provinces where good arable farmland was located.¹³ In fact, at the time

*“The North (Uppercase N),
... is an idea or imagined place
with shifting boundaries or space
depending on whom it is being
used by and at what point in
history it is being used.”*

Figure 1.12: Where Is North?

of confederation neither the British nor Canadian governments even knew the full extent of this northern region (the map of the northern part of Canada was not even completed until the 1920s). To the poets, writers and painters of the 1920s – particularly the Group of Seven – the North was firmly ensconced in the Precambrian Shield.¹⁴ And for contemporary Canadians, the North is located in the Yukon, Northwest Territories and Nunavut¹⁵ or in what is now termed the Arctic, but it can at times also include northern parts of the lower provinces.¹⁶ Interestingly, almost all of Canada was at one point thought of as the North and we often still think of ourselves as a northern nation.

I, like my contemporaries, tend to think of the North as the Arctic and northern portions of the lower provinces. However, I recognize that while the geographic location of what we consider to be the North has shifted over time, images of and ideas about the northern landscape have stayed fairly consistent. It is this imagined northern landscape of image and idea which persists through time and place that is of concern in this practicum. The imagined North found in settler Canadian culture

“while the geographic location of what we consider to be the North has shifted over time, images of and ideas about the northern landscape have stayed fairly consistent. It is this imagined northern landscape of image and idea ... that is of concern here.”

Figure 1.13: The North Contained in This Document

is located nowhere, yet everywhere, in Canada all at once. It is located in our culture, our minds, our collective imaginings of place.

Introduction | Endnotes

1. Grace, *Canada and the Idea of North*, 47.
2. Grace, xii, 17, 23, 66, 267-268, 273.
3. Atwood, *Strange Things*, 115; Grace, *Canada and the Idea of North*, 66; Lotz, *Northern Realities*, 154.
4. King, *Defiant Spirits*, 417.
5. King, 417.
6. “Arctic Adaptations,” *Lateral Office* online, <http://www.lateraloffice.com/ARCTIC-ADAPTATIONS-2013-14>.
7. “Northern Research Bursary Fund,” *LACF* online, <http://lacf.ca/activities/northern-research-bursary-fund>.
8. Grace, *Canada and the Idea of North*, 16, 27.
9. Atwood, *Strange Things*, 8; Grace, *Canada and the Idea of North*, 15.
10. Grace, *Canada and the Idea of North*, 43; Hodgins et al., *The Canadian North*, 157; Warwick, *The Long Journey*, 5.
11. Hodgins et al., *The Canadian North*, 157; Warwick, *The Long Journey*, 5, 8 - 9.
12. Creighton, *Dominion of the North*, 271-273; Hodgins et al., *The Canadian North*, 157, 224.
13. Creighton, 271, 384-385, 414-415; Hodgins et al., 224.

14. Grace, *Canada and the Idea of North*, 33.
15. Grace, 43.
16. Hodgins et al., *The Canadian North*, xiii.

North as Myth



Figure 2.1: North as Myth

BLAIR BRUCE

North as Myth | Identify an Image

We have all heard a version of the following story – and how it ends. A white man travelling alone journeys North. He is seeking escape, solitude or adventure; he canoes, hunts, prospects, or explores. The North tests him with extreme cold, dangerous rivers, storms, fire, starvation and treacherous terrain. If he survives these tests he will demonstrate his superiority over the North and his superior masculinity in general or alternatively, his oneness with the North. If he returns to the South he will be ready to take his place in a position of power. If he never returns South but rather dies or disappears in the North, his story becomes part of the ongoing myth of the North. This is the dominant settler narrative on North within Canadian culture.¹

This dominant narrative of the North has a set of well-known true stories underlying the myth: the one about Sir John Franklin and the crews of the *Terror* and *Erebus* who disappeared in the northern mist in 1843 while searching for the Northwest Passage; the one about John Hornby and his two companions who set out to live a self-sufficient existence on the Thelon River, but journeyed into the wilderness ill

prepared and died of starvation, leaving behind only their corpses and a diary detailing unimaginable suffering; the one about Tom Tomson, a little known Ontario painter just breaking onto the scene who mysteriously drowned in Algonquin Park while out canoeing on a lake he knew well; or the one about The Mad Trapper of Rat River who's true identity is still unknown and who, after murdering another man, led RCMP officers on a 45 day man hunt through the northern wilderness culminating in a shoot-out that left him and two officers dead. These stories helped shape, and are shaped by, the ongoing myth which now lives predominantly in literature, narrative non-fiction, and the visual arts. Yet, even though it lives in the world of the imagination, of story, it has far reaching effects on how we think about the North and the actual northern landscape.

Within the writing that comprises the dominant myth, 'the North' is synonymous with 'wilderness' and the two words are used interchangeably. In a purely literary sense 'the North' is generally employed as a metonymy for wilderness – it is used in place of

*“A sense of adventure intensified on the ship, I felt it among the passengers, many of whom were much older than I was. We’d come to see the last great **wilderness** before it melted and before humans sprinted to the finish line in our collective race to homogenize the planet. Everyone on board wanted an adventure and now inhaled the palpable thrill the **Far North** blows into anyone who has longed for it,”*

– Kathleen Winter

Figure 2.2: Example of Interchangeable 'North' and 'Wilderness'

North as Myth | Identify an Image

wilderness, a substitute for it, as if they are one and the same thing. The North is wilderness. But, a very specific idealized wilderness with a very specific imagery and associated meaning. The northern landscape in this dominant narrative is portrayed as a mythological wilderness that is either a white, empty space or an undisturbed boreal forest of rock, pine, lake and river. These two standardized images are used to create two types of environment – either a hostile North that will drive you mad or kill you or a pure, spiritual North that provides regeneration. In this chapter I will explore the characteristics of and ideologies associated with the image of a northern wilderness created by the dominant myth of the North and conclude with a discussion of problems that may arise for landscape architects in thinking of the northern landscape as solely this image.

North as Myth | Outline Characteristics of the Image

In Canadian mythology there are two kinds of Northern wilderness landscape. The first is an empty, white, frozen landscape of snow and ice generally associated with the high arctic. In fiction and non-fiction books, words commonly used to describe the northern landscape are vast, flat, barren, empty, cold, frozen, dark, silent, overwhelming, and wasteland. Visual depictions of the northern landscape reinforce these descriptions with common elements recurring over and over such as treeless, flat expanses with a distant horizon, stretches of snow and ice seeming to go on forever, predominantly white and blue colour palettes, dark skies, often appearing stormy and frequently featuring northern lights, and the ice filled sea punctuated by looming distant cliffs and mountains.

The second kind of mythological wilderness is a boreal forest landscape. The image of a forested wilderness is not usually portrayed in descriptive words but rather as a set of elements – trees, rocks, lakes and rivers – and it is assumed we already have a general idea of their appearance. The trees in both text and image are usually evergreens

*“But on its northern side Canada is set fast against the **frozen seas of the Pole and the desolate region of barren rock and ice-bound island that is joined to the polar ocean by a common mantle of snow. For hundreds and hundreds of miles the vast fortress of ice rears its battlements of shining glaciers. The unending sunshine of the Arctic summer falls upon untrodden snow. The cold light of the aurora illumines in winter an endless desolation.**”*

– Stephen Leacock

Figure 2.3: Description of Empty, White, Frozen Landscape



Figure 2.4: Depictions of Empty, White, Frozen Landscape

and often portrayed as being under some kind of stress. The rocks are massive formations of outcrops, cliffs, and canyons sitting on the edge of a lake or river while the stately or wind-blown trees cling for life. The lakes on which they sit are described as expansive stretches of open water, possibly dotted with rocks just breaking the surface, white capped and choppy, or frozen stiff.

The final element - wide, slow rivers - flow throughout images and text of the Northern wilderness. Rivers played a huge part in the exploration and colonization of North America as well as a central role in the early economy of the fur trade.² They were essentially the only way to travel through what was considered untouched or virgin wilderness and because of this, the image of a man, or group of men, travelling by canoe down the river became a central part of the Canadian wilderness myth.³ Narratives of more recent journeys by canoe have added more substance to the myth with early twentieth century adventurers and geographers such as Robert W. Service, Ernest Thompson Seton, and the Tyrell Brothers using this method of travel and writing about it.

*“The northern stretch in
which I wander is nameless.
Between me and the North Pole
there may be a few dozen people.
But I meet them rarely.
Mostly I wander alone,
occasionally talking to myself,
making my
peace with the northern lights and
the deities.
My landscape is not a peoplescape.
I am afraid of people.
My head is a thousand acres
of wilderness.
Behind my squinting eyes are
tangled trees and rocks
and streams,
and at night my imagination
howls with the wolves.
To onlookers I remain impassive.”*

– R. Murray Schafer

Figure 2.5: Description of Forested Wilderness



Figure 2.6: Depictions of Forested Wilderness

“A deep slow-flowing river; silent, smooth as molten glass; on either bank a forest, dark, shadowy and mysterious.

The face of Nature as it was since the Beginning; all creation down the eons of unmeasured time, brooding in ineffable calm, infinite majesty, and a breathless and unutterable silence.

So it has lain for countless ages, dreaming, dwelling on the memories of untold tales no longer remembered, wise with the wisdom of uncounted years of waiting.

Overhead an eagle manoeuvres in the eye of the sun, and in the shadows on the shore an otter lies asleep.

Far-off in midstream appears a tiny dot, growing larger and larger as it approaches, and presently a bark canoe, yellow as an autumn leaf, and floating as lightly, speeds by. The sun glints sharply at regular intervals on paddles swung with swift and tireless strokes, by six brown, high-featured savages. Eagle feathers bob in unison, copper-hued backs bend and sway, driving forward the fragile craft, high of prow and stern, with a leaping undulation that is the poetry of motion.

In the centre stands a white man, bedizened with the remnants of the lace and ruffles of the courts of Europe. His cheeks are hollow and his frame gaunt. His skin is streaked with blood from the bites of myriad flies, but he reckes not of it; his burning gaze is fixed ahead: Westward, Westward, from whence the river flows.

A few minutes and the bump and swish of paddles become inaudible. The canoe diminishes again to a speck and disappears into the unknown. And the tiny waves of its passing find their way to shore, and so die. The two wild creatures stare in idle curiosity, and return each to his occupation: the eagle to his undisturbed soaring, the otter to his interrupted sleeping: and little know that, for a moment, they have gazed on History.

And so, unostentatiously, without pomp or ceremony, all unknown to the teeming millions of the Eastern Hemisphere, the long closed portals of the Western World swing open.”

– Grey Owl

Figure 2.7: Description of a River in the Forested Wilderness

*“One by one I weeded them out,
for all that I sought was – Men.
One by one I dismayed them,
frighting them sore with my glooms;
One by one I betrayed them
unto my manifold dooms.
Drowned them like rats in my rivers,
starved them like curs on my plains,
Rotted the flesh that was left them,
poisoned the blood in their veins;
Burst with my winter upon them,
searing forever their sight,
Lashed them with fungus-white faces,
whimpering wild in the night;
Staggering blind through the storm-
whirl,
stumbling mad through the snow,
Frozen stiff in the ice pack,
brittle and bent like a bow;
Featureless, formless, forsaken,
scented by wolves in their flight,
Left for the wind to make music
through ribs that are glittering
white;”*

– Robert W. Service

In addition to the two images, two types of wilderness environment have been identified – the hostile North and the spiritual North. Ross King writes that “The Canadian landscape was, in history and legend, where people froze to death, drowned, starved, or went mad from isolation”⁴ and Canadian artists and authors have not been shy to pull from, use and propagate this message. In the hostile North man is pitted against an openly aggressive landscape described as “massive and unresponsive, dominating the individual,”⁵ a “faceless, mindless, unconsciousness,”⁶ and an “overwhelming presence”⁷ out to destroy them. The theme of a hostile wilderness that isolates man leading to excessive suffering and finally death recurs over and over again⁸ against the backdrop of a white or forested North in settler Canadian cultural products.

In the second type of wilderness environment – the spiritual North – the northern landscape is no longer a place where man goes to suffer and die but is instead a pure Northern wilderness man journeys through to find and nurture a deep connection between



Figure 2.8 (opposite page): Description of Hostile North

Figure 2.9: Depictions of Hostile North

“My work was founded on a long and growing love and understanding of the North, of being permeated with its spirit. I felt the strange brooding lonely presence of nature fostering a new race, a new age, and as part of it, a new expression in art. It was an unfolding of the heart itself through the effect of environment, of people, place, and time. No man is profound enough to explain fully the nature of his own inspiration – he generally attributes it to a thousand and one extraneous things. To the artist, his art is adventure in which he seeks to regain unity with nature and the knowledge of his own immortal being.”

– Lawren Harris

Figure 2.10: Description of Spiritual North

Figure 2.11 (opposite page): Depiction of Spiritual North

himself and nature.⁹ Through this journey wilderness provides man freedom, regeneration, self-knowledge and salvation.¹⁰ Frye refers to this connection as a spiritual unity and both he and Mitcham link the narrative to the pastoral myth where it is believed that “returning to a simpler way of life” will bring you closer to nature and open up a space for the spiritual connection to occur.¹¹ In Canadian novels this return to a simpler way of life often takes the form of retreating from civilization to a cabin in the woods.¹² However, an additional pattern can be identified in which the further north man goes, the more remote the area he retreats to, the more likely he is to attain a spiritual message or connection between himself and nature.¹³

The two kinds of wilderness image in conjunction with the two types of wilderness environment are used as a way to discuss man’s relationship to nature and depending on what message is being delivered, men, the landscape, indigenous people, and animals are portrayed in differing but specific ways.

The men of the hostile North must be variously noble, virile,



*“Down from his eyrie in the mountains to control the feverish throng on the lakes came Samuel Benfield Steele, the Mounted Police superintendent who was slowly gaining his reputation as **“the Lion of the Yukon.”** ... He was a big man of magnificent physique, tall, powerful, deep-chested, and massive-shouldered, **“erect as a pine tree and limber as a cat,”** as a colleague once described him.”*
– Pierre Berton

Figure 2.12: Description of Men in the North

strong, courageous, determined, self-reliant, competent, and usually, white. They are often depicted as physically healthy and superior to those who surround them and are usually found outdoors confronting the land.¹⁴ The hostile North becomes a testing ground for “real men” who, in order to survive, need to know how to chop wood, make a fire, paddle a canoe, build shelter, and hunt and kill their own food. The purpose of this man of the hostile North is to conquer and control nature to prove their superiority over it.¹⁵ The man of the spiritual North retains many of the same qualities of the man of the hostile North; he must still be healthy, strong, and courageous and know how to “hack it in the bush.” The place they really differ is in their purpose for going north; the man of the hostile North goes to conquer and claim; the man of the spiritual North goes to seek harmony with nature and find himself.¹⁶ This difference in purpose means the men of the spiritual north have some additional qualities such as integrity, generosity, and loyalty.¹⁷ He must also be willing to learn from the animals and the Indigenous people he encounters.

While the northern landscape of myth is made for men, it is portrayed as female. The landscape in the hostile North is described as “a cold and savage female”¹⁸ “of dangerous allure, and staggering beauty, and maddening deceit.”¹⁹ Her goal is to freeze, starve, drown, or drive men crazy.²⁰ Of course, the idea of the land as female is not an exclusively Canadian one, but, the image of it as a hostile female out to kill you is a particularly Canadian idea.²¹ In the spiritual North the landscape is also portrayed as female but this time as mother earth – protective and nurturing, but firm.²² Although, as Atwood points out, the landscape as mother earth portrayal is very rare when compared to the hostile female portrayal.²³

In the settler Canadian image of North as Myth, the North is usually a lonely place where others are rarely encountered,²⁴ but occasionally Indigenous people do appear. However, because they are used to help express the main characters relationship to the natural world, they do not appear as fully fleshed out, complex characters but instead as symbolic projections of the settler Canadian psyche.²⁵

*“Nothing then but to sit out the
darkness,
The second sterile year, and wait
for spring
And pray the straits would crack
Open, and the dash begin again;
Pray you could drive the ships
Through the yielding, melting
floes, drive and press on
down
Into the giant virginal strait of
Victoria.
But perhaps she might not yield,
She might not let you enter, but
might grip
And hold you crushed forever in
her stubborn loins,
her horrible house,
Her white asylum in an ugly
marriage.”*

– Gwendolyn MacEwen

Figure 2.13: Description of North as Female

“The old soldier to whom this order was addressed now prepared, with the assistance of his comrades, to turn the body upon its back when suddenly the air was rent with terrific yells that seemed to be uttered in their very ears, and in the next instant more than a hundred dark and hideous savages sprang simultaneously to their feet within the bomb-proof, while every tree along the skirt of the forest gave back the towering form of a warrior. Each of these, in addition to his rifle, was armed with all those destructive implements of warfare which render the Indians of America so formidable and so terrible an enemy.”

– Major John Richardson

Figure 2.14: Description of the ‘Irrational Savage’

Indigenous people in the hostile North are represented as the human manifestation of the hostility already present in nature and serve as a warning to settler men that this is what the hostile wilderness could turn them into, it is what they need to fight against and conquer.²⁶ This symbolic type can be termed the “irrational savage.” In the spiritual North, Indigenous people are seen as the conduit through which the settler man will achieve the spiritual enlightenment he has journeyed North to attain.²⁷ They are portrayed as living in a close, harmonious relationship with the natural environment which provides them with the deeper spiritual connection the southerner is going North to find.²⁸ However, they are also portrayed as simple, childlike, and primitive.²⁹ This symbolic type is referred to as the ‘happy savage’ or the ‘noble savage.’³⁰

Animals in the North of myth, like Indigenous people, are also symbolic projections.³¹ In the hostile North they are a symbol of man himself and illustrate Darwinistic beliefs about a Nature “red in tooth and claw” where you must kill or be killed.³² Animals in the spiritual

North version however, are given a place of prominence as kin and teachers of man.³³

North as Myth | Explore Ideologies of the Image

As I mentioned previously, the myth of an idealized northern wilderness, its associated images, and their identified characteristics are used to discuss and convey multiple, sometimes conflicting, messages about the human relationship to the natural world. The two types of wilderness environment, the hostile North and the spiritual North, developed in conjunction with exploration and settlement of the North American continent and are connected with different time periods within Canadian history and therefore differing experiences of the natural world.

Among literary and cultural critics the expression of a hostile North is attributed to early colonizers and late nineteenth and early twentieth century immigrants whose experience of the Canadian

*“The dead beast, turned up
(brown fur on back and white
on the belly), lay on the roadway,
its paws extended in the air –
worn-out attitude of prayer.*

*It was beautiful on the well-
travelled roadway
with its dead black lips:
God help me,
I did not even know what it was.
I had been walking into the city
then, early,
with my own name in mind.”*

– John Newlove

Figure 2.15: Description of Animals in the North

landscape was remarkably different from the one we have today.³⁴ The reality of most early Canadians was one of being surrounded by a vast continent that was very sparsely settled, had few modern means of communication or transportation and one where isolation, loneliness and suffering were part of the everyday experience.³⁵ This everyday reality led to a collective understanding of our geography as hostile and cultural products reflected this understanding.³⁶ The image of a hostile North was used to portray man's endeavor into the North as heroic, brave, and noble⁴² and to discuss the man versus nature dichotomy. The image of defeat, which happens more often than not, is meant to be a symbolic reminder to continue to fight.³⁷

Some tenets of the man versus nature ideology in a hostile North are that humans are seen as separate from nature, not part of it. This allows for the belief that man is superior to nature and thereby superior to anything it considers a part of nature such as animals and indigenous people. The belief in human superiority to nature can also lead to the belief in an inalienable right to dominate nature and take from it without

1. Humans are seen as separate from nature, not a part of it.

2. Man is superior to nature and thereby superior to anything it considers a part of nature such as animals and indigenous people.

3. Man has an inalienable right to dominate nature and take from it without consequence.

Figure 2.16: Tenets of Man vs Nature Ideology in Hostile North

consequence.³⁸

The development of a spiritual North is attributed to a shift in the landscape experience of Canadians in the early twentieth century.³⁹ During this time, development and industrialization progressed at an accelerated pace and people began to realize they were destroying nature at a fantastic rate.⁴⁰ Margaret Atwood writes “Sympathy begins to shift from the victorious hero to the defeated giantess, and the problem is no longer how to avoid being swallowed up by a cannibalistic Nature but how to avoid destroying her. ... It [becomes] increasingly obvious to some writers that man is now more destructive towards Nature than Nature can be towards man; and, furthermore, that the destruction of Nature is equivalent to self-destruction on the part of man.”⁴¹

Some tenets of the man versus nature dichotomy in a spiritual north are that man is connected to Nature – not necessarily a part of it but rather a recognition that humanity’s existence depends on a thriving natural environment. Within the narrative, existence is not just about physical sustenance, which nature provides in the literal sense of food

1. Man is connected to Nature, but still separate from it, and humanity needs a thriving natural environment to support its existence.

2. Man requires both physical sustenance and spiritual sustenance from the natural world.

3. The northern wilderness is a strong source of artistic inspiration and journeys North a necessary part of artistic genius.

4. Man has a moral obligation to the environment and we must be Nature's hero or savior.

Figure 2.17: Tenets of Man vs Nature Ideology in Spiritual North

and resources, but also about the spiritual sustenance it provides. This is perhaps why, throughout the last century, there is a very clear emphasis on the northern wilderness being a strong source of artistic inspiration and journeys North a necessary part of artistic genius. The revelation about having a connection to nature also leads to a belief in a moral obligation for man to protect what little nature is left.⁴² This new found connection and moral obligation does not mean the hero complex is left behind; now, rather than glory being achieved through conquering nature, glory is achieved through saving nature.

North as Myth | Propose Potential Problems with the Image for Landscape Architects

The North as Myth image of a vast, untouched wilderness is pervasive throughout Canadian culture and while the image has generally been created by, and exists in, our art and literature, I do believe it is the first image that pops into our minds when we think of the North.

This poses many potential problems for landscape architects who have no prior experience of northern Canadian landscapes or communities, yet are proposing to do design work in those very communities. It is very difficult to keep your preconceived ideas of a place from colouring your experience of it without actively trying to do so. In this section I will discuss how the image may affect our experiences of the northern landscape, so that when landscape architects are working in the north, we can be actively aware of potential issues caused by these preconceived images. We must learn to be appropriately critical of our understanding of our own experiences and biases, as well as how we are imaging and imagining the landscape throughout the design process.

The largest potential issue for landscape architects with the North as Myth image is that it presents itself as a replica of reality. However, it is important to recognize that it, like the other images I will outline, is an abstraction of the actual landscape. That should be an obvious statement but for the North as Myth image it is not. This is because the North as Myth image reproduces objects or elements which occur in the real

“the North as Myth image ... presents itself as a replica of reality. However, it is important to recognize that it ... is an abstraction of the actual landscape.”

Figure 2.18: North as Myth/Potential Problem One

“if you are unable to understand the [North as Myth] image as an abstraction you will have an expectation about what the northern landscape should look and be like. If you are trying to make sense of a landscape you are encountering for the first time, this may mean you will look for what you expect to see instead of what is actually there.”

Figure 2.19: North as Myth/Consequence of Potential Problem One

world and we often forget that they have been reimagined as symbols with an artistic purpose. This is true of literature, painting, and even photography. Representations of North that fall into the North as Myth category use the landscape to make a statement, to say something about the human condition, and they are not intended to be realistic.

This poses two problems for landscape architects. First, if you are unable to understand the image as an abstraction you will have an expectation about what the northern landscape should look and be like. If you are trying to make sense of a landscape you are encountering for the first time, this may mean you will look for what you expect to see instead of what is actually there. For example, if you go to an Arctic site for the first time in winter will you be able to see anything beyond an empty, flat terrain shrouded in darkness? Going a step further, instead of just looking for preconceived images of North, you may try to turn the landscape into this preconceived image of what it should be instead of working with those you are designing for to create a more meaningful landscape. If you are remediating a northern mine, will you be able to

prevent yourself from recreating your idea of a forested wilderness?

Second, if we are able to see these images as an abstraction, we tend to believe that what these acts of art and literature are doing is bringing out some hidden, deeper meaning in the landscape. I believe what they are really doing is engendering the landscape with personal or collective meaning that people with differing cultures or backgrounds may, or may not, recognize or relate to. If we are perpetuating these images of landscape in our own designs, the problem then lies in the inability for our designs to be universally accessible. And in the case of the North, our settler understanding of landscape may not particularly jive with the understanding of landscape by Indigenous people who live in northern Canada.

A final potential problem for landscape architects in utilizing the North as Myth image is the trap of thinking of the northern landscape as a homogenous, unending, empty wilderness – a trap that is easy to fall into whether your image of the wilderness is a flat terrain of ice and snow or a boreal forest. The problem arises from the general lack of

“if we are able to see these images as an abstraction, we tend to believe that what [they do] is bring out some hidden, deeper meaning in the landscape but ... what they are really doing is engendering the landscape with personal or collective meaning that people with differing cultures or backgrounds may, or may not, recognize or relate to.”

Figure 2.20: North as Myth/Another Consequence of Potential Problem One

“In thinking of the northern landscape as a homogenous, unending, empty, mythical wilderness we are failing to see it as a vital, active, ecosystem – one that humans are part of; we are failing to see it in all of its detail and nuance; we are failing to see existing and potential interactions between landscape elements as well as how it changes through space and time.”

Figure 2.21: North as Myth/Potential Problem Two

humans and animals in this image of the landscape as well as a general lack of diversity in plant material and landscapes described or shown. There is a difference between sparsely inhabited versus empty as well as a difference between uncomprehendingly large versus unending, and within the northern landscape there are multiple eco-zones, each with a plethora of varying plants and animals. In thinking of the northern landscape as a homogenous, unending, empty, mythical wilderness we are failing to see it as a vital, active, ecosystem – one that humans are part of; we are failing to see it in all of its detail and nuance; we are failing to see existing and potential interactions between landscape elements as well as how it changes through space and time. These failures will lead to an excess of lost opportunity in the design work of landscape architects because we cannot make use of what we are unable to see and understand. It will lead to the continued capitalization on large scale landscape phenomena such as the northern lights or naturally occurring terrain changes such as rock cliff overhangs, while ignoring small scale landscape phenomena such as the patterns of lichen and moss on the

tundra or the way fallen plant matter creates a spongy floor in the boreal forest. It also could lead to our design interventions being ornamental rather than functional because we are too scared to alter the ‘mythical wilderness’ in any way.

All of this becomes more problematic in the age of anthropogenic climate change. Failing to see humans as part of the landscape, failing to see the North as a vital, active, ecosystem, and failing to see the detail of the northern landscape may mean we fail to see the ways that northern landscape is being drastically altered by things like permafrost melt and insect infestations as well as the potential impacts these changes will have on the inhabitants of northern Canada. In addition, the idea of the North being a vast, unending place may cause us to underestimate how devastating these problems really are – there is so much of it, does it really matter if we lose a little here and there? As landscape architects we need to be able to put these changes into proper perspective and the North as Myth image hampers our ability to do so. The North is a very large area of land but it is finite. Settlement is sparse

North as Myth | Propose Potential Problems

when compared to the southern parts of Canada but people do live and thrive there. There is a lot of snow cover in the winter hiding them but a diversity of plants and animals do exist, and landscape architects do have a responsibility to try to understand the northern landscape as it is, not as we imagine it to be.

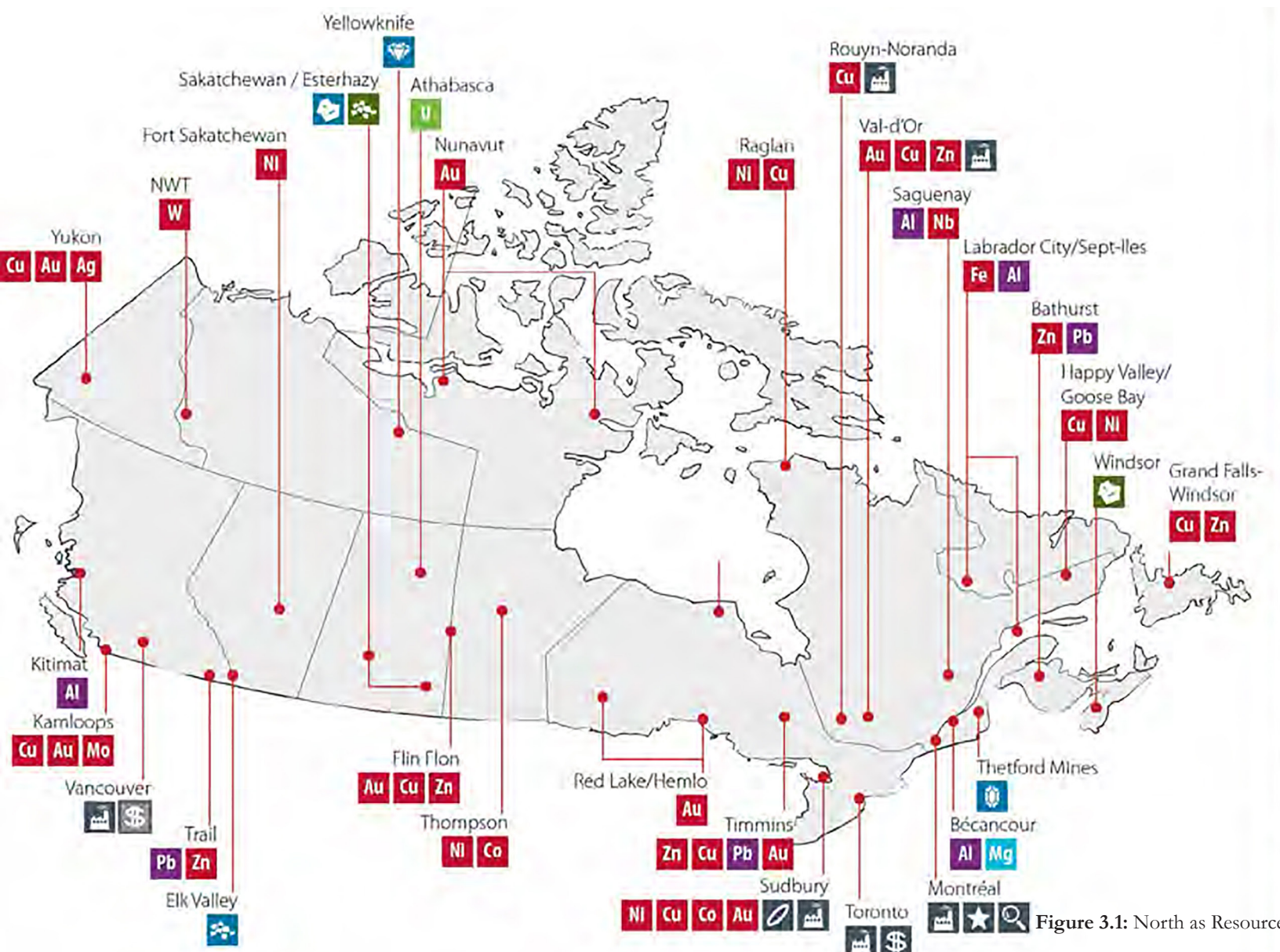
North as Myth | Endnotes

1. Grace, *Canada and the Idea of North*, 185.
2. Grace, 216.
3. Grace, 216.
4. King, *Defiant Spirits*, 20.
5. Mitcham, *The Northern Imagination*, 62.
6. Frye, *The Bush Garden*, 148.
7. Grace, *Canada and the Idea of North*, 32.
8. Grace, 33.
9. Grace, *Canada and the Idea of North*, 35,43; Warwick, *The Long Journey*, 98 - 99.
10. Mitcham, *The Northern Imagination*, 81,91; Warwick, *The Long Journey*, 99.
11. Frye, *The Bush Garden* 246 - 248; Mitcham, *The Northern Imagination*, 11.
12. Mitcham, *The Northern Imagination*, 11.
13. Mitcham, 20 - 21.
14. Atwood, *Strange Things*, 97.
15. Grace, *Canada and the Idea of North*, 122.

16. Mitcham, *The Northern Imagination*, 71.
17. Mitcham, 12,19.
18. Atwood, *Strange Things*, 90.
19. Grace, *Canada and the Idea of North*, 91
20. Grace, 91.
21. Atwood, *Survival*, 202; Grace, *Canada and the Idea of North*, 122.
22. Atwood, *Survival*, 210 - 211.
23. Atwood, 199.
24. Grace, *Canada and the Idea of North*, 184.
25. Atwood, *Survival*, 91.
26. Frye, *The Bush Garden*, 155; Grace, *Canada and the Idea of North*, 185.
27. Atwood, *Survival*, 103; Mitcham, *The Northern Imagination*, 24.
28. Mitcham, *The Northern Imagination*, 24, 28.
29. Atwood, *Strange Things*, 39; Warwick, *The Long Journey*, 104.
30. Atwood, 39; Warwick, 104 -105.
31. Atwood, *Survival*, 91.

32. Atwood, *Survival*, 79 - 80. Grace, *Canada and the Idea of North*, 220 - 221.
33. Mitcham, *The Northern Imagination*, 26.
34. Atwood, *Survival*, 49-50; Frye, *The Bush Garden*, 245.
35. Frye, *The Bush Garden*, xvii, 227.
36. King, *Defiant Spirits*, 417.
37. Grace, *Canada and the Idea of North*, 122.
38. Atwood, *Survival*, 60.
39. Atwood, *Survival*, 49-50; Frye, *The Bush Garden*, 247.
40. Atwood, *Survival*, 60.
41. Atwood, *Survival*, 60.
42. Mitcham, *The Northern Imagination*, 85.

North as Resource



- Co** cobalt
- Cu** copper
- Au** gold
- Fe** iron
- Mo** molybdenum
- NI** nickel
- Nb** niobium
- Ag** silver
- W** tungsten
- Zn** zinc
- Al** aluminum
- Pb** lead
- Mg** magnesium
- U** uranium
- Ⓢ** chrysolite
- Ⓢ** diamonds
- Ⓢ** potash
- Ⓢ** steelmaking coal
- Ⓢ** gypsum
- Ⓢ** salt
- Ⓢ** junior exploration/
mine financing
- Ⓢ** senior exploration/
mine financing
- Ⓢ** allied industries
- ★** head office
- Ⓢ** platinum group
minerals
- Ⓢ** research

Figure 3.1: North as Resource

North as Resource | Identify an Image

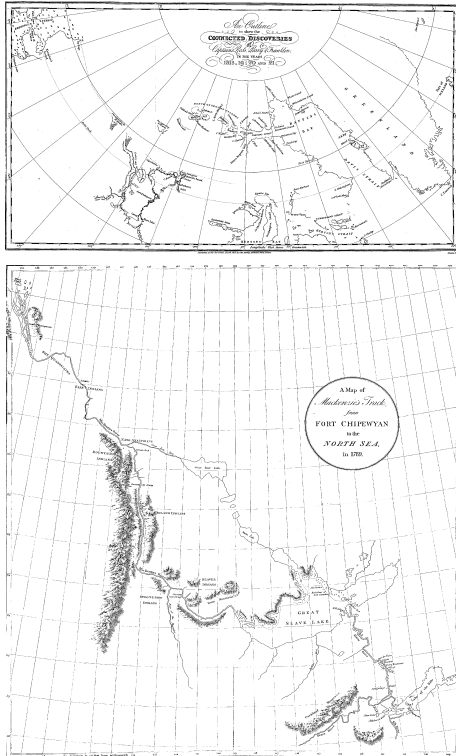


Figure 3.2: Exploration Maps

In the sixteenth and seventeenth centuries, European powers were trying to amass wealth and build ever larger empires and believed the resources of the New World could help them accomplish this.¹ During this time British and French explorers were sent to North America to exploit the fish off its coasts and search for potential mineral wealth on land.² However, when they arrived, they discovered potential wealth in an unexpected natural resource and ended up staying for the furs.³ The exploitation of furs began in trade along the St. Lawrence River and the coast of Hudson Bay but, over time, fur trading companies and voyageurs pushed deeper and deeper into the interior of the continent, into the North, in their quest for new trading partners and greater profits. Animal furs were the first natural resource to be extracted from the North and played a dominant role in the North American economy for centuries.

During the time the fur trade dominated the economy, settlement and development of other forms of resource extraction proceeded slowly, if at all, but at the turn of the twentieth century this changed

when the land of what is now the prairie provinces began to be coveted by those in the South. In the mid-1800's most of the good agricultural land in the province of Canada was settled or occupied and businessmen viewed the prairies as space to expand settlement and a way to create new sources of wealth.⁴ The drive for possession of the land eventually led to Confederation and the creation of the Dominion of Canada in 1867. With the signing of treaties and completion of the Canadian Pacific Railway in 1885 the Northwest was opened for a massive influx of immigrant settlers.⁵ This expansion in the North fed wealth and growth in the South⁶ and land became the resource of the North in the same way furs had been in previous centuries.

Following the First World War precious and base metals were in high demand in the world economy.⁷ Gold had always been an important resource for Canada and remained so, but markets in the twenties expanded to include metals such as copper, lead, zinc, nickel, and others.⁸ These metals are generally located in the Canadian Shield, which occupies the northern latitudes of Quebec, Ontario, Manitoba,

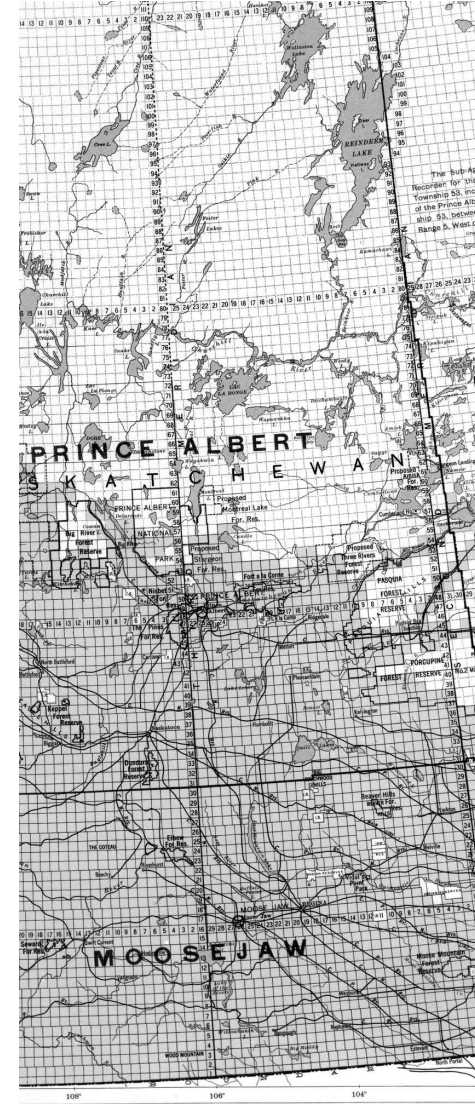


Figure 3.3: Township Map

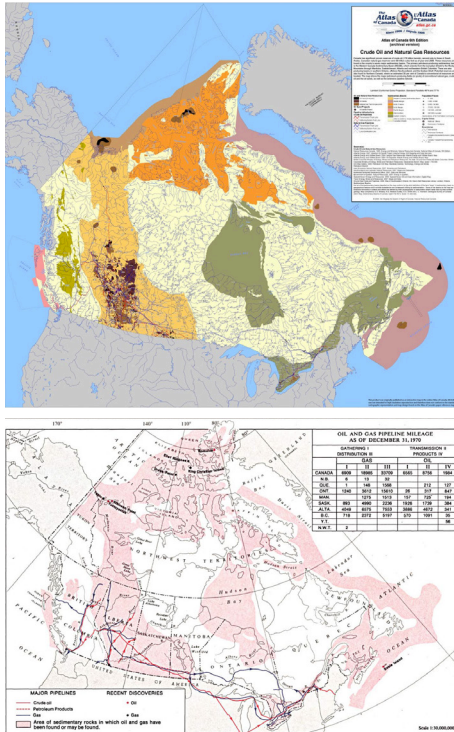


Figure 3.4: Oil and Natural Gas Maps

Saskatchewan and British Columbia as well as large portions of the Yukon and Northwest Territories. Exploration and development of Canada’s North shifted into high gear as mines, both small and large, went into development in places such as Sudbury, Rouyn, and Flin Flon,⁹ and large scale hydro-electric power generation was undertaken in order to provide power to the new mines and accompanying settlements¹⁰ – a trend that only intensified throughout the 40’s and 50’s and 60’s.¹¹ In this way, metals became the resource of the North as furs and land were previously.

More recently, arctic oil and natural gas discoveries in the 1940’s and 1960’s sparked a push for oil and gas exploration and extraction¹² as well as the construction of transportation methods such as pipelines, railroads, and roads.¹³ Realities of resource extraction in the North (such as a lack of transportation networks) has limited how much development of these original discoveries has actually happened¹⁴ yet development of oil and gas has been a constant discussion in the economics and politics of Canada – just look at the ongoing debate around pipelines. Now, with

climate change leaving ever larger swaths of Arctic Ocean ice free in the summer months, pressure to extract oil and gas resources in the arctic, not just from the land, but from the seabed as well, has been increasing¹⁵ and oil and natural gas have become just the latest resource of the North.

In the late 1950's John Diefenbaker ran an election campaign based on the idea that development of the resources of the North was the key to the prosperity of both the region and the entire country;¹⁶ "In his view the vast undeveloped North held the key to Canada's future."¹⁷ His campaign espoused a new 'Northern Vision' which saw "a new Canada – a Canada of the North"¹⁸ and hinged on "Roads to Resources" infrastructure that would open the North to development in the same way Sir John A. Macdonald's railway infrastructure opened up the North-West.¹⁹ Diefenbaker's message clearly resonated with Canadians as his party won the election with a landslide majority vote which shows just how deeply the idea that it is necessary to develop northern resources for economic prosperity is entrenched in settler Canadian culture.

"This national Development policy will create a new sense of National Purpose and National Destiny. One Canada! One Canada, wherein Canadians will have preserved to them the control of their own economic and political destiny. Sir John A. Macdonald gave his life to this Party. He opened the West. He saw Canada from East to West. I see a new Canada – a Canada of the North."

– John Diefenbaker

Figure 3.5: Diefenbaker Election Speech

“Within [Canada’s] historical narrative envisioning of the North is predominantly as a repository of natural resources which are a source of great personal and national wealth.”

Figure 3.6: North as Resource Image

Diefenbaker’s campaign not only capitalized on the resources of the North but also saw the North, in its entirety, as an idea, as a resource to be exploited for political gain.

We have gone from 1497 to 2019 and from resources of the North – fur, land, minerals, oil and gas – to North as a resource in order to demonstrate the extent to which the historical settler narrative of Canada focuses on economics and politics and is the story of discovery, possession, and development of natural resources for economic or political gain over and over again. This is partly due to the economic reality that from earliest European contact with North America to the present, extraction, development, and exploitation of natural resources has been the primary driver of growth, wealth, and prosperity in Canada. The fact that settlement has progressed in a south-east to north-west pattern, meaning the bulk of available natural resources have always been located in the North. Within this historical narrative, the North is predominantly envisioned as a repository of natural resources, which are a source of great personal and national wealth.²⁰ The North as Resource

image is one of maps, charts, lists and numbers and imaging of the North is more about documenting the physical structure, extents, and location of landscape components, rather than understanding how it feels or what it looks like. In this chapter I will discuss the characteristics of, ideologies associated with, and potential problems for landscape architects that may arise from the image of the North that lives in our historical narrative – the North as a stockpile of natural resources.

North as Resource | Outline Characteristics of the Image

The North as Resource image is not colourful or poetic, it is not concerned with appearance or experience of the landscape, and it is rarely interested in how a landscape functions. Rather, the purpose of depictions and descriptions of the landscape in the North as Resource image are to translate the physical landscape into facts and data with the intent to convey information in a simple and straightforward way. The goal of the image is to turn latent landscape features such as rivers,

“The North as Resource image is one of maps, charts, lists, and numbers and imaging of the North is about documenting the physical structure, extents, and location of landscape components.”

Figure 3.7: North as Resource Image Characteristics

mineral deposits, or forests into usable materials.

Visual representations of the northern landscape in this image generally fall into the category of maps and use a standardized set of symbols to accomplish the above stated goal. These visual representations abstract the landscape into a plan composed of lines and points delineating specific features. Lines are used to represent physical features as diverse as coastlines, lakes and rivers, railroads and highways, topography and bathymetry, and extents of ecological zones or mineral deposits. They can also be used to represent non-physical features such as political boundaries and property lines, defining boundaries of possession and control. Dots (or stars, or squares, or coloured blocks) are used to identify the specific locations of things such as settlements, mines, or power plants. The maps are always accompanied by a legend to aid in decoding of the symbols used to produce the image. These typical characteristics of the North as Resource image hold true whether you are looking at maps in the journals of early explorers, history books from the 1930's or modern GIS images in government reports.

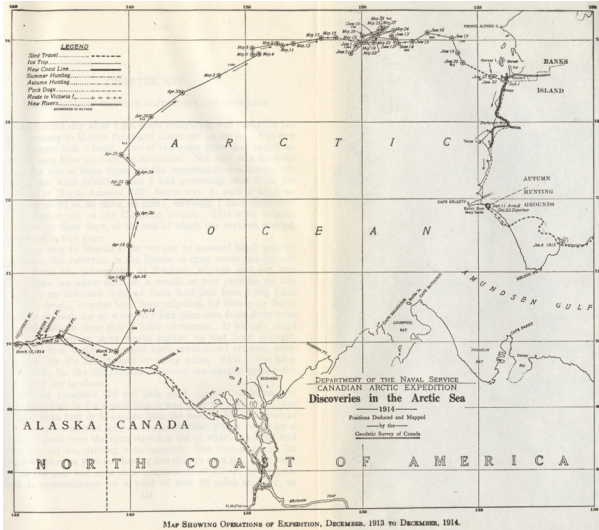
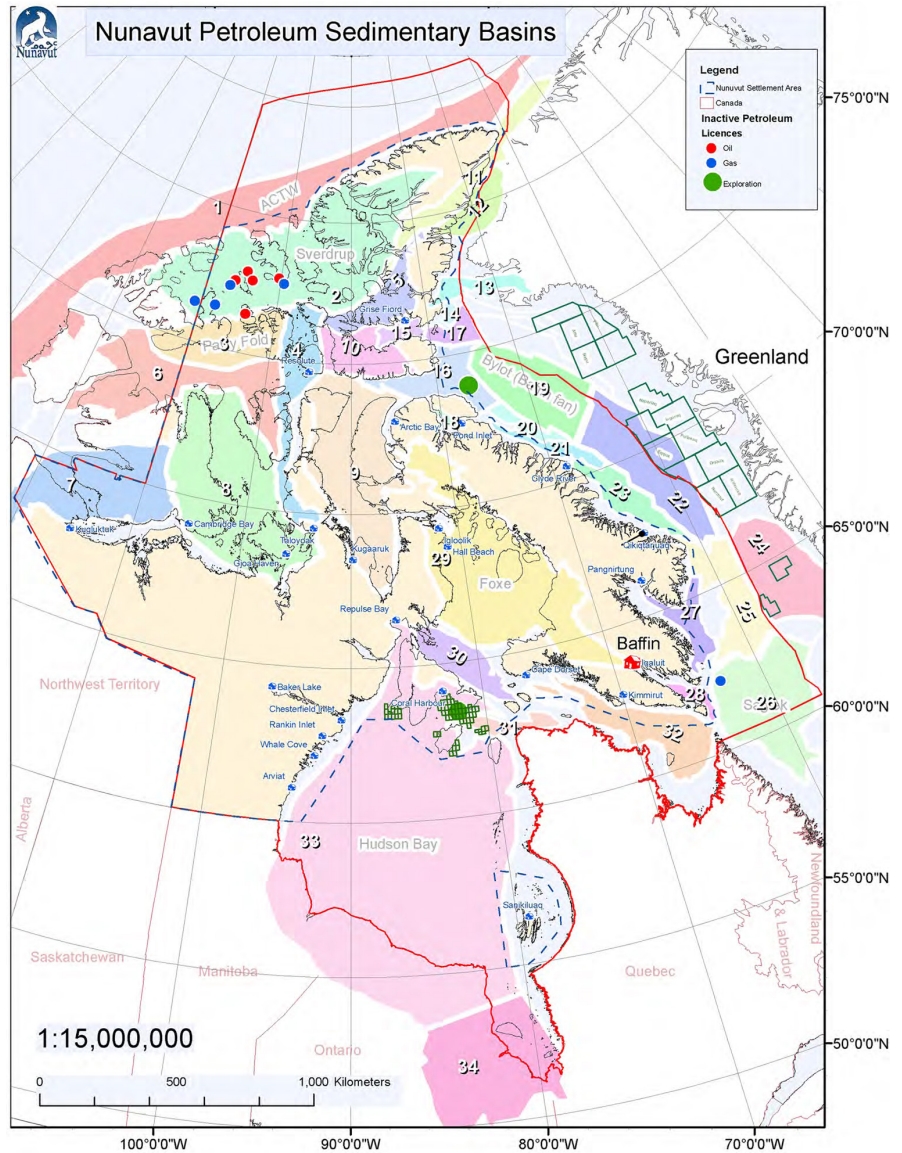


Figure 3.8: Depictions of North as Resource

Figure 3.9 (following page): More Depictions of North as Resource



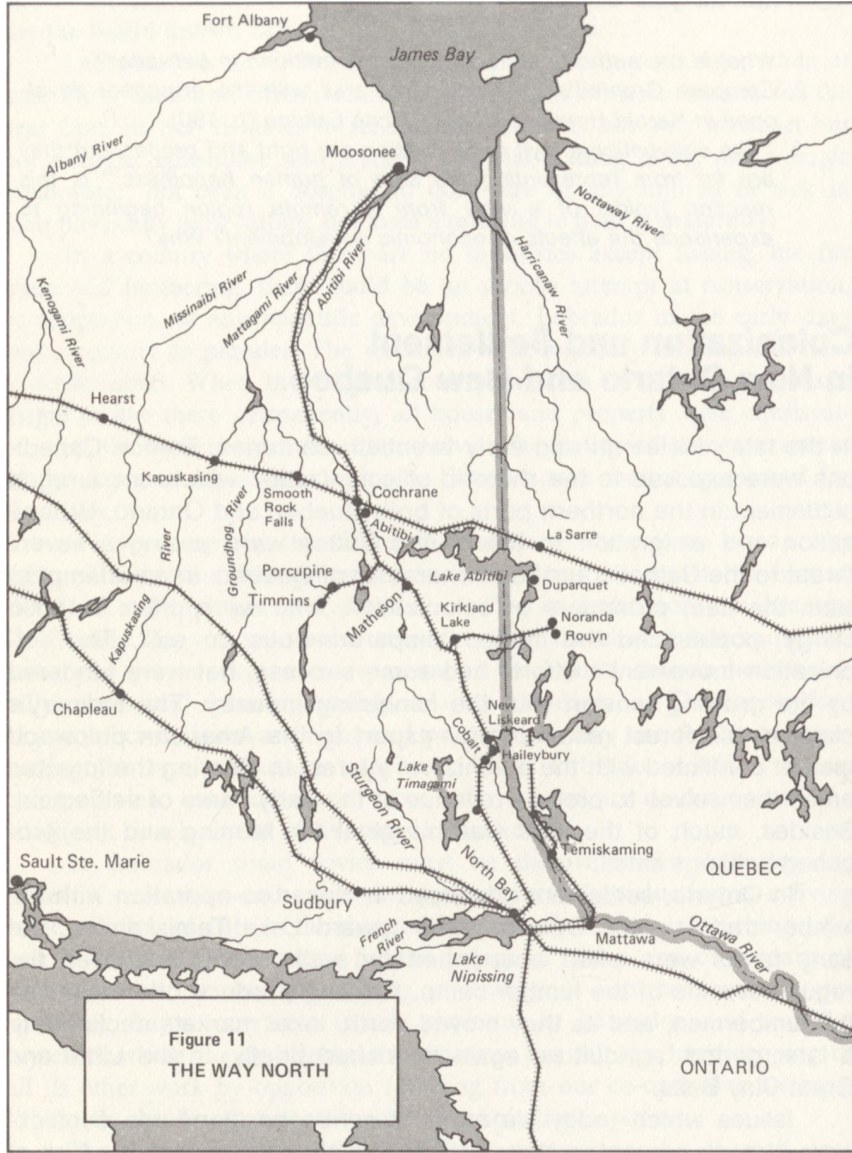
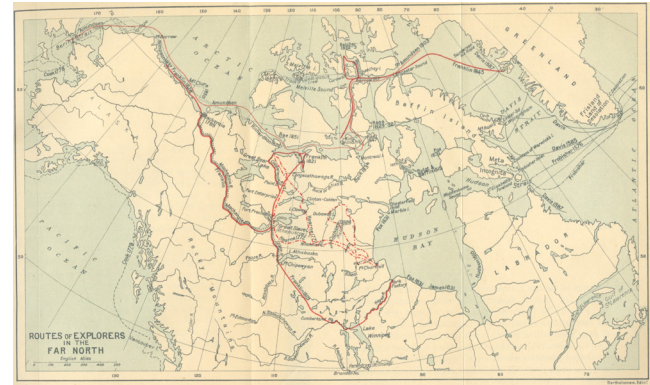


Figure 11
THE WAY NORTH



Verbal or written descriptions of the northern landscape are similar to the visual representations in this image in that they also abstract the landscape into simplified representations, although in the form of lists instead of maps. Within the descriptions the information most often conveyed is the name of a landscape feature, its location, the quantity of said feature which can be found at that location, and its current monetary value if exploited. Interestingly, descriptions that conform to this way of imaging the landscape can be found in sources as far back as exploration journals where a tally, or list, of animals seen or killed are frequently included in daily entries and often appear as the only description of the landscape. This is not surprising given that understanding the landscape in terms of what it can provide to us for our basic survival is at the core of the North as Resource image. Over time, the image has expanded to include materials harvested and extracted for profit and prosperity, rather than basic survival.

When descriptions of the landscape provide more than this basic information, the focus is on describing physical features of a potential

*“What are the prospects for mining in the Territory? The Yukon has a **twenty-billion-ton iron ore deposit in the Snake River area** that may come into production one day. There are deposits of **copper in the White River area, antimony prospects in the Yukon-B.C. border area south of Whitehorse, more lead-zinc in the Ross River Area, asbestos north of Dawson** and lots of alchemist’s symbols on the map.”*

– Jim Lotz

Figure 3.10: Description of North as List Focusing on Resource Type and Location

*“The prime object of the Northern Vision was to foster rapid development of the territories’ resources by making it easier to establish more modern industries, especially mines. Government efforts did help carry new mines into the production stage, notably the large **lead-zinc mine at Pine Point**, the future **Tungsten mine at Flat River** in the Nahanni district, and a **gold mine at Matthew Lake**, 165 miles east of Yellowknife, none of which went into production until after the fall of the Diefenbaker government. The search for minerals ranged widely across the territories, especially when metal prices improved in the early sixties and the government instituted the system of Prospectors Assistance Grants (1962). **Gold** showings were staked in the **Conwoyto Lake and Coronation Gulf** districts east of Great Bear Lake, west of **Carmacks** in the Yukon , and at **Ennadai Lake** in the interior of Keewatin, **base-metal occurrences** in the **Redstone River and Ross River** areas astride the Yukon-Northwest Territories boundary, and **iron** beds at **Snake River** in Northern Yukon and at **Mary River**, inland from Eclipse Sound, Baffin Island. These last attracted a good deal of public attention and*

considerable governmental planning and spending on local facilities, notwithstanding the negligible chance that they would be developed speedily, or ever.

*Oil and gas companies conducted large-scale seismic and test drilling operations on the **Eagle Plain and Peel Plateau** of Northern Yukon and along the **lower Mackenzie**. **Deep wildcat wells** were drilled northwest of **Fort Good Hope**, at **Tununuk Point** and the north shore of the **Mackenzie delta**, and three on the **Arctic islands** in 1961-62. These multi-million-dollar activities helped bring prosperity to Inuvik, Fort McPherson, and Dawson as transport bases and employee recreational centres, and furnished lucrative traffic for the transport services. No commercial production was achieved, but the effort kept hopes alive that the territories would soon be transformed from endless drains on the national treasury into generators of wealth through sales of oil and gas lands and royalties.”*

– Morris Zaslow

Figure 3.11: Another Description of North as List Focusing on Resource Type and Location

resource in order to inform the reader about its usability for purposes of industry. For example, the descriptions will provide the depth of a river and direction of water flow in order to discuss its suitability for power generation, they will provide the species and age of trees in a given location in order to discuss their suitability for forestry, or they will provide the composition of soil in order to discuss its suitability as agricultural land.

As can be expected with an image that relies so heavily on counting and listing resources, numbers are also a common feature in descriptions of the landscape. Numbers are used to express how much there is of a particular resource in the landscape, how much profit is, or potentially is, to be gained from a resource, and how progress and development of said resource is affecting population increases and decreases.

A final characteristic of the North as Resource image is the inclusion of detailed descriptions of processes related to the use of a particular resource – how to do something. In older journals this may be

*“Further south, the river valleys are well clothed with white spruce (the most common tree), birch, aspen, balsam, poplar and tamarack. The **green forest cover looks attractive** but a closer examination reveals timber that is of **little commercial value, a lot of underbrush,** and only thin ground cover where the land is not wet and swampy with muskeg. Apart from some **scattered thick stands,** the timber over most of the Territory is **not of high commercial quality.** In the valley of the Upper Liard, the **spruce is of reasonable size** and might be **suitable for a pulp and paper industry.**”*

– Jim Lotz

Figure 3.12: Description of North to Inform About Usability for Industry

*“The year 1964 saw the passing of one northern industry and the beginning of a new one. In that year the Yukon Consolidated Gold Company went out of business, and the last dredge working the old Klondike creeks ceased operations. After seventy years it was the end of large corporate gold mining in the Yukon, though individual miners continued to work the creeks on a small scale. In the same year, however, the extraction of **lead and zinc** began on a large scale at **Pine Point**, on the south shore of Great Slave Lake. Cominco began operations the next year, and in two years the value of minerals produced in the NWT rose from **\$18.6 million to \$115 million**. In the Yukon a new **lead-zinc** mining operation was developed at **Faro**, boosting mineral production in the Yukon from a value of **\$14.7 million in 1967 to nearly \$230 million in 1975**. Other mines and mining communities were established at **Clinton Creek**, west of Dawson City, where **asbestos** was mined beginning in 1967, and near **Whitehorse**, where a large open-pit **copper** mine went into production in the same year. The dreams of Vilhjalmur Stefansson and other Arctic boosters were realized when in 1970*

*the discovery was announced of huge **oil and natural gas deposits in the Beaufort Sea**, off the northern coast of the Yukon and the Mackenzie Delta near **Tuktoyaktuk**.*

*All this new economic activity, combined with a greatly increased government presence and a significant decrease in Native mortality rates brought about by improved nutrition and health care, led to a rapid rise in the population of the North. **Between 1961 and 1966 the population of the Northwest Territories rose from 23,000 to nearly 29,000, and in another five years to nearly 35,000**. Ten years later, in 1981, it had reached 46,000, and in the mid-1990s it stood at **approximately 60,000**. The Yukon’s population rose rapidly as well, particularly in the latter half of the 1960s, when it grew by nearly a third, **from 14,000 to 18,000; by 1981 it was 23,000; and by 1995 it had reached 30,000.**”*

– William R. Morrisson

Figure 3.13: Description of North Using Numbers

descriptions of how to butcher a caribou or smoke and store fish, and in newer works it might manifest as descriptions of how to extract gold from the earth or how an oil derrick works.

North as Resource | Explore Ideologies of the Image

In the book *Boundless* by Kathleen Winter the author has an exchange with a geologist where she asks “Isn’t making a map of northern minerals a precursor to taking land away from Northern people?”²¹ The geologist replies, “Geologists concern themselves with pure knowledge. We find out what exists. Mapping is nothing but a way of transferring that knowledge to the federal government, and to other people who might have an interest.”²² I think this is a common sentiment among scientists in regards to their work, but I strongly disagree with the geologist’s statement and argue that the North as Resource image – an image characterized by mapping and listing of physical features – has developed out of a desire to make use of the land and not out of the

*“The final stage of gold mining . . . was the use of **dredges**. These were huge, expensive machines that **floated on the creeks**. At the front of each one was a large boom with an endless chain of buckets that chewed the creek beds to a depth of us to 12 metres. Inside the dredge the gold was extracted by a more sophisticated version of the sluice box; then the residue was carried out the back on a conveyor belt along a boom that moved from side to side, depositing the tailings in the serpentine piles of gravel and round stones that are still a notable feature of the lower Klondike River valley.”*

– William R. Morrisson

Figure 3.14: Description of Process Related to Use

“The point of the image, the reason it exists at all, is because of a national need and desire to develop resources for economic gain. Unfortunately this endeavor comes at a severe cost to Indigenous people throughout Canada.”

Figure 3.15: Why North as Resource Exists

pursuit of “pure knowledge”. Although I acknowledge that the drive for the person making the map may be the pursuit of pure knowledge, the intent and funding behind early and subsequent exploration and research in northern Canada has always been to identify and develop natural resources in order to bring economic prosperity to Canada as a whole. The point of the image, the reason it exists at all, is because of a national need and desire to develop resources for economic gain. Unfortunately this endeavor comes at a severe cost to Indigenous people throughout Canada as the ideology that underpins it is based on racist and abhorrent beliefs and actions. The truth of this statement is made evident in the following discussion of the components of the ideology that lives alongside the image.

The three components of the ideology are a belief that you must lay claim to and own land in order to make use of it, accompanied by a belief that the Indigenous people European explorers encountered when they arrived in North America did not own the land which they occupied; a belief that the North belongs to all of Canada and therefore

the Canadian government, accompanied by a belief that our future as a society lies in the development of the natural resources of the North; and finally a belief that resource development, or development of any kind is progress and progress is an unequivocal advance in civilization.

The first component to the ideology associated with the North as Resource image is the belief that you must lay sovereign claim to land in order to possess it and you must possess it, or have ownership of it, in order to make use of it. This belief appears to be simple, common sense and innocent enough, but the process by which European monarchs originally came to “own” the land of North America, and therefore the process by which Canada as a country came to own the land, is based on a set of laws and rationalizations that are fraught with racism and call into question the validity of those original claims – a question which has been playing out in the Canadian court system for decades.

The original claims of ownership of the land were based on the Doctrine of Discovery and the concept *terra nullius*.²³ The Doctrine of Discovery was put forth by Pope Alexander VI in the Papal Bull “Inter

“You must lay sovereign claim to land in order to possess it and you must possess it, or have ownership of it, in order to make use of it.”

Figure 3.16: First Component of Ideology Associated with North as Resource

Caetera” issued in 1493 following Christopher Columbus’ ‘discovery’ of North America. “The Bull stated that any land not inhabited by Christians was available to be “discovered,” claimed, and exploited by Christian rulers.”²⁴ It was basically a framework which allowed Christian explorers to lay claim to lands that were seemingly vacant in the name of their sovereign by being the first Christian empire to discover them.²⁵ The concept *terra nullius*, which translates in English to “uninhabited” or “nobody’s land,” was how the European monarchs got around the fact that the lands they were laying claim to were actually inhabited.²⁶ Europeans believed at the time that Indigenous people were non-Christians, had no organized government structure, and had not developed the land they occupied and therefore were inferior human beings that “could not be considered rightful owners of their lands.”²⁷ The lands were therefore considered *terra nullius*. The British Crown eventually recognized some rights of Indigenous people to the land they occupied in the Royal Proclamation of 1763 which stated the right of Indigenous People to inhabit unsettled British lands but maintained

they neither possessed nor had sovereignty over the land and could only sell it to the Crown.²⁸ The government of Canada eventually chose to enter into treaties with Indigenous people because of this recognition of their limited right to the land.²⁹ It is worth noting, however, that the government only entered into these treaties as their claim to new tracts of land became necessary for expansion and settlement – or put another way, as a desire to develop the land made the treaties necessary – and it is argued they were not entered into in good faith nor have they been properly honoured since being signed.

The belief in a need to possess land in order to make use of it is so ingrained in our western system of laws and organizational structures we also often fail to see that, in addition to being based on other racist beliefs and actions, it stands in stark contrast to Indigenous notions of stewardship of the land. Lotz describes the difference in the following manner, “The Indians (sic) did not “own” land in the European sense; they took the yield of the land, and passed on the land to others who came after them. By contrast the white man’s method has frequently

“The North belongs to all of Canada which means the natural resources of the North belong to Canada as well and Canada’s future lies in development of these resources.”

Figure 3.17: Second Component of Ideology Associated with North as Resource

been to grab the land, plunder it and leave.”³⁰ These two competing ideologies will force Canadian society to adapt its laws and beliefs in order to move forward in reconciliation with Indigenous people.

The second component to the ideology associated with the North as Resource image is the belief that the North belongs to all of Canada. This belief is occasionally expressed in exactly these terms but more often shows itself in the language used to claim the North. Within the political rhetoric identified with the North as Resource image there are multiple examples where the land of the North is referred to as “Canada’s inheritance”³¹ or “Canada’s Birthright.”³² The belief that the North belongs to Canada contains a second related notion – the *natural resources* of the North belong to all of Canada as well. This idea is accompanied by the often expressed sentiment that Canada’s future lies in development of the natural resources of the North; as mentioned in the introduction of this chapter, Diefenbaker ran an entire election campaign on this sentiment and won. This component of the ideology does not just

show itself in language but in action as well. The federal government of Canada has a history of retaining control over the natural resources of the North for as long as it can. While the prairie provinces of Manitoba, Saskatchewan, and Alberta were created in 1870, 1905, and 1905 respectively, ownership of their natural resources was not granted until 1930.³³ The territories have fared much worse with the Yukon gaining control of their resources in 2003 and the Northwest Territories in 2014.³⁴ Nunavut still does not have control over its resources, although they are working towards that goal.³⁵ There are some valid economic and political reasons for the federal government to retain resource right when a province or territory originally comes into being but it is hard to think the belief that the resources of the North belong to all of Canada did not play a role in the length of time it has taken for the Territories to gain resource rights.

The final component to the ideology associated with the North as Resource image is the belief that resource development, or development of any kind, is progress and progress is an unequivocal

“Resource development, or development of any kind, is progress and progress is an unequivocal advance in civilization.”

Figure 3.18: Third Component of Ideology Associated with North as Resource

advance in civilization. The belief is made evident when a speaker or writer implies that the permanent settlement of agricultural or industrial economies is preferable to nomadic cultures based in subsistence and hunting economies. Within the books nomadic cultures and economies are described as primitive and sometimes with a tone of disgust whereas permanent settlement is described as a “move forward,”³⁶ “proper development,”³⁷ and “a complete civilization.”³⁸ The belief can be associated with a paternalistic attitude towards Indigenous people in Canada and has historically led to government policy and investment in northern Canada focusing on replicating a settler Canadian society based on resource extraction.³⁹ Much of this government policy in regard to Indigenous people has also been crafted with the express intent to assimilate them into a settler Canadian lifestyle of permanent settlement and participation in an industrial economy, rather than trying to find ways to assist them in maintaining their own cultures and economies. Canadian society as a whole is now dealing with the consequences of these harmful beliefs and actions and must find a new way forward.

North as Resource | Propose Potential Problems with the Image for Landscape Architects

It is a given that landscape architects need to know and understand the compositions and physical realities of the landscapes in which we are working. There are technical and aesthetic aspects to design that are served by this knowledge. It is also a given, then, that the North as Resource way of imagining the northern landscape is going to be a part of the work we do. There is also truth to the statement that northern Canada is a large source of undeveloped natural resources and one can imagine landscape architects working in a northern context where we need to reconcile resource development and community needs. One goal in these contexts needs to be to not repeat mistakes of the past and to accomplish this there are some potential problems in imagining the landscape as a resource that we need to be aware of.

First, mapping and naming is not a benign act; it is a form of knowledge and knowledge is power, even when it is not being wielded. As previously argued the mapping and describing of physical features of the landscape is the first step in the process of bringing them

“Mapping and naming is not a benign act; it is a form of knowledge and knowledge is power, even when it is not being wielded.”

Figure 3.19: North as Resource/Potential Problem One

“Landscape architects may potentially be generating new knowledge about the landscape they are working in. ... Once the information is produced and available to others it can, and likely will, be used for purposes over which we have no control.”

Figure 3.20: North as Resource/
Consequence of Potential Problem One

“The pervasiveness of the development is progress and progress is advancement belief within settler Canadian culture.”

Figure 3.21: North as Resource/
Potential Problem Two

into human use and historically this type of imaging of the northern landscape has been for the express purpose of exploiting natural resources for economic gain. In northern Canada there are large tracts of landscape that have not been mapped in great detail. Because of this fact, landscape architects may potentially be generating new knowledge about the landscape they are working in as opposed to gathering readily available information as we do in southern Canada. While this new knowledge is important, and probably necessary, for us to generate because it informs our design decisions, we must be aware that once the information is produced and available to others it can, and likely will, be used for purposes over which we have no control. This potential hazard can be mitigated by being cognizant of the issue and carefully controlling to whom our maps or information is made available.

A second, and potentially more dangerous, problem landscape architects need to be aware of is the pervasiveness of the development is progress and progress is advancement belief within settler Canadian culture. It is a value judgement we may be harbouring without realizing.

The belief leads to an understanding of permanent settlement as preferable to other settlement patterns, which could result in a landscape architect proposing a design solution that mimics assimilationist tragedies already enacted in the past. For example, it is easy to imagine a landscape architect proposing the relocation of small northern communities to create larger, more centralized communities in order to maximize efficiencies in the delivery of social programs like health care and education. What that landscape architect is failing to see is this design proposal would enforce a permanent settlement pattern and dislocate people from their current homes – a tragedy that has historically been forced upon northern Indigenous communities many times. What appears to be an obvious solution to funding and staffing shortages fails to take into account the social and cultural costs the communities will pay.

As landscape architects working in a northern context we need to be knowledgeable about the history of the communities we are working with and be prepared to adapt settler Canadian models of settlement

“The belief leads to an understanding of permanent settlement as preferable to other settlement patterns which could result in a landscape architect proposing a design solution that mimics assimilationist tragedies already enacted in the past.”

Figure 3.22: North as Resource/
Consequence of Potential Problem Two

North as Resource | Propose Potential Problems

and habitation in order to make them work for communities who live a lifestyle very different from the one we know. Indeed, perhaps we need to be prepared to completely abandon our settler Canadian models and imagine a new form of settlement and habitation altogether.

North as Resource | Endnotes

1. Grant, *Polar Imperative*, 55.
2. Creighton, *Dominion of the North*, 2 - 10.
3. Creighton, 2 - 10.
4. Creighton, *Dominion of the North*, 272; Hodgins et al., *The Canadian North*, 224.
5. Creighton, *Dominion of the North*, 384 - 387.
6. Creighton, 566.
7. Creighton, *Dominion of the North*, 471; Zaslow, *The Northward Expansion*, 100.
8. Zaslow, *The Northward Expansion*, 100.
9. Creighton, *Dominion of the North*, 475.
10. Hodgins et al., *The Canadian North*, 195; Zaslow, *The Northward Expansion*, 121.
11. Zaslow, *The Northward Expansion*, 246.
12. Grant, *Polar Imperative*, 339; Zaslow, *The Northward Expansion*, 242 - 243.
13. Zaslow, *The Northward Expansion*, 242 - 243.
14. Grant, *Polar Imperative*, 366, 376.

15. Grant, 402 - 403, 463.
16. Morrison, *True North*, 160.
17. Morrison, 160.
18. Diefenbaker, *Opening Campaign Speech, Winnipeg, February 12, 1958*, 6, in “The Federal Elections of 1957 and 1958 – Diefenbaker Canada Centre – Documents,” *University of Saskatchewan* online, <https://www.usask.ca/diefenbaker/virtual-exhibits/federal-elections-1957-1958.php>.
19. Morrison, *True North*, 160 - 161.
20. Grace, *Canada and the Idea of North*, xvi; Hodgins et al., *The Canadian North*, 247; Mowat, *Ordeal by Ice*, 13.
21. Winter, *Boundless*, 90.
22. Winter, *Boundless*, 90.
23. “The Doctrine of Discovery, 1493,” *The Gilder Lehrman Institute* online, <https://www.gilderlehrman.org/content/doctrine-discovery-1493>.
24. Grant, *Polar Imperative*, 14 - 16.
25. “Christopher Columbus and the Doctrine of Discovery – 5 Things to Know,” *Indigenous Corporate Training Inc.* Online, <https://www.ictinc.ca/blog/christopher-columbus-and-the-doctrine-of-discovery->

5-things-to-know.

26. Grant, *Polar Imperative*, 14.
27. Grant, 14.
28. Grant, 16.
29. Grant, 16.
30. Lotz, *Northern Realities*, 204.
31. Creighton, *Dominion of the North*, 153.
32. George Brown, “The Northwest – Our Birthright” (Toronto: *The Globe*, December 10, 1856), page unknown, quoted in Hodgins et al., *The Canadian North*, 226 - -227.
33. Lotz, *Northern Realities*, 149.
34. Graham and Yarhi, “Territorial Government in Canada,” *The Canadian Encyclopedia*, <https://www.thecanadianencyclopedia.ca/en/article/territorial-government>.
35. Graham and Yarhi, “Territorial Government in Canada,” *The Canadian Encyclopedia*, <https://www.thecanadianencyclopedia.ca/en/article/territorial-government>.
36. Zaslów, *The Northward Expansion*, 69
37. Zaslów, 177.

38. Lotz, *Northern Realities*, 60.

39. Lotz, *Northern Realities*, 60; Zaslow, *The Northward Expansion*, 186.

North as Change

North as Change | Identify an Image

British engineer Guy Callendar first suggested the increase of atmospheric carbon dioxide concentrations over the preceding century were the cause of increased global temperatures back in 1938¹ and US scientist Wallace Broecker introduced the term “global warming” into public discourse in 1975,² but, it wasn’t until the mid-1990’s that the threat of anthropogenic climate change became a recognizable part of popular and political discourse with the publishing of the Intergovernmental Panel on Climate Change Second Assessment Report – “the first definitive statement that humans are responsible for climate change” – in 1995 and the signing of The Kyoto Protocol agreement in 1997.³ In more recent years, the signing of the Paris Climate Agreement, described as “the first-ever universal, legally binding global climate deal,” by 195 countries in 2015,⁴ popular climate change documentaries such as Al Gore’s *An Inconvenient Truth* and *An Inconvenient Sequel*, Leonardo DiCaprio’s *Before the Flood*, and the award winning *Chasing Ice*, books such as *This Changes Everything* by Naomi Klein, *Climate Wars* by Gwynne Dyer, and *The Sixth Extinction* by Elizabeth Kolbert, as well as devastating

occurrences of wildfires, floods, and storms have thrust the issue of climate change to the forefront of popular consciousness. In Canada, multiple polls conducted in the last five years show that the environment and climate change has grown to be one of the top five biggest concerns for Canadians, especially Canadians under the age of 35, and this concern over environment is a dramatic increase from a decade ago.⁵

The melting arctic plays a key role in the dialogue and images of the popular and scientific discourse on anthropogenic climate change. Dramatic images and descriptions of crumbling glaciers and melting sea ice are interspersed among discussions and images of destructive fires, floods, and droughts that have caused massive amounts of human suffering throughout the world, suggesting a link or shared victimhood between the two. Within the popular discourse on climate change in Canada this melting arctic, or the North, is seen not just as a victim of climate change but, in a complicated twist, as a driver of climate change as well because of the feedback loops connecting physical processes. The North has also become a harbinger of the devastating consequences to



Figure 4.2: Melting Arctic in Commentary on Anthropogenic Climate Change

come for the inhabitants of southern latitudes of Canada if the world cannot curb the current trajectory of climate change.

“The Canadian North [is] a massive sheet of snow and ice that is melting at an accelerated rate causing catastrophic consequences for animals and humans who live there and potentially for humanity on earth as a whole.”

Figure 4.3: North as Change Image

“Animals are the face of devastation in this northern landscape where the landscape and its inhabitants are envisioned and described as interacting physical processes.”

Figure 4.4: North as Change Image Characteristics

All of this has led to the imaging of the Canadian North as a massive sheet of snow and ice that is melting at an accelerated rate causing catastrophic consequences for animals and humans who live there and potentially for humanity on earth as a whole. Animals, polar bears in particular, are the face of devastation in this northern environment where the landscape and its inhabitants are envisioned and described as interacting physical processes as opposed to objects or living beings. In Canada, the image also includes a call for the need to recognize that the North is not occupied just by polar bears, caribou, and whales, but is also home to *people*; people who are already suffering the consequences, both physical and cultural, of anthropogenic climate change. In this chapter I will explore the characteristics of, and ideologies associated with the image of North as a catastrophically melting block of ice and propose potential problems that may arise for landscape architects in imagining the landscape in this manner.

North as Change | Outline Characteristics of the Image

In the North as Change image, descriptions and visual depictions of landscape focus on quantifying the amount of transformation that has occurred in a part of the landscape over time. The three most common transformations that are visualized and described are the loss of sea ice, glaciers receding, and permafrost melt. Other descriptions of transformation appear, such as increased intensity and frequency of storms, increased or decreased vegetation growth, and changes to the geographic ranges of animal species and diseases, although the last three examples are not as common as the first three. The predominance of descriptions of changes in sea ice, glaciers, and permafrost in this image of the North can be attributed to their causal connection to most other physical processes in the Arctic. Changes in sea ice, glacier, and permafrost extents not only affect things like precipitation, ocean levels, and ground stability but also, vegetation growth, animal feeding habits, and human hunting patterns. They are also large drivers of Arctic weather and climate patterns and Arctic weather and climate patterns drive global weather and climate patterns. Ultimately, changes in these

“Between 6 and 7 July 2010 the Jacobshaven Glacier in western Greenland lost a chunk of ice nearly 3 square miles in size, significantly contributing to the retreat of the glacier inland. A few weeks later a giant ice shelf three times the size of Manhattan broke off the northern tip of Greenland. In the summer of 2011 I transited the Northwest Passage from east to west, something that would have been impossible even five years earlier. In Baffin Bay and Lancaster Sound there were lots of icebergs, including a huge sheet of ice more than 13 miles long that had likely broken off northwestern Ellesmere Island. But in the Northwest Passage itself, there was not a shred of ice.”

– Shelley Wright

Figure 4.5: Description of Northern Landscape As Transformation



“Even now, hundreds of thousands of tons of plant-, animal-, and microorganism-based carbon are washed into the sea along every mile of eroding coastline each year. These materials had previously been sealed in the permafrost. ...

Benjamin Jones of the U.S. Geological Survey (USGS) recently found that a stretch of coastline he had been monitoring in Alaska had retreated an average of 22.3 feet per year between 1955 and 1979. Over the next twenty-three years, that rate increased by 28 percent. The low-lying coastline of Alaska that Jones was studying was losing 44.6 feet of land per year between 2002 and 2007 and 82 feet between 2008 and 2009.

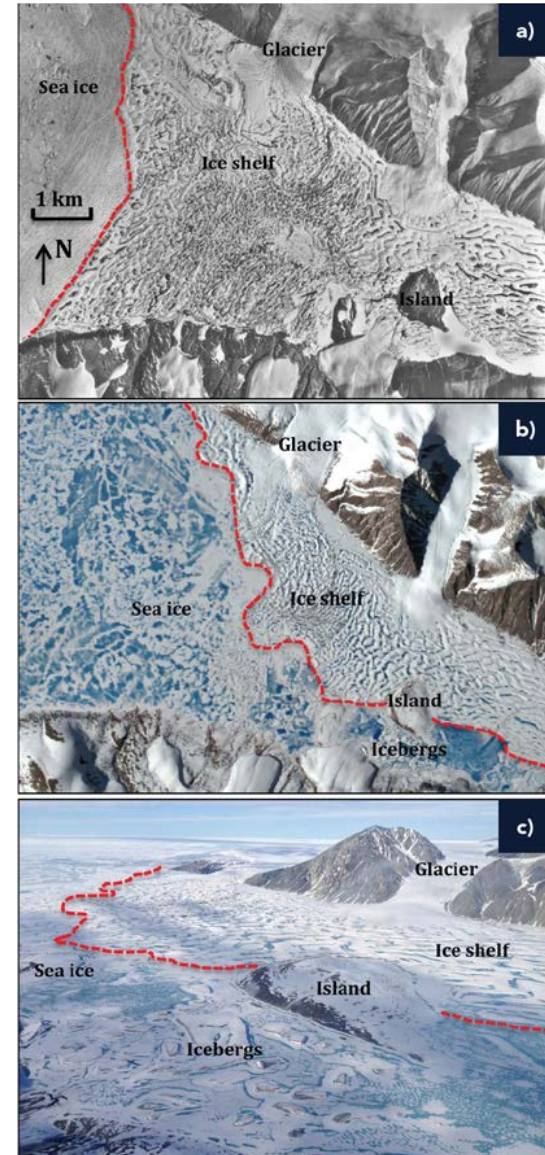
The effect of this loss is exacerbated by rapid permafrost thawing occurring farther upstream along big Arctic rivers such as the Yukon and Mackenzie. Steve Kokelj and his colleagues have documented monumental slumpings of riverbanks in the Peel River that flows from the Yukon into the Northwest Territories into the Mackenzie. The collapse of these shorelines changes both the chemistry of the rivers and shoreline soils in a way that may be lethal to fish and favorable for invasive plants species that are migrating north and overtaking some tundra ecosystems.”

– Esward Struzik

Figure 4.6 (opposite page): Depictions of Melting Snow and Ice

Figure 4.7 (above): Another Description of Northern Landscape as Transformation

Figure 4.8 (right): Depiction of Transformation in Glacial Ice Shelf

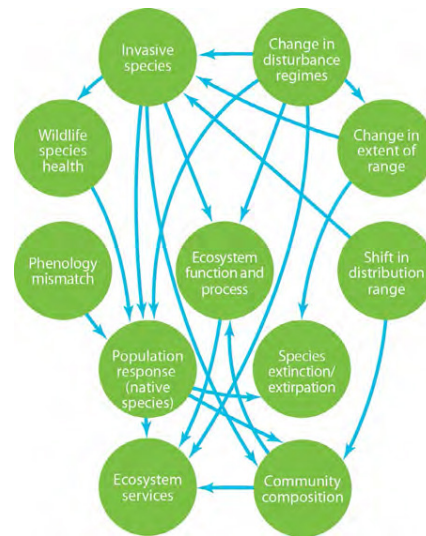
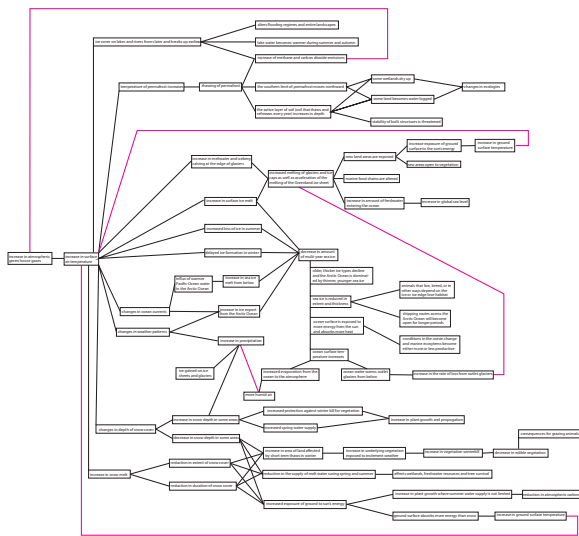
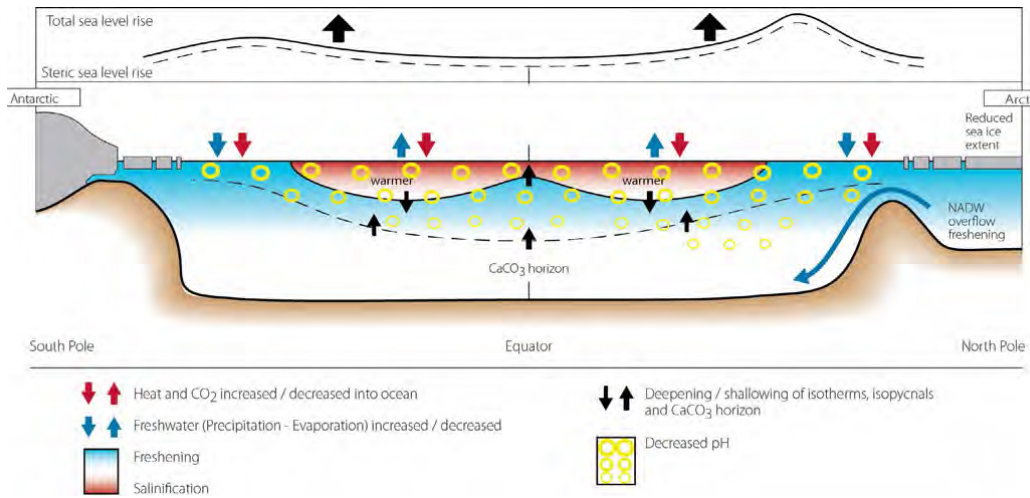


three components of the landscape affect every other physical process in the Arctic and eventually, the globe. These three transformations have been studied more extensively by scientists than all of the others causing them to dominate the image of North as Change. Their predominance in the imagery of documentaries and news stories may also have to do with their shock value in illustrating for Canadians, and the world, just how quickly changes to the Arctic environment are taking place. It is much easier and more impactful to visualize the melting of a glacier than it is warming ocean currents or population dynamics of a caribou herd.

In addition to a focus on transformation, North as Change, as opposed to describing the landscape in terms of its appearance or composition, as the other two images do, tries to understand and explain the landscape as a series of interconnected physical processes. Visual and textual representations of the landscape focus both on processes themselves and on the connections between processes. These representations demonstrate that the connections between processes are a pattern of feedback loops following a non-linear path. Due in part

Figure 4.9 (opposite page left):
Depictions of Northern Landscape as
Interconnected Physical Processes

Figure 4.10 (opposite page right):
Description of Northern Landscape as
Interconnected Physical Processes



“Multiple climate change effects will not only interact but will also do so in a way that may amplify their impact on all the other factors. ... As the atmosphere and ocean warms, the release of greenhouse gases will increase ... As dark blue oceans and brown landscapes absorb more of the sun’s rays as heat, less energy is bounced harmlessly out of the atmosphere. The albedo, or reflective, effect of white ice and snow decreases, and more heat is trapped in the lower atmosphere. Methane (natural gas) that has been trapped in the tundra ... [is] beginning to seep into the air and ocean ... the more heat, the more melting; the more melting, the more heat.”

– Shelley Wright

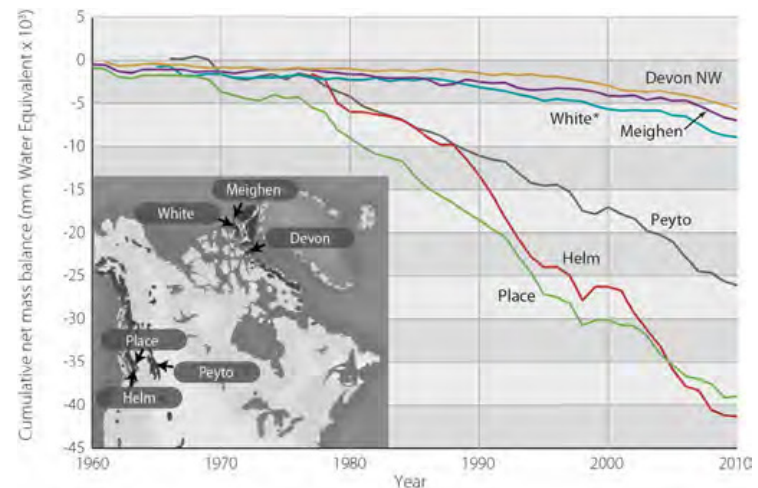
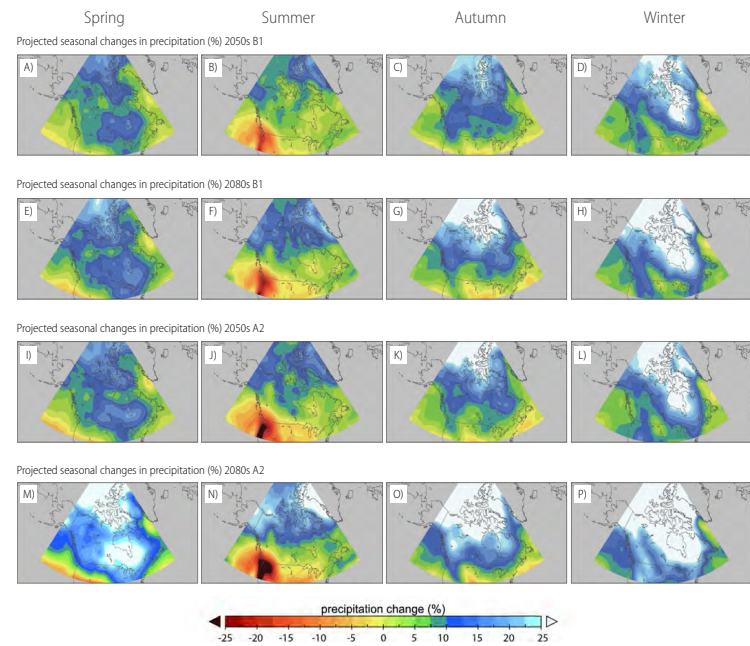
“Holdsworth first proposed the idea of extracting an ice core from Mount Logan in 1974. ... he’s clearly most proud of the 338-foot-long (103 m long) core that was extracted in 1980-81. The data provided him and other scientists with insights into climate change that were significant enough to be published in Nature, arguably the most respected scientific journal in the world. ...

“The oxygen isotopes in undisturbed snowfall layers stored annually in that core provided them with a climate record that dates back to 1736. Those layers at the bottom half of the core showed that for the first 150 years, the amount of annual snowfall was almost static year after year. But around the time the Little Ice Age ended in 1850 to 1870, they could see clear signs that snowfalls were increasing, presumably because the atmosphere had warmed. That increase in snowfall was even more dramatic in the later years. Between 1948 and 2000, the rate of snowfall increase was four times compared to the levels that fell 1851-2000.”

– Ed Struzik and Gerald Holdsworth

Figure 4.11 (above): Description of Northern Landscape Incorporating Time

Figure 4.12 (right): Depictions of Northern Landscape Incorporating Time



to the landscape being thought of as a series of processes and in part to the focus of this image being on transformations in those processes, time also becomes an important factor in all North as Change images and descriptions. Time is difficult to represent in static images so time lapse photography and graphs are a common feature of this image. In some ways these representations of landscape stand in contrast to the dominant image in North as Change of a frozen, homogenous landscape that is melting as they illustrate the complexity of the Arctic landscape, but, in other ways they support the dominant image as they continually focus on components of the landscape that are freezing and melting such as glaciers and permafrost.

Another characteristic of this image is that descriptions of transformation and processes in the landscape are usually followed by an outline of the consequences of these changes for animals and humans. In these descriptions, emphasis is placed on the impending consequences for wildlife while the consequences outlined for humans usually focus on the impending consequences for human inhabitants of more southerly

“What affects one affects us all. The Arctic, is the cooling system, ... for the entire planet. As its ice and snow disappear, the globe’s temperatures rise faster and erratic weather becomes more frequent. This results in drought, floods, tornadoes and more intense hurricanes. Sea levels around the world rise, and small islands from the Caribbean to Florida to the South China Sea slip into the ocean. From the farmers in Australia to the fisherman in the Gulf of Mexico or the homeowners of New Orleans, the devastation escalates. The future of Inuit is the future of the rest of the world – our home is a barometer for what is happening to our entire planet.”

– Sheila Watt-Cloutier

Figure 4.13: Description of Consequences to Transformation With a Tone of Doom



Figure 4.14: Depictions of Animals in North as Change

latitudes. The emphasis on concern for how anthropogenic climate change will affect animals in the Arctic is accompanied by an increase in their appearance in settler Canadian visual representations of the North. This is especially true of the polar bear which has become the face of climate change in the Arctic to settler Canadians and the world. In his book *Future Arctic: Field Notes from a World on the Edge* Edward Struzik writes “If anything about the meltdown of the Arctic mattered to the rest of the planet, it was the fate of this animal.”⁶

In most descriptions of the North as Change landscape there can also be found a tone of impending doom. Changes in the landscape are frequently described as having, or potentially having, catastrophic consequences. The tone of impending doom can be attributed to the fact that most of the books in the North as Change image are written as a warning to Canadians and people in other western societies to change their behavior and do it quickly in order to prevent their own demise.

The language used to locate the North in the North as Change image is also quite different from the other images. In this image the

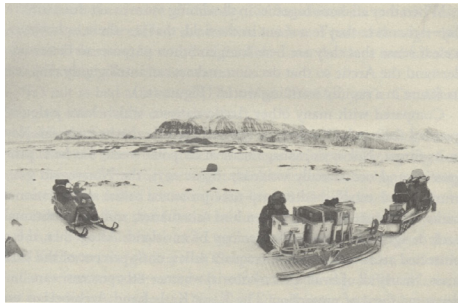


Figure 4.16: Depictions of Scientists in North as Change

an unsettling characteristic in the visual depictions of these scientists was found. Most images of scientists in the field bear an uncanny resemblance to images of people in the empty, white North in North as Myth. The scientist stands diligently undertaking their work surrounded by a vast, frozen, and empty landscape, replacing the explorer/settler/traveller in the image of North. The only difference is that instead of trying to conquer the North the scientists are trying to understand it – but they are still the hero of the story. It seems dominant narratives are hard to alter.

North as Change | Explore Ideologies of the Image

Unlike the North as Myth and North as Resource images, the North as Change image does not have an easily identifiable set of beliefs or ideology associated with it. This is potentially attributable to the fact that, finally, Indigenous voices are being incorporated into the narrative and image of North. They are still not the dominant voice but they

are starting to make themselves heard and their perspective and beliefs sometimes contravene the settler Canadian viewpoint being espoused. This leads to ambiguity in the belief system being projected by the image as a whole, which is perhaps a good thing.

Nowhere is this demonstrated more clearly than in discussions about scientific knowledge versus traditional knowledge (TK) or Inuit Qaukimajatuqangit (IQ). Within the books assessed for this chapter there are examples of clear valuing of scientific knowledge over TK and IQ, examples of recognizing the value of TK and IQ when used in conjunction with scientific knowledge, and examples where TK and IQ are considered equal to scientific knowledge and arguments for their inclusion in decision making processes are made. There is no clearly defined ideology with the image but rather an aspect of the image where competing ideologies are in conflict.

One real world scenario where the conflict between these competing perspectives is playing out and where the North as Change image plays a significant role is in the ongoing controversy between

“The North as Change image does not have an easily identifiable set of beliefs or ideology associated with it. ... [there is ambiguity in the belief system being projected by the image as a whole ... Nowhere is this demonstrated more clearly than in discussions about scientific knowledge versus traditional knowledge or Inuit Qaukimajatuqangit.”

Figure 4.17: Ambiguity in the North as Change Ideology/Scientific Knowledge vs. TK and IQ

scientists, conservationists, and Inuit people over management of polar bear populations in northern Canada. Scientific research shows that some polar bear populations are currently increasing and some declining but overall paints a bleak picture for their survival in a melting Arctic⁷ and one suggested stressor that exacerbates the problem is the Inuit harvest of polar bears. However, the polar bear, as a source of food, clothing and a livelihood, is in a place of prominence in Inuit lives and culture⁸ and many Inuit do not believe what the scientists are saying because their experience tells them the population is actually increasing.⁹ In many cases they do not want to reduce the amount of polar bears they harvest.¹⁰ The Inuit have a say over the polar bear quotas, but ultimately the decision lies with the federal government who have so far sided with the Inuit. One has to wonder who will ultimately win out in the battle over public opinion given the polar bears cult-like status in the North as Change image.

A second belief associated with the North as Change image where ambiguity can be found is the belief that transformation or

change in the landscape is a normal and valuable factor in a functioning landscape – a landscape is composed of processes, after all. However, in the North as Change image this belief comes with a caveat; increased anthropogenic carbon dioxide emissions have accelerated transformations in the northern landscape to such a degree that the ability to adapt for animals that inhabit this landscape becomes difficult, if not impossible, and mass extinctions a real possibility. The belief that transformation is normal still exists but that must be reconciled with the knowledge that the rate at which it is currently happening because of anthropogenic climate change, is not normal. This is perhaps where the tone of doom in the image comes from; it is not a fear of change, it is a fear of the pace of change and what that potentially means for humanity. If the animals are unable to survive the projected rate of change, will humans be able to adapt and survive it? Within the alarmist dialogue on climate change it is common to hear the comment that climate change may mean the end of the world. What is really meant by this comment, and what we are really fearful of, is that it may mean the end of humanity

“transformation or change in the landscape is a normal and valuable factor in a functioning landscape ... However, that must be reconciled with the knowledge that the rate at which it is currently happening because of anthropogenic climate change, is not normal.”

Figure 4.18: Ambiguity in the North as Change Ideology/Transformation is Normal

“a muted subtext in [North as Change] ... is a call to acknowledge the North is populated by people and climate change is not only causing ecological change but cultural change for the Inuit as well.”

Figure 4.19: Muted Subtext/A Call to Recognition

– the world will survive, we may not. One would think this fear would drive people to change their behaviour in order to curb anthropogenic climate change and it is exactly this fear the North as Change image is playing on.

One final belief that is not controversial, but rather a muted subtext in this image of North is a belief in the need to conserve Inuit culture along with the need to stop climate change and it is as much a call to recognition for settler Canadians as it is a belief held by Inuit people. There are two parts to this call to recognition and the first is to acknowledge the North – the Arctic – is not just populated by polar bears and caribou but also by people who are just as much a part of the ecology of the northern landscape as animals are. The second is to acknowledge that climate change is not only causing ecological change but cultural change for the Inuit as well, and this is potentially more damaging than the ecological changes. The Inuit way of life is intimately intertwined with the Arctic landscape they live in and the changes in sea ice, snow cover, permafrost and other conditions are affecting their

ability to hunt traditional food sources and live off the land. Comments about the Inuit loss of connection to the land because of climate change were frequent and demonstrate how serious this problem is for them, and this is on top of the social, economic, and health issues the Inuit already face from the ongoing trauma of colonization and residential schools. Amazingly, there is also a very strong belief in their own ability to adapt to the ongoing changes in their northern home. They have done it before and they will do it again.

North as Change | Propose Potential Problems with the Image for Landscape Architects

It was difficult for me to assess the North as Change image and discern potential problems for landscape architects in imagining the landscape in this way because I am drawn to this way of thinking about landscape myself. I believe it is true that many practicing landscape architects envision the landscape as interconnected processes that change over time; just think about current catch words in the profession

“There is potential for settler landscape architects to favour scientific knowledge over other forms of knowledge.”

Figure 4.20: North as Change/Potential Problem One

Valuing of scientific knowledge over other forms of knowledge may compromise a cordial and productive relationship with clients.

Figure 4.21: North as Change/Consequence of Potential Problem One

– Anthropocene, adaptation, and emergence. However, there are two potential issues with the North as Change image which we should be aware of. First, this image focuses primarily on physical processes when other kinds of processes also play a role in landscape change and second, there is potential for settler landscape architects to favour scientific knowledge over other forms of knowledge which may damage their working relationship with people in northern Canada.

In the ideologies section of this chapter I discussed the conflict and ambiguity within the image over the value of scientific knowledge versus traditional knowledge (TK) or Inuit Qaukimajatuqangit (IQ). The potential for this conflict to be present in a settler landscape architect’s own thinking is quite high. If you have been educated in the Canadian system, scientific knowledge will be the basis for your perspective on the world. In order for a landscape architect to have a cordial and productive design process with clients we must be able to understand and see the landscape from alternative perspectives. In the case of northern Canada we may frequently be working with Indigenous people whose

perspectives and opinions run counter to our own. It is incumbent on the landscape architect to value Indigenous forms of knowledge at least as much as their own.

A second potential problem for landscape architects in imagining the landscape as the North as Change image is the tendency to focus on physical processes over other forms of process. The issue isn't with imaging landscape as interconnected physical processes but rather with only imagining it as interconnected physical processes. In any landscape there are also cultural, economic, political, cognitive (generation of meaning and memory), aesthetic, and probably many more, processes at play and all of them are interconnected in some way. The solution to a design problem is not always physical or only physical. Sometimes we must employ economic, cultural, or political adjustments in order to achieve an optimal solution. For that reason, it is preferable to understand and imagine a landscape in all of its complexity in order to avoid limiting the possibilities for intervention.

North as Change focuses primarily on physical processes and ignores other kind of processes. Imagining the landscape in this way may limit creativity and possibilities for intervention.

Figure 4.22: North as Change/Potential Problem Two and Consequence to Potential Problem Two

North as Change | Endnotes

1. Black, “Brief History of Climate Change,” *BBC News* online, <https://www.bbc.com/news/science-environment-15874560>.
2. Black, <https://www.bbc.com/news/science-environment-15874560>.
3. Black, <https://www.bbc.com/news/science-environment-15874560>.
4. “Paris Agreement,” *European Commission* online, https://ec.europa.eu/clima/policies/international/negotiations/paris_en.
5. Bruce and Coletto, “What Keeps Us Awake,” *Abacus Data* online, <http://abacusdata.ca/what-keeps-us-awake-top-national-issues/>; “Vote Compass,” *CBC News* online, <https://www.cbc.ca/news/politics/vote-compass-canada-election-2015-issues-canadians-1.3222945>.
6. Struzik, *The Big Thaw*, 12 – 13.
7. Struzik, *The Big Thaw*, 29.
8. Struzik, *The Big Thaw*, 16.
9. Struzik, *The Big Thaw*, 174.
10. Struzik, *The Big Thaw*, 175.

Reflection

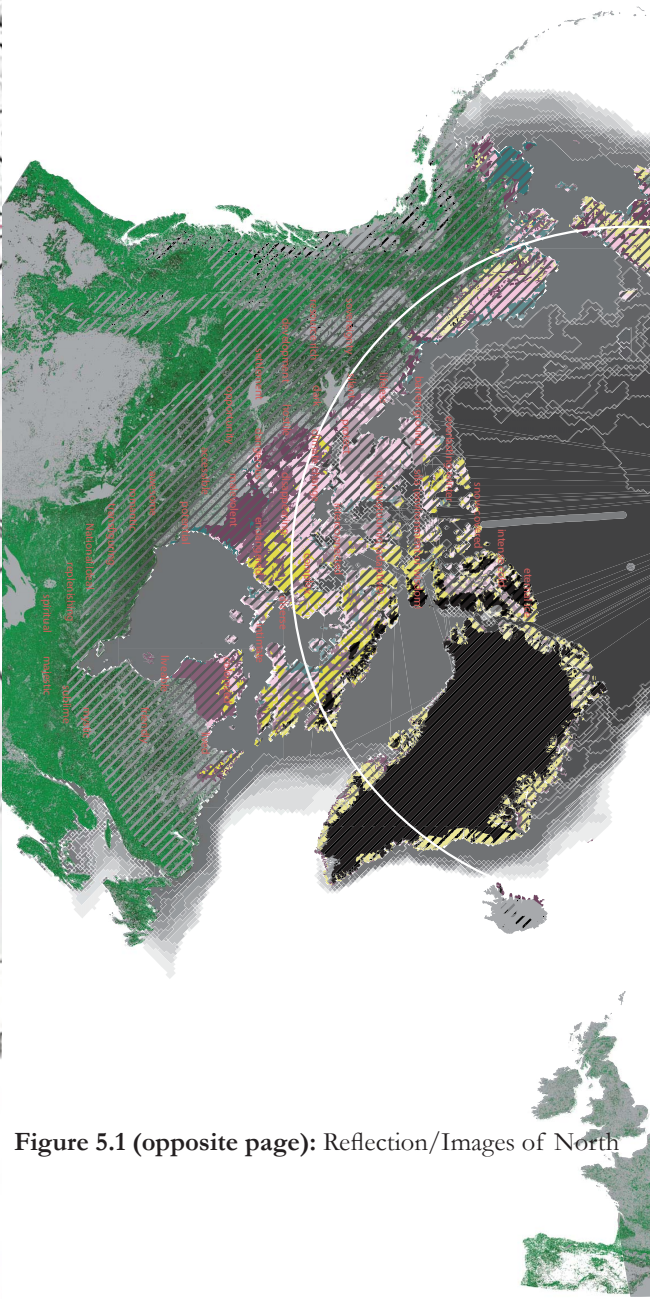


Figure 5.1 (opposite page): Reflection/Images of North

Reflection

In the introduction to this document I stated that the North (uppercase N) is an idea or imagined place¹ and it is this imagined North that is of concern here. I wrote that introduction months before completing the document and I don't think I fully understood the statement until, during my final presentation, I was asked "What can the North teach us?" At the time, the question stumped me but it was through later contemplation of the question that I fully grasped what North as an idea means. The ideas of North I have identified here exist in books, television shows, news reports and articles, political rhetoric, and scientific research, but they don't exist anywhere in reality. North is our collective concept of a place, not an actual place. That is not to say everything within the images and ideas is false. Within each idea of North there are aspects of the images that are truthful as well as aspects that indicate something of importance to us about the landscape, but these nuggets of reality aren't the full picture and they come with a very specific settler Canadian perspective attached to them. So what *can* this imagined North actually teach us? Or, put another way, what did it teach

me? I think the answer (as with so many acts of discovery) is that it can teach us about ourselves – our own thinking – and the patterns to our ways of imagining landscape. It can also show the way to move past the patterns.

The images I have identified can be understood as frameworks for making sense of the landscape – not just the northern landscape, but all landscapes. Myth is a framework for generating meaning in the landscape; Resource is a framework for extracting value from and maximising efficiencies in the landscape; Change is a framework for altering the physical processes of the landscape; and all three frameworks are developed out of a western settler perspective. What the ideas of North taught me is the extent to which landscape architects examine and understand landscapes in standardized ways and the extent to which these ways of imagining landscapes are rooted in cultural beliefs. The problem with the standard frameworks in a northern context is that many people who live in northern Canada are not of settler Canadian background and likely have ideas and images of their home which are

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based on completely different frameworks for understanding landscape. I don't think this means a settler Canadian landscape architect should not or can not work in a northern Canadian context, or that we need to completely forget our own frameworks for understanding landscape – as if we could. It does, however, mean that we should do the necessary preparatory work in order to understand alternative frameworks for making sense of the landscape while at the same time search for representations of the North that are created from an experience of place.

In the case of the ideas of North, the question of whether we need to move past our standard frameworks is an important one. Culturally diverse voices have traditionally been excluded from the dominant images of North as Myth and Resource and are just barely seeping into the image of North as Change. Given that Indigenous people, including Inuit, Gwichin, Cree, Dene, and other communities, make up a large portion of the population of northern Canada – 23% of the population of the Yukon identifies as Indigenous,² 52% of the

Northwest Territories identifies as Indigenous,³ and in Nunavut 86% of the population identifies as Inuit or Indigenous⁴ – it is not enough to just be aware of settler Canadian biases and understand how they could potentially affect designs and decision making. Landscape architects also need to be actively trying to understand frameworks for imaging the landscape from these excluded voices. It is our responsibility to seek out diverse representations of the northern landscape and be allies in making those voices heard. It is only through this endeavor that we can truly create meaningful landscapes for *all* of the people who live in northern Canada.

Looking back on my project, all three ideas of North are lacking one thing – representations of the northern landscape rooted in actual experience of northern Canada. Even North as Change, where the scientists engaged in producing the image clearly have exposure to the landscape, lacks representations built out of experiences; the image is based on what scientific study tells them about the landscape, not what their personal experience of the landscape tells them. Because the images

Reflection

lack representations rooted in first hand experience, it is imperative for landscape architects who are going to work in northern Canada to seek out these types of representations in any number of forms (story, art, etc.) as long as they are generated by people who actually live, work and play in the northern landscape. I believe it is also imperative for landscape architects working in northern Canada to have their own experience of the northern landscape and as such should have lived and/or travelled extensively in northern Canada before undertaking work there.

Finally, it is important for landscape architects to remember the ideas of North have developed over a very long period of time and historically North was understood to be much further south than we think of it now. The images and ideas as well as recommendations I have developed in this document have just as much applicability in Fort McMurray, Alberta, Thompson, Manitoba, and Thunder Bay, Ontario as they do in Iqaluit, Nunavut or Tuktoyuktuk, Northwest Territories.

For a long time I had intended to write a fourth chapter for this

practicum. It was meant to be about North as Home – the image of the North from the perspective of the people who live there, in particular Inuit people. For various reasons, the chapter was never written, and in hindsight I am glad it didn't happen. Part of being an ally is learning to listen without needing to speak for or over people. However, in the endeavour to listen to and be an ally to Indigenous people in northern Canada I believe the books on the booklist I developed for the chapter should be read. For those who would like to join me in this endeavor, the list is as follows: Northern Voices: Inuit Writing in English, Penny Petrone; Saqiyuq: Stories from the Lives of Three Inuit Women, Nancy Wachowich; Uqalurait: An Oral History of Nunavut, John Bennet and Susan Rowley; Stories in a New Skin: Approaches to Inuit Literature, Keavy Martin; Sanaaq, Mitiarjuk Nappaluk; Life Among the Quallunaat, Mini Aodla Freeman. My journey North, like so many before me, was a search for knowledge, but what I found was myself, my own mind. My journey now continues with a search for understanding, sensitivity, and an ability to listen without needing to speak.

Reflection | Endnotes

1. Atwood, *Strange Things*, 8; Grace, *Canada and the Idea of North*, 15.
2. “Aboriginal Peoples: Fact Sheet for Yukon,” *Statistics Canada* online, <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016012-eng.htm>.
3. “Aboriginal Peoples: Fact Sheet for Northwest Territories,” *Statistics Canada* online, <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016013-eng.htm>.
4. “Inuit: Fact Sheet for Nunavut,” *Statistics Canada* online, <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016017-eng.htm>.

Bibliography

- “Aboriginal Peoples: Fact Sheet for Northwest Territories.” *Statistics Canada* online. Last modified March 29, 2016. <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016013-eng.htm>.
- “Aboriginal Peoples: Fact Sheet for Yukon.” *Statistics Canada* online. Last modified March 29, 2016. <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016012-eng.htm>.
- “Arctic Adaptations.” *Lateral Office* online. Last modified June, 2014. <http://www.lateraloffice.com/ARCTIC-ADAPTATIONS-2013-14>.
- “Christopher Columbus and the Doctrine of Discovery – 5 Things to Know.” *Indigenous Corporate Training Inc.* online. Last accessed February 2, 2019. <https://www.ictinc.ca/blog/christopher-columbus-and-the-doctrine-of-discovery-5-things-to-know>.
- “Inuit: Fact Sheet for Nunavut.” *Statistics Canada* online. Last modified March 29, 2016. <https://www150.statcan.gc.ca/n1/pub/89-656-x/89-656-x2016017-eng.htm>.
- “Northern Research Bursary Fund.” *LACF Landscape Architecture Canada Foundation* online. Last accessed May 18, 2017. <http://lacf.ca/activities/northern-research-bursary-fund>.
- “Paris Agreement.” *European Commission* online. Last accessed November 1, 2018. https://ec.europa.eu/clima/policies/international/negotiations/paris_en.

- “The Doctrine of Discovery, 1493.” *The Gilder Lehrman Institute of American History* online. Last accessed February 2, 2019. <https://www.gilderlehrman.org/content/doctrine-discovery-1493>.
- “Vote Compass: Economy and Environment Rate as Top Issues.” *CBC News* online. Last modified September 11, 2015. <http://www.cbc.ca/news/politics/vote-compass-canada-election-2015-issues-canadians-1.3222945>.
- Anderson, Bruce and David Coletto. “What Keeps Us Awake: Top National Issues.” *Abacus Data* online. Last modified November 21, 2016. <http://abacusdata.ca/what-keeps-us-awake-top-national-issues/>.
- Atwood, Margaret. *Strange Things: The Malevolent North in Canadian Literature*. Oxford: Oxford University Press, 1995.
- Atwood, Margaret. *Survival: A Thematic Guide to Canadian Literature*. Toronto: House of Anansi Press, 1972.
- Berton, Pierre. *Klondike: The Last Great Gold Rush, 1896-1899*. Toronto: McClelland and Stewart, 1972.
- Black, Richard. “A Brief History of Climate Change.” *BBC News* online. Last modified September 20, 2013. <https://www.bbc.com/news/science-environment-15874560>.
- Creighton, Donald. *Dominion of the North: A History of Canada*. Toronto: The Macmillan Company of Canada, 1957.

Bibliography

- Diefenbaker, John. *Opening Campaign Speech, Winnipeg, February 12, 1958*. In “The Federal Elections of 1957 and 1958 – Diefenbaker Canada Centre – Documents.” *University of Saskatchewan* online. Last accessed February 12, 2019. <https://www.usask.ca/diefenbaker/virtual-exhibits/federal-elections-1957-1958.php>.
- Frye, Northrop. *The Bush Garden: Essays on the Canadian Imagination*. Concord, Ont: House of Anansi Press, 1995.
- Gerin-Lajoie, Jose, Alain Cuerrier, and Laura Siegwart Collier, eds. *“The Caribou Taste Different Now”: Inuit Elders Observe Climate Change*. Iqaluit: Nunavut Arctic College Media, 2016.
- Gopnik, Adam. *Winter: Five Windows on the Season*. Toronto: House of Anansi Press, 2011.
- Grace, Sherrill E. *Canada and the Idea of North*. Montreal & Kingston: McGill-Queen’s University Press, 2001.
- Graham, Katherine A. and Eli Yarhi. “Territorial Government in Canada.” *The Canadian Encyclopedia*. Last edited October 25, 2016. <https://www.thecanadianencyclopedia.ca/en/article/territorial-government>.
- Grant, Shelagh D. *Polar Imperative: A History of Arctic Sovereignty in North America*. Vancouver: Douglas & McIntyre, 2010.
- Grey Owl. *The Collected Works of Grey Owl: Three Complete and Unabridged Canadian Classics*. Toronto: Key Porter Books, 2004.

Bibliography

- Haliburton, R.G. *The Men of the North and their Place in History: A Lecture Delivered Before the Montreal Literary Club, March 31st, 1869*. Montreal: John Lovell, 1869.
- Harris, Lawren. *Lawren Harris*. Edited by Bess Harris and R.G.P. Colgrove. Toronto: The Macmillan Company of Canada, 1969.
- Hodgins, Bruce W., Jamie Benidickson, Richard P. Bowles, and George A. Rawlyk, eds. *The Canadian North: Source of Wealth of Vanishing Heritage?* Scarborough, Ont: Prentice-Hall of Canada, 1977.
- Honderich, John. *Arctic Imperative: Is Canada Losing the North?* Toronto: University of Toronto Press, 1987.
- King, Ross. *Defiant Spirits: The Modernist Revolution of the Group of Seven*. Madeira Park, BC: Douglas and McIntyre, 2013.
- Leacock, Stephen. *Adventurers of the Far North: A Chronicle of the Arctic Seas*. Toronto: Glasgow, Brook & Company, 1914.
- Lotz, Jim. *Northern Realities: The Future of Northern Development in Canada*. Toronto: New Press, 1970.
- MacLaren, Ian. "The Aesthetic Map of the North, 1845-1859." *Arctic*, vol. 38, no. 2 (1985): 89-103. <http://www.jstor.org/stable/40510354>.
- Mitcham, Allison. *The Northern Imagination: A Study of Northern Canadian Literature*. Moonbeam, Ont: Penumbra Press, 1983.

Bibliography

Morrison, William R. *True North: The Yukon and Northwest Territories*. Toronto: Oxford University Press, 1998.

Mowat, Farley. *Ordeal by Ice: The Search for the Northwest Passage*. Toronto: McClelland and Stewart, 1973.

Mowat, Farley. *The Polar Passion: The Quest for the North Pole*. Toronto: McClelland and Stewart, 1973.

Mowat, Farley. *Tundra: Selections from the Great Accounts of Arctic Land Voyages*. Toronto: McClelland and Stewart, 1973.

Northey, Margot. *The Haunted Wilderness: The Gothic and Grotesque in Canadian Fiction*. Toronto: University of Toronto Press, 1976.

Raffan, James. *Circling the Midnight Sun: Culture and Change in the Invisible Arctic*. Toronto: HarperCollins Publishers, 2015.

Schafer, R. Murray. *Music in the Cold*. Toronto: The Coach House Press, 1977.

Service, Robert W. *Songs of a Sourdough*. Toronto: William Briggs, 1907.

Seton, Ernest Thompson. *The Arctic Prairies: A Canoe-Journey of 2,000 Miles in Search of the Caribou, Being the Account of Voyage to the Region North of Aylmer Lake*. New York: International University Press, 1943.

Stefansson, Vilhjalmur. *The Friendly Arctic: The Story of Five Years in Polar Regions*. New York: The Macmillan Company, 1944.

Bibliography

- Struzik, Ed. *The Big Thaw: Travels in the Melting North*. Mississauga: John Wiley & Sons Canada, 2009.
- Struzik, Edward. *Future Arctic: Field Notes from a World on the Edge*. Washington, DC: Island Press, 2015.
- Voaden, Herman A., ed. *Six Canadian Plays*. Toronto: The Copp Clark Company, 1930.
- Warwick, Jack. *The Long Journey: Literary Themes of French Canada*. Toronto: University of Toronto Press, 1968.
- Watt-Cloutier, Sheila. *The Right to be Cold: One Woman's Story of Protecting Her Culture, the Arctic, and the Whole Planet*. Toronto: Allen Lane, 2015.
- Winter, Kathleen. *Boundless: Tracing Land and Dream in a New Northwest Passage*. Toronto: House of Anansi Press, 2014.
- Wright, Shelley. *Our Ice is Vanishing/ Sikuvut Nunguliqtuq: A History of Inuit, Newcomers, and Climate Change*. Montreal & Kingston: McGill-Queen's University Press, 2014.
- Zaslow, Morris. *The Northward Expansion of Canada, 1914-1967*. Toronto: McClelland and Stewart, 1988.

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1.1 Left: William Blair Bruce, *The Phantom Hunter recently renamed The Phantom of the Snow* (1888), in Sherrill E. Grace, *Canada and the Idea of North* (Montreal & Kingston: McGill-Queen's University Press, 2001), xviii.

Centre: Paul Kovacs and Jason Thistlethwaite, *Canadian Mining Industry Clusters (modified from Stothart, 2011)*, in Paul Kovacs and Jason Thistlethwaite, "Industry," in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 77.

Right: Kari Zahariuk, *North I Think*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, Professor Richard Perron, University of Manitoba, 2014.

1.2 Top: Kari Zahariuk, *Quilted Tundra*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, Professor Richard Perron, University of Manitoba, 2014.

Middle: Kari Zahariuk, *Purple Mountain Coast*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, Professor Richard Perron, University of Manitoba, 2014.

Bottom: Kari Zahariuk, *Arbitrary Treeline*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, instructed by Professor Richard Perron, University of Manitoba, 2014.

- 1.3 Kari Zahariuk, unnamed photograph, produced in *Churchill Travel Study Course, ENVR 3010/4010 Research Project in Churchill Ethnoecology and ENVR 4010 Wildlife and Ethnoecology of the Manitoba Coastal Region*, instructed by Kristina Hunter and Dr. Ryan Brook, University of Manitoba, August 2015.
- 1.5 Sergio Pirrone, *View of Arctic Adaptations Exhibition Arrival*, in “Arctic Adaptations,” *Lateral Office* online, last modified June, 2014, <http://www.lateraloffice.com/ARCTIC-ADAPTATIONS-2013-14>.
- 1.7 Top: Per-Henrik Gurth, *Aa is for Arctic, in the icy cold north*, in Kim Bellefontaine, *ABC of Canada* (Toronto: Kids Can Press, 2004), 2.
- Middle: Travel Manitoba (creator), CJOB 680 (publisher), *TravelMB Commercials*, image capture of video, running time 2:44, image capture time 1:58, published December 12, 2013, <https://www.youtube.com/watch?v=mAE6ulqpUDE>.
- Bottom: Untitled image, found at “CBC Gem – True North Calling – Season 1,” *CBC* online, last accessed January 26, 2019, <https://watch.cbc.ca/season/true-north-calling/season-1/95bc5886-2478-4932-893d-f5412cf0a63a>.
- 1.11 Sherrill E. Grace, *Canada and the Idea of North* (Montreal & Kingston: McGill-Queen’s University Press, 2001), 16.

Figure Notes

- 2.1 William Blair Bruce, *The Phantom Hunter recently renamed The Phantom of the Snow* (1888), in Sherrill E. Grace, *Canada and the Idea of North* (Montreal & Kingston: McGill-Queen's University Press, 2001), xviii.
- 2.2 Kathleen Winter, *Boundless: Tracing Land and Dream in a New Northwest Passage* (Toronto: House of Anansi Press, 2014), 51.
- 2.3 Stephen Leacock, *Adventures of the Far North: A Chronicle of the Arctic Seas* (Toronto: Glasgow, Brook & Company, 1914), 2.
- 2.4 Top Left: William W. May, *Division of Sledges Passing Cape Lady Franklin; Extraordinary Masses of Ice Pressed Against the North Shore of Bathurst Land* (1855), in Ian McLaren, "The Aesthetic Map of the North, 1845-1859," *Arctic*, vol. 38, no. 2 (1985): 99, <http://www.jstor.org/stable/40510354>.
- Bottom Left: Ron Williams, photograph of Inukshuk and landscape, in Ron Williams, *Landscape Architecture in Canada* (Montreal & Kingston: McGill-Queen's University Press, 2014), i – ii.
- Right: Franz Johnston, *A Northern Night* (1917), in Ross King, *Defiant Spirits: The Modernist Revolution of the Group of Seven* (Madeira Park, BC: Douglas and McIntyre, 2013), Plate 27.
- 2.5 R. Murray Schafer, *Music in the Cold* (Toronto: The Coach House Press, 1977), 8.

- 2.6 Top Left: Lucius O'Brien, *Sunrise on the Saguenay, Cape Trinity* (1880), in Anne Newlands, *Canadian Paintings, Prints and Drawings* (Richmond Hill, Ont: Firefly Books, 2007), 233.
- Middle Left: Arthur Lismer, *A September Gale – Georgian Bay* (1921), in Charles C. Hill, *The Group of Seven: Art for a Nation* (Ottawa: National Gallery of Canada, 1995), 133.
- Bottom Left: Modern photograph of Miles Canyon on the Yukon River, *National Archives of Canada c21675*, in William R. Morrison, *True North: The Yukon and Northwest Territories* (Toronto: Oxford University Press, 1998), 13.
- Right: Emily Carr, *Wood Interior* (1909), in Charles C. Hill, Johanne Lamoureux, and Ian M. Thom, curators, *Emily Carr: New Perspectives on a Canadian Icon* (Ottawa: National Gallery of Canada, 2006), 38.
- 2.7 Grey Owl, *The Collected Works of Grey Owl: Three Complete and Unabridged Canadian Classics* (Toronto: Key Porter Books, 2004), 3 - 4.
- 2.8 Robert W. Service, "The Law of the Yukon," in *Songs of a Sourdough* (Toronto: William Briggs, 1907), 12 - 13.
- 2.9 Left: Tom Thomson, *Northern River* (1915), in Ross King, *Defiant Spirits: The Modernist Revolution of the Group of Seven* (Madeira Park, BC: Douglas and McIntyre, 2013), Plate 15.

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Top Right: Lowrie Warrener, drawing of man and monster in forest (1930), in Herman A. Voaden, ed., *Six Canadian Plays* (Toronto: The Copp Clark Company, 1930), 66.

Bottom Right: Jeffrey Spalding, *Night Fall* (1984), in Anne Newlands, *Canadian Paintings, Prints and Drawings* (Richmond Hill, Ont: Firefly Books, 2007), 305.

2.10 Lawren Harris, *Lawren Harris*, eds. Bess Harris and R.G.P. Colgrove (Toronto: The Macmillan Company of Canada, 1969), 7.

2.11 Doris McCarthy, *Aurora and the Bergs* (1996), in Anne Newlands, *Canadian Paintings, Prints and Drawings* (Richmond Hill, Ont: Firefly Books, 2007), 203.

2.12 Pierre Berton, *Klondike: The Last Great Gold Rush, 1896-1899* (Toronto: McClelland and Stewart, 1972), 265.

2.13 Gwendolyn MacEwen, "Terror and Erebus," in *Afterworlds* (Toronto: McClelland and Stewart, 1987), 44.

2.14 Major John Richardson, *Waconsta or The Prophecy Abridged Edition* (Toronto: McClelland and Stewart, 1967), 32.

- 2.15 John Newlove, “The Well Travelled Roadway,” quoted in Margaret Atwood, *Survival: A Thematic Guide to Canadian Literature* (Toronto: House of Anansi Press, 1972), 71.
- 3.1 Paul Kovacs and Jason Thistlethwaite, *Canadian Mining Industry Clusters (modified from Stothart, 2011)*, in Paul Kovacs and Jason Thistlethwaite, “Industry,” in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 77.
- 3.2 Top: John Murray, *An Outline to shew the Connected Discoveries of Captains Ross, Parry, & Franklin, in the Years 1818, 19, and 21.* (1823), in John Franklin, *Narrative of a Journey to the Shores of The Polar Sea in the Years 1819, 20, 21, and 22* (Rutland, Vermont: M. G. Hurtig, 1969), insert at back of book.
- Bottom: Alexander MackKenzie, *A Map of Mackenzie’s Track, from Fort Chipewyan to the North Sea, in 1789.* (1801), in Alexander Mackenzie, Esq., *Voyages from Montreal on the River St. Laurence Through the Continent of North America to the Frozen and Pacific Oceans In the Years 1789 and 1793 with a Preliminary Account of the Rise, Progress, and Present State of the Fur Trade of that Country* (Japan: M. G. Hurtig, 1971), insert between pages cxxxii and 1.

Figure Notes

3.3 Topographical Survey of Canada, *Index to Townships in Manitoba, Saskatchewan, Alberta, and British Columbia* (1929), in “Convert Canadian Legal Land Description to Latitude and Longitude,” *Legal Land Converter*, last accessed February 2, 2019, <http://www.legallandconverter.com/>.

3.4 Top: Natural Resources Canada, *Crude Oil and Natural Gas Resources* (2009), in “Energy,” *Natural Resources Canada* online, last modified October 30, 2017, <https://www.nrcan.gc.ca/earth-sciences/geography/atlas-canada/selected-thematic-maps/16872>.

Bottom: The National Atlas of Canada, *Oil and Gas Fields, Pipelines and Processing Plants, 1970, Western Canada* (1974), in “Energy,” *Natural Resources Canada* online, last modified October 30, 2017, <https://www.nrcan.gc.ca/earth-sciences/geography/atlas-canada/selected-thematic-maps/16872>.

3.5 John Diefenbaker, *Opening Campaign Speech, Winnipeg, February 12, 1958*, page 8, in “The Federal Elections of 1957 and 1958 – Diefenbaker Canada Centre – Documents,” *University of Saskatchewan* online, last accessed February 12, 2019, <https://www.usask.ca/diefenbaker/virtual-exhibits/federal-elections-1957-1958.php>.

3.8 Top Left: *Map Showing Operations of Expedition, December, 1913 to December, 1914.*, in Vilhjalmur Stefansson, *The Friendly Arctic: The Story of Five Years in Polar Regions* (New York: The Macmillan Company, 1944), insert between pages 140 and 141.

Bottom Left: Henry Mindak, *Gold Along the Yukon*, in Pierre Berton, *Klondike: The Last Great Gold Rush, 1896-1899* (Toronto: McClelland and Stewart, 1972), xxiv.

Right: *Nunavut Petroleum Sedimentary Basins*, in “Petroleum Maps of Nunavut,” *The Government of Nunavut* online, last accessed November 1, 2018, <https://www.gov.nu.ca/edt/documents/petroleum-maps-nunavut>.

3.9 Left: *Figure 11: The Way North*, in Bruce W. Hodgins, Jamie Benedickson, Richard P. Bowles, and George A. Rawlyk, eds., *The Canadian North: Source of Wealth of Vanishing Heritage?* (Scarborough, Ont: Prentice-Hall of Canada, 1977), 186.

Top Right: *Disputed Claims in the Circumpolar Arctic, c2009*, in Shelagh D. Grant, *Polar Imperative: A History of Arctic Sovereignty in North America* (Vancouver: Douglas & McIntyre, 2010), 453.

Bottom Right: Edin Bartholomew, *Routes of Explorers in the Far North*, in Stephen Leacock, *Adventurers of the Far North: A Chronicle of the Arctic Seas* (Toronto: Glasgow, Brook & Company, 1914), insert between pages vii and 1.

3.10 Jim Lotz, *Northern Realities: The Future of Northern Development in Canada* (Toronto: New Press, 1970), 88.

3.11 Morris Zaslow, *The Northward Expansion of Canada, 1914-1967* (Toronto: McClelland and Stewart, 1988), 345.

Figure Notes

3.12 Jim Lotz, *Northern Realities: The Future of Northern Development in Canada* (Toronto: New Press, 1970), 41.

3.13 William R. Morrison, *True North: The Yukon and Northwest Territories* (Toronto: Oxford University Press, 1998) 163 - 163.

3.14 William R. Morrison, *True North: The Yukon and Northwest Territories* (Toronto: Oxford University Press, 1998) 107.

4.1 Kari Zahariuk, *North I Think*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, Professor Richard Perron, University of Manitoba, 2014.

4.2 Top: RATPAC Documentary Films and Appian Way (creators), National Geographic (publisher), *Before the Flood – Trailer/ National Geographic*, image capture of video, running time 2:18, image capture time 0:28, published September 27, 2016, <https://www.youtube.com/watch?v=D9xFFyUOpXo>.

Middle: The Co-operative and Dogwoof (creators), Dogwoof (publisher), *Chasing Ice – Official Trailer*, image capture of video, running time 2:19, image capture time 0:19, published November 15, 2012, <https://www.youtube.com/watch?v=VIIdkgZVGhWc>.

Bottom: Paramount and Participant Media (creators), Paramount Movies (publisher), *An Inconvenient Sequel: Truth to Power/ Official Trailer*, image capture of video, running time 2:28, image capture time 0:59, published September 25, 2017, https://www.youtube.com/watch?v=9rS_giWlUQ8.

- 4.5 Shelley Wright, *Our Ice is Vanishing/Sikuvut Nunguligtug: A History of Inuit, Newcomers, and Climate Change* (Montreal & Kingston: McGill-Queen's University Press, 2014), 12.
- 4.6 Left: Achim Baque, untitled, in Jose Gerin-Lajoie, Alain Cuerrier, and Laura Siegwart Collier, eds., *"The Caribou Taste Different Now": Inuit Elders Observe Climate Change* (Iqaluit: Nunavut Arctic College Media, 2016), 296.
- Top Right: Kathleen Winter, *Cathedrals of Ice* (2014), in Kathleen Winter, *Boundless: Tracing Land and Dream in a New Northwest Passage* (Toronto: House of Anansi Press, 2014), page 1 of inserts between pages 132 and 133.
- Bottom Right: Shelley Wright, *Midnight at midsummer in Pond Inlet, 21 June 2003* (2014), in Shelley Wright, *Our Ice is Vanishing/Sikuvut Nunguligtug: A History of Inuit, Newcomers, and Climate Change* (Montreal & Kingston: McGill-Queen's University Press, 2014), 32.
- 4.7 Edward Struzik, *Future Arctic: Field Notes from a World on the Edge* (Washington, DC: Island Press, 2015), 64-65.
- 4.8 L. Copland, *Changes in the Extent of the Petersen Ice Shelf, Ellesmere Island*, in James D. Ford, Trevor Bell, and Nicole J. Couture, "Perspectives on Canada's North Coast Region," in *Canada's Marine Coasts in a Changing Climate*, eds. Donald S. Lemmen, Fiona J. Warren, Thomas S. James, and Colleen S.L. Mercer Clarke (Ottawa: Government of Canada, 2016), 160.

Figure Notes

4.9 Top: N. L. Bindoff, J. Willebrand, V. Artale, A. Cazenave, J. Gregory, S. Gulev, K. Hanawa, C. Le Quere, S. Levitus, Y. Nojiri, C.K. Shum, L.D. Talley, and A. Unnikrishnan, *Schematic side view of prominent observed climate changes in the ocean* (2007), in Elizabeth J. Bush, John W. Loder, Thomas S. James, Linda D. Mortsch, and Stewart J. Cohen, “An Overview of Canada’s Changing Climate,” in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 48.

Bottom Left: Kari Zahariuk, *Chaos Map*, produced in *LARCH 7340 Landscape Architecture Studio 4: Nature Discourses*, Professor Richard Perron, University of Manitoba, 2014.

Bottom Right: *Illustration of the complex interactions among documented or projected responses of species and ecosystem processes to climate change*, in Patrick Nantel, Marlow G. Pellatt, Karen Keenleyside, and Paul A. Gray, “Biodiversity and Protected Areas,” in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 174.

4.10 Shelley Wright, *Our Ice is Vanishing/ sikuwut Nunguliqtuq: A History of Inuit, Newcomers, and Climate Change* (Montreal & Kingston: McGill-Queen’s University Press, 2014), 219.

4.11 Ed Struzik, *The Big Thaw: Travels in the Melting North* (Mississauga: John Wiley & Sons Canada, 2009), 69-70.

4.12 Top: Canadian Centre for Climate Modeling and Analysis, *Projected seasonal changes in precipitation across Canada for the middle and end of the 21st century under various SRES scenarios*, in Elizabeth J. Bush, John W. Loder, Thomas S. James, Linda D. Mortsch, and Stewart J. Cohen, “An Overview of Canada’s Changing Climate,” in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 48.

Bottom: Natural Resources Canada and Geological Survey of Canada, *Cumulative net glacier mass balance patterns*, in Elizabeth J. Bush, John W. Loder, Thomas S. James, Linda D. Mortsch, and Stewart J. Cohen, “An Overview of Canada’s Changing Climate,” in *A Changing Climate: Sector Perspectives on Impacts and Adaptation*, eds. Fiona J. Warre and Donald S. Lemmen (Ottawa: Government of Canada, 2014), 39.

4.13 Sheila Watt-Cloutier, *The Right to be Cold: One Woman’s Story of Protecting Her Culture, the Arctic, and the Whole Planet* (Toronto: Allen Lane, 2015), x – xi.

4.14 Top: Joelle Taillon, untitled, in Jose Gerin-Lajoie, Alain Cuerrier, and Laura Siegwart Collier, eds., “The Caribou Taste Different Now”: *Inuit Elders Observe Climate Change* (Iqaluit: Nunavut Arctic College Media, 2016), 24.

Middle: Shelley Wright, *Big male nanuq (polar bear), Gjoa Haven, 27 August 2011* (2014), in Shelley Wright, *Our Ice is Vanishing/Sikuuvut Nunguligtuq: A History of Inuit, Newcomers, and Climate Change* (Montreal & Kingston: McGill-Queen’s University Press, 2014), 269.

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Bottom: Ed Struzik, *One of the wolves that regularly visited the author as he explored the north end of Ellesmere Island* (2009), in Ed Struzik, *The Big Thaw: Travels in the Melting North* (Mississauga: John Wiley & Sons Canada, 2009), page 7 of inserts between pages 182 and 183.

4.15 Top: Dawn Huck, *Map*, in James Raffan, *Circling the Midnight Sun: Culture and Change in the Invisible Arctic* (Toronto: HarperCollins Publishers, 2015), xi.

Bottom: Untitled map, in Edward Struzik, *Future Arctic: Field Notes from a World on the Edge* (Washington, DC: Island Press, 2015), vii.

4.16 Top: Ed Struzik, *A scientist skis across the top of the Lowell Glacier nearly 43 miles (70 km) from its toe on the Alsek River* (2009), in Ed Struzik, *The Big Thaw: Travels in the Melting North* (Mississauga: John Wiley & Sons Canada, 2009), page 5 of inserts between pages 86 and 87.

Middle: Edward Struzik, *Figure 11.1 Glaciologist Jack Kohler*, in Edward Struzik, *Future Arctic: Field Notes from a World on the Edge* (Washington, DC: Island Press, 2015), 184.

Bottom: Matthew Kennedy, *Simon Pendleton and PhD adviser Gifford Miller collect samples of ancient plants along a glacial flow on Baffin Island, Nunavut*, in Jamie Malbeuf, “Glacier Melt Exposes Plants Frozen Under Baffin Island Ice for 40,000 Years,” *CBC News* online, last modified January 30, 2019, <https://www.cbc.ca/news/canada/north/baffin-island-glacier-study-1.4998217>.

