“The Whole Thing Was to Try to Make a Living Here”: Labor, Land, and the Relationships They Produced on the Trans-Alaska Pipeline System, 1974-Present

by

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THESIS ABSTRACT

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Title: “The Whole Thing Was to Try to Make a Living Here”: Labor, Land, and the Relationships They Produced on the Trans-Alaska Pipeline System, 1974-Present

This thesis examines the relationships between workers, their labor, and the land during and after the construction of the Trans-Alaska Pipeline System (TAPS). It places these relationships within a broader history of twentieth century industrial labor on the North Slope and in Alaska. Without these antecedents, the TAPS would not have been possible. I understand and analyze these relationships using oral histories, memoirs, and archival materials including photographs and journals. The TAPS workers’ relationships with labor and land were a productive historical process and force which created oil infrastructure. Workers on the TAPS built meaningful affective relationships which shared many factors with the conservation and environmental movements that so vehemently opposed the TAPS. Therefore, I argue that for some Pipeline workers, these relationships contributed to the construction of future personal lives and small businesses in Alaska’s post-1977 economy. This economy features environmental tourism alongside other resource extraction. I argue that the logics of capitalist extraction and extractivist labor run throughout both forms of value production. Because workers are one consistent throughline between these seemingly disparate economies, labor organizers can use environmental logics with fossil fuel workers to win broad proposals for a post-fossil capital economy.

Key words: Trans-Alaska Pipeline System, labor, Alaska, extractivism, environment

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This thesis was, of course, a social production. Though it was my fingers in the archives and on the keys, the support, waged labor, ideation, and community offered by others made this work possible. Whatever successes this project holds were collective. The errors and blind spots are my own.

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John Bellamy Foster was a joy to learn from during my time at UO. Being able to study the metabolic rift with him made me a better organizer and unionist – two of the most important takeaways from my time here. His lengthy, serious feedback on my work felt like the deepest kind of respect a student can ever receive.

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DEDICATION

To my parents,

and

in loving memory of my teacher and friend,

Scott Moore.

“The strategy is solidarity.”

Stacey Davis Gates,
President of the Chicago Teachers Union

“Labor is, first of all, a process between man and nature.”

Karl Marx, *Capital, Volume I*

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INTRODUCTION

Alaska's resources have been coveted and their proper use debated for thousands of years. In the mid-twentieth century, this debate often pitted conservationists against loggers, miners, or other extractavists. Each side won here and there – national parks were created, mines were opened. Jobs were created. Profit was made. Outdoor enthusiasts still managed to enjoy the land. Native Alaskans fought and won sovereignty.

In the late twentieth century, climate change shifted the calculus and dramatically increased the import of the already hot debate over Alaska's land and the resources it holds. Protecting polygons on a map from direct extractive industry was far less meaningful if those polygons would be 1, 2, or 3 degrees hotter in a few decades, just like everywhere else. Climate change changed the nature of the debate. It became apparent that to continue apace with fossil fuel development in particular would create "climate chaos."

But the politics of erasing jobs is foolish and cruel. A rejection of this popular debate – jobs or climate? – is the prism through which I viewed this research. I wanted to understand if there was a possibility to organize a coalition of fossil fuel workers toward a democratic, sustainable energy future. There is precedent for this. Trade Unionists for Energy Democracy (TUED) has fought for more than a decade to make a transition to a livable energy future by organizing unions across the globe to steer the shift from fossil capital to eco-socialism. By organizing both the Global North and South in coalition, TUED has built power commensurate to the power of global capital. It will take power on this scale to win. There is a long way to go. But, after spending my teens and twenties in the climate movement, I am convinced that organized labor must lead the charge toward a livable planet for all people and species. I wanted

to understand Pipeline workers to try to organize workers like them to win the future we all deserve.

* * *

This thesis argues that workers constructed the landscape, economy, and culture of Alaska by navigating their labor, their personhood (meaning their identities, values, and ethic of place), and the land upon which they worked. This trio was sometimes contradictory, such as when the labor of a worker contributed to the Exxon Valdez Oil Spill on Bligh Reef – the very landscape he had fallen in love with when he had arrived in Alaska years before. But workers also found ways to reconcile their labor, their personhood, and the land. For example, some workers created a new understanding of the politics of their personhood by exploring their gender through their labor and the land they worked on. Though much of my argument is situated in the twentieth century, I also argue that the subsistence and colonial labor in centuries prior created the landscape to which workers arrived in the twentieth century.

Workers navigating this trio – land, labor, and personhood – were a productive force of history which created Alaska's economy, its job sites, and its politics. This production created the many aspects of the landscape that workers arrived to on the TAPS in 1974. The workers' production of this history carved their experiences while working the Pipeline from 1974 to 1977. And, finally, workers used this skill of navigation to co-create the economy in the years after the construction of the Pipeline was finished in 1977. In short, workers on the Trans-Alaska Pipeline system produced more than oil and oil infrastructure. They created Alaska's contemporary economy, many parts of its culture, and changed themselves to fit into the state that they had created. Because Pipeliners have used their labor, the land, and their personhood to

co-create an economy before, they and their descendants can – and must – do it again to protect all life on earth.

* * *

Academics of various fields and popular writers alike have understood the immense significance of the Trans-Alaska Pipeline System (TAPS) since it was first proposed in the early 1970s. In the field of history, academics have considered the Pipeline from several angles: the environmental controversy, its business and economic history, and as part of a broader history of settler colonialism and the frontier. Experts in other fields, including sociology and economics, have taken interest in the TAPS, too. But heretofore, historians have mostly left the experiences of workers out of the spotlight in their inquiries. The existing historical scholarship on the TAPS has, thus far, largely ignored the experiences and contributions of workers to the proposal, construction, and operation of the Pipeline.

Peter A. Coates' 1991 *The Trans-Alaska Pipeline Controversy: Technology, Conservation, and the Frontier* is an essential history of the Pipeline. It is the most authoritative and expansive history of the TAPS. However, it often leaves workers out of its discussion of technology, conservation, and frontier. Coates is concerned with the significant environmental resistance to the TAPS, and views this resistance in relation to past infrastructure proposals for Interior and Arctic Alaska. He argues that TAPS and the resistance to it marked a significant shift in environmentalism in North America. The work is exhaustive in its discussion of the controversy and the differing conceptions of "frontier", but not in its discussion of workers. When workers appear, they are nearly always portrayed as monolithic, anti-environmental actors. Philip Wight's dissertation and forthcoming book, *Arctic Artery: The Trans-Alaska Pipeline System and the World It Made*, understands the Pipeline's physical genesis, construction, and throughput as a

global system, with intimate origins in Alaska. Wight's work is a terrific macroeconomic and environmental study of global petrocapitalism. However, it does not adequately discuss the experiences of workers.

Despite the relative lack of labor history in the TAPS historiography, historians of Alaska have long been attuned to labor in the region and state. The labor history has typically expressed ways in which workers have carved out identity, participated in and/or resisted capitalism, and built community. Led by Stephen Haycox, these histories have also often understood workers within the colonial space of Alaska. Haycox's *Alaska: An American Colony* and *Frigid Embrace: Politics, Economics, and Environment in Alaska* frame this intervention. In these books, he argues that because new Alaskans reify the systems, cultures, economies, and norms of wherever they came from, rather than adapting to the lifeways of Native Alaskans, they perform coloniality. Haycox also focuses on the state's reliance upon imported goods, as opposed to local economies, to frame his argument of coloniality.

Significant scholarship that engages with Haycox's broad framing includes Diane J. Purvis' *Ragged Coast, Rugged Coves: Labor, Culture, and Politics in Southeast Alaska Canneries.* Purvis assesses the salmon cannery workscape from 1878 to the mid-twentieth century and finds that Native and Asian workers expressed nuanced relationships with colonialism and capitalism via their relationships with nature and one another. Purvis also highlights the ways that female workers, especially Native women, engaged with wage labor, gender, racialization, and union power.

Bathsheba Demuth also focuses on work related to the marine world. Her *Floating Coast: An Environmental History of the Bering Strait* centers the pursuit of energy as the animating force in Beringia (the Alaskan, Western Canadian, and Russian Arctic, with emphasis on the

marine space). Demuth's history explains how Indigenous people controlled the pursuit of energy prior to arrival outside colonial labor. When Russian and American whalers did arrive, the varying value systems display the importance of energy in different ways. But the labor necessary to extract this energy is critical. As the history proceeds, the difference between socialist and capitalist pursuits of energy actually produce a common result: expropriated Native lands and deeply harmed landscapes. Demuth's discussion of energy does not, however, expand to include the buried energy beneath her story.

Alaska's Skyboys: Cowboy Pilots and the Myth of the Last Frontier by Katherine Johnson Ringsmuth is not a labor history in a strict sense. But it uses Haycox's coloniality to study how pilots engaged with the frontier myth of Alaska. This frequently invokes their labor, such as investigating how their skills were developed and handed down, how they navigated an unusual wage structure, and the ways that their labor impacted the land, Native Alaskans, and contributed to Alaska's developing colonial identity.

In another study of industrialized labor, William R. Morrison and Kenneth A. Coates' *Working the North: Labor and the Northwest Defense Projects, 1942-1946* argues that labor historians should take the north more seriously, and that historians of the north should take labor more seriously. They argue this case by examining the military and civilian labor which created major infrastructure in the Northwest Territories, the Yukon, and Alaska. Chief amongst these projects is the construction of the Alaska Highway, typically called the Alcan. Their work contributed to my understanding of the TAPS' antecedent projects and helped me understand how critical similar projects from the recent past were to the successful labor on the TAPS. Considering the significant, labor-sized hole in the TAPS historiography, I relied upon work from outside Alaskan history to understand and craft my understanding of TAPS workers.

Richard White's classic article "Are you an environmentalist or do you work for a living?" outlined the class (and, therefore, political) differences that carve the worker from the most mainstream political expression of environmental consciousness and, therefore, presupposes the existence of other expressions of environmental and ecological consciousness that are illegible to the professional-managerial class and ruling class. White also situates this binary as a result of settler-colonial myths of recreation-as-exploration, which misrepresent that which is actually labor.

This presupposition is followed, then, by the work of *Strong Winds and Widow Makers: Workers, Nature, and Environmental Conflict in Pacific Northwest Timber Country* by Steve Beda, *Making a Living: Work and Environment in the United States* by Chad Montrie, and *Environmental Inequalities: Class, Race, and Industrial Pollution in Gary, Indiana, 1945 - 1980* by Andrew Hurley, who trace the lineage of working class environmentalisms in U.S. history. These historians use the self-descriptions, journals, letters, and other ephemera of workers to center individuals and broader groups in their stories. Beda, in particular, studies *both* loggers' intimate stories through oral histories and archival materials they left behind *and* macroeconomic forces through the use of government labor reports, Congressional documents, federal agency reports, and similar official paperwork to portray the workers of Pacific Northwest logging industry and their relationships to the land. Beda, critically, tracks the shift from radical left populism to the spotted owl controversy of the 1990s and the related reactionary politics of many late twentieth century American workers. Montrie, meanwhile, traces the rise of workers movements in the United States by arguing that it was capital's increased organization and automation that divorced workers from nature. He argues that workers rights and environmental rights were part and parcel in various labor movements in the nineteenth and twentieth centuries.

Hurley's *Environmental Inequalities: Class, Race, and Industrial Pollution in Gary, Indiana, 1945-1980* examines how class and race intersected with environmental quality and outcomes in Gary. Hurley makes it clear that the violence of capitalism is racial and environmental, and that these violences are frequently coincident.

I used histories of Alaska, labor, and environment to frame my examination of the workers on the Trans-Alaska Pipeline System. This methodology enabled me to understand workers as more than just clock-punchers. Their lives were complex and the Pipeline was one part of an array of experiences, goals, and types of labor. Because of this approach, I was able to understand the ways that workers related to the land, to their personhood, and to their labor. This approach is necessary to understand the lasting impact of the TAPS workers on Alaska's economy, culture, and politics. The existing historical scholarship on TAPS, labor in Alaska, and labor-environmental history more broadly suggest that an analysis of TAPS workers is needed in our understanding of the Pipeline. The affective experiences of workers and the tenuous mediation between labor, self, and land deserve study because they matter to how the culture, economy, and policy of Alaska shifts in the late twentieth century. The workers of the TAPS have been depicted in popular environmental conversation as transient, anti-environmental, immoral, and monolithic. My research historicizes, complicates, and, in some ways, disproves these popular claims.

The backbone of my source base is the oral histories that Mike Jernigan and Kelly Bay helped me to create. I connected with both of them by traveling and working in Alaska. Meeting them this way actually directly informed the argument of my third chapter: I met Pipeliners by working in and participating in Alaska's tourist economy. I met Mike when I drove to Alaska and landed, exhausted, at his campground in Tok. After learning he and his father had worked

the Pipeline, I scheduled a follow-up conversation with him. I was advised to focus on building trust with those I was interviewing, so we chatted for awhile. Then I asked him questions that were open-ended: why did he come to Alaska? What were some of his favorite parts of working the Pipeline? Did he see much wildlife? I had a list of questions jotted down, but wanted to prioritize hearing what he wanted to share.

Kelly Bay lives in McCarthy, Alaska, where I work in the summers. I was connected to him by my own labor, working as a guide in Wrangell-St. Elias National Park. I approached Kelly in a similar way to how I approached Mike: build a ten-minute rapport, ask some open-ended questions, and try not to get in the way. Kelly's stories and general gregarious nature helped to crystallize how workers with deeply affective relationships with the land managed to create a life during and after the Pipeline.

The oral histories that I created with Kelly and Mike are invaluable to this project. I sought other sources, too. The papers and photographs of workers like Arne de Heus, Errol Champion, William Mumby, and Edna Witcher helped to contextualize the Pipeline and those who worked it. I sought out how workers described the land first and foremost in these archival materials. I used Tropy (a software) to code for mentions of various things like caribou, flowers, or workplaces safety. I sought differences and commonalities between themes of nature and work. From there, I contextualized their experiences of the land and labor with other aspects of what they recorded. It was not until after this initial analysis that I found the persisting – obvious, even – presence of the workers themselves in relation to their work and the land. This understanding was critical.

Another aspect of my sources are non-academic published works. I used these because the culture surrounding the TAPS in Alaska is a thing in and of itself. The way that the public

views the TAPS is a key part of the post-Pipeline-construction era, and so I wanted to document various expressions of this view. I also was able to find a trio of memoirs which offered a local color interpretation of the Pipeline and their relationship to it. These were: Wilma Knox's *Four Years Below Zero*, in which she describes her work as a security guard on the Pipeline; Jack Roderick's *Crude Dreams: A Personal History of Oil & Politics in Alaska* helped me understand the views of boosters and politicos in relation to the Pipeline; *Oil: Discovery at Prudhoe Bay: Mountain Men and Seismic Vision Drilled Black Gold* by John M. Sweet also provided invaluable commentary on seismology, wildcatting, and other aspects of the exploration between World War II and the late 1960s.

Finally, I make use of the Alyeska Pipeline Service Company's commemorative coffee table book, *Alyeska: A Thirty Year Journey.* This book deserves special analysis because it was published by the corporation responsible for building the Pipeline. In many ways, it was intended to reify the cultural reverence for the Pipeliners and the Pipeline itself. Within it, workers are profiled. Frequently, they wax poetic about the ecology and landscape of the Pipeline job site. This, of course, is intended to support the company's claims of environmental responsibility. Workers reported that they were enraptured by the land they worked on. I was excited by their read this documentation, but I tried to take it with a grain of salt.

* * *

In chapter one, I argue that workers' labor and forces of natural history created the North Slope. Oceans, glaciers, and other geologic forces created the landscape (aesthetics) and ecology (the scientific system of species and lands) that workers developed deep relationships with through their labor. These same forces produced the oil that drew tens of thousands of workers to the North Slope in the 1970s. Furthermore, the effort to use the energy contained in and around

the North Slope was not invented by TAPS workers. Instead, TAPS workers' labor was made possible by the labor of those who preceded them. Indigenous people sought the energy held in the land and water, especially by hunting whales and other cetaceans. They practiced trade and statecraft as Russians and Americans took interest in the region's energy sources. Most importantly, military and state-sponsored industrial projects in Alaska and on the North Slope began in the 1920s and continued in various forms through 1957. In these projects, workers proved that major industrial infrastructure projects were viable and valuable on the North Slope and throughout Alaska. These workers developed the know-how necessary to complete projects on the land *by working on the land.* Machinery in adverse environments, construction on permafrost, supplying remote camps and jobsites, and safety and wellbeing of workers were all major factors in the TAPS. Workers built knowledge in these vital categories on projects prior to the TAPS, such as the exploration of the National Petroleum Reserve 4 and the Defense Early Warning System Line (DEWline). This know-how proved to private capital, state and federal agencies, and workers that the North Slope and Alaska more broadly was worth further investigation and investment. This proof was created by workers and made the labor of TAPS workers possible.

Chapter two examines the lives of workers during their time on the Pipeline. I argue that workers on the TAPS created history that produced far more than just oil and oil infrastructure. I used archival materials, memoirs, and oral histories to understand how TAPS workers navigated their labor, their personhood (which I understand as their identity, ethics, or ambitions), and the land. I found that this trio was a constantly shifting dynamic in the lives of workers on the TAPS. While some moments foreground one or two of these factors over the other(s) (such as when a security guard encountered a bear in camp, leading to a critical assessment of her performance of

gender in a highly masculine worksite), all three are always present in the stories and archival materials of working people on the Pipeline. I argue that navigating this trio was itself an act which produced history on personal and societal levels. Workers navigated this trio to create environmental ethics, conceptions of their identity, a clearer understanding of their life's goals and the wages necessary to pursue them, among other things. Societally, workers navigating this trio created workplace culture and the post-pipeline economy. I count workers as anyone working on or adjacent to the Pipeline because I am interested in studying Alaska's late twentieth century beyond the specifics of the work camps and Pipeline job sites. For example, I use sources from Fairbanks locals and a Caterpillar salesman to understand the broader economy of the Pipeline era, and how non-Pipeliners performed a similar navigation of self, labor, and the land.

In chapter three, I argue that workers used their ability to navigate land, labor, and self in the changing, post-Pipeline-construction economy. Workers learned this skill through their labor on the Pipeline. They used this skill to construct the post-Pipeline-construction economy's emphasis on tourism as a new form of extractive labor. My argument is built primarily upon oral histories that I conducted with two Pipeliners, Kelly Bay and Mike Jernigan. Both men worked in Alaska in the decades after the Pipeline was finished. In the years since 1977, they have navigated the changing economy by shifting their labor, relating to new lands and relating to land in different ways, and seizing the opportunities for personal fulfillment that their co-creation of the tourist economy created. Both men worked in non-Pipeline work for years after the Pipeline was finished. During these years, they sought opportunities on the land to use their labor to create small businesses which now play significant roles in the state's tourism infrastructure.

Kelly and Mike could not have pursued this trajectory without the skill of navigating their labor, selves, and the land. They learned this skill on the Pipeline.

* * *

Finally, a few notes on terms. By "the North Slope," I mean the vast region of tundra, delta, hills, and rivers between Alaska's Brooks Range and the Arctic Ocean. It is commonly also referred to as "the Slope," and so I sometimes use that parlance for variety and to match the language used by workers past and present. "Wildcatting" is an oil industry term. It refers to exploratory drilling in previously unexplored areas. "Bush planes" are the small planes which connect Alaska's residents to one another and to critical services. They are also essential to the state's tourist economy, as many companies offer "flight-sees" and flights to scenic areas for hunting, backpacking, and camping. They typically seat anywhere from 1-6 people, though some might consider a slightly larger plane to be a bush plane, too. They are known for their ability to land on tundra, gravel, snow, glaciers, and sand. This versatility makes them essential to Alaska, past and present. I often refer to events after 1977 as occurring in the "post-pipeline economy." It is important to note that the Pipeline continues to operate to this day. I use this term for efficiency because I am typically concerned with the lives of workers "post-pipeline," by which I mean *their* time working on the TAPS.

CHAPTER I

The North Slope's Labor History, 1924 - 1974

Without a historical lens, it might seem remarkable, even a bit weird, that one of the most contested spaces in the world outside of a war zone is a tundra-mountain-and-ocean-scape where 11,000 people live across 89,000 square miles. Indeed, Alaska's own Congressional Representative, Don Young, once called a significant portion of the North Slope "nothing."[1] But the North Slope has long been home to continuous if shifting economy which continues to the present day. The claim of "nothingness" on the Slope is simply inaccurate. Though the Trans-Alaska Pipeline System may be an astounding accomplishment of technology and labor, people using and exploiting the resources of the North Slope, or attempting to, was not new. The TAPS was simply the latest iteration of economy and labor on the North Slope.

In order to build the TAPS, the economy needed to shift. The perfect storm of industrial knowledge, capital, state policy/engagement, and outside demand did not exist until just before workers began arriving on the Slope in 1974. This shift happened over five decades, from the 1920s to the 1970s. This shift was actually a series of shifts in the areas listed above. First, the industrial knowledge to conduct major infrastructural projects in remote and unforgiving areas would need to be developed. This industrial knowledge was the result of advancing technologies, trial and error (especially on the part of workers), and the massive infusion of capital provided by the military. Second, capital had to see the North Slope as capable of producing profits. Exploration by state and private interests combined with industrial knowledge to prove this to the interests of capital. Third, the state needed to adjudicate important questions of environmental

[1] US Congress, House. 2011. *ANWR: Jobs, Energy, and Deficit Reduction, Parts One and Two.* Oversight Hearings before the House Natural Resource Committee, day 1. 112th Cong., 1st session, September 21.

policy and Indigenous sovereignty. On a local level, the state had to prioritize development of the North Slope. This prioritization contributed to the creation of industrial knowledge. Finally, outside demand needed to develop in order to justify the enormous cost of winning approval, construction, and operation of the TAPS.

These factors would take decades to coalesce into conditions which greenlit the TAPS. Although some referred to the TAPS as the "largest private infrastructure project ever," it is enormously indebted to public dollars. No source of public dollars – and labor – is more responsible for the gathering of the factors listed above and, therefore, for the eventual construction of the TAPS than the military. A series of military projects on the North Slope were the backbone of the economy in the decades preceding the TAPS. These projects began in the 1920s with exploration of the North Slope's petroleum potential. Next, this oil was tapped for use during World War II. Simultaneously, the Alcan – a highway connecting Alaska to Canada and the rest of the United States – was constructed to avoid the suddenly dangerous Pacific. Finally, the Cold War's tensions focused attention on the value of the North American Arctic. The presence and impact of the military labor associated with these projects created the region's economy and was critical to the eventual development of the TAPS. This is because of the similarities in technology (heavy machinery), location (the North Slope specifically), and purpose (often the oil exploration of the National Petroleum Reserve 4, on the northwest Slope). When workers arrived to build and then operate the Trans-Alaska Pipeline System, they arrived to a region that had already been a stable economy for decades.[2] By explaining the long history

[2] Of course, the economy of the North Slope far pre-dates the U.S. military. Bathsheba Demuth's *Floating Coast*: *An Environmental History of the Bering Strait* explored this in depth. She sought to portray the region's history using calories/energy to argue that the outcome of both capitalist and socialist exploitation of the region's energy was relatively similar. For Demuth, American capitalist and Soviet socialist relations are just different attempts to bend nature in ways it cannot bend, at least not for long.

of labor's relationship to the ecology of the North Slope, and in Alaska more broadly, this chapter makes it clear that workers on the Trans-Alaska Pipeline System could not have completed their labor – or, frankly, even begun it – without the the economy which preceded them.[3] This examination of the 1920s – 1970s answers how and why workers arrived on the North Slope in 1974 to begin the mad dash toward Valdez. Furthermore, popular narratives espoused by conservationists and some boosters of oil have advanced an argument that land in Alaska, and the North Slope specifically, is wilderness or empty.[4] These narratives used frontier mythology, ecologically inaccurate claims, and ahistorical grounding to argue that the land impacted by the Pipeline has had no other use, whether in the present or in the past.[5] The economy discussed in this chapter makes it clear that these claims are false.[6] The TAPS was created by a variety of factors, many of which were set in motion by the military over a period of decades. These factors created the economy in which workers would build the TAPS.

From Wars to Wildcatters, 1923 - 1967

The oil beneath the North Slope is the oozing result of diatoms and other fossils from marine life that was crushed and heated by the surrounding geological layers, and feasted on by

[3] See Stephen Haycox, *Frigid Embrace: Politics, Economics, and Environment in Alaska.* (Oregon State University Press, 2002.) 5. Haycox places Alaskan history, including its rushes, in the broader context of coloniality. He highlights gold, the military arrivals of WWII and the Cold War, and the TAPS as "three waves of non-Native settlers" who "migrated to the region." This chapter is most concerned with the WWII and Cold War periods. The Klondike Gold Rush was certainly important to the state's history, but has little bearing on this argument.
[4] Coates, 183. See Coates for a robust discussion of the rhetoric used by the conservation movement to argue for wilderness during the Pipeline Era, especially in chapters seven and eight. It is replete with Cronon's "wilderness myth." A classic example of popular advancement of the "nothing" myth is some of Alaska Representative Don Young's rhetoric during his nearly four decades representing Alaska in Congress, especially in his early years as an elected official. Albro Gregory, a newspaperman from Nome, weaponized this imagery in an interesting way, arguing that most folks in the lower forty-eight thought that "Alaska is one large chunk of ice," thus implying the question that those opposing the Pipeline were foolishly protecting something they did not understand.
[5] A longer history of Alaska disproves this claim. Demuth's *Floating Coast* is useful here, again. Additionally, I recommend the literature of Velma Wallis, such as *Two Old Women: An Alaska Legend of Betrayal, Courage, and Survival.*
[6] It must be noted that this chapter does not document the beginning of an economy on the North Slope. That began thousands of years prior. Again, see *Floating Coast*.

anaerobic bacteria.[7] "On average," the chemist Harold Schobert wrote, "some 7 kg of carbon accumulated in organic matter eventually resulted in 1 gram of carbon in fossil fuels."[8] The Prudhoe Bay Oil Field's 25 billion barrels of crude spread across 213,543 acres suggest that the North Slope was once an extraordinarily vibrant ecology.[9] A lengthy process of marine chemistry created the oilfield that workers would work over and over again in twentieth century.

Boosters had long sought greater investment in Alaska, but it was World War II and the Cold War that created the logics for capital and the state alike to lay the military industrial groundwork for future extractive industry, like the TAPS.[10] Though the Arctic had been plied for trade and resources for centuries by indigenous people and outsiders alike, the region's contemporary era began in 1923 when President Warren Harding set aside the National Petroleum Reserve – 4 in the northwest portion of the North Slope. Initially explored and mapped by dog team in 1923 - 1926, the "Pet 4" became a critical piece of the military's energy stocks in the 1940s. The prospect of oil within the United States *and* close to the war in the Pacific was extremely interesting to the military. Then, after World War II concluded, strategic geography became an important resource to claim on the North Slope of Alaska. As a result, workers played a pivotal role in developing a relationship with land that proved the feasibility of future, industrial-scale extraction on the North Slope.

The United States military set in motion the creation of the economy that led to the TAPS during World War II. The Permanent Joint Board on Defense – the partnership between the U.S.

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[7] U.S. Energy Administration. June 12, 2023. "Oil and petroleum products explained." Accessed March 12, 2024. https://www.eia.gov/energyexplained/oil-and-petroleum-products

[8] Harold Schobert, *Chemistry of Fossil Fuels and Biofuels*, (Cambridge University Press, 2013), 104.

[9] British Petroleum. N.d. "Prudhoe Bay Fact Sheet." Accessed February 22, 2024. http://www.bp.com/liveassets/bp_internet/us/bp_us_english/STAGING/local_assets/downloads/a/A03_prudhoe_bay_fact_sheet.pdf

[10] Coates, 64.

and Canada to ensure the security of their interests in North America – was the foundational governmental partnership which prompted these projects.[11] This Board was spurred to aggressive planning, investment, and dispatching of labor by the attack on Pearl Harbor on December 7, 1941. The seas of the Pacific were no longer safe for shipping and transportation, it seemed. A road to Alaska through Canada was begun exactly four months after Pearl Harbor – extraordinary haste for a project that had been languishing in various public and private forums for more than a decade. This haste continued, as eleven thousand soldiers finished the Alaska Highway in nine months, connecting Edmonton, Alberta, to Fairbanks, Alaska.[12] These workers found themselves in conditions remarkably similar to those of the Pipeliners three decades later: "The high incomes came, in large measure, from the extended hours of work on the construction projects," wrote two historians.[13] Images show trucks and bulldozers up to the tops of their tires in mud; soggy tents drooping in heavy, wet snow; and filthy, sweating men and women erecting bridges and cabins.[14] The labor force related to these projects amounted to an "American invasion" of Alaska, the Yukon, and the Northwest Territories between 1942 and 1946.[15] Some 60,000 workers arrived in "the Northwest" to expand empire and defend North America. But this significant in-migration was a part of the economy of the region. It was not the first time that workers from afar had arrived, and it would not be the last.[16]

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[11] Coates, 67.
[12] Coates and Morrison, 36.
[13] Ibid, 146.
[14] Ibid, 37, 57, 166.
[15] Ibid, 3. As Alaska's economy has changed, the Alcan's purpose has shifted from being a strategic aspect of international, allied infrastructure to being a thoroughfare for tourism. The connections between labor and the landscape produced a piece of critical international infrastructure *and* a future site of tourism. This, too, portended the Pipeline.
[16] Labor historians have been relatively uninterested in or dismissive of conceiving of soldiers as workers, a conception that Morrison and Coates challenge.

In the twentieth century, Alaska's population was defined by significant in- and out-migration. This transience has caused historians to explain the 20th century history of Alaska as a series of rushes or booms. These rushes or booms were characterized by significant in- and out-migration and non-permanent residency.[17] For example, scholars have documented how salmon, minerals, whales, and military investment brought significant numbers of workers from around the world into the colony's, then territory's, then state's, economy.[18] But despite significant transience, the persistent presence of labor on the North Slope in the twentieth century displays a stable, if shifting, economy.

World War II caused a population boom in the state. In 1939, all of Alaska had 72,500 residents. Only 524 of them were military personnel. By the following summer, 9,000 military personnel called Alaska home. By 1943, the military population had ballooned to 152,000 people. The state as a whole had grown to 233,000 residents.[19] This gargantuan growth in population outpaced the population growth during the Pipeline years, but it, like other aspects of military labor in the state, set a blueprint for massive infrastructure projects in the United States' northern most reaches. These workers/soldiers were learning how to make industrial expansion happen in lands that offered surprising and confusing new challenges. The extreme weather,

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[17] Stephen Haycox, *Frigid Embrace: Politics, Economics, and Environment in Alaska,* (Oregon State University Press, 2002), ix.

[18] Diane J. Purvis, *Ragged Coast, Rugged Coves: Labor, Culture, and Politics in Southeast Alaska Canneries,* (University of Nebraska Press, 2021), which documents cannery labor in amongst marginalized workers, especially women of color. Purvis explores how colonialism and capitalism shaped workers' lives, arguing that workers bonded across ethnic identities to form culture and resistance to exploitative conditions. Stephen Haycox, *Frigid Embrace: Politics, Economics, and Environment in Alaska*, (Oregon State Press, 2002) argues that Alaskans have created a colony, due to their reliance upon goods from outside the state and their proclivity for recreating the norms, systems, and cultures of their places of origin. Bathsheba Demuth, *Floating Coast: An Environmental History of the Bering Strait,* (W.W. Norton & Company, 2019) argues that life in Beringia is best understood via the study of the pursuit of energy, especially from cetaceans. William R. Morrison and Kenneth A. Coates, *Working the North: Labor and the Northwest Defense Projects, 1942 - 1946,* (University of Alaska Press, 1994) argues that military laborers had enormous impact on the pattern of living and working in Alaska, the Yukon, and the Northwest Territories. They pay special attention to the difficulties of working in often inhospitable locales, as well as to the bureaucratic and policy attempts to support those working in those difficult conditions.

[19] Coates, 74.

seasonal shifts in conditions, permafrost, and various logistics of working in the North demanded that laborers begin to understand to advance both their own safety and wellbeing, and their projects themselves.[20]

Though many thematic or experiential similarities existed between military labor projects and the Pipeline, no single project was as relevant to the TAPS as the exploration of "Pet 4." Today, Pet 4 – also called NPR4 -- is the National Petroleum Reserve in Alaska – NPR-A. The Pet 4 was (and is) a 23-million-acre portion of Alaska's North Slope. The region is characterized by the immense tundra plain between the foothills of the western Brooks Range and an extraordinary number of rivers, deltas, ponds, and lakes. During the initial exploration in the twenties, geologists felt that any oil that was there would be tremendously difficult to ship out of the remote region due to sea ice that remained nearly year-round.[21] This difficulty would eventually lead to the creation of the TAPS.

But first, a commercially significant amount of oil would need to be found. In 1944, "the modern era of oil development in Alaska began."[22] As World War II raged on and the need for oil for military use began to appear protracted, the U.S. Geological Survey and the U.S. Navy's Office of Naval Petroleum and Oil Shale Reserves turned their attention to NPR4 in earnest. This shift in state attention – and, therefore, labor power – toward NPR4 was the "turning point" in Alaskan oil history.[23] Military labor conducted the first efforts to seize the energy of the ancient life beneath the surface of the North Slope. Without the exploration and labor performed

[20] Ibid, 75.
[21] Ibid, 55.
[22] Ibid, 75.
[23] John M. Sweet, *Discovery at Prudhoe Bay: Oil, Mountain Men and Seismic Vision Drilled Black Gold*, (Hancock House Publishers, 2008), 86.

between 1923 and the end of World War II, the exploitation of the North Slope's oil reserves may have been significantly delayed.

A hurdle of industrial knowledge in the North Slope's economy was the delivery of materials and labor to the Arctic. In July of 1944, 8,448 tons of "supplies, equipment, Seabees (WW II Navy constructors) and stevedores" departed Tacoma, Washington.[24] This "flotilla" arrived in Barrow, Alaska, in August and September – critical timing because of the always-pesky ice-in and ice-out problem in the Arctic Ocean.[25] ARCO and British Petroleum would have this problem, too. It is difficult to grasp the enormity of this project's audacity. Thousands of tons of equipment were transported via tractor trains of a dozen sleds traveled distances of hundreds of miles over weeks, such as the common trek from Barrow to Umiat. Bush planes resupplied the travelers on their journeys. It was remarkable journeys and projects such as these that provided the "proof of concept" for the Trans-Alaska Pipeline System in the eyes of the state and capital.[26]

Stunning numbers of workers and amounts of material could be transported to harsh and seemingly remote locations that were wholly unconnected to the rest of the state via road.[27] Workers could be kept safe enough and happy enough to maintain productivity. Materials and machinery could be serviced and resupplied by Alaska's growing bush plane industry. This creation of industrial know-how made it clear to investors, wildcatters, boosters, and laborers that massive industrial projects could be undertaken on Alaska's North Slope. This finding was critical to the establishment of the North Slope's stable economy.

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[24] Ibid, 87.

[25] Late summer was typically – though not always – ice free in necessary portions of the Arctic Ocean. This has, of course, changed dramatically today, as shipping in the Arctic Ocean becomes more possible each year.

[26] Sweet, 88.

[27] This portion of the military labor projects would not, actually, be replicated. As will soon be described, the construction of a road from Fairbanks was critical to the success of the TAPS.

But the creation of this industrial knowledge was not only used by pro-Pipeline partisans. The economy had impacted the North Slope. Not everyone was happy about it. Though conservationists would ultimately be unable to stop the construction and operation of the TAPS, the impacts of military industrial activity in the North Slope's economy created secondary demands for their movement. The successful defeat of Project Chariot and the Rampart Dam – two significant infrastructure projects in northern and interior Alaska in the mid-twentieth century – created the context for the debate over TAPS.[28] But so, too, did the scars created by earlier industrial projects on the North Slope and in the Interior. Conservationists were well-aware of the enormous impact that gravel airstrips and Caterpillar tractors had left behind during exploration of the Pet 4.[29] This impact likely led to the policies that conservationists managed to win via the various stages of the environmental review process for the Pipeline.[30] The history of the region's economy laid the groundwork for the concessions that conservationists would eventually win. These were primarily policies about minimizing impact. The methods of construction and exploration during the Pet 4 surveys in the late stages of World War II laid the foundation for future projects on the North Slope. This was true both in the actual equipment and practices that were employed – the importance and utility of Caterpillar machinery, for example – and in the environmental policies and stipulations that ultimately the TAPS.

The World War II era of labor on the North Slope and in the Far North concluded with an awareness of the potential of its strategic location and an expanded economy. Despite the end of

[28] Coates, 23. Project Chariot was part of the Atomic Energy Commission's "Atoms for Peace" program. It was proposed to use a nuclear explosion to create a harbor in Alaska's coast on the Chukchi Sea, near the Bering Strait. The Rampart Dam was an effort to dam the Yukon River for hydropower.
[29] Ibid, 76.
[30] One oft-cited example of a win for conservationists was the rule that workers not walk off of the job site or work camp, thus creating new impacts on the surrounding land. Though workers were prone to ignoring management's rules, Mike Jernigan, a former Pipeliner, once told me that people mostly stayed off the surrounding tundra and other vegetation.

World War II, the late 1940s and 1950s were not a bust in the region's economy, but rather an advance into new forms of strategic industrialization – especially on the North Slope. Key amongst these were the Defense Early Warning Line (DEWLine), which aimed to protect North America and its people from the threat of Soviet aggression; and the Canol Pipeline, which connected oilfields in the Northwest Territories to American military infrastructure via Fairbanks.[31] These projects continued the economic form of past years: the use of military power to take advantage of the North's strategic resources.

The DEWline employed 7,500 workers in Alaska, beginning in 1953. It was completed in 1957, stretching the length of Alaska's Arctic coast. The Western Electric Company was awarded the government contract to construct the radar and communications infrastructure. Much like the Pet 4 exploration and the construction of the Alcan, the DEWline was challenged by permafrost and other difficulties endemic to the region. Enormous amounts of gravel were needed to lay airstrips, for example.[32] Airstrips would be critical to the eventual construction of the TAPS, as many workers would travel by air to and from the workcamps.

Imperialist conflicts created the economy of Alaska's North Slope in the mid-twentieth century. These conflicts had proven the viability of major infrastructure projects and the use of heavy machinery on the North Slope, and in Alaska more generally, had been proven several times over. The military's efforts to develop and expand the economy of the North Slope would lead to private investment in the post-war years. Commercially viable oil was discovered in South-Central Alaska's Kenai Peninsula in 1957, which whetted the appetite of exploratory oil companies for the state.[33] In July of 1959, the American Association of Petroleum Geologists

[31] The Canol was not on the North Slope, but deserves attention as an important precursor to the TAPS.
[32] Coates, 75-77.
[33] Sweet, 117.

(AAPG) published a meeting abstract titled, "Recent Developments in Alaska" in which they summarized the state of the state's oil potential:

> The discovery of commercially recoverable oil on the Kenai Peninsula by Richfield in 1957, coupled with the prior oil and gas discoveries made by the Navy in and adjacent to Naval Petroleum Reserve No. 4 in Northern Alaska, and the subsequent opening to public leasing of Interior Department lands east of the Reserve have caused the oil companies to renew their interest in Alaska.[34]

In the early 1960s, various businesses heeded the advice of the AAPG. A trio of companies -- Humble, Richfield, and Atlantic Refining Company -- invested in the potential of the North Slope, often in joint venture capacity to spread the financial risk of remote exploratory drilling.[35] The time and money spent by the military and the industrial knowledge created by workers on its projects had convinced capital that exploration of the state's oil reserves was a worthwhile investment.

Atlantic Refining and Richfield would merge in 1965, becoming ARCO. Frantic lease sales, facilitated by an oil-friendly state lease manager, Thomas Marshall, characterized much of the 1960s. Global capital coalesced around the idea that there was likely wealth to be created on Alaska's North Slope. The state's bush plane and helicopter technology and industry added to the transportation legacy of bulldozers and sled dogs. Geologists roamed the treeless northern foothills of the Brooks Range, assessing the "structure" of the region and hoping to draw the treasure map for drillers.[36] Finally, on April 22nd, 1967, commercially viable oil was "spudded" – tapped – at ARCO-Humble Prudhoe Bay State No. 1.[37] Alaska – indeed, the world – would

[34] Sherman, W.B., Watson, J.W. 1959. "Recent Developments in Alaska: ABSTRACT." AAPG Bulletin, American Association of Petroleum Geologists, Accessed April 15, 2024. https://archives.datapages.com/data/bulletns/1957-60/data/pg/0043/0007/1750/1779a.htm?q=%2BtextStrip%3Aalaska+%2ByearSort%3A%5B1958+TO+1959%5D
[35] Sweet, 126.
[36] Ibid, 172-179.
[37] Ibid, 198-200.

never be the same. But in order for the economy of Alaska's North Slope to build the Trans-Alaska Pipeline System, private industry would need to gain support from the state.

ANCSA, the Trans-Alaska Pipeline Labor Boom, and Geopolitics

The early efforts to transport oil from the North Slope were typically by sea in part because the Interior was seen as too costly and difficult to traverse. Humble Oil and Refining had chartered the SS *Manhattan* in August of 1969 to attempt to break ice through the Northwest Passage to manage an Arctic Ocean egress for the North Slope's petroleum.[38] But the workers who had traversed the North Slope via plane, helicopter, heavy vehicle and machinery, and foot to map and exploit the Pet 4 made it clear that the North Slope could become an oil jobsite and, eventually, an oil transportation system. The maddening ice-in and ice-out at sea was combined with the know-how created by the workers in the economy that preceded the TAPS. This combination led to the proposal of the Trans-Alaska Pipeline System in February of 1969.[39]

The Alaska Native Claim Settlement Act of 1971 was a critical intervention in the economy of Alaska. Its necessity showed that, though there was a continuous extractive economy in Alaska in the 20th century, the state needed to help chart a course in order to shift from military to private enterprise. Prior to the passage of ANCSA, Native Alaskans' lands had not been clarified in much of the state. To build the 800-mile Pipeline, land ownership would need to be adjudicated. The right-of-way that ANCSA helped to create was essential to the Pipeline's eventual approval. However, to physically clear the way for and construct the Pipeline, the oil companies would need labor to create further industrial knowledge. Alaska had

[38] Coen, 5.
[39] Coates, 176. It must be noted that a Trans-Canada Pipeline was explored. Coates explores this historical "what-if" in Chapter 7 of *The Trans-Alaska Pipeline Controversy.*

elected a new governor in November of 1966 named Walter Hickel. Hickel was a businessman with interests in real estate and construction. Hickel was committed to growth for Alaska's industries. One of the key elements of this commitment was Hickel's creation of the Northern Operations Rail Transportation and Highways (NORTH) Commission. Hickel, well aware of the potential of the North Slope's oilfields, created the Commission to explore the potential of expanding rail and roads into the state's northern regions.[40]

Workers labored in December temperatures as low as 63 below zero, connecting Fairbanks to Sagwon, some 90 miles south of Prudhoe Bay.[41] Yet the "Hickel Highway," as it was dubbed, became a punching bag for conservationists and even some businesspeople. It was exorbitantly expensive and carved a lasting scar through the Interior – without becoming a year-round road, due to the challenges (and errors made by haste or inexperience) of dealing with road construction atop dynamic permafrost. When summer came, the road melted into the tundra, taiga, and muskeg, becoming the "Hickel Canal."[42] The scar was more than physical: it gathered Native Alaskans and conservationists in opposition to the road and, by virtue of its reliance upon a road, the Pipeline.

Lawsuits were filed by five Native groups and several conservation non-profits.[43] Ecological knowledge was critical to development of infrastructure in the north, especially when infrastructure projects came under fire from steadfast opponents. Haste, capital, and state power alone were not enough to thread the delicate needle of northern construction.[44] In order for the

[40] Coates, 163.
[41] Ibid, 165.
[42] Haycox, 103.
[43] Coates, 189.
[44] This needle would eventually be threaded in the spring of 1974, after the Pipeline was approved and construction had begun. The resulting highway was further east than Hickel's initial attempt, and, evidently, would learn from the lessons of the past by freezing gravel and other materials atop the permafrost before laying a road on top of that. It

economy to persist on the North Slope, it seemed that its drivers would need to persuade conservationists and Native Alaskans that the mistakes of the Hickel Highway would not be repeated. From 1970 to 1973, despite enjoying overwhelming support within Alaska, the Pipeline floundered in heated public debate.[45]

The hurdle for oil companies and boosters was raised significantly by the National Environmental Policy Act of 1970 (NEPA), which strengthened the environmental review process. This was another example of the state involving itself in the creation of the North Slope's economy in order to mediate the environmental and business/labor interests in and out of Alaska. NEPA bought conservationists more time to build a national and international base of popular support for their cause.[46] But the TAPS is a global system and was subject to the fluctuations of a volatile global oil market.[47]

In the late 1960s and early 1970s, the North Slope was being meaningfully shaped by Native Alaskans, federal law and bureaucracy, in-state boosters, and state politics up until the very last moment. As "wildcatting" (an oil industry term for small-scale exploratory drilling) and other exploration efforts charged forward, a key piece of support was still lacking: the outside demand to create the economic and political necessity. As a colonial economy, Alaska's industry is defined by demand outside the state for its raw materials.[48] Within the state, the promise of profit and jobs had wooed most Alaskans already. But environmentalism was an important topic in Washington D.C.'s halls of power in the early 1970s. As exemplified by the passage of NEPA

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was named the Dalton Highway after James W. Dalton, a pioneering Arctic engineer who had worked on the DEWLine.

[45] For an exhaustive history of the public debate surrounding approval and operation of the TAPS, see *The Trans-Alaska Pipeline Controversy: Technology, Conservation, and the Frontier* by Peter A. Coates.

[46] Coates, 189-190.

[47] For further discussion of this, see Philip A. Wight's dissertation, *Arctic Artery: The Trans-Alaska Pipeline System and the World it Made.*

[48] See Haycox, *Alaska: American Colony* and *Frigid Embrace: Politics, Economics, and Environment in Alaska.*

and other environmental laws, the environmental movement was on the march – and making progress for itself. As it had in the World War II and Cold War years, the next iteration of the North Slope's economy would depend on the state and its response to global conflict.

In October of 1973, the Organization of Arab Petroleum Exporting Countries (OAPEC) issued a crippling embargo against the U.S. The embargo, in retaliation for the $2.2 billion of aid that Congress had appropriated to Israel during the Arab-Israeli War, triggered an explosion in the price of oil from $2.90 per barrel to $11.65 between October of 1973 and January of 1974.[49] Though the embargo would end in March of 1974, prices did not drop, creating an extended and politically impactful crisis in the United States. Sociologist Matt Huber argues that the oil crisis of the 1970s was an affront to the domestic political norm of cheap, widely available gasoline after decades of steady economic growth and an expanding middle class in the United States.[50] Indeed, U.S. oil consumption had jumped from 5.8 million barrels per day in 1948 to 16.4 million in 1972.[51] The embargo, price inflation, and subsequent rattling of American consumer politics was a tremendous gift for oil companies and Alaskan boosters. The demand from outside the state – that final piece of the puzzle – had arrived.

The Trans-Alaska Pipeline Authorization Act passed the House 361-14 and the Senate 80-5 in mid-November of 1973, less than a month after the announcement of the embargo. On November 16, 1973, President Richard Nixon signed it into law.[52] Alaska Governor William A. Egan told *The New York Times* that the President's signature marked "the end of a long and

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[49] https://www.federalreservehistory.org/essays/oil-shock-of-1973-74

[50] Huber, Matthew T. 2013. *Lifeblood: Oil, Freedom, and the Forces of Capital*. University of Minnesota Press. 98-99. Huber's exploration of how oil became so entrenched in the United States' modes of production, culture, and politics is critical for understanding the late twentieth century and, though he leaves it unexamined, Alaska.

[51] Yergin, Daniel. 2008. *The Prize: The Epic Quest for Oil, Money & Power*. Free Press. 541.

[52] Carrington, William J. Feb., 1996. "The Alaskan Labor Market during the Pipeline Era." *Journal of Political Economy*, Vol. 104, No. 1: 186-218. 189.

vigorous struggle by Alaskans for development of the facilities necessary to begin moving our vast crude oil resources to market to help meet our nation's critical energy needs."[53] With federal approval secured at long last, labor prepared to flow north to arrive in the newest version of the North Slope economy.

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The economy of Alaska and, specifically, its North Slope, was constructed by military and state intervention, private capital, and the colonial export system that has characterized much of Alaska's post-colonial history. The TAPS needed a variety of factors to align in order to begin construction in 1974. First, workers needed to produce industrial knowledge, as they did on dog-sleds, in the construction of various military projects, and in wildcatting missions. Second, capital had to believe in this knowledge and in the viability of the project, despite its significant challenges of climate and location. Third, the state needed to intervene to adjudicate how the Pipeline could be approved, creating the regulatory and policy framework within which capital and labor operated upon the Pipeline's approval. And, finally, Alaska's colonial economy would need outside demand in order to spring into action to supply oil to an expanding global economy. Geopolitics provided this demand. The United States military was integral to these factors aligning. Indeed, the military set in motion many of the other factors which eventually coalesced in the Cold War era.

It was these factors that created the economy that workers began arriving to in 1974. They were not arriving to nothing; they were not rescuing a ghost-town from a bust. They were,

[53] Special to the New York Times. 1973. "Bill on Pipeline Hailed in Alaska: Governor Says the Signing Ends a Long Struggle." The New York Times, November 18, 1973. https://www.nytimes.com/1973/11/18/archives/bill-on-pipeline-hailed-in-alaska-suit-was-filed-tax-increase-many.html?searchResultPosition=1

instead, arriving to work the land that an economy had been shaping for decades. Their labor and lives changed Alaska forever.

CHAPTER TWO

"I Wasn't Working Non-Stop":

Workers' Relationships with Land and Gender on the Trans-Alaska Pipeline

Kelly Bay arrived in Fairbanks, Alaska on February 1, 1975. The son of a Boeing engineer, he had been working as a carpenter in Bend, Oregon, when he decided to drive up the Alcan with a friend named Scott in the winter of 1975. "We didn't come for the work," he explained to me on a warm afternoon in McCarthy, Alaska. "We came to go to Alaska."[54] Despite the fact that the Pipeline had hired roughly 25,000 workers into Alaska the summer before, Kelly claimed to me that he was not aware of the Pipeline project.[55] Kelly and Scott pulled into an RV park and campground, across the road from Creamer's Field on the north side of Fairbanks. The campground, run by a woman named Betty, was crowded with out-of-town folks looking for Pipeline- and Pipeline-related work. In the frigid, late afternoon winter light, Kelly and Scott shuffled through snow and around trailers to the small office, hoping to rent a spot to sleep.

"Betty liked to drink," Kelly chuckled. "She's layin' on the couch, passed out. Eventually, she got up and rented us a spot."[56] The campground was like the rest of Fairbanks in the Pipeline days: totally beyond its carrying capacity. The infrastructure was so overwhelmed that many aspiring Pipeliners were relieving themselves in a slough behind the campground.

Kelly and Scott were part of a tsunami of workers who arrived in Fairbanks, a small city in the rolling, boreal interior of Alaska. In July of 1973, the Alaska State Department of Labor estimated that 45,571 people lived in Fairbanks North Star Borough. By July 1 of 1975, the Alaska

[54] Bay, Kelly, 2023. Interview by author. McCarthy, Alaska. July 29, 2023.
[55] Carrington, 191.
[56] Bay, Kelly. 2023.

State Department of Community and Regional Affairs estimated that 63,350 people called the city and Borough home – an increase of roughly 36%.[57]

This tsunami of workers came from many places and backgrounds. They had a variety of skills and, probably, a variety of ideas about what Alaska was and why they were there. Popular narratives and other histories have focused on one understanding of what they produced with their wage labor: a globally significant, 800-mile-long Pipeline which remains operational nearly fifty years later. Understanding the Pipeline itself is important and other scholars have done important work to do so. Though elements of this chapter will explain the physical infrastructure that workers created, that is not the purpose of this chapter. Instead, this chapter will begin the critical task of describing what this diverse, enormous group of workers produced *beyond* oil infrastructure.

I am particularly interested in describing the relationships that these workers created to build a home in Alaska both during their work on the Pipeline and in the years after the Pipeline was completed in 1977. To do so, I will highlight several different workers who report via archival, memoir, and oral histories the relationships they built. It is critical to note that they tell stories that may not speak for all who worked in the Pipeline economy between 1974 and 1977. The stories of this small handful of workers are anecdotal. This does not, however, strip them of their value. The stories of relationships in this chapter are still valuable because they explain how *some* workers created relationships on the Pipeline to create a home on the job and in the years afterward. They can be used carefully to guide future research of labor on the TAPS and in similar projects.

[57] Dixon, Mim. *What Happened to Fairbanks? The Effects of the Trans-Alaska Oil Pipeline on the Community of Fairbanks, Alaska*. Westview Press. 118.

Completely cataloging the types of relationships workers created in the Pipeline economy is not the goal of this project.[58] Instead, I describe and analyze relationships which fell into one of a few categories. First, I found relationships that workers had with the land and ecology around them. These relationships are important to understand because they trouble the popular and academic notions of workers on the TAPS as anti-environmental. Other cases describe relationships with the land which show that many workers on the Pipeline reported strong affective connections with the land and ecology around them. In short, many workers on the Pipeline had ethics of place that were formed by their relationships to the land.

Another relationship that I seek to explain is relationships that workers built with the worksite and its culture. These relationships characterize a significant part of the time that workers spent on the job and are important for this fact alone. However, these relationships were *also* valuable because of their long-term impact on the workers and the state's economy. I am also especially interested in the stories relayed by Wilma Knox, a security guard on the Pipeline. Wilma's story of her relationship to the job and its culture begins the important work of describing the experiences of women on the Pipeline.

These relationships exemplify how some Pipeline workers used their experiences on the Pipeline to find a home in Alaska's economy in the years after the Pipeline was completed in 1977. This makes it clear that the totalizing narrative of massive in-migration, followed by labor by male wageworkers who did not care for the land, followed by massive out-migration, is a dramatic error in understanding the Pipeline's laborers. Indeed, these workers were demonized by many who feared the impact they would have.[59] There are vital critiques to be made of the

[58] Largely absent from specific focus are social relationships, boss-worker relationships, and relationships between Native Alaskan workers and workers from elsewhere.
[59] This was especially true in Fairbanks.

Pipeline, especially in regards to its contribution to climate change. However, the TAPS workers were often creating valuable relationships during their time working in the Pipeline economy. Many workers forged relationships during their time working in the Pipeline economy which show the complexity of their lives and directly contributed to their post-Pipeline existences.

Labor Assembles on the Pipeline

The concerns in Fairbanks about the impact of tens of thousands of workers were profound. Fears about a loss of the frontier and wilderness, about the vice and violence associated with "man camps," especially sexual violence and drugs, were in the newspapers on a seemingly daily basis.[60] As the Alyeska Pipeline Service Company[61] began delivering infrastructure to the town, the fleet of yellow pickups became a talking point and target of petty theft, a small act of mischievous resistance to the arrival of a behemoth of capital in the once quiet town.[62] But ire and anxiety were not the only attitudes on display in Fairbanks. Letters from Fairbanks families to relatives in the Lower 48 comment with great anticipation on the Pipeline's progress toward approval and then toward completion.[63]

Unions, like the Teamsters, had negotiated strong contracts for their members by reading the sense of urgency amongst Alyeska and politicians. But these contracts also required that they sacrifice their right to strike. Moreover, workers agreed to extraordinarily grueling stretches of work: seven days a week for twelve or more hours a day – called "seven-twelves" in the camps.[64] Of course, many workers also relished the opportunity to work "seven-fourteens" or more because

[60] Dixon, 12.
[61] Alyeska Pipeline Service Company was formed in August of 1970. It was made up of several oil companies who held leases on the land from whence the oil came, and through which the Pipeline would flow.
[62] Dixon, 17.
[63] Lawson Papers TAPS, August 9, 2023. Collection One, Box One. "Lawson Family Letters." Alaska and Polar Regions Collections and Archives. University of Alaska-Fairbanks, Fairbanks, Alaska.
[64] Dixon, 10.

unions had won both high base wages *and* significant overtime. These grueling yet rewarding conditions were coupled with a national uncertainty in the labor market and the perception of "adventure" – "we came to go to Alaska" – to create a previously unseen "invasion" of workers into the state, especially into Fairbanks.[65] So profound was the concern in Fairbanks that in June of 1974 – the beginning of the first summer of construction – Fairbanks North Star Borough launched an Impact Information Center to monitor the ways that the Pipeline project was affecting the city and Borough.[66] The municipality decided that the potential arrival of thousands of workers was worth the creation of a method through which to monitor this impact. Even the anticipation of workers on the Pipeline created history.

As evidenced by the creation of the Impact Information Center, the TAPS was predicted by local business people. But, as Kelly's anecdote of scarce lodging and public ditch restrooms illustrates, even after almost one year of construction on the Pipeline, the city's businesses were stretched beyond their carrying capacity. If the Pipeline was expected, why did Kelly, Scott, and thousands of other workers arrive to find a city and Borough without adequate housing, plumbing, electricity, telephone numbers, and more? The municipality had anticipated them enough to create a method through which to monitor their impact; but, ironically, the history that these workers would inevitably make was not going to be within readymade infrastructure.

Mim Dixon's 1978 sociological study of the impacts, *What Happened to Fairbanks?* argues that many business owners and public officials were incapable and unwilling to make the capital investment needed to prepare the region: "The types of capital expenditures needed to expand the infrastructure required investments…[which] had to be based upon a stable economy

[65] See Coates and Morrison, *Working the North: Labor and the Northwest Defense Projects, 1942 - 1946* for more information.
[66] Dixon, 13.

or a prospective period of long-term growth. Historically, Fairbanks has had anything but a stable economy."[67] Instead of capitalizing to meet the explosion of development, Betty and other business people chose to ride it out, uncertain of how deep the wealth created by the Pipeline would sink into the community. The history of an unstable economy shows the ways in which chapter one's various projects on the North Slope may have caused intermittent economic activity in Fairbanks.

But the environmental concerns – themselves partially caused by the significant damage that past iterations of the industrial development on the Slope had caused – slowed the permitting process for the Pipeline so dramatically that local business owners were unable or unwilling to scale their businesses for the coming barrage of Pipeliners. Dixon argues that many in the community were once-bitten, twice-shy. In 1970, business owners had prepared to scale up for the anticipated boom. "Due to the delay in pipeline construction as a result of NEPA and ANCSA, their investments were not profitable and many sustained heavy losses," Dixon explains.[68] A member of the Lawson family – a clan in Fairbanks – wrote an annual letter to relatives in the Lower Forty-Eight. In December of 1971, this letter reported a similar conundrum: "Alaska is still suffering from oil pains. Much rests on the settlement of the Native Land Claims. In the meantime, those who geared for the boom are holding the bag and our whole economy is suffering."[69] A few years later, after the Claims had been settled, and the construction begun, the Lawson's letter sang a different tune:

> For Fairbanks, I'd call 1975 the YEAR of the PIPELINE. No doubt you heard many stories about the project. I'd guess that most of them are true or reasonable facsimiles thereof. One day at the airport as people were walking to their cars after arrival of a plane one man

[67] Ibid, 130-131.
[68] Ibid, 134.
[69] Lawson Papers TAPS.

> said to another: 'I hope some son-of-a-bitch doesn't offer me a job.'[70]

In four short years, Fairbanks – indeed, all of Alaska – was changed forever by the workers on the Trans-Alaska Pipeline. Their labor, and wages changed the land and cities of the state forever, transforming tundra into job sites and towns like Fairbanks into small cities. But it was more than these factors that shaped Alaska. As this chapter will show, these workers changed Alaska because of the relationships they built, too.

Roughly 50,000 people worked in Alaska's Pipeline economy in each of the three primary years of construction, 1974-1976. These 50,000 – many of whom were presumably repeating their work from year to year as their positions became seasonally possible or necessary – included people employed by Alyeska, as well as work by subcontractors.[71] They worked as welders, security guards, light and heavy mechanics, cooks, carpenters, general laborers, clerical staff, and bus and truck drivers, among other things. Many were career Pipeliners who had worked similar jobs around the world.[72] Mim Dixon's study, *What Happened to Fairbanks?* estimated that 40-60% of workers were Alaskan.[73] The trouble with this estimate, aside from the width of its margin of error, is the loose conception of what constituted an "Alaskan." To qualify as an Alaskan – and, therefore, as a much-coveted "in-state hire," -- one must have lived in Alaska for one year, maintained a residence in Alaska, voted or planned to vote in Alaska, and intended to establish a permanent residence in Alaska.[74] Some workers found these relatively lenient policies to be a boon. But for understanding how many workers had spent more than one

[70] Ibid.
[71] Carrington, 191.
[72] Carrington, 191.
[73] Dixon, 78.
[74] Carrington, 191.

year in Alaska, they leave much to be desired. However, the estimation of 40-60% suggests that, via their labor, many workers found the state agreeable enough to file their paperwork to become residents.

The wages for almost all workers were extraordinary. Average monthly earnings in Alaska ballooned 56% during the three years of Pipeline construction, a staggering figure which attracted workers from across the United States.[75] But there were other factors, too: Kelly's claim, for example, that he did not even know of the Pipeline and just came "to go to Alaska," likely holds some truth; the pull of Alaska in the historical human imagination is well-documented. Previous rushes had produced prose and poetry by Jack London, Robert Service, and others.[76] Ironically, the environmental movement, too, likely bears responsibility for making the state's landscape seem irresistible: language evoking transcendent beauty, untouched wilderness, and photographs of glaciers, bears, and massive salmon must have been alluring to some.[77] But not all workers had romantic notions of a "Last Frontier." Mike Jernigan, a light equipment mechanic in the Galbraith Lake Pipeline Camp, for example, claimed he simply followed his father up north from Oregon after witnessing a workplace accident at a machinist shop in Portland.[78] Unions, too, were able to secure jobs for their members, transporting their members from around the country to work the Pipeline, such as the Teamsters Local 798 out of Tulsa, Oklahoma.

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[75] Ibid, 198.

[76] It is somewhat remarkable that there is not much acclaimed literature, music, or other cultural artifacts left by the Pipeliners. Many memoirs and archival materials remain, of course, but the success of Service or London has not be duplicated.

[77] See Coates, *The Trans-Alaska Pipeline Controversy: Technology, Conservation, and the Frontier* for greater discussion of how frontier myths factored into Pipeline proposals and policy.

[78] Jernigan interview.

This amalgamation of workers from around the country contributed significantly to how workers experienced labor and land on the Pipeline. Kelly Bay remembered a cultural and geographical melting pot: "Man, there were all kinds of folks," he recalled. "Texans, Louisianans, Bald Knob, Arkansas. Irish people speaking Gaelic." I pressed him – "like, from Ireland?" "Damn near," he responded with a characteristic chuckle.[79] Mike Jernigan commented on the cultural differences of the various union locals and their regions of origin, for example:

> The interactions with other people that come from all over the United States, I mean the [Teamsters Local] 798ers, Pipeline welders, that was a different breed of people – I don't know where they came from, I mean Arkansas, Louisiana – they were hillbillies from way back, ya they'd be playing cards, and figured someone was screwin' 'em and stab 'em, or they'd get mad and light the room on fire. …. I remember getting ready to head to work one morning and go in, walking in, and all the sinks were ripped off the wall, all the shower curtains were tore out, all the toilets were ripped outta the floor, and I go, "what's up with this shit?

Unions and their respective cultures and militancies played a role in the Pipeline worksite culture and, thus, the workers' experience and their historical contribution to the state and its land. More than a dozen union locals were involved in the project, including the International Brotherhood of Teamsters, the International Brotherhood of Electrical Workers (IBEW), and Labor's International Union of North America (LIUNA).[80]

Labor historians have documented the ethnic and regional cultures and solidarities that likely contributed to expressions of control of the shop floor in many periods of history.[81] While unions were beginning their multi-decade decline in the United States, a culture of looking down

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[79] Bay interview.
[80] Dixon, 69.
[81] Asher, Robert, and Stephenson, Charles. *Labor Divided: Race & Ethnicity in United States Labor Struggles, 1835 – 1960.* State University of New York Press. 4. With "shop floor," I use a colloquial term in union circles to refer to the job site, workplace, or location where labor is performed.

on management, willfully ignoring directions, and controlling the shop floor persisted in some locals on the Pipeline. Jernigan recalled, for instance, buses on the Pipeline which were used to transport workers from the camps to the job site. Teamsters, in particular, were notorious in Jernigan's memory for locking themselves inside their buses to collect a day's pay while eating lunches, playing cards, and socializing with one another.[82]

Some scholars have enthusiastically pronounced the dramatic, positive shift in racial politics in Alaska as a result of ANCSA, claiming that the Act and its impacts have granted Native Alaskans "racial invisibility" in urban Alaska.[83] But this focus on Native and settler tensions and relationships supposes a racial binary that obscures the numerous other racial groups in Alaska. It also obscures the staggering racism that Native Alaskans have continued to face and resist since ANCSA. There is still significant work to be done in studying race and labor in Alaska, though some have made significant progress in recent years.[84]

Indeed, race and racism played a significant role in the working lives of Pipeliners. Control of the shop floor was not the only strong stance that Teamsters, and likely other unionists, took while working the Pipeline. Sociologist Mim Dixon relayed stories of appalling racism on the Pipeline. Dixon named the "798ers" out of Tulsa, Oklahoma as especially guilty of perpetrating these acts.[85] She reported demands for racially segregated accommodations and that Black workers ride at the back of buses on the jobsite.[86] One Native Alaskan worker reported

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[82] Jernigan interview.
[83] Haycox, 101.
[84] Diane J. Purvis's *Ragged Coast, Rugged Coves: Labor, Culture, and Politics in Southeast Alaska Canneries* is a considerable contribution to the study of race and labor in Alaska, especially in how itinerant or migrant labor uses racialization to their advantage. Indigenous labor in the canneries also receives significant discussion. Gender also receives a similar treatment, as Filipina workers use their gendered culture to build solidarity against oppressive working conditions.
[85] "798ers" was the Pipeline slang term for members of Teamsters Local 798, a local of Pipeline welders and other Pipeline related laborers.
[86] Dixon, 75.

being assigned demeaning, unnecessary work and wage theft; he quit less than two months into the job.[87] Further research on race and racism on the Pipeline is imperative to understanding the relationships that were developed on its job sites.

Gender, Labor, and Bears:

The Pipeline Relationships of Wilma Knox

Security guard Wilma Knox's memoir documents her time on the working on the Pipeline. Knox was one of relatively few women to work on the Pipeline. Mim Dixon estimates that the peak number of women employed on the Pipeline was about 3,000 in the summer of 1975. At this time, roughly 30,000 total Pipeliners were employed.[88] In her memoir, Wilma makes it clear that relating to her gender was both an internal and external process which was always in relationship to the labor she performed and the land she performed it on.[89]

From the very beginning, Wilma Knox understood her Pipeline experience as gendered. She left her husband, Bob Knox, and a decent life behind in Anchorage when she accepted a position as a security guard on the Trans-Alaska Pipeline in 1975. She ended up stationed at Galbraith Lake Camp, a worksite with some 2,800 workers on the north side of the Brooks Range.[90] "A job on the line would give her the opportunity to build up our savings for the retirement years," wrote Bob Knox in the memoir's foreword. "But more than that, she saw it as a challenge for a woman to secure a job on this giant wilderness construction project."[91] Wilma recorded her experiences in frank and optimistic detail in a memoir that Bob published in 2016

[87] Ibid, 76.
[88] Ibid, 79.
[89] Ibid, 91.
[90] Jernigan interview.
[91] Wilma Knox, *Four Years Below Zero*. (Deming, New Mexico: The Tennyson Press, 2016.) ix. Fascinatingly, Bob and Wilma divorced during her time on the Pipeline after thirty years of marriage. She writes of this event in a chapter titled "Despair." They remarried a few years later and retired to Hawaii.

after her death the year prior. It was limited to only 500 copies, but tells a riveting story that argues for far more. It offers a compelling example of how women experienced the Pipeline's masculine labor and culture. Knox's stories show how she developed a shifting relationship with her gender during her time working the Pipeline.

Wilma found herself landing in a fifty-six seat F-27 plane on a gravel runway in the Arctic Circle on March 29th, 1975. "The reason for my going to the Pipeline is clear," she wrote in her memoir, which is a lightly edited compilation of her personal journals from the time. "I am determined to make enough money so that we no longer have to live from payday to payday and so we will have a nest egg for the years ahead. Surely, one year should do it – or at least I hope so."[92] But Wilma's estimate of one year was quite inaccurate. Many things kept Wilma coming back to the Pipeline and her job as a security guard over four years of work. Certainly, the money and her deeply held and readily demonstrated convictions that women were just as capable as men must have been motivating.

Knox was also fascinated by her surroundings. Her memoir dedicates an entire chapter to one species in particular: Grizzly bears. Knox went to the Pipeline for financial security. But once she was there, she found that the work put her in intimate relationship with the land and its ecology.

> To say that the Grizzly Bear made day-to-day life for Security Guards interesting – and exciting at times – is an understatement…I got so intrigued by the bear in my early days at Galbraith that I spent some time talking with the Wildlife people and learned some facts I didn't know despite all my years in Alaska.[93]

Knox wanted to gather baseline knowledge from the "Wildlife people." But she was producing plenty of knowledge of bears on her own in her day-to-day work as a security guard. Her memoir

[92] Knox, 2.
[93] Ibid, 87.

recounts bear incidents with a wonder that inflects many of her stories. For example, her curiosity and responsibilities to maintain a safe camp on the North Slope taught her that, in the winter darkness, "the spotlight actually scares him off – he really can't stand it for long."[94] Her work on the Pipeline produced not only relative safety for workers in a harsh environment, but also knowledge of the local ecology, including bears. Wilma's labor had to engage with the land's most dangerous elements – such as bears – in order to do her job well. If she were to fail, her gender would have been called into question.

These two things – workplace safety and knowledge of the local ecology – were often inseparable for workers like Wilma. Wilma's creation and use of knowledge about bears (both generally and in relationship with specific individual bears) also produced a pride in her, which was in no small part related to her experience as a woman in an extremely masculine space and job. Her memoir frequently discusses being one of the only women in her role, or in a given space. The ability to do her job as well as any man was central to her shifting relationship to her gender. She was proving her ability to do the job on a daily basis.

One particularly amusing and illustrative example of this was a remembrance of a "big party," sanctioned by Alyeska, that included one uninvited guest. In this recollection, Wilma wrote of how her relationship with bears via her labor was entangled with her shifting relationship to her labor. This entanglement shows that workers were constantly producing things other than oil infrastructure through complex relationships.

Workers – presumably mostly men – came from the "nearby" North Slope camps. Knox listed Toolik and Pump 4, but it is likely that Atigun and Happy Valley residents would have been present too, if not others. They arrived at Galbraith "by the busloads. So we had the bear

[94] Ibid, 96.

and all those drunks at the same time. It was really something," Knox wrote. "That night it took five hours to get him [the bear] out of the center of camp. I never moved out of my pickup from 6:10 until after 11:00 pm." A crowd formed to witness the bear, which likely frustrated Wilma, given her responsibility for everyone's safety.

Not only did the crowd form, they squawked: "I have never seen so many bear experts in all my borned days," Wilma recorded. "Nine-tenths of these people are from Tulsa and places like that and have never even seen a bear before so how they became experts I'll never know. It was just simply disgusting." Perhaps, one might take Wilma's words as unnecessary, if not unfair. But Wilma was one of the few women in the camp and was responsible for the safety of an increasingly intoxicated crowd of men – a precarious situation for all people (and species) involved. Were something to go wrong on her watch – say, an injury to a worker or damaged equipment – she could be held responsible. This responsibility would likely have undermined at least one of her goals: to prove her worth as a woman in a man's role and industry. It could have also landed her in professional trouble, undermining her ability to provide for her and Bob's retirement plans. Wilma's ability to successfully minimize the danger of the land despite her gender shows how labor produced a shifting relationship to gender for workers like Wilma.

Wilma's intimate and frequent relationship with bears as an Alaskan woman working in the Arctic produced a judgment of those who behaved with drunken foolishness towards an animal that she knew better than they did.[95] Wilma used her knowledge and experience of bears – some of which she produced on the job – to draw a meaningful line of social distinction between those who knew them, like herself, and those who did not but thought they did – like many male Pipeliners from the Lower 48.

[95] Ibid, 93-94.

In her journals-turned-memoir, Wilma frequently expressed personal musings about the way she was relating to her gender while working the Pipeline. Because she was one of relatively few women performing typically masculine labor in a space that was also replete with expressions of patriarchy – from violence to sex work – Wilma explained her relationship between her labor, self, and the land as a site of challenging *and* reifying gender norms in 1970s Alaska.[96] Her gender was almost constantly called out. Even in the on-boarding process, as she was given clothes for the job, her request for women's sizes was met with incredulity and twisted "humor": "Why, we don't believe in discrimination! We're *letting* you wear men's clothing. After all, you'll be filling men's jobs!"[97] The assertion was clear: women like Wilma did not deserve to be working the Pipeline.[98]

Knox's reflections on her decision to give a man a task that she knew she was capable of show her wrestling with how she related to her gender identity while on the Pipeline. Despite her competence and ability to handle the persistent threat associated with bears, her growing relationship to the ecology via her labor was not immune to the malign influence of patriarchy upon her as a worker and as a person. She related her regret for handing off managing a bear to a pair of male co-workers. "Why I turned it over to them I do not know," she reflected. "I think it was another of those reflex actions because of being a woman and brainwashed to think that there are certain things men should take care of. This is one attitude I am going to start really fighting. I could herd that bear around just as good as those little bastards – probably even better."[99] By

[96] Ibid, 90.
[97] Knox, 4.
[98] However, some types of labor by women was at least tolerated in some Pipeline camps. Sex work was often performed by women. Knox reports seeing a pair of potential sex workers board the plane with her on her way into Galbraith: "Two odd-looking women arrive with their luggage. The Indian girl says they are a couple of hookers from downtown Fairbanks. (I didn't ask her how she knew, but just accepted the info matter-of-factly.)" Knox, 4.
[99] Knox, 90.

handing off the work, Wilma reified the patriarchal nature of work on the Pipeline. But, in her conviction to "start really fighting," Wilma directly challenged the Pipeline's patriarchal labor structure and culture. This anecdote shows how Wilma's relationship to her gender shifted on a sometimes daily basis as a result of her work.

Some workers did not center experiences of identity in their labor – though, of course, gender, whiteness, and other aspects of identity were ubiquitous in the lives of the mostly white, mostly male workers on and near the Pipeline. Instead, the expression of awe, curiosity, and reciprocity with the land was one third of the self, labor, and land mediation that historicized the Trans-Alaska Pipeline. There is ostensibly little need to keep what amounts to amateur ecological field journals, coffee table photograph books, and scribbled musings on the beauty and wonder of nature in order to perform the labor they were hired on to do. But journal, photograph, muse, and talk about the land they did.

According to documents filed by Alyeska Pipeline Company with the U.S. Department of the Interior Office for Equal Opportunity, the population of women working on the Pipeline for Alyeska reached their peak in September and November of 1975, when they made up about [100],000 of the 30,000 people employed. Of those women workers, about half of them had office jobs, an environment where they made up nearly a third of the workers. Of the 30,000 workers on the Pipeline in that late summer and fall of 1975, roughly 5,000 were "minorities," understood as non-white workers.[101]

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[101] Dixon, 79. As historians like Richard White have argued, the romantic ideals of the "frontier" are often invoked in discussion of the North American West. Historian Peter Coates argues forcefully that this notion of the frontier featured prominently in how people thought and talked about the TAPS. The stories of racism, sexism, and other bigoted behavior on the TAPS make it clear that White's claim – that in the westward expansion of the United States, migrants reified their own cultures, norms, and lifeways – certainly applies to Alaska's Pipeline period.

Further research into the ways that race, gender, and other identities impacted labor on the TAPS is vital to gain a well-rounded understanding of the Pipeline's labor history. In these examples, it is clear that workers on the Pipeline were not a part of some monolithic workforce, in which workers saw past differences in pursuit of a common goal. Rather, workers of marginalized identities were forced to contend with this element of their personhood and how it interfaced with their labor, and with the land. As Wilma in particular has shown, the tasks of working in intimate relationship with the land was unavoidably intertwined with identity by virtue of the patriarchal culture that the Pipeliners created and reified on a daily basis. Wilma's labor on the Pipeline contributed to her shifting relationship to her gender.

Labor and Land

The people who worked the Pipeline were numerous, diverse, and hardly monolithic in their labor and attitudes. But one trend which appears repeatedly in archival materials and in oral histories is the remarkable impression that the land and landscape left on them. This was not limited to certain types of jobs on the Pipeline. Workers were creating relationships with the land via their labor on a seemingly daily basis. This included workers in Pipeline-adjacent work, too.

For example, Errol Champion was a worker in a non-Pipeline job, one of the roughly 25,000 counted each summer in one of the numerous Pipeline adjacent industries. Champion was working as a Promotion Manager for a Caterpillar dealer in 1975 when he spent twelve days traveling the length of the then-in-progress Pipeline. Champion took roughly 1500 photographs to create a slideshow documenting the use of Caterpillar equipment in the "single largest privately funded construction project in history."[102] This was ostensibly trade work, intended to display the

[102] Errol Champion Slides, August 9, 2023. Box Number 1, Folder Number 2. "Errol Champion TAPS," Alaska and Polar Regions Collections and Archives, University of Alaska – Fairbanks, Fairbanks, Alaska.

"type of activity that is going into the building of this oil pipeline."[103] For Caterpillar, and Caterpillar dealers, the Pipeline was a heretofore unimaginably large business opportunity.[104] Not only did workers comment that they had never seen so many Cats in one place; the Pipeline also represented a chance for Cat to make clear its market dominance in the construction industry in some of the toughest construction environments on Earth.[105]

But amidst the countless shots of Cats, hardhats, and excavated dirt trenches, Champion consistently includes and describes, in words and photographs, the ecology and beauty of the Trans-Alaska Pipeline's 800-mile-long worksite. For Champion, and perhaps for his supervisors, linking the labor and landscape was both unavoidable to capture the significance of the work *and* potentially good marketing. The connections between the land and Champion's labor drove the sales slideshow that he produced after his short time on the Pipeline.

In his slideshow and the accompanying script, Champion's relationship to the landscape is a recurring theme. Descriptions and invocations of natural beauty and construction technology span the length of the Pipeline. Champion often seemed to lose focus on the Cats, instead deferring to the stunning surroundings. In his opening comments, he introduced himself and his project. But, in a telling addition, he also introduced the landscape in detail, both in relation to Cats, and where Cats are not present at all. From his opening sentences:

> The pictures show the broad, flat terrain of the Arctic North Slope and some surprisingly beautiful flowers that appear there in the summer…rugged and beautiful scenery of the southern mountain ranges in Alaska, over 1,000 machines in action along the line, our services, our facilities, our training programs, our equipment in action, and people who are getting the job done.[106]

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[103] Errol Champion Slides.
[104] Coates, 19.
[105] "This was the first major test for the recently introduced 245 hydraulic excavator, and it has already become the standard of the pipeline industry," Champion wrote in the notes to his slideshow.
[106] Errol Champion slides.

Not only does Champion's text refute narratives of "nothingness" by invoking descriptions of landscape and individual species – it also explicitly linked his labor and the labor of others to the land, thus articulating the relationships that he and other workers formed with the land via their labor. In fact, Champion's description of beauty and labor are nearly always woven together, just a comma or a period away from one another: "From Glennallen we travel south to Milepost 43, which means 43 miles north of Valdez, where one of four 245's [sic] is excavating the ditch in Section 1. Note the snow-capped Chugach Mountains in the background," Champion's script reads.[107] For Champion, the job was the text; but the subtext – beauty, nature – had to be noted because the connection between the two was so relentless. His slideshow notes verbalized his relationship to the land; the photos illustrate it.

In other portions of his slideshow, Champion largely let the pictures illustrate this relationship. The inclusion of wide-angle landscape shots, narrated with comments such as, "Excavation and site preparation work is going on at the top of Thompson Pass. The pipeline, as well as the road, will pass through this area," make it clear: for workers, "this area" is not "nothing." The photo of Thompson Pass – "this area" – depicts a fresh dirt road cut from a field of tundra. Glaciers and mountain peaks loom behind low-hanging clouds in the background.[108] Another image shows a Caterpillar bulldozer perched on a mound of dirt. Behind the supposed purpose of the image is the broad, awe-inspiring expanse of the Lowe River. Its braided currents weave through an immense glacial relief. Dense vegetation fills the ramparts of both sides of the valley. The Caterpillar equipment may be at the center of the photograph; but its remarkable setting

[107] Ibid.

[108] The road built up and over Thompson Pass by Pipeline workers is frequently used for access to the "pristine" alpine outdoor recreation opportunities that the Chugach Mountains afford. It is extremely popular with hikers and backcountry skiers, depending on the season.

is every bit as important in the eyes of Champion. His persistent connection between the machinery of labor and the land upon which labor was performed illustrates how inseparable the relationship was between workers and the ecology they were working in.

Other pictures show that, despite the scale of the grandeur in and near the Pipeline worksites, Champion and other workers were impressed with the minutiae of ecology, too. A pair of photos showed tiny, purple-petaled flowers in the supposed "nothing" of the North Slope. "The Arctic tundra is beautiful country," Champion narrated. "It is covered with lots of wild flowers in the summertime including the state flower, the Alaska forget-me-not. Alyeska asks that people not walk on the tundra; in fact, they insist you do not walk on it, and anyone caught treading off the pad will be dismissed from his job."[109] It is easy to draw the connections to past iterations of work on the North Slope, such as the exploratory drilling in the Pet 4, in which the tundra was damaged by heavy machinery, to understand how environmental concerns were fused with business concerns to create policy for the ecology and the relationship of workers to it. But for workers like Errol, this a policy worth noting. It affirmed for him that the workers on TAPS, and perhaps himself, too, were being considerate of the landscape and ecology that he could not stop snapping photos of. TAPS workers added their own perception of how to work on and with the land by commenting on and, often, following the environmental regulations and expectations – despite the culture on the job sites of bending and breaking other rules.[110] This shows how workers' relationships to the land directly influenced their ethics and behavior. In a worksite where workers frequently broke rules in order to assert their control of the workplace, Champion and others reported following rules that protected the thing they had a deepening relationship to.

[109] Errol Champion Slides.

[110] Jernigan described theft, shop floor militancy, vandalism, violence, and more – but he noted that workers tended to follow rules about staying off the tundra.

Champion's attention is so affixed to the landscape and its scenery that, even with no Cats in the vicinity, he takes time to document and include pictures of Alaska's environment: "During Alaskan summers in the interior, the sun almost never sets and darkness fails to appear. Shown here is the reflected sunlight at 12:30 in the morning - a view from my motel window in Glennallen," Champion wrote in his slideshow script. It is hard to understand what purpose this could serve other than to impress upon the viewer that workers in Alaska experience some of the most remarkable natural phenomena in the world.

Champion's slideshow offers an example of the type of relationships that were being created in the lives of workers on the Pipeline. Though he was there to document a product for his employer so that he could earn money, Champion chose to include photos and text that were ostensibly superfluous to his professional goal. He was selling his labor, like any worker, but he was also building a relationship with the land by infusing his work with personal reflections of awe at the land and its beauty. Furthermore, he was quick to note the ecological regulations which the Pipeliners abided by to reconcile the beauty he was witnessing with the harms that many accused the project of.

Beyond her gendered encounters with bears, Wilma Knox, the security guard, also engaged with the land in expressions of awe and via personal scientific reflections. While her gender played a significant role in her experience, she, like other workers, at times commented on the land's beauty and complexity without reporting any relationship to her gender. Her relationship to grizzlies, described earlier in this chapter, provided some examples of this. But Knox's amazement, curiosity, and respect was hardly limited to grizzlies. The tundra was a landscape of stunning biodiversity, despite narratives to the contrary. In one entry to her journal, she counted the various species she was encountering in a personal biodiversity census:

> Even though it's really winter here this far North, I continue to see other animals. A few caribou are someplace all around, though we seldom see them at night. Most amazing of all, a moose or two has wandered by…This tree-less tundra is such a poor place for moose, yet they are here. The ground squirrels have long since gone to bed. The ravens are here and even a few gulls.[111]

Knox's work may have been to guarantee smooth and secure production and delivery of fossil fuels. But by virtue of performing this labor, she regularly came into contact with an ecosystem that gave her much to marvel at, even as it sometimes complicated her work. "This Arctic region is an amazing and interesting place," she wrote in the conclusion of her chapter on bears and other wildlife. "Even with its long, long winters and its terrific sub-zero temperatures and punishing winds, it still manages to support a healthy and amazingly varied population of animal and bird life."[112] The ecology of the North Slope gave Wilma the opportunity to learn about the natural world, marveling at its peculiarity and megafauna. There was certainly more than "nothing" on the North Slope, at least according to Wilma Knox and Errol Champion. They marveled at their jobsites and built relationships with the land.

Landscape Shots Through the Boss's Lens

Even the boss had to admit that something was happening between workers and the land. In 2007, Alyeska Pipeline Service Co. commissioned a heavy, large, bright red hardback book to honor the 70,000 men and women who had done the seemingly impossible: deliver oil from the Arctic Ocean to the Pacific via a single, 800 mile long, 48 inch wide pipe. "This book is a gift to [the Pipeliners] for their commitment to doing their job safely and efficiently for the past 30 years," wrote Kevin Hostler, then the President and CEO of Alyeska. The book is printed in full color,

[111] Knox, 96.
[112] Knox, 96.

with riveting images from life on the Pipeline. It features numerous characters reflecting upon their efforts and experiences on the Pipeline, typically accompanied by a full page, candid headshot. It's all twinkling eyes, white hair, and a remarkable cross-section of American identities. Men and women of every age, race, and type of work.[113]

As workers navigated their personhood, their labor, and the land, the boss found another thing to use to add to its power on the "shop floor" and in Alaska's popular discourse and imagination. Maintaining this power was critical because of how contentious the fight for the creation of the TAPS had been.[114] By appropriating the affective language of workers, the Company gained legitimate claim to a meaningful portion of environmental rhetoric which was typically used to drum up anti-Pipeline sentiment. Via this commemorative book, workers became key mouthpieces for the campaign to make the Pipeline appear environmentally sound, if not outright beneficial. Because of this context, it is important to view the analysis of the commemorative book as a unique piece of this project's source base. It includes numerous stories of the Pipeline from those who built and operated it. But these stories and the accompanying images were also doing important work to maintain favor with the Alaskan public. The relationships between workers and the land were so potent that the boss saw them as a valuable tool to use in public relations.

In addition to the headshots, other pictures show the grueling work in and on the land: some engineers bent over computers, calculating permafrost thawing or slope angle or melting temperatures.[115] But far more images show workers in intimate, physical relationship with Alaska's varied, remarkable ecosystems: unidentifiable figures in the noon-day dusk of an Arctic

[113] *Alyeska,* foreword.
[114] See Peter A. Coates, *The Trans-Alaska Pipeline Controversy: Technology, Conservation, and the Frontier.*
[115] *Alyeska*, 36.

winter, faces covered and heads hooded against rolling, white tundra; shovel-wielding crews snaking through thin corridors in dense, black spruce in the Interior; Cat operators clearing shoreline of forest and undergrowth to develop the Pipeline's terminal in Valdez.[116]

Sandwiched in between a chapter called "Construction" and a chapter called "Oil Flow" are twenty-eight pages titled "Wilderness Encounters." The photography here focuses on wildlife specifically, in addition to the landscape shots which are common in the rest of the book, much the way Champion included landscapes in his Cat-specific photos. As with most of the book, "Wilderness Encounters" heavily quotes workers to describe the wildlife and nature they encountered and the work they did. A two page spread depicts a pink sky, illuminating jagged, glaciated peaks, mirrored in a small pond which is surrounded by grasses. Mist rises off the grasses, signaling a summer-y predawn. Stylized text is nestled between the pond and the crest of the range. The text quotes an engineer on the Pipeline, Dave Comins: "Traveling through the country on the south side of the Brooks Range," it reads, "is just spectacular. It doesn't matter if it is winter, summer, spring, or fall. It is just beautiful."[117] Comins' marveling was highlighted by the boss because it allows the company to lay claim to the human affection that Comins and other workers were experiencing on the Pipeline. His words are used to portray a still-intact ecosystem, thirty years on from the completion of the Pipeline.[118]

Comins' words also take the reader to the north side of the range, where the Sagavanirktok River flows out of the mountains and into the North Slope. In this place, the Brooks Range towers in the south, a grand amphitheater. The stage is the northern horizon: the North Slope. In late July and early August, the sun circles, tucking behind peaks, until it wraps around onto the stage of the

[116] Ibid, 28-29, 44, 88-89, 103, 112-113, 212-213.
[117] Ibid, 110-11.
[118] Of course, "climate change" is not mentioned in the book, nor are its deleterious impacts on the landscapes which workers express so much affection for.

northern sky. There, at one in the morning or so, it dips, just off the horizon, tucking bright orange behind Prudhoe Bay, some 150 miles north, only to come back up thirty minutes later, orange mellowing to yellow. Comins recalls a trip to monitor the pipeline in a helicopter, soaring above this remarkable land, just south of the calving grounds of the Porcupine caribou herd:

> One time we were flying over Pump Three…we would fly about 150 feet above the pipeline, then pull up over the top of a ridge before going down again. When we came up over the ridge, suddenly it looked liked [sic] the hills were moving…The hills were covered with caribou, and the whole side of the mountain seemed to be in motion. It was just breathtaking, spectacular.[119]

Caribou were a particularly important species for the Alyeska Pipeline Company to show affection for. Environmentalists had built significant rhetorical power by comparing the caribou of Alaska to the bison of the West a century before.[120] By quoting workers who have an affinity for caribou, the company gained rhetorical and political shelter from some of the environmental and Native Alaskan critiques of the Pipeline. Relatedly, it was a common refrain amongst Pipeliners that caribou actually like or benefit from the Pipeline and its infrastructure. In an oral history interview, Mike Jernigan, an auto mechanic at the Galbraith Lake Camp, shared his thoughts on environmentalists' claims that the Pipeline was bad for caribou:

> **MM:** Did workers talk about environmentalists, mostly out of state, worried about the Pipeline, is that something that workers even talked about?
>
> **MJ:** Yeah, they said it was bullshit. Cuz the pipeline could only go so far above ground, and then it had to go underground, cuz they said that the caribou and reindeer and all those mucks-ox [sic] would never go under it? No, they stand on it. In fact, they even get close

[119] Ibid, 121.
[120] Coates, 207.

> to it because it has a silver lining on the outside and when the sun hits it, it kinda reflects down and they can get heat off it.

Jernigan's knowledge of the megafauna and their relationship to the Pipeline is, of course, accurate in some ways. Caribou, musk ox, and other species have persisted in the decades after the Pipeline. But their populations are not stable, and the Pipeline and its role in fossil capitalism is partially to blame. But workers' relationships are with individuals, individual herds, or landscapes. These relationships may approach what some would "citizen" or "community science." But they are not, in fact, scientific. Workers relationships with the land are both profound *and* flawed. They are significantly affective *and* insufficient to diagnose the harms caused by fossil capitalism. In *Alyeska: A Thirty Year Journey*, Pipeliner Vol Williams espoused similar beliefs about the errors of environmentalist thought:

> We get a lot of caribou. In the twenty years I've been here, the caribou have calved on the North Slope 12 times. But you don't hear anything about that because the environmentalists don't want to talk about it…As it turned out, they loved the roads! They love these pads![121]

A few pages later, a small black bear is pictured, snout just above the gravel of a road cut, skulking between six Ford pickups and one green and yellow school bus. The Pipeline lurches up and over a rise in the background, and a bald, male Pipeliner, his hands on his hips, peers at the bear. Williams recalls not just bears, generally, but one specific bear, with whom he and others built a unique, if frustrating, relationship over numerous days at Pump Station Three. PS 3 sits at the very northern edge of the Brooks Range, where the Ribdon River flows out of the glaciated peaks along the Continental Divide. Williams is quoted as saying,

> We used to have a bear at Pump Station 3 that would pop windshields out of the trucks. The workers would leave sack lunches

[121] *Alyeska*, 130.

> in the truck, and he learned there was food in there. There would be a whole string of trucks…he would go through every one of them and pop the windshields out. Eventually he could do it without breaking them…Every day, the equipment shop would have to pop the windshields back in. The next day, they'd be popped out again.[122]

This individualized description of a particular bear's habits show the intimate nature of the Pipeliners' relationships with the land. Not only does Williams recognize an individual bear by the bear's actions; he also tracks that bear's *own developing relationship* to the presence of workers and infrastructure.

The stories of workers building relationships with the land, ecology, and animals of the Slope clearly show that their labor was producing much more than just oil infrastructure. Workers were developing an ethic of place and an affection for wildlife while on the job. This is remarkable because it forcefully repudiates notions of Pipeliners as itinerant to the point of disinterested in their surroundings. Perhaps some were – but the evidence in this chapter shows that many workers in the Pipeline economy labored to build oil infrastructure *and* important relationships with the land.

Managing Labor Time to Deepen Relationship with the Land

While many workers created relationships with the land and ecology of their job-sites, others sought to use their time on the job to build their relationships with the land during their time off. Kelly Bay, who had stumbled through the snow in Fairbanks to try to rent a campsite, was the best example of this. Kelly was clear that he was selling his labor in order to spend considerable time on the land. Where other workers highlighted the ways that they built relationships with nature

[122] Ibid, 112-113.

while on the job, Kelly sought out deeper relationships with the ample time off that his high wages and thrifty habits afforded him.

Kelly certainly found that nature was unavoidable in his work on the Pipeline as a carpenter-turned-general laborer. The weather often animated his stories when I interviewed him: "Atigun? Brutal; November, blowin', cold sonofabitch," he responded when I asked him about conditions at a camp in the last gasps of the Brooks Range before the North Slope.[123] Kelly worked at several camps in his time on the Pipeline, including Atigun, Pump Station 10, and Isabel Pass.[124] His time while working on the Pipeline was largely focused on working and partying: "Oh yeah," Kelly leaned back, sighing wryly during my interview of him. "Whole lotta partying." In a seven-day-a-week job, cocaine, Kelly told me, was a more common hangover cure than Alka-Seltzer or ibuprofen. There just was not a lot of time for Pipeliners to do much other than work. But Kelly had not come for the work. He had come to the state for an idea of Alaska. If there was insufficient opportunity to connect with the land while on the job, Kelly would need to carve out time from his work – both on the clock and off.

Despite the exhausting labor, Pipeliners managed to make fun and recreate from time to time. Kelly told me that he once set a trap line under the mess hall at a camp – he thought it was Atigun – successfully snaring an animal, maybe a fox. Or, of another time at either Isabel or Pump Station 10:

> The best time I had was workin' a laborers' crew. I mean we just had a ball…there was a guy that we knew, a Teamster, that drove the Pipe truck, and the Pipe trucks had diesel tractor, and the trailer was basically a bobsled; and he'd let us drive it, out on the highway,

[123] Bay interview.

[124] Atigun was a camp just north of Atigun Pass where the Brooks Range and the North Slope meet. Pump Station 10 was on the banks of the Delta River in the Alaska Range. Isabel Pass was just a few miles south of PS10.

> but it was empty; just drivin' backhauls or something; just totally fuckin' around.[125]

Other stories of recreation and hi-jinks show up in the archive and other sources here and there, such as Pipeliners water-skiing on a rare afternoon off.[126] But the norm, according to Kelly and others, was exhaustion.

The grind of seven-twelves and seven-fourteens fueled Kelly's desire to get off the clock for months at a time in order to spend the time that he wanted to "on the land," as some Alaskans call subsistence living. For Kelly, these sorts of excursions into other portions of the state were sometimes fueled by people he met and views he saw while on the job. His labor led him to opportunities to deepen or expand his relationship with the land.

In 1975, Kelly was working at Isabel Pass when a view of the Wrangell Mountains to the south pulled him away from a job on the Pipeline. He would eventually find his way to the tiny ghost town of McCarthy, tucked on the south side of the Wrangells, at the base of the Root Glacier. "I wasn't working non-stop," he explained. "I was living at Ruby Creek…on the north side of Isabel Pass," he told me. "This friend of mine, Scott, that I came to Alaska with, he was staying there with his girlfriend. We got a map out," Kelly told me. His speech quickened here, and he sat upright in his chair. "He was staying there, on an AirTrack drill, working at a rock pit, blasting, drilling, and he could see the Wrangell Mountains. And we got a map, and – we saw that there was a road into McCarthy." Scott's work on a quarry – likely a good example of "Pipeline-adjacent" labor – provided both him and Kelly with the inspiration to build deeper relationships with the land and ecology of Alaska. This shows the ways in which workers sought high wages in ecologically resonant places in order to further their own relationships with the land off the clock.

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[125] Bay interview.
[126] *Alyeska,* 65.

This insertion of personal goals and dreams into the broad picture of Pipeline work demonstrates the Pipeline as a site of labor *and* important ecological learning and personal ambition. Kelly's labor guided him toward his primary goal: "to go to Alaska."

In the late fall and winter of 1975 and 1976, Kelly and his girlfriend (now wife), Natalie, set out along the McCarthy Road to explore what the free time that came with the Pipeline's high wages could introduce them to. They ended up fixing up a cabin for "an old timer" named Jim Edwards. A former carpenter, Kelly traded work on Edwards' house for "rent" in the cabin he and Natalie had fixed up. McCarthy left a mark on Kelly and Natalie. Stories from their early seasons there peppered my interview with Kelly. It was clear how much the land and region means to him. Hearing him describe his early efforts to make a life there sound like stories from old sweethearts describing their first few dates. The detail was rich, and the tone endearing. Kelly's relationship to the land was facilitated by significant stretches of time-off from working the Pipeline. Buoyed by wages earned on the Pipeline, he could pursue his relationship with the land in McCarthy.

Once, for instance, Kelly relied upon the material legacy of one of Alaska's other big mineral booms – copper – to successfully kill a goat: "I went and shot a goat in the fall, up there by Amazon Gulch by Kennicott." Kennicott, some three miles north of McCarthy, was the mine primarily responsible for the copper boom of the late 19th and early 20th century. "When the snow comes down, snowline, like in October, we'd go up there and the goats would be right up there, right below the line. So you don't have to go up…" he gestured up toward the ridgeline, and laughed heartily. Kelly's free time from the Pipeline was earning him the opportunity to develop the kind of intimate relationship that leads to successful hunts.

The hunt lasted three short fall days, he explained. Kelly and an unnamed hunting partner shot the billy on the first day. The next day, they returned to locate the body but "realized we

weren't gonna get him outta there unless we rigged up some kind of a sled," Kelly told me. Kelly engaged in the time-honored (now illegal, but still common) tradition of taking materials from the mine infrastructure to use in various subsistence and household projects. Prior to heading back up on the third day, they "put together pieces of roofing tin, Kennicott roofing tin, went back up there with that, sledded him back. I mean he must've weighed three hundred pounds, billy goat. Boy, was he tough."[127] Kelly's labor had bought him the time to go create remarkable stories such as these. Indeed, he may have never heard of McCarthy's existence if not for work on the Pipeline, and his view from near Isabel Pass. The happiness with which Kelly related stories of McCarthy to me is indicative of his personal goals and personhood being directly linked to his labor and the land. His ability to navigate all three in relation to one another created a life in McCarthy.

At this point, McCarthy was still a ghost town – a handful of year-round residents in the remains of a copper boom in the late 19th and early 20th century.[128] Alaska's tourist economy had not yet expanded to the prominence it enjoys today, and certainly not to McCarthy. Jobs were essentially non-existent. "Well, what am I gonna do here," Kelly recalled thinking. "I should prolly just go back to work."[129] These sorts of rotations characterized Kelly's approach to building relationships with the land and pursuing his personal goals while on the Pipeline. He would take a few months of Pipeline work, then head elsewhere, typically McCarthy, to practice various forms of subsistence and land-based trades and activities, including trapping by dog team, guiding hunts, and running a sawmill.

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[127] Bay interview. Kennicott is the former copper mine a few miles up the mountain from McCarthy. It is now one of the focal points of Wrangell-St. Elias National Park. As such, visitors are no longer allowed to remove scrap metal or anything else. Kelly added: "Best thing to do with a billy goat like that is put his nose in the grinder and keep grindin' til you see his tail go through." Some locals today call materials salvaged from the Kennicott Mine Site "Kennicrap."

[128] For more on McCarthy, especially as a prism through which to understand environmental history in the American West, see William Cronon's essay, "Kennicott Journey: The Paths Out of Town."

[129] Bay interview.

In 1976, after Kelly worked another stint on the Pipeline, he and Natalie bought land up McCarthy Creek, a mountain stream that surges to a heinous torrent several times a year. They began building a cabin there in the fall of 1976, but it was not complete yet when winter settled in. They opted for a wall tent on the property to keep working through the winter. Kelly explained to me how their relationship with the land allowed them to improve the property that their Pipeline wages had helped them purchase, despite the notoriously challenging Alaskan winter: "Barrel, fifty-five gallon barrel [stove]. Shoveled ten cords of wood through that thing trying to keep warm. We ate a lot of salmon, went down to Chitina and caught salmon, and then a lotta canned food. So we stayed in that tent and worked on that cabin all winter," Kelly explained. Kelly and Natalie's wages – many from the Pipeline – bought them time to build a home in intimate connection with Alaska's ecology.[130] Kelly's labor had helped to buy them the ability to pursue their personal goals in close relationship with the land.

* * *

In these workers' relationships, they constructed meaning. For example, according to their stories, one can easily tell that Pipelines and nature can coexist. But to see this clearly, you need to be working the land – not advocating for environmentalism in Anchorage or D.C. Only those who do not work the land directly would critique such a notion.[131] These stories explain how workers on the Pipeline sought to assure themselves of their own environmental and ecological righteousness while performing their labor.

Furthermore, workers built relationships with their identities. This is most prominently displayed in the stories of Wilma Knox, but is subtext in many elements of the stories told by men

[130] Bay interview. Chitina remains an extremely popular dipnetting destination on the Copper River, about a half-day's drive from McCarthy in 2024.

[131] Noticeably absent from this viewpoint is the considerable number of anti-Pipeline and anti-drilling Native Alaskans.

who worked the Pipeline. These stories also exemplify how one's identity was thrust into intimate, sometimes vexing, relationship with the land around them and their labor upon it. They also offer examples of workers who used the sale of the labor as a way to be in Alaska – a place they coveted in large part because of its natural beauty and ecology. Pipeline employees like Mike Jernigan, Kelly Bay, Wilma Knox, and Vol Williams, and workers in Pipeline-adjacent jobs like Errol Champion, could have espoused a total lack of concern for the ecology they worked in and on. They could have claimed that the Pipeline did little or nothing to change them or their self-perception. Perhaps some workers did.

But in my research, I found workers who cared too much about the land and, perhaps, their own reputations, to allow environmentalists or other Pipeline opponents to create a narrative about their relationships with Alaska's ecology. Instead, these workers created various justifications for their labor's environmental legitimacy by paying attention to how wildlife engaged with the Pipeline itself, as well as with their tasks specifically. They also frequently placed nature in their labor and in their stories, even when it was not necessary to the job at hand. Furthermore, they leveraged their relationships with the land and their coworkers to seek out time and opportunity in close relationship to Alaska's lands and waters. This attention to the land enabled their claim to environmental morality while they worked the Pipeline.

These affective relationships with wildlife, landscapes, and ecologies also display another example of workers crafting relationships to their identities as workers. Indeed, as the planet warms, the contradictions between fossil fuel workers with affection for ecology and the ecology itself are getting sharper. But for workers on the Trans-Alaska Pipeline, their relationships stitched together things that might seem contradictory or unrelated: their labor, their identities, their ethics, and the land.

But despite these contradictions, many of these workers reported, and continue to report, that they watched for impact on the land and wildlife while building the Pipeline. Instead of finding widespread harms, their experience pointed them toward a working, if not harmonious, relationship between their labor and the land. It is telling that many of them relate these stories of ecology and labor coexisting with pride. In the eyes of these workers, they have done right by themselves and their relationship to the land. Their relationships were crafted through labor in order to create a home in Alaska's Pipeline economy. They would also shape Alaska's politics, economy, and culture in the decades to come.

CHAPTER THREE

Pipeliners Co-Create the Tourist Economy

The first time that I flew in a Wrangell Mountain Air plane, I was in the 185. Our pilot, a Coloradan named Jared, narrated the landscape to us as we headed north from McCarthy: Sourdough Peak, the Mile High Cliffs, Hole-in-the-Wall Glacier, the University Range.

My two clients were from Maryland, looking foreward to their last trip before their first child was born in a few months. We landed at an expansive alpine valley called Skolai Pass, seasonal home to countless grizzlies, Dall sheep, and caribou. After five days of arduous hiking, pelvic floor pain, and winds and snow that flattened our tents, we arrived, soaked to the bone, at an airstrip named Wolverine. I felt confident my clients would reflect positively on this vacation – but it might take a few months.

The Wolverine Airstrip was a bluff of tundra, perched some 2500 feet above the Chitistone Gorge, likely carved out by receding glaciers during the Last Glacial Maximum, 24,000 to 15,000 years ago. I checked my map, comparing it to the gullies and peaks surrounding us. I then paced the vague, grassy ruts left in the tundra. Winds whipped across the short, sharp grasses. The strip couldn't be anywhere else, I decided, but I'd never seen a pilot manage a strip so short, perched so high, with such little room for error.

As I ate my rapidly cooling oatmeal and gazed across the valley toward the stunning, glaciated University Range, I wondered how I'd do on tips. I had given up on a decent-paying job teaching middle school to head for the exploitation of grad school, hoping to reap the benefits of time to think, and the benefits of a pay bump after a masters degree. Guiding in Alaska's tourist economy gave me a chance to do something I love in a place I couldn't get enough of, all for relatively good wages. In the past five or so years, I'd worked hard to earn a good reputation in Alaska and in the guiding industry, and I was confident that I was beginning a long relationship with the economy and mountains of Wrangell-St. Elias National Park. Still – there's a difference between a good tip and a great tip. Had I given the clients the space they needed to navigate their pregnancy and relationship amidst an extraordinarily demanding trip? Were they gonna blame me for the five straight days of rain? For the terrifying exposure on the unavoidable scree slopes? I rub my shoulders and neck. It's tough pulling a wage out of the land.

The dull hum of a plane shakes me from my vaguely anxious musings. I turn to the clients. "Here he comes," I say, trying to inspire a sense of excitement. "Yay!" they respond in unison. I chuckle – their tones seem to convey more relief than excitement. Jared, in the 185 again, chugs up the Chitistone Valley, maybe three thousand feet above the river. He passes us, then banks to assess the strip and the wind, and to lose elevation. He comes out of the turn, flattening his wings, aiming north to take advantage of the headwind, and drops gently onto the strip, bouncing on his tundra tires with room to spare. These pilots never cease to amaze me.

We load up and Jared gives the safety talk. "This strip is a bit of a thrill to take off from," he tells us over the headsets. The prop begins to spin in the front of the plane. "If it feels like we're falling, that's good. It's too short to get speed, so we drop off the cliff to gain speed." I'm used to the

bluster of bush pilots, and of Alaskans to tourists in general. Performing the romantic myth is what tourists pay for. It animates their stories, providing them with a sense that they have experienced something unique, frozen in some imagined frontier past. In the past ten or fifteen years, I've gone from believing this stuff, to knowing a smart worker hunting for a tip, to performing the song-and-dance myself.

Jared guns it and we bounce down the tundra strip. In no time, it's quite clear to me that there's not enough land to give us the speed we need. I'm not scared. I've learned that if you can't trust workers and locals in the Alaskan backcountry, you really shouldn't be there. The tundra disappears under our tires and we're falling, calmly, fifty feet, then maybe seventy-five. The cliff a few hundred feet in front of us seems to move across our windshield as we drop slowly. I feel a rush of excitement, and the nose of the plane shifts from slightly down to slightly up. We start to climb.

"You weren't kiddin', huh, Jared," I say into the headset. "That's a helluva strip!"

"Yep," he responds, his voice crackling over the headset as he banks us left, southeast, over the Chitistone River, then south-southwest toward McCarthy, toward tip money, toward dinner and beer, toward a shower with a bucket. "An old-timer named Kelly Bay found that strip. Braver man than I."

Kelly's labor on the pipeline was transformed into the Wolverine landing strip. Kelly's labor on the Pipeline made my labor in Alaska's tourist economy. This chapter explores how.

* * *

In the years following the construction of the Trans-Alaska Pipeline System, many workers chose to stay in the state.[132] Some of these workers used their experiences and relationships on the Pipeline to find a lasting footing in Alaska's growing tourist economy. In some cases, these experiences and relationships directly produced successful small businesses which are, today, examples of the cornerstones of the state's thriving tourist economy. Therefore, some of the workers on the Trans-Alaska Pipeline System played a direct and significant role in the creation of the state's transitioning economy in the years after the Pipeline was completed. This demonstrates the importance of fossil fuel workers to various economies in Alaska and argues for their importance as historical actors beyond their production of fossil fuels. This chapter illustrates

[132] Carrington, 190.

this via oral histories that I conducted with Kelly Bay and Mike Jernigan in the summer and fall of 2023.

Kelly Bay's labor and his relationship to the land were (and are) a potent historical force. In fact, Kelly and workers like him used these relationships to co-produce the post-Pipeline economy. Kelly's labor on the Pipeline (and elsewhere) earned him wages, which led to personal investments in McCarthy, including his land and cabin, and the planes, fuel, licensing, employees, and other elements needed to run a business. Kelly's personal goals were rooted in finding a way to make a living in McCarthy. The land was the resource that he continued to extract value from by supplying tourist experiences. These experiences relied upon the ecology's aesthetic to be commodified.[133] Kelly's labor and his relationship to the land produced a key thing in Alaska's post-Pipeline economy: a thriving small business rooted in Alaska's environmental tourist economy in McCarthy.

Mike Jernigan also used his labor and relationship with the land to produce a small business. But Mike and Kelly's relationships to the land were far from identical. Kelly was entranced by the landscape, perhaps relying upon frontier myths to relate to it. Mike, on the other hand, saw Alaska as a space for family and wealth. His personal goals were to do his duty to his family by building a successful career in proximity to them. Mike's labor as an auto mechanic on the Pipeline led to jobs as a construction worker in the post-Pipeline economy. These jobs each taught him about the transitioning economy in the state and showed him an opportunity to achieve his goals by opening a family business. Because of his labor as a construction worker, Mike was

[133] I use Hal K. Rothman's *Devil's Bargains: Tourism in the Twentieth-Century American West* (University of Kansas Press, 1998) as the basis of my understanding of tourism's extractivism. I also rely upon my own experiences working tourism in the West, which has confirmed Rothman's argument that workers in tourist economies sacrifice their sense of self and identity in order to sell a commodified and performed version of place and space. I also draw from Mark David Spence's *Dispossessing the Wilderness: Indian Removal and the Making of the National Parks,* (Oxford University Press, 1999) and Earl Pomeroy's *In Search of the Golden West: The Tourist in Western America* (Knopf, 1957).

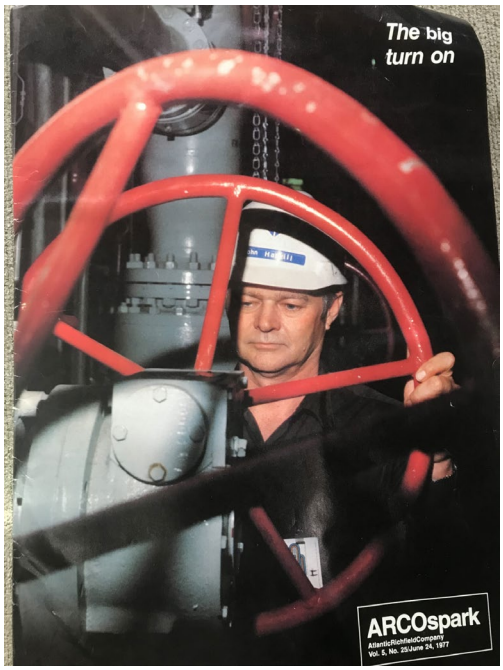
able to find an opportunity to strengthen his connection to his family via small business ownership. The Jernigans opened an RV campground to capitalize upon the extraction of environmental tourist value from the land. Despite his more reserved affection for the land, Mike's labor and relationship to the land in Alaska produced a nearly identical result: a small business in Alaska's environmental tourist economy. Both workers used labor and their relationship to the land which they learned as workers on the Trans-Alaska Pipeline to produce key contributions to the state's tourist economy. Because of their Pipeline labor, Kelly, Mike, and other workers like them have learned a new way to extract a living from their home state's ecology.[134] This produces the logical juxtaposition at the heart of this thesis: that Pipeline workers are dynamic who can exploit nature in different ways. If organized, they could pursue a post-carbon economy.[135]

The Big Turn-On

At 9:29 p.m. on June 17th, 1977, a man named John Harvill twisted open a large, red, metal wheel on Alaska's North Slope: a valve opened. There were a few more people in the room than usual, which he likely found unusual. At least one of them snapped photos; that was probably unusual, too.

[134] Hal K. Rothman, *Devil's Bargains: Tourism in the Twentieth-Century American West*, (University Press of Kansas, 1998).

[135] Here I am referring to Matthew T. Huber's *Climate Change as Class War: Building Socialism on a Warming Planet* (Verso, 2022). One of Huber's core arguments is that winning a livable future will require socialism built in proximity to energy production. Though he highlights the energy grid, I believe that expanding this argument to include other forms of energy production and extraction is important too, if slightly less so than the grid with which Huber concerns himself. As a geographer and sociologist, he is also concerned with the spatial expression of energy economies. This naturally applies to the Pipeline and its labor.



"It finally begins," the headline read a week later in *ARCOspark*, a publication of the Atlantic Richfield Company.[136] Harvill was a Flow Station Operator for ARCO, working in Prudhoe Bay when, unbeknownst to him, he started the flow of oil from the North Slope to the terminal at the warm water port of Valdez. He would continue working for ARCO, as would some of his family members, for decades to come.[137] As noted previously, 40 - 60% of Alyeska employees were Alaskan, and likely stayed in the state afterward.[138] As the Pipeline's construction was completed, oil and labor did indeed flow south, out of the state and into the global economy.[139]

Many of the roughly 25,000 workers who were working on the line packed up their belongings, maybe pawning cold weather gear in Fairbanks, Glennallen, Valdez, or Anchorage,

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[136] Jessica Harvill, email message to author, May 22, 2023.
[137] Ibid.
[138] Dixon, 78.
[139] Philip A. Wight, *Arctic Artery: The Trans-Alaska Pipeline System and the World It Made,* (unpublished dissertation, 2020.) It is important to note that Wight's history takes an (appropriately) expansive view of the Pipeline by emphasizing the word "System" to focus on far more than just the physical structure. He argues for an assessment of the TAPS as a terraqueous global network of trade and energy. Therefore, his estimation of emissions includes crude oil pumped then, ostensibly, burnt, *as well as* emissions from the "extraction, North Slope transportation, TAPS pumping stations, and tankers."

and headed south. Many continued in their trade jobs at the next oil and gas project in the contiguous U.S. in places like Oklahoma and Texas.[140] Undoubtedly, some decided to enjoy the nest egg they had made on the Pipeline: buying a home, maybe; having a child; taking vacations; investing in a business plan.

Workers who stayed, however, would need to find a footing in Alaska's post-Pipeline economy. This economy was quite different from that of the Pipeline years, as the reliable flow of remarkably high wages was contracting dramatically.[141] After 1977, the Pipeline's operation would require only a fraction of the workforce that had built it. Workers who stayed in Alaska would need to find new sources of income. Though many of these workers were skilled – meaning they had specific abilities such as welding, driving, mechanic work, or carpentry – there was no other project in the state that could absorb this glut of labor. But in addition to their trade skills, these workers had created relationships with the land around them. These relationships would serve some of them well as they sought new lines of income after June of 1977.

* * *

Like the workers flowing south from the Slope, so, too, did oil. On July 28th, 1977, at 11:02 pm, the TAPS produced the first barrel of oil at its terminus in Valdez, Alaska, on the Pacific Coast.[142] "All celebrated the first gush of Alaska's black bounty of crude oil from the end of the trans-Alaska pipeline," wrote an Associated Press reporter. "Sirens wailed, firecrackers snapped, horns honked, cheers erupted in bars." Jean Mahoney, an "unemployed Anchorage widow," won $30,000 for placing the closest guess for the amount of time it would take the oil to arrive from the Slope to Valdez. Her guess of 38 days, 12 hours, and 56 minutes was only a

[140] Mead, Robert Douglas. *Journeys Down the Line: Building the Trans-Alaska Pipeline*, (Doubleday, 1978). 95.
[141] Carrington, 193.
[142] Wight, 20.

minute off.[143] This description shows the cultural importance of the Pipeline in Alaska: workers had not just produced the Pipeline. They had produced a culture which valued their labor in an almost obsessive way.

Early estimates had suggested that some 9 billion barrels of oil would be recovered from the Prudhoe Bay Oil Field.[144] In the intervening half-century, the Alaskan Arctic's long since bygone era of algae, diatoms, and other former lives has flowed down the Trans-Alaska Pipeline to more than double that initial estimate.[145] To this day, this crude oil arrives in Valdez's terminal, where it becomes "the largest maritime movement of domestic crude in U.S. history." In the 1980s, more than half of all tankers flagged in the United States were involved in shipping crude from Alaska's North Slope by way of Valdez.[146]

More than crude oil flowed out of the Pipeline, however. The TAPS also gave birth to the iconic Permanent Dividend Fund, the annual check of oil revenue for all Alaskans.[147] The PDF links individual Alaskans to their crude wealth via the labor of Pipeliners. The PDF is just one element of the "petro-welfare state" which was constructed "behind" the physical Pipeline infrastructure. This state helped to ensure that, although the boom of the Pipeline's construction was a mere three years, the economic wealth created by the Pipeline would extend into the decades to come.[148] Workers like Mike Jernigan and Kelly Bay contributed to the creation of a political-economic system that Alaska had not experienced prior to the Pipeline's completion.

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[143] Associated Press. "Valdez Celebrates Arrival of First Oil." *Eugene Register Guard*, July 29, 1977. https://news.google.com/newspapers?id=x6NVAAAAIBAJ&pg=3868%2C7062865.
[144] United States Senator Lisa Murkowski. 2017. "FLOOR SPEECH: 40th Anniversary of the Trans-Alaska Pipeline System." Accessed May 2, 2024. https://www.murkowski.senate.gov/press/speech/floor-speech-40th-anniversary-of-trans-alaska-pipeline-system
[145] Wight, 8.
[146] Ibid, 14-15.
[147] A history of the PDF is needed to understand Alaskan culture, resource extraction, politics, and political economy.
[148] Wight, 219. "Petro-welfare state" is, to my knowledge, Wight's term.

Furthermore, Mike, Kelly, and other workers would use their skills of navigating land, labor, and personhood to carve their place in Alaska's shifting economy within this petro-welfare state that they had produced the wealth to create.

Because of the TAPS' economic importance, many of the state's residents embraced a rhetoric of reverence for the Pipeline that lasted long after the fawning news stories of late June 1977. In a 2017 speech on the floor of the U.S. Congress to commemorate the fortieth anniversary of that first barrel of oil arriving in Valdez, U.S. Senator Lisa Murkowski told a story of both success and undying dependence upon the Pipeline: "there is no question that the Trans-Alaska Pipeline has had a profoundly positive impact on Alaska," she proclaimed. Nodding to the centrality of the TAPS' impact on the PDF, jobs, and investment, she continued, "This is not just our pipeline; it is our economic lifeline. Over the course of 40 years, TAPS has become the veritable backbone of our state's economy." Sen. Murkowski went on to note that one-third of the Alaskan workforce was employed or supported by the oil and gas industry. She continued: "It has generated tremendous revenues for our state—some $168 billion at last count, which have been used for everything from roads, to schools, to essential services."[149]

Notably absent from Murkowski's rhetoric is, of course, climate change, the horrifically damaging Exxon Valdez oil spill, and the failed efforts at creating and maintaining "internal economies…especially self-sustaining agriculture."[150] Instead, the economic dependence on the Pipeline and the resulting culture of reverence that much of the state adheres to has helped to reify the Pipeline's indispensability to the state. Despite damning global news coverage of the 1989 Spill, some of the state's population would actually refer to it as a positive event, as Mike

[149] United States Senator Lisa Murkowski.
[150] Haycox,Stephen. *Alaska: An American Colony*. (University of Washington Press, 2006.) xv.

Jernigan did to me in the summer of 2023. It was more jobs, he explained. His own father, a purchaser for Alyeska, was maxing out million dollar credit lines daily while collecting overtime to furnish the work crews with the supplies they needed to clean the spill.[151] Cleaning up the environment was good for the economy, just as dirtying it was.

The production of oil is not an end; it is a means. The end is burning or otherwise using the crude to create various aspects of our global economy and, therefore, various ways of life in fossil capitalism. TAPS has played a significant role in the construction and maintenance of this nearly totalizing system. In 2017, it was estimated that, in the (then) forty years of the Pipeline System's operation, 17.5 billion barrels of crude had been produced. This number can be used to estimate that, through 2017, the Pipeline System has "moved or emitted" 11.2 billion tons of carbon dioxide – "nearly one percent of total anthropogenic carbon dioxide emissions."[152] Senator Murkowski's sentiment is a common one in the forty-ninth state: it is perhaps impossible to imagine Alaska without the Pipeline. It is also, therefore, impossible to accurately describe Alaska in the Pipeline and post-Pipeline years without describing the workers who built and operate(d) it. The lasting impact of the Pipeline itself mirrors the lasting impact of the workers who built it. Both have persisted in Alaska's economy and culture in the decades since 1977. Workers who loved the land and understood that they could extract value from it contributed to a project which has done significant harm to the planet's ecological stability. This tension is central to this chapter's discussion of the role that Mike Jernigan and Kelly Bay played in Alaska's tourist economy in the years after 1977.

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[151] Jernigan interview.
[152] Wight, 29.

Oil, oil infrastructure, and environmental harm were not the only things that workers on the Trans-Alaska Pipeline System produced. In addition to Alaska's oil economy, the state has increasingly embraced tourism as a key component of its economic model. Workers from the Trans-Alaska Pipeline have contributed to this embrace by extracting desirable tourist experiences from the land. Without former Pipeline workers' ability to relate to the landscape through their labor, Alaska's environmental tourist economy would be less robust than it is today.

Alaska has been a twinkle in the North American tourist's eye for well over one hundred years. But it was not until relatively recently that it became a central driver in the state's labor and economic portfolio.[153] Tourism in Alaska began in 1880, when a steamship arrived in Glacier Bay from the West Coast of the Lower 48.[154] Nearly fifty years later, a mere 30,000 tourists arrived in the state annually. Alaska was simply too far for most to afford to travel to for pleasure. Europe was often a cheaper destination with more amenities. In the mid-twentieth century, tourism was primarily focused on rail travel. The difficulties that workers encountered in Alaska were present for tourists too: seasonality, bugs, and a lack of infrastructure. All these factors added up to create a somewhat slim tourist economy in the territory. In addition to shortcomings of the transportation system, workers from extractive industry had not yet managed to use their skills of navigation to create the scale and variety of tourist amenities which powers the state's tourist economy today. But the growth of air travel in the 1920s and 1930s –

[153] Haycox, Stephen. "Tourism in Alaska's Past," *Discover Alaska* (blog). *Alaska Historical Society.* N.D. https://alaskahistoricalsociety.org/discover-alaska/glimpses-of-the-past/tourism-in-alaskas-past/
[154] Ibid.

specifically in small planes known as "bush planes" – and, shortly thereafter, the completion of the Alcan Highway, both offered significant new methods to get into and around Alaska.[155]

Territorial Governor Ernest Gruening was intent upon turning the state into a hub for tourists interested in natural beauty.[156] Gruening's hope for a robust tourist economy built on the state's natural scenery was prescient. The expansion of commercial air travel and the post-war economic boom helped create the tourist economy of today's Alaska, which boasts nearly three million tourists annually now. But even in 1967, only one relatively small air service, Cordova Airlines, offered flights in and out of the state.[157] Today, numerous direct flights from the Lower 48 and Asia to Anchorage and Fairbanks have made Alaska a popular tourist destination on a global scale.

Furthermore, because of the state's relative remoteness, tourists typically come and spend significant time in the state – 8.5 days on average.[158] But those 8.5 days must be spent *doing something*. Airlines may deliver millions of tourists annually. But it is the workers of Alaska who use their relationships with the land to create valuable tourist experiences in places like McCarthy and Tok. Workers like Kelly and Mike, who developed this relationship between land and labor on the TAPS, have used it to create the infrastructure upon which tourists now rely.

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[155] Katherine Johnson Ringsmuth, *Alaska's Skyboys: Cowboy Pilots and the Myth of the Last Frontier,* (University of Washington Press, 2015), 81.
[156] Ibid, 81-82.
[157] Ibid, 136.
[158] Alaska Travel Industry Association. N.d. "Tourism Works for Alaska." *Alaska Travel Industry Association.* https://www.alaskatia.org/resources/tourism-works-for-alaska

"Please lord, gimme another pipeline"

In 1977, workers like Kelly and Mike were faced with a difficult transition away from the reliably high wages of the Trans-Alaska Pipeline System. They used their skills as tradesmen and their relationships with the land to craft a future for themselves in Alaska's post-Pipeline economy. "Let's see, that was '77. I must've gone back to Pump 10, because that was the last job, '77," Kelly recalled. Kelly Bay watched spring turn to summer that year, working in good conditions: outdoors, with good people, in beautiful mountains. He did not realize that his seasons of balancing Pipeline construction work with subsistence life in McCarthy were rapidly coming to a close. "They were like, 'it's over, it's done," Kelly told me, waving his hands. He seemed to mimic the boss's nonchalance toward what had become a way of life, a steady paycheck, and a source of community for thousands of Pipeliners.[159]

"Everybody was like, 'no! You're kidding! That can't be true,' so then everyone was like, 'please lord, gimme another pipeline, I promise I won't piss it all away this time!'" Kelly folded his hands together in mocked prayer and chuckled. Indeed, this quote was so common that Mike Jernigan told me it made its way onto a popular bumper sticker in the state in the late Seventies.[160] "Everybody on the Pipeline, they pretty much thought it was gonna go on forever," Kelly chuckled. When the Pipeline did not, in fact, go on forever, Pipeliners had to choose if they wanted to stay in the state where they had built relationships with land and people alike. To stay, workers would use their labor and the land to pursue their personal goals in Alaska's late twentieth century economy.[161]

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[159] Bay interview

[160] Jernigan interview.

[161] It is difficult to estimate numbers of workers who stayed behind, due to the transiency of the labor force in the TAPS years in general and the lenient definition of residency in Alaska.

Many workers chose to pursue life elsewhere. "A lotta people left. Big saying there is, 'happiness is a Texan goin' south with an Okie under each arm," Kelly crowed with laughter.[162] But his anecdote does not quite stand up to demographic inquiry: between 1970 and 1980, Alaska became about 1% less male, while the number of women stayed flat – hardly representing the 2:1 ratio suggested by his somewhat off-color anecdote. "A lotta those Pipeliner guys, they were career welders or whatever, they went to wherever's next. A lotta people left, some people stayed, depending on how well they liked it. A lotta people were here for the money; I would say the majority of people were here for the money."[163] Indeed, many welders in particular moved onto other projects that their union, Teamsters Local 798, had helped negotiate for them. But a majority, of course, isn't a totality. In the core of the Pipeline years, between 1973 and 1976, Alaskan employment grew from 120,410 to 188,769 – a nearly 60% increase. Nearly 8% of the 1976 workers were either unemployed or left the state to find work elsewhere at the end of construction in the summer of 1977, when oil began flowing toward Valdez.[164]

Kelly had used his labor on the Pipeline to consider the land and where he wanted to fit his life into it. This occurred most precisely in his view of the Wrangell Mountains from near the Isabel Pass Pipeline camp. Furthermore, he had used this dream of a life in the Wrangells and the wages and spare time that he earned with his labor to get to know McCarthy's land, ice, wildlife, and people. Other oil and gas projects – even the continued high wages they promised – were not about to get him to leave the place he had worked hard to get to and stay in. He was a landowner in McCarthy now and had recently completed cabin.

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[162] Bay interview.
[163] Ibid.
[164] Carrington, 198. This statistic needs further study and should not be taken to mean that 92% of Pipeliners stayed in the state, unless further research confirms this.

Just to be sure, I asked him that once: did you consider going south when it ended? "Oh no, I never considered that," he responded.[165] But even the most committed new Alaskan would need to answer some tough questions: would Kelly work harder for longer hours? Save less money toward future goals? Purchase less to advance his goals? Kelly would use jobs on the North Slope in intermittent ways to keep money coming. But even many of those who remained in oil and Pipeline related jobs saw their wages fall after 1977.[166]

John Harvill may have started the flow of oil in June of 1977, but there were still jobs on the North Slope to keep that oil flowing. "You know, after the pipeline, you know it was all union, so later on, let's see it woulda been early eighties, it wasn't Pipeline money, it was Slope money," Kelly described to me.[167] The North Slope was still a site of wages and reliable work. But Kelly begrudged the Slope's monotony and brutal labor, which he reported as worse than earlier Pipeline jobs because of the different land he was working on.[168] He went several times nonetheless. It was a stopgap – not a career or vocation. As he had done during the Pipeline's construction, Kelly used the sale of his labor to buy himself time to create a life in McCarthy, where the land and his goals coalesced. His ability to navigate land, labor, and self in relationship to one another continued after the Pipeline construction ended.

"It was all union stuff…so I was going up there as a Laborer. Prudhoe Bay. Nine weeks, 7-whatever, 7-10s, 7-12s, all kinds of hours," he sighed. "I didn't like it up there," he chuckled to me over the phone a few months after our conversation in McCarthy. "I'd rather be down here [in McCarthy], you know?" Kelly told me. His wages on the Pipeline had created the financial and

[165] Bay interview
[166] Carrington, 207.
[167] Bay, interview.
[168] Ibid.

temporal opportunity to pursue a life lived in the Wrangell Mountains. As a man who came to the state "to go to Alaska," not to work, it was only logical that he sought out work that could buy him time back in his cabin, with Natalie, up McCarthy Creek. For a time, the North Slope's ongoing oil work offered a way to do that. But Kelly hated it:

> "I always looked at it as – you were sellin' part of your life is basically what you were doin up there, cuz it was really no life, you just work everyday, long hours, people get crazy after about six, eight weeks…I mean, it was really good money. Couldn't make better money. In the eighties we were making fifteen hundred, two thousand a week, it all adds up, you know after forty it was time and a half, and if you worked Sunday it was double time…[but] you go up there in the winter and it's just white and it's…the wind blows like a sonofagun and you know – it'd be thirty, forty below, and the wind's blowing thirty! It's just a big industrial thing going on, and you're dealin' with a lot of different people, some of 'em were real nice and some of 'em were not. Construction hands, come from all over.[169]

Even for a devoted outdoorsman and seasoned hand, this – shoveling knee-deep, glycol-laden snow in pitch black, gusting winds, below zero temperatures, for instance – was not the sort of work Kelly wanted to do. Kelly's labor on the North Slope's barren landscape was directly impacted by the brutal environmental conditions. This land, he decided, was not the Alaska he had come for. His dreams and ambitions lay elsewhere in the state. He had used his labor in the oil economy to buy access to his dreams and ambitions. Now, in Alaska's post-Pipeline economy, he would continue to seek out relationships with the land in McCarthy in a changed labor market. As he'd do for much of the seventies and eighties, Kelly paired grueling oil labor with other pursuits he was more passionate about, treating Pipeline and Slope work as a way to buy time to try his hand at other things, whether waged or not.

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[169] Bay interview.

One of the ways that Kelly attempted to make a home for himself in McCarthy was by working as a trapper. Trapping by dog team in the Chitina-Nizina River Valley between the Wrangells and the Chugach was a much closer approximation of what Kelly aspired to, but his labor and the land were unable to produce the financial wellbeing to survive. Though he recalled the trapping fondly, it was not enough to get him to his goal of a sustainable economic life in Alaska. He would need to be more closely linked to the tourist economy.

Kelly trapped using his newly finished cabin up McCarthy Creek as a home base. It is dense, soggy country there, much like the boreal forest between the Wrangells and the Alaska Range.[170] Moving through this country in the summertime would be a fool's errand. In the winter, mushing makes more sense than relying on a snow machine. If a dog gets hurt, you can always bundle her up and tuck her in your sled and carry on, albeit a bit more slowly. If a snowmachine ski breaks? Or the engine fails? That could be a death sentence.

"When I first got here, I just wanted to have a dog team, so I rounded up a bunch of dogs," Kelly told me.[171] The dogs had been an important part of the construction of his cabin with Natalie. "[I] had a couple dogs and used 'em for pullin' some lighter loads, like roof poles and getting water, and then I kept adding to them. Went to five dogs, and then to seven dogs, and then to eight dogs, and then to ten dogs," – I could hear a smile in Kelly's voice, as the hook of a joke rounded a bend and headed my way – "and then to 8 dogs, and then to 7 dogs." He was laughing then, relaying a truism of Alaskan life: dog teams are expensive, an ungodly amount of work, a great

[170] I've flown over it a number of times to and from work, always marveling at the airplane's ability to drop me and my clients off in the alpine, safely above the intimidating, thick flats below. Gazing from above, ponds, muskeg, and marshes are the only break in the forested land. Once, a pilot named Bill exclaimed as we soared a thousand feet over the land: "look! A family of swans, on that pond below!" As we both craned our necks to see them, Bill chortled into the headset: "they've got that place to themselves."

[171] This desire to have dogs speaks to how Kelly viewed Alaska and his role within it. He "just wanted" to have dogs because they helped him have a specific type of relationship with the land.

way to go into debt – or worse. Best to find a sweet spot, if you want to have them at all, he was telling me. “It was kinda optimum, seemed like seven to eight dogs was kinda ideal. Not so many dogs to feed, not so many dogs to board in the summer when I’d go out and work [on the Slope or elsewhere].” Dog teams and trapping had played an important role in Alaska, but in the late Seventies and early Eighties, they did not produce enough profit for Kelly to make ends meet and advance his goals of a long-term life in McCarthy. They did, however, provide Kelly with something he sorely wanted: a deeper connection to the land in and around McCarthy.

Kelly and the dogs traveled up and down the frozen Chitina River to set trap lines for marten, wolverine, lynx, and coyote. He would keep an eye out for overflows and dodgy ice before cutting up country toward the foothills of the Chugach to spots he knew to be good for marten, a pair of small lakes called Sunshine and Louise. “There were quite a few up that country. Pretty sparse otherwise,” he recalled.[172]

Kelly likely used a series of trapper’s cabins to make multi-day runs, to stash food and other supplies, and to warm up during the bitter, short winter days around the solstice. “Coyote weren’t really worth anything,” and the lynx population fluctuated, depending on predation by wolves. The money was in marten, but even they were not especially lucrative: twenty to forty dollars each. The marten were typically trapped near a pair of lakes, Sunshine and Louise, about sixteen miles south (as the crow flies) of McCarthy.

Kelly sold his furs to a middle man named Dean Wilson in the town of Kinney Lake, some seventy-five miles west of McCarthy. “He’d take ‘em to fur auctions and sell ‘em,” Kelly explains. His voice starts to get chipper: “Yeah, you gotta stretch ‘em and dry ‘em, then they’re stable, so

[172] Bay interview.

they can be sent off to a tannery to make whatever. That was fun." Kelly's labor and its connection to the land via the bodies of its wildlife brought him joy.

But the money in trapping was marginal – "enough to buy dog food," Kelly later commented.[173] But the tone of his voice and the detail he offers, unprompted, makes it clear: although the wage labor on the Slope was necessary to stay afloat financially, Kelly's heart was in different kinds of work: the silence of sled runners on snow and hours of expert craftsmanship, for example. Though he worked oil jobs, his passion has always been the land and in building new skills to relate to it. And not just any land: the valleys and mountains of the Wrangells and Chugach, where the Nizina and the Chitina Rivers come together. McCarthy. But this was not enough to make it in Alaska's late twentieth century economy. He would need to align himself and his labor more directly within the tourist economy.

Kelly's ability to use his labor to connect McCarthy and Prudhoe Bay shows that describing a gap between resource extraction and ecological consciousness is an inaccurate depiction of some Alaskan workers. Kelly labored to balance expenses, passions, and the seasonality of Alaskan life. He sought to piece together the right variety of forms of work to balance his desire to be in Alaska, doing work he enjoyed, with his pocketbook. Though they shared arduous labor, Kelly decided that the North Slope and trapping by dog did not go well together in pursuit of his goal: reliable footing in Alaska's ever-shifting economy. He was yet to find that footing, however. Alaska's tourist economy was not yet booming in McCarthy.

Desperate to avoid the lucrative but bleak labor at Prudhoe Bay, Kelly needed more than just trapping to get by in the years after the Pipeline. The end of the Pipeline was "a shock," Kelly summarized to me. "But we weren't totally dependent on the Pipeline anyway. We knew how to

[173] Ibid.

do other stuff."[174] Among those other things was running a sawmill that he bought and drove down to the Kenai Peninsula, a salmon-rich region due south of Anchorage. "Used to drive down there in the summer and saw lumber, Halibut Cove, mostly. Yeah, I got hooked up with Tillion down there, Clem Tillion, was a [state] senator at the time, they had a need for a lot of lumber, so I set up there and sawed for one, two summers." Kelly was learning that being a jack-of-all-trades was (and is) an especially valuable trait in the Alaskan economy. His ability to work the land was an unending throughline in Kelly's life in Alaska. For a carpenter by trade, working as a sawyer in a well-connected pocket of the market might be the logical choice.

But for Kelly, a job out of McCarthy was not a job worth keeping for any longer than he needed it. And trapping's exhausting, time-consuming work coupled with thin profit margins on account of the low price of furs and the high price of dog food, boarding, and supplies had Kelly exploring other ways to make a life for himself in post-Pipeline Alaska. He had found opportunities to sell his labor, but had failed to navigate the trio of labor, land, and self effectively yet. The labor on the Slope was despicable to him, despite its decent pay. Trapping brought him joy because he was working the land in and around McCarthy, but he could not bring home enough money via the sale of skins to do more than feed his canine coworkers. Running a sawmill in Alaska's expanding residential areas was decent money, but it was not in McCarthy. He had yet to add the critical elements which would eventually secure his life in McCarthy.

Kelly got a welcome gift when, in 1980, Wrangell-St. Elias National Park and Preserve was established. This created the largest National Park in the United States. Though many in the region were furious that the Park would limit or extinguish their subsistence hunting and small scale mining endeavors, Kelly and others used the new public land to locate their labor within

[174] Ibid.

Alaska's expanding environmental tourist economy. But he would need more than his affection for the lands and a National Park designation to find a footing in the region's tourist economy. His labor would need to change in order to pursue his goal of a life in McCarthy.

In a state replete with myths, perhaps one character captures the imagination better than any: the bush pilot. These "skyboys" are "steeped in a familiar tale of American prowess, freedom, and exceptionalism…The most daring flyers opened Alaska's 'empty land' to mineral development and carried to new heights mountaineers aiming to conquer the continent's highest unnamed peaks."[175] The bush plane, wrote environmental historian Roderick Nash, "is Alaska's covered wagon."[176] But just as much of the romance of the covered wagon falls away upon closer inspection, so too does the mythic veneer of bush planes and the people who have piloted them. Some parts of this myth hold up: the danger, the various "firsts," the affection for the region they were settling. But when we place bush pilots within the broader historical events of twentieth century Alaska, we find historical actors playing a far more complex role in the creation of Alaska's contemporary economy. Among the impact of these actors are the commodification of the state as a "Last Frontier" for tourists, the malign impact of aviation on Native communities who suddenly had far less control over who arrived in their villages and towns, and the continued connection between Alaska's supposedly individualistic pioneers and their constant reliance upon federal subsidies and structures of support.[177] Labor in the bush plane industry allowed Kelly to utilize the Last Frontier myth and the federal infrastructure (such as runways, licensing, and other professional standards) to find his footing within Alaska's tourist economy. This ability to link his

[175] Ringsmuth, 7.
[176] Nash, Roderick. *Wilderness and the American Mind.* Fifth Edition. (Yale University Press, 2014). 276.
[177] Ringsmuth, 7.

relationship with the land to the tourist economy would open the door for the realization of his goal of a life in McCarthy.

Aviation in Alaska has been a more than century-long project of economy and culture. To people outside Alaska, it might seem illogical that Kelly worked as a carpenter, then laborer, then a fur trapper, then a sawyer, then a pilot. It's not necessarily the career path one would take to fly planes in the Lower 48. In late twentieth century Alaska, it makes all the sense in the world. Kelly's professional trajectory was one of trying to find and keep a job that kept him in proximity to Alaska's land, specifically in and around McCarthy. He had used work on the Pipeline and elsewhere to make the initial steps. But to build a life on the land, he would need to find a way to fit into Alaska's growing tourist economy.

Before Kelly was a pilot, he was just along for the ride. Amongst the dozen or so residents of McCarthy in the late seventies and early eighties was a man named Gary Green. Gary and Kelly got along well, in no small part due to their seasonally complementary methods of getting around the mountains and muskegs: Kelly had the dogs. Gary had the plane. "Gary was in McCarthy, from when I arrived in McCarthy in '75 or '76. I had a dog team, was trappin', he had a little J4 Cub. We used to trade off. We'd fly in his airplane and then take trips with my dog team."[178] Those early plane-supported trips – hunting, hiking around, getting to know the many subranges of the Chugach and Wrangells – opened Kelly's eyes to new ways to engage with the land he'd left home to live on. From time to time, Gary would let Kelly fly the Cub. Over time, Kelly's interest in dogs waned: "Got tired of lookin' at the wrong end of a dog goin' down the trail. And, you know, an airplane gives you freedom around here," he told me. "Without an airplane you can't really go anywhere around here, unless there's a road, and there's not many of those around here."[179] Kelly

[178] Bay interview.
[179] Ibid.

was realizing a new way of relating to the land in the region he loved. Though it was not yet directly connected to his labor, his early flights with Gary would provide him with the skills to make a home in McCarthy's tourism economy. Even today, as roads creep their way into more valleys, forests, and ranges of Alaska, access to a plane is a major asset for those who like mountains, mining, hunting, or, if you're in a village, making appointments out of town.

Kelly began to see an avenue opening. The plane could offer him work he enjoyed in the place he loved. "I got my license in 1983. I bought an airplane…flew it back up here from Casper, Wyoming, yep, a little Cub," Kelly explained. I learned later that it was a P18 Cub Special, 105 horse, no flaps, with an eighteen fuselage. "That was '82 or '83. And uh, yeah, just spent the summer [in McCarthy] flying around."[180] The airplane – just a "little Cub" – offered Kelly access to parts of the Wrangells, Chugach, and beyond that he had previously had to rely on Gary to get to. And the Pipeline had given him the money to pay for it. "Had a wad of cash from working on the pipeline, so I spent it on airplane gas," he told me.[181] This is another example of Kelly transferring the wages of the Pipeline into his affection for Alaska's ecology, specifically in McCarthy.[182] His labor on the Pipeline offered Kelly the chance to spend time and money flying, ultimately launching him on his next career.

Despite Kelly's persistent search for some kind of consistent work in the Wrangell-Chugach-St. Elias region, the plane didn't start as a business opportunity. It started as a love of getting to know the mountains and valleys of the newly minted Wrangell-St. Elias National Park. But eventually, the opportunities for a business of sorts started coming to Kelly: miners, hunters, the occasional tourist. "Well, we were here with airplanes," he explained, "and people'd show up

[180] Ibid.
[181] Ibid.
[182] It is, of course, another example of the relationship between affection for ecology and burning fossil fuels.

and say, 'Take us flying, we'll pay for your gas.'"[183] In the Seventies, tourism in McCarthy was still extremely slow. Building a business around this sort of attraction was only just beginning to cross Kelly and Gary's minds. But the controversial decision to create Wrangell-St. Elias National Park and Preserve would create an opportunity for Kelly to "stick" in McCarthy via the burgeoning tourist economy.

Kelly and Gary represented a new era of pilots who sought to make their passion – and eventually, their paycheck – fit into a new national park that many had disagreed with.[184] With mining essentially outlawed in the region, it has been mostly backpackers, hunters, climbers, skiers, and "flight-seers" in the decades since. As things became busier, Kelly realized he needed to legitimize the business in order to keep it running at a pace that allowed him to make McCarthy his home. The federal oversight of the aviation industry provided a structure through which Kelly's labor could become explicitly tied to the tourist economy in McCarthy. So, he and Gary began following the law.

They had a friend with the FAA. "I said [to the friend], 'how do you do this air taxi thing?' We really didn't wanna do it. We had to buy insurance. [Before that] we'd fly up here and take the cash and stuff it in our pockets. [Gary] had a 180 and I had a Super Cub on that [FAA] ticket," Kelly explained.[185] This anti-federal attitude shows that Kelly was a part of the longer tradition of anti-federalist politics in Alaska that so frequently couple with a reliance upon federal support and policy. The creation of Wrangell-St. Elias National Park and Kelly's begrudging attitude toward FAA regulations are an example of how Kelly navigated place of his labor in the new tourist economy.

[183] Ibid.
[184] Ringsmuth, 180-182.
[185] Bay interview.

Visitation did, indeed, expand in the early years of Wrangell-St. Elias National Park. In 1984, the NPS had estimated that Wrangell-St. Elias National Park and Preserve had hosted 22,200 visitors that year. They predicted as many as 67,000 by 1995.[186] With this optimistic forecast in mind, Kelly and Gary started McCarthy Air in 1988. Though he did not wish to be engaged with the FAA, Kelly relied upon it to gain legitimacy, which he sorely needed as visitation in the park exploded in the years following its designation. The lands that he loved needed federal intervention to become a consistent part of tourist economies in Alaska which had thus far prioritized other National Park landscapes, such as Denali. This designation of the land gave Kelly the customer base that he needed to create a life via his labor in the place he loved.

Thirteen years after rolling into Fairbanks on a frigid February day, Kelly had turned his relationship with the land and oil money into a tourism business. But by the fall of 1989, Kelly had sold his half of the business to Gary and signed a two-year non-compete agreement. "Yeah that partnership didn't work out too well," he sighed.[187] Just as it seemed Kelly had landed a spot in McCarthy, he was back to the drawing board.

The non-compete meant that if Kelly wanted to use his most lucrative skill south of the Slope, he'd have to find somewhere else to fly. The eighties and early nineties were a time of plenty in Bristol Bay – the salmon capital of the state.[188] In the mid-eighties, Kelly had worked as a hunting guide in the Chickaloon region of the Chugach and as an occasional pilot for a businessman named Joe Klutsch. Klutsch, who had also worked the Pipeline, was converting his

[186] National Park Service. 1986. "General Management Plan: Wrangell-St. Elias National Park and Preserve." Accessed March 9, 2024.
https://parkplanning.nps.gov/document.cfm?parkID=21&projectID=34503&documentID=38089
[187] Bay interview
[188] Ibid.

Pipeline money into a thriving hunting tourism business that survives today.[189] Kelly's good relationship with Klutsch helped him out in a pinch after the split from Gary and McCarthy Air. As quickly as it seemed he had found a long-term business plan in McCarthy, Kelly was a few hundred miles away, flying planes off the Katmai Peninsula, once again linking his labor to the land.

"I started flyin' fish out of Bristol Bay, off the beach, that was during the eighties, the set netters there, they were havin' big runs of fish, and the only way to transport 'em was with an airplane," Kelly explained to me. The booms of salmon were opening the economy, just as oil, timber, and other resources had in years past. Kelly knew to follow these booms and apply his skilled labor to contribute to his goal of a life in McCarthy. "So we'd pick 'em up on the beach and fly 'em to Dillingham, or King Salmon, or Naknek, and yeah, that was wild and crazy. Lotta crappy weather, lotta airplanes, you know it was a big happening, lotta fish, lotta money."[190] Boom times in Alaska's extractive economy would once again connect Kelly's labor to the land in his pursuit of a long-term life in McCarthy.

At the end of his two year non-compete, Kelly high-tailed it back to McCarthy. "Well, cuz I liked being here, the whole thing was trying to make a living here, and it was never easy," Kelly summarized. "[Natalie and I] came back and started [Wrangell Mountain Air] because by then it was a national park." A few tourist businesses had opened in McCarthy and the surrounding area, including the high-end Ultima Thule Lodge, which still operates today.[191] "We could see there was some potential there, and so that's when we started Wrangell Mountain Air."[192] Kelly and

[189] Katmai Guide Service. N.D. "About Us." Accessed February 10, 2024. https://katmaiguideservice.com/about-your-alaska-hunting-guides/
[190] Ibid.
[191] Ringsmuth, 187-188.
[192] Bay interview.

Natalie saw the emerging economy centering on the young National Park and used their labor and love of the land to cement their place in McCarthy.

The park had begun to take off, with tourists beginning to include it in their Alaska itinerary alongside Denali, the Kenai Peninsula, and the fishing villages of Southeast.[193] The creation of a few lodging options, plus the dueling air services to get into the backcountry of the United States' largest national park had made McCarthy a destination. Suddenly, Kelly and Natalie needed airplanes, pilots, and staff to keep up. Their labor needed to shift in order to secure their relationship to the land and their goal of a lasting life in McCarthy.

Of course, airplanes were essential to the labor of running their tourism business, Wrangell Mountain Air (WMA). "Let's see we had a Cub, and…tryin' to think – oh, I bought a 185 in 1990 and I leased it to Pen Air cuz I was down there doin' fish surveys, and seal surveys, and bear surveys, and all these surveys…," Kelly trailed off.[194] The bush plane had become a critical tool of labor in Alaska. By transitioning into this economy, Kelly gained a new ability to gain passive income from his airplanes. He had worked hard on Alaska's land, especially on the Pipeline in the Brooks Range, in the Alaska Range and, after the Pipeline, on the North Slope, to build the capital necessary to participate in Alaska's tourism economy. "[I was] flyin' Fish and Game guys around to do fish counts. And Pen Air needed another airplane, so I leased it to 'em and then we started WMA and we had the Super Cub that we used down at Klutsch, and then we had the 185 and I leased the 206 that had been flyin' fish in Bristol Bay, and then we just started adding airplanes," he explained. "Yep, twenty five years in debt to the bank," he chortled. "Not even pipeline money's enough," I suggested. Kelly sighed deeply. "No, we borrowed a lot of money from banks. Paid it

[193] National Park Service.
[194] Bay interview.

all back, but…" he trailed off. "Stressful."[195] Despite these stressors, Kelly had managed to "stick" in McCarthy. His love of the land, which had developed because of the Pipeline, was linked to his ability to commodify it for tourists.

Kelly's business, Wrangell Mountain Air, sticks to this day. Early days of competition with Gary's company, McCarthy Air, were tense: "It was pretty nasty in the beginning – Gary, as you might imagine, wasn't exactly happy to see me show up."[196] But things settled into place, eventually, and Wrangell Mountain Air grew, and grew, and grew. "Things grew and more people came…so we put on more airplanes, more pilots, more van drivers, more vans," he said. "We ended up with seven airplanes and, I dunno, four or five vans, and twenty-something employees…If it had happened all at once, prolly wouldn't been able to handle it."[197] The growth in WMA mirrored the growth in Alaska's tourist economy and, in particular, the growth in visitation to Wrangell-St. Elias National Park. After predicting 67,000 visitors in the 1980s, the Park and Preserve has consistently met or exceeded that number in the years since, including an all-time high of more than 87,000 in 2012.[198]

Between 1977 and 1992, Kelly migrated across Alaska's landscape and economy in search of a niche for himself. He struggled to triangulate his labor with the land he loved and the long-term goal of settling down in McCarthy. The Pipeline and North Slope offered him grueling, lucrative work. It was in this work that he established the skills of navigating his labor in relationship to the land and his long-term goals. In the years after the Pipeline construction was completed, Kelly engaged with the land via his labor while he tried to secure the time and money

[195] Ibid.
[196] Ibid.
[197] Bay interview.
[198] Wrangell-St. Elias National Park. "Park Statistics." Accessed May 10, 2024. https://www.nps.gov/wrst/learn/management/statistics.htm

to "stick" in McCarthy. Though he tried to use numerous different types of labor in several parts of the state to stitch himself to his desired home in McCarthy, he would need to learn to incorporate his labor into the growing tourist economy predicated upon the beauty of Alaska. Kelly used his labor to stitch together the resource economy and the tourist economy in order to spend the rest of his life in the place he still loves: McCarthy, Alaska.

Family, Small Business, and Tourism

When John Harvill turned that red wheel in Prudhoe Bay, Mike Jernigan was about 150 miles south at a Pipeline camp on the west side of Galbraith Lake. Galbraith Lake collects the streams running off the Brooks Range to the west and south. The lake is large, popular with migratory birds and small mammals. On the south side, a stream flows out of the lake, joining the Atigun River as it ducks under the Haul Road, then the Pipeline, and then plunges into the Atigun Gorge, racing between the last hills of the Brooks Range toward the Sagavanirktok River, then the Arctic Ocean near Prudhoe Bay. It is a dramatic portion of the Brooks Range, close to both the glaciated extremes of Atigun Pass and the Continental Divide, and the relatively flat expanse of the North Slope's caribou calving grounds and subsequent biodiversity.

Mike Jernigan is perhaps more likely to marvel at man-made wonders than ecological and hydrological systems. While Kelly longed for dog teams and the ability to move across the Alaskan landscape, exploring its nooks and crannies, Mike wanted good wages, steady work, and the opportunity to build a life for his family. He spoke of "pride" when he looked at the terminal in Valdez.[199] "No," he told me when I asked if Alaska's reputation for adventure, wildlife, and scenery had attracted him to the 49th state. "It was all about the money, all about the money." The Pipeline and his family had brought him to Alaska, but the ability to seize his goal of family and

[199] Jernigan interview.

prosperity kept him there in the decades after John Harvill opened the valve to begin the flow of oil to Valdez.

It is important to differentiate between Mike and Kelly's motivating personal goals. Kelly wanted to create a life with Natalie in McCarthy because of its scenic and ecological value to him. Mike, however, had a different motivating goal. Once, Mike described to me an interaction with a wolf while on the job near Atigun. He described it as, "the most amazing thing" he had ever seen. But his stories of marveling at the land are less present than other workers. Mike's consistent focus was to make money in order to be in close relationship with his family. Alaska's landscape was where those two things came together. Therefore, Mike and Kelly's relationship with the land and their personal goals were different from one another. However, it is telling that the result of this navigation was common between the two. Both men used their Pipeline labor to find their place within the post-Pipeline tourist economy.

Mike was one of about 2,800 people working at Galbraith in June of 1977. He spent his 7-10s and 7-12s and beyond working on light duty equipment: trucks, buses, and other autos that needed attention. Like most Pipeliners, he reported a total lack of free time: "you were there to work," he told me. He had his future in mind – a stable life for himself and his family. While others saved for trips to Vegas, or for drugs and alcohol, Mike remembered making a conscious decision to avoid the vices that he could easily afford. He had a life to build. "I'd send the checks down to my mom, and she'd put 'em in the bank or whatever," he told me. Mike worked tirelessly in the auto maintenance shed, stashing away his paydays, and watching his nest egg grow for fifty-four weeks on the job. "When that was all over, I had $89,000 in the bank."[200]

[200] Jernigan interview. Mike's $89,000 in the late seventies would be equal to nearly half a million dollars today.

As the oil started flowing toward Valdez, Mike entered his twenties with family in Fairbanks and a significant savings account. When he narrated this time in his life, Mike did not linger on the end of Pipeline work. It was the end of one job; he was focused on finding the next. But despite his financial goals, he would not join the thousands of Pipeliners headed south. "When I got done off the Pipeline, I came to Fairbanks. Green Construction was the last company I worked for up on the Slope, it was Associated Green, it was a joint venture," he explained. Mike's labor on the land was singularly focused on money and proximity to family. Fairbanks offered both, so he did not consider leaving the state. "Anyhow, Green had a job in North Pole, putting in the dike system, flood control from the Chena River," he remembered. Mike worked the land to manage flooding in the expanding North Slope Borough, whose population was expanding as a result of the Pipeline's boom.[201] "When that was winding down, my mom and dad were in Anchorage and my mom was working for a small construction company at the time called Wilder Construction which was out of Bellingham, WA, and they needed a truck driver, so I went to work for them." Once again, Mike's connection to his family was the primary goal; he used the land and his labor to advance progress toward this. As a hardworking and upwardly mobile young man, Mike sought out family and more work by investing his labor power in the project of building Alaska's late twentieth century economy which was adjusting to the impact of the Pipeline.

The option of leaving Alaska was not particularly appealing. While Kelly sought a way to stay on the land he had fallen for in the Wrangells and Chugach, Mike linked one trade job on the land to the next in order to advance toward his personal goal of family and prosperity. But, as the Pipeline jobs dried up, it's likely that the lower cost of living in other parts of the country could

[201] Chapter Two describes this boom.

have allowed Mike to save more money.[202] This shows that, although money may have been a major factor, his family was equally, if not more, important. Instead, he used the land as a site of labor in order to create a comfortable life with his family in Alaska.

Mike worked twenty years for Wilder, the Bellingham-based outfit, driving trucks and working on various construction sites across the state. It was on a Wilder job that he found the inspiration and opportunity to site his labor within the growing tourist economy, tying together his family, his labor, and the land. "We were doing a section of highway out here, Yerrick Creek to Robertson River Bridge," Mike told me. "And there's really no place to stay in Tok, so I had my dad and mom come up and visit, cuz you seen all these RVs tryna find some place to park, and we ended up buying that five acres and then this five acres, and then another five acres in the back, and then that's where we are today." Mike and his parents used their understanding of the state's growing tourist economy from the vantage point of their labor to locate their prosperous future for their family in Alaska. Mike's position within the tourist economy is different from Kelly's. But Mike's story further underscores the utility of wealth and land-relationships built on the Pipeline. Mike labored for decades on Alaska's lands because he wanted to create a successful business to share with his family. The tourist economy, reliant upon Alaska's ecology and landscape, was the economic space that both Mike and Kelly created their lasting home in.

The Jernigan's campground is called Tok RV Village. They opened it in 1986, less than a decade after the oil started flowing south from Prudhoe. I was able to visit it twice in the summer of 2023. A large blue and white slatted sign announces the campground to travelers as they approach on the highway. It's just a tick east of where the Alaska Highway meets the Tok Cutoff. From here it's a day's drive to Anchorage, cutting through the Alaska Range. Further west, it's a

[202] Carrington, 216.

half-day's drive to Fairbanks, just out of reach of the Range's north foothills through the Tanana River basin. Driving a day southeast will take you across the border, into Canada, through Kluane National Park, and onto the banks of the Yukon River in Whitehorse, Yukon. In other words, it's one day's drive from many of the things that tourists want to see in Alaska and the Yukon. The Jernigans used their knowledge of the tourist economy to position their family to profit from this flow of tourists.

That flow brought in $2.2 billion dollars to Alaska in 2018 [203] and $5.6 billion in 2022. In 2022, almost 44,000 people worked in Alaska's tourism industry, making a total of $1.4 billion.[204] The Alcan Highway – one of the projects on which labor proved that it was possible to complete industrial projects despite the challenges of construction in the North – was changed from a strategic military artery into a key element of the lifeblood of Alaska's tourist economy. The Jernigans – and, to a lesser extent, Kelly and Natalie – positioned their labor in relation to the tourist economy so that they could profit from the infrastructure created by past laborers.[205]

When they first opened, the Jernigans hosted fifty sites. For the six summers after opening, they commuted on weekends from Anchorage, where their construction and oil jobs were. They added campsites and amenities and oversaw general management. As tourism in Alaska expanded, so did their business. By 2007, they had 142 sites. Eventually, a generation of Jernigans – Jerry and Rose, Mike's parents – retired to the (slightly) easier winters of Idaho Falls, Idaho. But the business stayed in the family – once again prioritizing family within business decisions, as Mike

[203] Resource Development Council. "Alaska's Tourism Industry." N.d. Accessed March 15, 2024. https://www.akrdc.org/tourism

[204] Alaska Travel Industry Association. "Alaska 2022-2023 Tourism Impact Model. 2023. Accessed March 15, 2024. https://www.alaskatia.org/sites/default/files/2024-03/ATIA%20Alaska%20Tourism%20Impact%20Modeling%202022-2023%20-%20FINAL%20Updated.pdf

[205] "To a lesser extent" because McCarthy relies on different methods of transportation for tourism; mostly air travel into Anchorage and then either flying or driving into McCarthy from there. This does not rely on the Alcan in any way.

had done when confronted with the chance to leave Alaska as the construction of the Pipeline ended. Mike's wife, Cindy, and their kids, Ashley and Chad, keep the place running these days.[206] When I was there, in the summertime, grandkids and their friends scampered around.

The Jernigans have, proudly, expanded their services and acreage. But tourism, like oil, does not always boom. In July of 2019, 10,467 personal vehicles crossed the Alcan Border, where the Alaska Highway enters the state from Canada. The following July, with strict pandemic regulations in place, only 2,021 personal vehicles headed toward Tok from the border.[207] But a global pandemic is not the only example of tourism's fickle business. "The once-common sight of a meandering, RV-driving summer tourist is becoming more of a rarity in Alaska, according to a new survey of visitors," wrote the *Fairbanks Daily News-Miner* in 2012. Highway border crossings for three of the four ports of entry between the Yukon to Alaska had dropped a combined 26% between 2006 and 2011. Local prognosticators blamed gas prices, but also a lack of sufficient vacation time to make the lengthy drive, "even among retirees."[208]

The Jernigans have persisted through it all. When I pulled up in the summer of 2023, I found a woodchip empire amongst – likely from – the thick forest of black spruce. A powder blue double wide with aftermarket porch and roof holds the office, gift shop, bathrooms, and other basics. Various members of the Jernigan family greet visitors as you approach: someone might be out front, watering the planters; another person might be inside at the register, ready to get your stay booked. The campsites are behind the office. Outlets are mounted on two-by-fours and picnic tables adjoin. The whole of the acreage has been thinned dramatically. The boreal forest is prone

[206] Tok RV and Campground. "About Us." N.D. Accessed July 3, 2023. https://tokrv.net/about-us/

[207] United States Department of Transportation Bureau of Transportation Statistics. "Data Visualizations: Multi Data Dashboard." 2023. Accessed March 15, 2024. https://data.bts.gov/stories/s/Data-Visualizations/pbt9-k67k

[208] Fanelli, Michael. "Alaska tourism industry expecting another strong year, led by cruise passengers." Alaska Public Media. January 4, 2024. Accessed March 15, 2024. https://alaskapublic.org/2024/01/04/alaska-tourism-industry-expecting-another-strong-year-led-by-cruise-passengers/

to burns. It's a managed space, one that would be familiar to any summer national park roadtripper. The showers are a short walk away; there's even spotty wifi. In 2007, the Tok RV Village was awarded a coveted 9.5 out of 10 from Good Sam, the nation's largest RV club. The postage charge on Mike's paychecks mailed back to Fairbanks is looking like a pretty good investment.

* * *

The old pipeline camp at Galbraith Lake where Mike had gotten the news that oil was flowing south is today a public campground, popular with motorcyclists and RV types driving the Dalton Highway – the road itself built to service the construction of the Pipeline. It's difficult to find a better metaphor for much of Alaska's contemporary economy: tourism, predicated upon natural beauty, built upon the infrastructure and labor of resource extraction. Workers created this formation of the economy by triangulating their labor, the land, and their dreams for a good life in Alaska. Kelly struggled to recreate the free time that his labor on the Pipeline had afforded him. The post-Pipeline economy, however, was not amenable to this. Wages had dropped and the subsistence method of relating to the land was not viable for Kelly and Natalie to create the life that they wanted. Therefore, Kelly was forced to reposition himself in Alaska's economy to benefit from tourism. Kelly's love of the land in the Wrangells and Chugach led him to flying bush-planes. It was, therefore, his love of the land which created the opportunity for him to successfully square his labor, his relationship to the land, and his long-term goal of life in McCarthy.

Mike, on the other hand, was motivated by a desire to create a prosperous life for his family. Alaska's land was not his "north star." Instead, his labor took place on and in Alaska's landscapes. Mike's labor allowed him to stay in proximity to his family while saving money toward a larger goal of a family business. His labor on the land in service of Alaska's expanding tourist economy created the vantage point through which Mike was able to see a business opportunity in Tok.

Workers prior to the TAPS created the tourist potential that Mike seized upon to achieve his personal goal: family and prosperity intertwined in a successful small business. Therefore, despite the shift in the context of their various labors, Mike and Kelly used their relationships to Alaska's land and their labor to play a vital role in the creation of the tourist economy in the late twentieth and early twentieth century.

CONCLUSION

"You Can't Drink Money"

This thesis argued that workers on the Trans-Alaska Pipeline System shaped the history of Alaska through their relationships with the land. It explained how their labor produced far more than industrial projects like the Trans-Alaska Pipeline System. In addition to oil infrastructure, workers' labor created their relationships with the land. In some cases, these relationships produced future businesses and jobs in the environmental tourism economy in the decades after 1977.

In order for TAPS workers to arrive in Alaska's oil economy in the first place, decades of industrial labor needed to occur. Military labor in the early to mid-twentieth century made the North Slope (and Alaska more broadly) legible to the state, to capital, and to labor. After projects like the DEWLine, the exploration of Pet 4, and the Alaska Highway, it was clear that Alaska's unique circumstances – climate, remoteness – were not enough to prevent labor, capital, and the state from producing major industrial projects and impact in the region.

The workers on the Pipeline were not monolithic; neither were their experiences. This thesis argued against popular and academic notions of a strictly white, male, anti-environmental workforce on the TAPS. Through archival materials and oral histories, this project explained several different types of workers and the relationships that they built with the land during their time on the Trans-Alaska Pipeline System. These relationships had similarities with conservationists of the period, but are not identical to them. They understand the land through the prism of their labor, not recreation.

These relationships laid the groundwork for some Pipeliners to find their way into Alaska's post-Pipeline economy in the years after 1977. While many workers left the state, a meaningful

number remained. For some of these workers, the relationships they built with the land during their work on the Pipeline guided their future actions. This chapter is particularly interested in understanding how some workers connected their labor on the Pipeline to labor in Alaska's environmental tourism industry. These workers commodified the landscape and delivered that commodity to tourists. This relationship to the land via their labor gave them footing to stay in Alaska, despite the loss of lucrative Pipeline wages.

Future scholarship is needed to adequately understand workers on the TAPS and their impact on Alaska and beyond. Some of the areas that I would have liked to engage with are listed here. First, TAPS labor was exposed to and likely shaped by frontier mythology. This mythology and its impact on TAPS labor could reveal more areas of political potential for fossil fuel workers. Race and labor is underdiscussed in this work. I sought out Black and brown workers to interview, but was unable to find them in the time that I had. Unions received a brief focus in my thesis, but their importance to the TAPS is far greater than my discussion lets on. Eco-terrorism played a role in the Alaskan subconscious in the Pipeline years, as the arrival of petromodernity and environmental devastation drove some to violence. Eco-terrorism and labor should be studied in relation to one another on the Pipeline to understand how workers viewed this threat to the jobs and wellbeing. Furthermore, a closer analysis of safety and fatalities on the Pipeline should be considered. Finally, the informal economy and illegal forms of labor were very present on the Pipeline. A deeper understanding of the sale of illegal drugs and the labor of sex workers both deserve considerable focus if we are to understand a truly holistic image of labor on the Pipeline.

* * *

In 2017, I camped at the Galbraith Lake campsite at the end of a trip I had worked in the Brooks Range. The landscape is stunning. I recall the clear, crisp August morning that threatened

winter. I had been guiding a six week backpacking trip in the Arctic National Wildlife Refuge for young adults from the Hula Hula River to the Pipeline and Haul Road. We shuffled out of the tundra and onto the gravel beneath the Pipeline. It was suspended some 7 feet or so off the ground. I pulled out a sharpie and scrawled "You can't drink money" onto the silver metal above my head. I turned and offered it to the others. All but one accepted. I told them I wouldn't check what they wrote. We had talked a lot about the health of the land and planet in the weeks prior. The participants and I were feeling acute climate grief and rage after traveling across the land of the North Slope and Brooks Range.

I remember thinking about how I was probably breaking the law and encouraging minors in my care to break the law, too. All this on the clock, to boot. I felt a little childish writing on the Pipeline, but I felt I had to register some of my rage at the crisis we were inheriting. Despite thinking of my own work as wrote on the Pipeline, I don't recall thinking of the people who had camped in the same place that we would that night. I am ashamed to say that, back in 2017, I knew very little of the history that I have examined and explained in this thesis.

I'll likely be guiding near the Pipeline again this summer. I am excited to explain to my clients – typically elite, liberal, environmentalists -- some of the most salient aspects of its history. Most importantly, I'll try to explain to them about the deep relationships that the TAPS workers had with the land, their labor, and themselves. But I won't hold my breath: I've been waiting on liberal environmentalists get us out of our climate spiral for all thirty years of my life. They've failed. Environmental tourism, too, is no panacea. The jobs it produces are rarely unionized, resulting in remarkable precarity. And tourist economies are predicated upon existing fossil fuel transportation infrastructure. Furthermore, the commodification of place and space is a violent

process which often undermines efforts to organize labor unions, for indigenous sovereignty, and for climate justice.

Now that I have finished this thesis, I can get right back to organizing. Maybe I'll start with some pipeline workers.

REFERENCES CITED

Asher, Robert, and Charles Stephenson. *Labor Divided: Race and Ethnicity in United States Labor Struggles, 1835-1960*. SUNY Press, 1990.

Beda, Steven C. *Strong Winds and Widow Makers: Workers, Nature, and Environmental Conflict in Pacific Northwest Timber Country*. University of Illinois Press, 2022.

Berry, Mary Clay. *The Alaska Pipeline:: The Politics of Oil and Native Land Claims*. Indiana University Press, 1975.

Carrington, William J. Feb., 1996. "The Alaskan Labor Market during the Pipeline Era." *Journal of Political Economy*, Vol. 104, No. 1: 186-218.

Coates, Peter A. *The Trans-Alaska Pipeline Controversy: Technology, Conservation, and the Frontier*. Lehigh University Press, 1991.

Alyeska Pipeline Service Company. *Alyeska - a 30-Year Journey*, 2007.

Cronon, William. *Uncommon Ground: Rethinking the Human Place in Nature*. W. W. Norton & Company, 1996.

Demuth, Bathsheba. *Floating Coast: An Environmental History of the Bering Strait*. W. W. Norton & Company, 2019.

Dixon, Mim. *What Happened to Fairbanks?: The Effects Of The Trans-alaska Oil Pipeline On The Community Of Fairbanks, Alaska*. Routledge, 2019.

Haycox, Stephen W. *Alaska: An American Colony*, Oregon State University Press, 2002.

———. *Frigid Embrace: Politics, Economics, and Environment in Alaska*. University of Washington Press, 2002.

Huber, Matthew T. *Lifeblood: Oil, Freedom, and the Forces of Capital*. U of Minnesota Press, 2013.

Hurley, Andrew. *Environmental Inequalities: Class, Race, and Industrial Pollution in Gary, Indiana, 1945-1980*. Univ of North Carolina Press, 2009.

Knox, Wilma M. *Four Years Below Zero*, Tennyson Press, 2016.

Malm, Andreas. *Fossil Capital: The Rise of Steam Power and the Roots of Global Warming*. Verso Books, 2016.

Mead, Robert Douglas. *Journeys Down the Line: Building the Trans-Alaska Pipeline*. Doubleday Books, 1978.

Montrie, Chad. *Making a Living: Work and Environment in the United States*. Univ of North Carolina Press, 2008.

Morrison, William Robert, and Kenneth Coates. *Working the North: Labor and the Northwest Defense Projects, 1942-1946*. [Fairbanks] : University of Alaska Press, 1994.

Nash, Roderick Frazier. *Wilderness and the American Mind: Fifth Edition*. Yale University Press, 2014.

Naske, Claus-M. *Alaska: A History of the 49th State*. University of Oklahoma Press, 1987.

Purvis, Diane J. *Ragged Coast, Rugged Coves: Labor, Culture, and Politics in Southeast Alaska Canneries*. U of Nebraska Press, 2021.

Ringsmuth, Katherine Johnson. *Alaska's Skyboys: Cowboy Pilots and the Myth of the Last Frontier*. University of Washington Press, 2015.

Roderick, Jack. *Crude Dreams: A Personal History of Oil & Politics in Alaska*. Epicenter Press (WA), 1997.

Rothman, Hal. *Devil's Bargains: Tourism in the Twentieth-century American West*. University Press of Kansas, 1998.

Schobert, Harold. *Chemistry of Fossil Fuels and Biofuels*. Cambridge University Press, 2013.

Sweet, John M. *Discovery at Prudhoe Bay: Oil : Mountain Men and Seismic Vision Drilled Black Gold*. Hancock House, 2008.

Wight, Philip. *Arctic Artery: The Trans-Alaska Pipeline System and the World It Made*. dissertation., 2019.

Worster, Donald. *Under Western Skies: Nature and History in the American West*. Oxford University Press, USA, 1992.

Yergin, Daniel. *The Prize: The Epic Quest for Oil, Money & Power*. Simon and Schuster, 2012.