TO HELL, HEAVEN, AND BACK AGAIN:

LANGUAGE, RELIGON, AND THE VARIED

MEANINGS OF YELLOWSTONE

by

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DEDICATION

This thesis is dedicated to my family: my parents, my brother and sister, and my grandparents. Thanks for helping me along this journey and encouraging me along the way. This is also dedicated to my fellow grad students and faculty who helped make this project a reality. Thanks for being a part of my journey!

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ABSTRACT

This thesis examines the history of language and Yellowstone National Park from the early nineteenth century through the second decade of the twentieth century. I examine how the language used to describe Yellowstone's many features changed over time and how that language reflected the larger culture and the change that took place over time.

INTRODUCTION

As I sat there in my grandpa's idling truck in a traffic jam just inside Yellowstone's west entrance, I was intrigued. This was my first time in America's first national park, and if I had heard of it before I was not sure. But I was intrigued. Let me explain – I had just graduated high school and got to spend a portion of the summer with my grandparents as they explored the country in their truck and fifth-wheel RV. My life experience to this point was rather unique, since I had spent the preceding thirteen years growing up on the other side of the world in Kazakhstan, where my dad had been teaching English, so I had spent this in a combination of Kazakh, Russian, and English-speaking international schools. So, when I spent a few days in Yellowstone the summer after high school, I wanted to spend more time there than we had that summer. Little did I know then that the beautiful landscape that I was seeing had once been compared to hell. My project, in brief, examines the various types of religious and scientific language applied to Yellowstone's landscape over the nineteenth and early twentieth and how that language changed over time.

"Majestic mountains, dazzling arrays of geysers, and magnificent wildlife."[1] These are the first words of Robert B. Smith's *Windows into the Earth* that tell the geological story and history of both Yellowstone and Grand Teton National Park. These nine words conjure a sense of awe and wonder in our mind's eye. We can almost see beauty of Yellowstone right before us. Yet what Smith left unsaid but captured repeatedly by early nineteenth-century explorers was not a sense of wonder but one of fear brought on when witnessing a landscape that resembled hell. For the first Euro-Americans, Yellowstone was not "majestic, dazzling, magnificent." Although Yellowstone

[1] Robert B. Smith and Lee J. Seigel, *Windows into the Earth: The Geologic Story of Yellowstone and Grand Teton National Parks* (Oxford: Oxford University Press, 2000), ix.

may have first been compared to hell, people have overwhelmingly used positive language to describe the park and has been a highlight for many who have made the trip to northwestern Wyoming.

Yellowstone National Park is indeed a marvelous place evoking descriptions of wonder and awe as well as descriptions of fear and bewilderment. From the time John Colter first walked through the greater Yellowstone region in 1807 through the establishment of Yellowstone as the first national park in 1872, Euro-Americans have used religious imagery to describe what they saw, smelt, and experienced. The Grand Canyon of the Yellowstone inspired descriptions of Eden and heaven while the Norris Geyser Basin elicited language of hellscape imagery. Biblical language deeply influenced how explorers described their experiences. They routinely applied descriptions of Eden, heaven, and hell to the landscape. By the Hayden Expedition of 1871, a change in descriptive language took place. Explorers and tourists alike shifted from purely religious language to a mixed language of the sacred and the secular.

This thesis examines how people experienced, spoke, and wrote about Yellowstone's various geographic and geologic features. The timeframe I investigate begins with the Lewis and Clark Expedition of 1804-1806 and ends with the founding of the National Park System in 1916. During this one-hundred-and-ten-year period, the language people used to describe Yellowstone's features changed as scientific explorations took place throughout the West and Yellowstone. Early explorers in Yellowstone used religiously-symbolic and metaphorical language to describe the geyser regions as Hell while speaking of the rivers and valleys in Edenic terms. Some parts of Yellowstone resembled hell while other regions resembled heaven. These explorers used different language to describe what their experience was like. They spoke of how they experienced the

various aspects of the land. The best way they did that was through employing Biblical language. By the time the National Park Service was established, the language shifted towards including scientific descriptions and explanations for the wonders of the region. Nevertheless, people were still left in awe of the wonders they witnessed and spoke of their time in Yellowstone in mostly positive terms. Many remarked that the scenes, sounds, and smells remained in their memories for the rest of their lives. My research investigates the intersection of the scientific discovery and religious experience in Yellowstone and how science influenced the language that people used to describe Yellowstone National Park. Yellowstone was and remains a natural laboratory for how people employ language to describe the region's many natural wonders. Additionally, from the 1860s onwards, there was figurative language present in people's descriptions – not just Biblical and scientific but also mechanical and technological.

My research is significant for two reasons: first, Euro-Americans used figurative language and place names to erase Indigenous toponyms, which thereby helped to reinforce the myth of Yellowstone as an empty wilderness landscape with no prior Native occupation or use. Yet the very instability of place names and terms suggest the potential for recovering and re-establishing Native names and Native presence in the park. Second, scientific terms and names used for Yellowstone volcanology, although seemingly rational, objective, and neutral, in fact partakes of Biblically-inspired apocalyptic imagery and language – dark clouds covering large swaths of earth, potential loss of life of people, plants, and animals, etc.

For example, *National Geographic* recently published an article on the past and future of the Yellowstone caldera. "Thousands of years ago," the article notes, "the last blast from the Yellowstone supervolcano shot a fatal plume of hot ash, molten rock, and lethal gases thousands

of meters into the air. A third of the continent was likely plunged into complete darkness."[2] Past explosions serve as a basis for what future eruptions might look like. "If another larger caldera-forming eruption were to occur at Yellowstone, its effects would be worldwide," the United States Geological Survey predicted. "Thick ash would bury vast areas of the United States, and injection of huge volumes of volcanic gases into the atmosphere could drastically affect global climate."[3] Fortunately no such eruption is predicted any time soon, but the threat of destruction and devastation is real. Although neither of these publications are religious by any mean, the language used here would is like descriptions that early visitors to Yellowstone used. They understood the imagery perhaps even better than we do today. Although my research ends with the establishment of the National Park Service in Yellowstone, the relationship of scientific and religious language continues as strong as ever through the present day.

This thesis is situated in a long historiography that includes Yellowstone historians Aubrey Haines and Lee Whittlesley. Several other prominent historians have examined Yellowstone through numerous lenses, including Paul Schullery, Judith Meyer, George Black, Roderick Nash, and others. Although these historians have analyzed and examined Yellowstone from numerous angles, none of them have used the same approach that I do here by focusing on the written account and the language that was used to describe Yellowstone's varied geographies.

Paul Schullery's *Searching for Yellowstone* examines Yellowstone's ecological history and present. Schullery argues that "there is a remarkable contrast in the search for Yellowstone."[4]

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[2] Alyssa Samson, "When a Sleeping Giant Awakes," nationalgeographic.org, National Geographic, October 19, 2023 https://education.nationalgeographic.org/resource/when-sleeping-giant-awakes/. Accessed February 27, 2024.
[3] Michael Diggles, "Steam Explosions, Earthquakes, and Volcanic Eruptions – What's in Yellowstone's Future?" usgs.gov, United States Geological Survey, May 10, 2005, https://pubs.usgs.gov/fs/2005/3024/
[4] Paul Schullery, *Searching for Yellowstone: Ecology and Wonder in the Last Wilderness* (Helena: Montana Historical Society Press, 2004), 2.

Schullery focuses on various topics such as elk slaughter, the history of aspen on the park's northern range, and the issues surrounding wolves and their reintroduction in Yellowstone. Schullery also examines how Yellowstone manages the diverse flora and fauna of the park, including bison, elk, and wildfires. Schullery's fourth edition of *Searching for Yellowstone,* published in 2004, was aided by the National Academy of Science's 2002 publication of its research and review of Yellowstone's northern range, when wolves had been reintroduced in 1995. Schullery, by his own admission, touches on the factual aspect of Yellowstone's ecology and therefore gives less attention to the wonder and awe of Yellowstone's natural features. Because of this, he does not concentrate on the spiritual, emotional, or aesthetic elements of Yellowstone.[5] He argues that since Yellowstone was established in 1872, "we have never stopped establishing it,"[6] either as first-time visitors or scientists in their quests to understand the hidden secrets of the park. My research adds to Schullery's work by examining the ways in which early explorers and tourists used language to describe the park and their experiences in it as they searched and discovered.

Former Yellowstone Park historians Aubrey Haines and Lee Whittlesley have published extensively on Yellowstone National Park. Haines's *The Yellowstone Story: A History of our First National Park* provides an excellent two-part overview of Yellowstone's history from the Lewis and Clark Expedition through his time in the park in the 1970s. Volume one examines Yellowstone's prehistory through the 1880s, while volume two began in the 1880s with the Army in Yellowstone and brought the narrative through the end of the twentieth century. Another important work that Haines published was *Yellowstone National Park: It's Exploration and Establishment*, which chronicles the various events from John Colter through the Hayden

[5] Schullery, *Searching,* xviii.
[6] Schullery, *Searching,* 1.

Expedition. Haines explains the events that were crucial in the establishment of Yellowstone as a national park. Haines primarily focuses on the actions of these men and how those actions helped bring back information that led to the creation of Yellowstone National Park. My work adds to Haines by analyzing the written accounts of the fur trappers, explorers, missionaries, and scientists, and how their language changed over time. The language of these men, especially the fur trappers and missionaries from the 1820s – 1850s, primarily focused on the hellscape language that I examine early in my thesis.

Following in Haines's footsteps as park historian, Lee Whittlesley published several books on the park's history. These assess traveler experiences in Yellowstone with an emphasis on the stagecoach era in the park. Some examples include *Storytelling in Yellowstone: Horse and Buggy Tour Guides,* which scans stories told by tour guides in Yellowstone before the creation of the National Park Service, and *"Off with the Crack of a Whip!": Stagecoaching Through Yellowstone, and the Origins of Tourism in the Interior of the American West, Vol. 1, 1878-1891*, which inspects the evolution of stagecoach tourism in in the park and the experiences that tourists had while on the stagecoach tours. My work complements Whittlesley's *Yellowstone Placenames, Death in Yellowstone* and *Gateway to Yellowstone* in analyzing the language that both tour guides and tourists used during the stagecoach era in Yellowstone.

In *The Spirit of Yellowstone*, Judith Meyer, presents a positive portrayal of Yellowstone's landmarks and stunning scenery. She wrote "Yellowstone is a 'place' with what the Romans called a *genus loci,* or spirit of place: an infectious, irresistible force that stirs up something in so many of us."[7] Meyer is right when she writes that Yellowstone stirs something in us. Yellowstone is a

[7] Judith Meyer, *The Spirit of Yellowstone,* (Lanham, MD: Robert Rinehart Publisher, 2003)1.

uniquely complex place, continually evoking moments of awe and wonder as well as fear and uncertainty, an aspect that Meyer does not touch on in *The Spirit of Yellowstone*. She described how many people extolled the beauty of the park through the written word. My thesis adds to what Meyer's work by investigating the darkness found in many early accounts – accounts of Yellowstone not as a pristine, beautiful, or sublime work, but a place that represented hell for many people. While there is a uniqueness and wonder to Yellowstone, as Meyer notes, it is more than that. The instability of language around Yellowstone is found in early accounts that often-made reference to both hell and heaven in the same journey through Yellowstone. Even when Meyer presents written records of Yellowstone's thermal areas, she labels them as "startling, weird, spectacular,"[8] not in the hellish language that was prevalent from the 1820s – 1850s. While we have moved away from that language today, we should not ignore the early accounts of how fearfully explorers and trappers experienced, spoke, and wrote of Yellowstone.

Mark Spence's *Dispossessing the Wilderness* and Lee Whittlesley's *Death in Yellowstone* examine darker aspects of Yellowstone's history. In *Dispossessing the Wilderness,* Mark Spence analyzes the United States' deeper history of wilderness protection and the corresponding removal and exclusion of Indigenous people from those places. Many Americans of the late nineteenth century came to view the west "as an uninhabited Eden," an Eden that was devoid of Indigenous peoples.[9] Generations of Americans, from wilderness managers to tourists, have bought into the myth of the uninhabited wilderness while completely ignoring the millennia of history of Indigenous people who have lived, hunted, and cultivated the seemingly pristine landscapes.

[8] Meyer, *Spirit of Yellowstone*, 13.
[9] Mark David Spence, *Dispossessing the Wilderness: Indian Removal and the Making of the National Parks* (Oxford: Oxford University Press, 1999), 4.

Spence argues that the rise of the untouched wilderness or the wilderness ideal is tied to the practice of Indigenous removal. Park officials and historians argued for years that Indigenous people avoided areas such as Yellowstone as regions that were uninhabitable. Spence proves that claim to be wrong, as do Lawrence Leondorf in *Restoring a Presence* and Douglas MacDonald in *Before Yellowstone*. Both provide archaeological evidence that Native Americans inhabited Yellowstone long before Euro-Americans first explored the region.

Lee Whittlesey's *Death in Yellowstone* is concerned with a different aspect of Yellowstone's darker history. Whittlesey work, which is currently in its second publication, focused on various death accounts in Yellowstone from the park's creation through the twenty-first century. Each chapter examines different ways people have died while exploring Yellowstone – death by geysers, bears, poisonous gases, hypothermia, drowning, and a myriad of other ways. Despite the warnings of the Park Service, tourists have repeatedly ignored the warning signs and paid the ultimate price with their lives.

Other works on Yellowstone include George Black's *Empire of Shadows*, which examines Yellowstone in the larger narrative of the violence of the Indian Wars and the "civilizing of the frontier;" Bruce T. Gourley's *Historic Yellowstone National Park: The Stories Behind the World's First National Park* that provides a glimpse into what life was like for people who explored and lived in Montana and Wyoming during the middle and end of the nineteenth century; Susan Neider's *Classic Yellowstone: The Best of the World's First National Park* that describes early explorers' accounts and how they struggled to describe Yellowstone features, Neider also explores early landscape painters in Yellowstone. These works are just a few that have been published on Yellowstone in recent years. John F. Sears's *Sacred Places: American Tourist Attractions in the*

Nineteenth century explores "the production of tourist sites" that date back to the creation of Yellowstone National Park.[10] *Sacred Spaces* was one of the first works to study tourism in the second half of the nineteenth century and how Americans constructed sacred places during that time frame. Sears explored the "many interactions between nature and culture in America" and the crucial role that nature had on the formation of an American national identity in the nineteenth century.[11]

My work adds to the historiography of Yellowstone by examining how people experienced Yellowstone over a roughly one-hundred-year period. During that time, the language of how people spoke and wrote about Yellowstone changed. One Yellowstone historian argued, "The creation of the park in 1872 launched the American public, indeed the world public, on a search for Yellowstone in the grandest sense: not just to learn what was there and enjoy it, but to make sense of it in the context of their times."[12] That sentiment is no less true of the people who went to Yellowstone before 1872. By the 1850s, unconfirmed rumors swirled around Yellowstone: the language being used in published accounts or by word of mouth stirred up hellish images in many people's minds. Many explorers wanted to go there, to place it on a map, to contextualize it, and to understand these reports of a most mystical and wonderful place that they kept hearing about.

An aspect of Yellowstone that I explore, primarily in chapter 4, is how people experienced Yellowstone in winter. Except for John Colter's trek through Yellowstone in the winter of 1807, few if any people explored and experienced Yellowstone during winter prior to Yellowstone being

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[10] John F. Sears, *Sacred Places: American Tourist Attractions in the Nineteenth Century* (Amherst, Mass.: University of Massachusetts Press, 1989), ix.
[11] Sears, *Sacred Places,* xv.
[12] Paul Schullery, *Searching for Yellowstone: Ecology and Wonder in the Last Wilderness* (Helena, MT: Montana Historical Society Press, 2004), 97-98.

established as a national park. Questions that I examine include "How did people experience Yellowstone in winter?" "How were winter experiences similar and different from experiences in summer?" "What kind of language did people use to describe the geyser region of Yellowstone in winter, and how was that language different than that used in the summer months?" The Northern Pacific Railroad allowed people to experience Yellowstone in winter in a way that was not possible previously.

Language is crucial for conveying ideas and information. This is especially true when describing an event that we have witnessed or place that we have been. In the case of Yellowstone, it is interesting to study how people have historically struggled to describe Yellowstone's features through the language they used. Explorers, missionaries, scientists, and tourists alike overlaid their own cultural knowledge onto Yellowstone's varied landscape, constructing meaning around what they experienced.

The change in language also represents the shift in how people viewed and thought about nature. For most of the seventeenth and eighteenth centuries, wilderness was a place that Euro-Americans feared. Wilderness carried the connotation of being "deserted, savage, desolate, barren – in short, a waste." These words had negative connotations for the landscape. Many of the strongest words and parallels applied to the landscape came from the King James Bible. Wilderness was a place where a person could find oneself on the edge of civilization, lost in moral confusion and despair. The Bible presented wilderness as a place of struggle and overcoming temptations, such as what Moses experienced in the Old Testament and Jesus in the New. Milton's *Paradise Lost*, a significant literary work in the minds of many Puritans, depicted Eden as a place surrounded by "a steep wilderness." Wilderness was a place where people went against their will in fear and

trembling. Wilderness represented the antithesis of all that was good; it was darkness, representing the evil that was on the outside of the good that was in the garden.[13]

By the end of the nineteenth century Americans had changed their attitude and thoughts towards nature. They now valued the previously worthless wilderness as beautiful, reflecting the divine nature of God's handiwork. Far from being a dark and overwhelming place, wilderness was instead becoming a positive place. John Muir described the Sierra Nevada as heaven. Discovered in the 1850s, Yosemite represented the Garden of Eden. Various regions of the west that had once been deemed useless were now lauded as places of inexpressible beauty that Americans had to witness for themselves.[14] Yellowstone especially exemplified this. Early explorers described Yellowstone's geysers with hellscape imagery. When the park was established, it was done so for its outstanding beauty and matchless wonders and for the yet undiscovered wonders it possessed.

Susan Schdrepfer argues that mountains represent America's last – and first – wilderness. Last in the sense that the recently arrived Euro-American settlers slipped around them as they moved westward in search of new places to settle. In so doing, they passed by islands of unknown places that they would one day conquer. These mountains were also first in the sense that mountains were the first places that Americans designated as wilderness. These settlers constructed meaning around the mountains and valleys over which they passed. They laid their cultural assumptions on the physical features of the landscapes across which they travelled and in which they settled. North American mountains became symbols of civilization for a critical reason: the

[13] William Cronon, "The Trouble with Wilderness: Or, Getting Back to the Wrong Nature," *Environmental History,* Vol. 1, No. 1. (Jan. 1996), 8-9.
[14] Cronon, "The Trouble with Wilderness," 9.

mountain ranges run north-south, directly intersecting America's east-to-west migration.[15] This is also true concerning Yellowstone. Isolated, individual accounts of exploring the park existed for decades before the United States government finally commissioned Ferdinand Hayden to explore and chart the wonders of Yellowstone.

Nineteenth-century Americans also imposed the cultural beliefs and assumptions on Yellowstone's varied landscape. In the early decades of the nineteenth century, fur trappers were the first Euro-Americans to explore Yellowstone's geothermal features. These trappers, some of whom were illiterate, were raised in a deeply religious culture. The trappers' cultural assumptions derived from the Bible and later applied to Yellowstone's features. Yellowstone, however, is more than just mountain peaks and valleys. It contains waterfalls, valleys, geysers, rivers, and various other wonderful features. With an average altitude of over seven thousand feet, Yellowstone is one of the highest wilderness places in the United States. In the mountains of the American West, explorers and settlers skirted arounds its edges, only stopping to explore Yellowstone after having settled other places further west.

One of these cultural beliefs was the idea of the sublime. By the nineteenth century, sublime landscapes represented places where one had the rare opportunity glimpse the face of the Creator. Many Americans believed that God could reveal Himself anywhere. He could most often be found in the vast and powerful landscapes that overwhelmed a person to the point of feeling small and insignificant. God could therefore be found in nature – in a waterfall, a thunderstorm, on top of a mountain, or in the chasm of a mountain. People knew when they had entered a sublime landscape

[15] Susan Schrepfer, *Nature's Altars: Mountains, Gender, and American Environmentalism* (Lawrence, KS: University Press of Kansas 2005), 1-2.

for it evoked a strong sense of emotion ranging from fear and awe.[16] Yellowstone elicited these strong emotions and feelings, both positive and negative.

By the end of the nineteenth century, wilderness provided an escape from civilization. Industrial cities were becoming crowded and polluted, and wilderness became a haven where people could escape to. The idea of wilderness as an untouched, pristine place was the product of eastern elites who knew nothing of the work that Indigenous people or farmers had undertaken on the land.

During the nineteenth and twentieth centuries, men sought places that they viewed as both threatening and feminine to cultivate and conquer the "primordial impulses" they hoped to refine, foil, or sublimate. The language they employed to describe the landscape was very gendered – men conquered a "virgin" landscape. These men sought places where they could exercise control over the landscape. Yet in experience and in attempting to control nature and wild places, people experienced a depth and breadth of human emotions – anger, fear, hate, love. They sought hardship and risked death, and in so doing "experienced sublime moments of spiritual transcendence over material bonds."[17] Warren Angus Ferris captured this sentiment in 1833 when he described his fellow fur trappers. He wrote, "Engage for money! No, not they; health, and the strong desire of seeing strange lands, of beholding nature in the savage grandeur of her primeval state, – these are the only arguments that could have persuaded such independent and high-minded young fellows to adventure with the American Fur Company in a trip to the mountain wilds of the great west. But they are active, vigorous, resolute, daring, and such are the kind of men the service requires."[18]

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[16] Cronon, "The Trouble with Wilderness," 11-12.
[17] Schrepfer, *Nature's Altars,* 4.
[18] Warren Angus Ferris, *Life in the Rocky Mountains: A Diary of Wanderings on the Sources of the Rivers Missouri, Columbia, and Colorado, 1830-1835,* (Pantianos Classics: first published 1843) 6.

Men like Ferris, who visited Yellowstone National Park, applied their own beliefs over Yellowstone's varied landscape.

This thesis demonstrates the shift that took place in the language that trappers, explorers, scientists, and tourists applied to Yellowstone. What began in the early years of the nineteenth century as religious language shifted towards scientific language by the beginning of the twentieth century. Several historians have written about Yellowstone, but few, if any, have written about how culture influenced the language explorers used to describe Yellowstone's many features. Historians who have written about Yellowstone before 1872, when it was established as a national park, focused primarily on the exploration of Yellowstone within the larger context of American Western exploration. During this time, Yellowstone remained relegated to the periphery of exploration, empire, and settler colonialism. Yellowstone's unique geographic features elicited unique responses by the trappers and explorers who saw them, mostly of fear and of hell. Many even today are in awe of Yellowstone geothermal features, but the comparisons to hell or the devil seldom if ever get brought up, and if those comparisons arise, only in jest.

Chapter one analyzes the years from 1804 through 1840 when the language applied to Yellowstone was primarily religious, hellscape imagery. Chapter two investigates the exploration and gold trapping era from 1840 to 1869 in the Rocky Mountain West and the men who explored Yellowstone. The language during this timeframe is primarily religious; there is, however, a shift that takes place with the Raynolds Expedition of 1859-60. The third chapter reviews the three scientific explorations in Yellowstone from 1869-1871. Finally, the fourth chapter considers Yellowstone from its establishment in 1872 until the founding of the National Park Service in 1916.

At first, the shift in language is subtle especially during the early fur trapping years before 1840. During western exploration from the 1840s onward, scientific language began to replace religious language. Although scientific language became more prominent, traces of religious language remained in the decades following Hayden's 1871 Expedition. Even after Hayden's expedition, backed by the U.S. Government and the Northern Pacific Railroad, people described Yellowstone's varied features in both scientific and religious language. As the decades passed, Yellowstone has become a place that embodies different meaning for different people. It has been this way since the Indigenous peoples first came across Yellowstone several thousands of years ago. An ordained minister will view Yellowstone differently, perhaps seeing hellish features in Yellowstone's thermal areas or Eden in the Lamar Valley, whereas a trained scientist will marvel at the bacteria that add to the smell of sulfur in the Norris Geyser Basin.

Ideas about nature have varied over history, and that is particularly true about Yellowstone National Park. Ideas and the corresponding language that described early visitors' experiences in Yellowstone were complicated and changing.[19] Language of religion gave way to language of science, yet Yellowstone continues to elicit deep feelings of awe and wonder from the millions of tourists who visit the park each year. There is a history and complexity to the meanings applied to Yellowstone. The meanings used by explorers who consciously employed different uses and have come to express radically different changes over decades of exploration within Yellowstone.[20]

While people are experiencing Yellowstone in personal ways and defining it for themselves, a growing group of people are realizing that Yellowstone represents something much more dynamic in culture. We are increasing in our understanding of the park and in so doing

[19] Raymond Williams, *Ideas of Nature* (London: Verso, 1980), 1.
[20] Williams, *Ideas of Nature,* 1-2.

embarking on a great journey of discovery. Understanding how people have experienced Yellowstone in the past and the language they employed can and will help us understand and anticipate how people will experience the park in future generations.[21]

People need nature, wilderness, wild places to explore and visit. Wilderness places like Yellowstone can be positive for our psyche. Wallace Stegner argued that "We need wilderness preserved – as much of it as is still left, and as many kinds – because it was the challenge against which our character as a people was formed."[22] Wilderness has positive effects, no matter our age or how often we visit wilderness areas or public places like national parks. Whether we've been once in our lives or we go yearly, being out in nature creates positive memories in our minds. This is seen in the accounts of those early explorers who visited Yellowstone. Joe Meek recounted his experiences to his biographer over three decades after he went there, but his memories were still fresh in his mind as if they had just happened. Jim Bridger returned to Yellowstone many times over the course of three-plus decades, describing his experiences to whomever would dare to listen. Osborne Russell went so far as to exclaim that upon viewing the Lamar Valley he wished he could spend the rest of his days in that magical country. These ideas of nature and wilderness sustained the fur trappers the same way they sustained Stegner, the same way we are sustained by our experiences and memories in Yellowstone.

Nineteenth-century America was strongly religious. Many explorers who travelled through the American West used religious language to describe various scenes and landscapes of the West, as did many boosters of the West. These people used imagery of heavenly places repetitively to

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[21] Paul Schullery, *Searching for Yellowstone: Ecology and Wonder in the Last Wilderness* (Helena, MT: Montana Historical Society Press, 2004), 4-5.
[22] Wallace Stegner, *Wilderness Letter to David E. Pesonen* (Outdoor Recreation Resources Review Commission: 1960), 1.

describe the land and to increase westward adventure and settlement. This deeply religious sentiment was born out of two centuries of Puritan beliefs about religion and wilderness. From John Winthrop to Anne Bradstreet, from the Mathers to Jonathan Edwards, early Puritans all wrote and taught extensively on nature and man's relationship to nature and God.[23] From the time of John Calvin in the middle of the sixteenth century, Protestant "theologians developed a strong nostalgia for the innocence and natural harmony of Eden" that found its way to the new colonies in the seventeenth century and lingered through the first part of the twentieth century.

Puritan theology and values were evident in early nineteenth-century art. The painter Thomas Cole was fascinated with Eden for most of his life, a fascination that he depicted in much of his art. His paintings *The Oxbow, The Garden of Eden,* and *Expulsion from the Garden* all contained Edenic images. These paintings expressed New England Calvinist fascination with Eden and the yearning to return to the lost garden. This desire for Eden helped kindle the rise of a landscape ideal in the nineteenth century that inspired artists, landscape architects, and preservationists.[24] Yellowstone was, and remains, a unique landscape. It represents one of the few places where, in the matter of a few steps, a person can go from images and language of hellscape to images and language of heaven. And in many ways, especially for the nineteenth century person, it did not fit the Puritan landscape ideal.

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[23] For a broader discussion on religion in seventeenth- and eighteenth-century America and Puritanism, see Mark Stoll's *Inherit the Holy Mountain: Religion and the rise of American Environmentalism* and *Protestantism, Capitalism, and Nature in America;* Carolyn Merchant's *Reinventing Eden: The Fate pf Nature in Western Culture* and *Major Environmental Problems in American History*; Jill Lepore's *The Name of War*; Catherine Albanese's *Nature Religion in America: From the Algonkian Indians to the New Age;* David D. Hall's *Worlds of Wonder, Days of Judgement: Popular Religious Beliefs in Early New England* are among the historians who have also written about religion and its impact in early America.

[24] Mark Stoll, *Inherit the Holy Mountain: Religion and the Rise of American Environmentalism,* (Oxford: Oxford University Press, 2015) 34.

Produced in 1836, Cole's *Oxbow* best exemplifies Puritan thoughts and beliefs about nature. Cole published his famous "Essay on American Scenery" in conjunction with his painting. Cole's essay celebrated American scenery, upholding it as equal to the best that Europe had to offer. American scenery exemplified the aesthetic values of the day: the sublime, the beautiful, and the picturesque, values that he painted into *The Oxbow.* English critics had long defined sublime "as a wild scene evoking awe and terror." Cole's religious and moral beliefs reflected Calvinist and Puritan ideals that were still strongly embedded in New England in the mid 1830s.[25] Americans applied the sublime, among many other descriptions, to Yellowstone often during the nineteenth and twentieth centuries.

Benjamin Franklin, one of America's most well-known secularists, paid tribute to early Puritan leaders for many of his beliefs. Franklin serves as an early example of a person who can and does reject parental creeds and beliefs but found himself challenged to change his 'habits of mind' that people were taught from a young age.[26] Many early explorers to Yellowstone were born in Puritan New England. Once they got out West, they left their Puritan upbringings. When beholding Yellowstone's wilderness, they drew upon the Puritan language they were raised in. Joe Meek was reminded of his childhood Methodist preacher when he saw Yellowstone's geysers for the first time.

No work of art or literature had more impact on Protestant views of nature that did John Milton's *Paradise Lost.* Originally published in 1667, *Paradise Lost* had a long reign in popular culture from the seventeenth century well into the twentieth. It encapsulated Reformed Puritan

[25] Stoll, *Inherit the Holy Mountain,* 12-13.
[26] Mark Stoll, *Protestantism, Capitalism, and Nature in America* (Albuquerque, New Mexico: University of New Mexico Press, 1997) 85.

beliefs about Eden, which were oft repeated during the poem's heyday in the eighteenth and nineteenth centuries.[27] By the middle of the nineteenth century, *Paradise Lost* was one of the most well-known and well-loved Puritan works. Thus, when Puritan descendants first viewed western landscapes such as the Yosemite Valley, they naturally gravitated towards comparing it to Milton's description of Eden. This comparison has remained through the twenty-first century. Yellowstone, in comparison, is different. The comparisons of Yellowstone's geyser regions to hell do not linger the same way in which Yosemite Valley was compared to Eden.

What began in the early nineteenth century with religious language ended by the early twentieth century with scientific language. Terms such as 'hell,' 'fire,' 'Eden,' 'sublime,' 'burning sulphur,' and other such language gave way to scientific terms and descriptions of the physical landscape. Former Yellowstone historian Aubrey Haines wrote that the early reports concerning Yellowstone enticed further exploration, eventually leading to the three scientific explorations of 1869, 1870, and 1871. From this point, scientific descriptions and place names increased. By the mid-1910s, very few religiously descriptive place names remained in the park. The few that were left were mainly from the fur trapping era before 1840 and the miners' descriptions of the 1860s. Aubrey Haines tracked over thirty different variations of place names that contained the word "Devil" in the name. Most of these arose during the fur trapping and gold mining eras between the 1830s and the late 1860s.[28] After Hayden's expedition of 1871, these placenames began to be replaced by early tourists, the army, and the National Park Service.

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[27] Mark Stoll, "Milton in Yosemite: *Paradise Lost* and the National Park Idea," *Environmental History* 13 (April 2008): 244.

[28] For more on the history of place names in Yellowstone, see Aubrey Haines's *Yellowstone Place Names: Mirrors of History,* and Lee Whittlesley's *Yellowstone Place Names.*

Early visitors of Yellowstone often struggled to describe the landscapes they saw. Joel Daehnke argues that the park often strained the conventions of descriptive language that the nineteenth-century explorer had. Yellowstone and other regions of the West "horrified most observers because … their education and experience had given them no words or images to describe what they saw."[29] Yet even compared to the many unique landscapes of the West, Yellowstone stands separately from the rest. In the eyes of a nineteenth-century observer, Yellowstone was a horrifying place. This explains why explorers such as Meek, Bridger, Russell, and many others often applied negative biblical imagery to the region. Like Benjamin Franklin, these explorers drew from language of their youths with which they were most familiar and to describe Yellowstone's various features.

Paul Schullery argued that "we have never stopped establishing Yellowstone. Whether as first-time visitors or as world famous biologists we continue to discover and explore it, and we also continue to create it."[30] This progression of continued establishment of Yellowstone has its roots dating back to Lewis and Clark. Yellowstone, when it was founded one hundred and fifty years ago, was manifested as much on myth as it was fact. The myth and spirit of Yellowstone had as much to do with establishing Yellowstone as did the scientific exploration of the park.

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[29] Joel Daehnke, *In the Work of Their Hands is Their Prayer: Cultural Narrative and Redemption on the American Frontiers, 1830-1930* (Athens, Ohio: Ohio University Press, 2003), 67.
[30] Schullery, *Searching for Yellowstone,* 1-2.

CHAPTER ONE

A LAND OF FIRE, SMOKE, AND BRIMSTONE: YELLOWSTONE HELLSCAPE IMAGERY IN THE EARLY NINETEENTH CENTURY

Warren Angus Ferris was entranced at the camp fire. Before him was a group of more than twenty men, chattering amongst themselves. They were unable to contain their excitement, often speaking over each other as they told of this strange place. The group had been fur trapping when they happened upon a place full of "astonishing" sites. Steam and water shot straight into the air, sometimes over sixty feet in height! Another swore he smelled the pungent odor of sulfur. No one could stop talking of what he had seen, each offering slight variations – and exaggerations, it seemed – of the same story. But in one thing they were in total agreement: the place they had been to, seen, smelled, experienced was very real.[31]

Religion was a central tenet of American culture during the nineteenth century. Protestants, Puritans Baptists, Methodists, and later, Mormons, were just some of the Christian denominations. As the nation moved westward with many migrants looking for new opportunities, people took with them their religious beliefs that they had learned from childhood and often their theology onto the landscape as they moved west. Reformed Protestants, mainly from New England, had a significant influence on the way in which American religious thought used language to describe the varied landscapes of the American West. Many of the explorers mentioned in this chapter were from Puritan New England, and even those who were not were raised in Christian households.

[31] Warren Angus Ferris, *Life in the Rocky Mountains: A Diary of Wanderings on the Source of the Rivers Missouri, Columbia, and Colorado, 1830-1835* (Published by Pantianos Classis, first publishing 1843), 143.

Although some explorers left organized religion by the time they reached adulthood, the way of thinking and speaking in which they were raised came west with them and manifested in how they described Yellowstone's features, whether the hellscape imagery applied to Norris Geyser Basin or the heavenly Grand Canyon or the Paradise Valley on the park's north side. Many Reformed Protestants became enamored with the Yosemite Valley and often compared it to Eden. Similar Biblical language and allusions occured in the language used to describe Yellowstone for most of the nineteenth century.[32] The decades between 1800 and 1840 that this chapter covers informed how the explorers and fur trappers saw Yellowstone's landscape in religious terms.

The name "Yellowstone" itself is an English word that comes from the pen of explorer David Thompson in 1798. The name is a translation of the Minnataree expression *Mi tse a-da-zi,* which was subsequently translated into French as Roche Jaune. From this French term Thompson translated the name into the English Yellowstone. Thompson's translation may not be the earliest, however. John Evans, a Welsh explorer working for Spaniards, produced a map a year before Thompson that showed a tributary of the Missouri that Evans termed "River Yellow Rock." The map was uncirculated and was thus unknown to Thompson.[33] Neither Thompson nor Evans left any indication that they traveled through the park.

Earliest Written Accounts

The earliest rumors surrounding the geographic features of Yellowstone come from a written source in 1805. The governor of the Louisiana Territory, James Wilkinson wrote a letter to President Jefferson in October 1805 with a map of the Missouri River. He stated that "this Rude

[32] Stoll, "The Trouble with Wilderness," 238.
[33] Aubrey Haines, *Yellowstone Place Names: Mirrors of History* (Niwot, CO: University of Colorado Press, 1996), 2.

Sketch without Scale or Compass is not destitute of Interests, as it exposes the location of several important Objects, and may point to the way to useful enquiry – among other things a little incredible, a Volcano is distinctly described on Yellowstone River.[34]" Wilkinson's assertions of the presence of a volcano in the Yellowstone region would not be the last time writers made that comparison was made. Early reports of Yellowstone such as Wilkinson's would be discarded more often than they were believed, in part because they strained the existing beliefs of the people who heard these reports. Because the landscape was so unlike anything that people had seen, they struggled mightily to describe what they encountered.

When Wilkinson composed his letter to Jefferson, Lewis and Clark were passing just north of Yellowstone and unaware of the wonders it contained. At least one Lewis and Clark scholar believes that the explorers came across information regarding Yellowstone after their journey and added it to their reports as a postscript in 1809, a few years after having returned to St. Louis. Writing in St. Louis, William Clark, explained that "At the head of this river the natives give an account that there is frequently heard a loud noise, like Thunder, which makes the earth Tremble, they State that they seldom go there because their children Cannot sleep – and Conceive it possessed of spirits, who were averse that Men should be near them."[35] Clark's revealing statement represented a false belief about the Indigenous people's attitudes about Yellowstone's geysers. Clark wrote that the local tribes did not associate with the park because they were afraid of the features it contained. Many scholars picked up this misconception and it persisted long into the

[34] Aubrey Haines, *Yellowstone National Park: Its Exploration and Establishment,* (U.S. Department of the Interior, National Park Service, Washington 1974), 3-4.
[35] Haines, *Yellowstone National Park,* 4.

twentieth century. While the expedition itself did not explore Yellowstone, a member of the group was the first Euro-American to do so.

In 1807John Colter was the first American to travel through the Greater Yellowstone region. Colter himself did not use overtly religious language to describe the landscape he travelled through. In fact, little if anything is known of the language that he did use. By the 1830s, his journey had become known as "Colter's Hell." This descriptive use of hell reflected language during the 1830s and was retroactively applied to Colter's experiences in the region some thirty years later. Fir trade historian Washington Irving in 1837 coined the term "Colter's Hell" and took on a life of its own ever after.[36]

Hiram Martin Chittenden was the first historian to describe Colter's trek through Wyoming and Yellowstone. After Chittenden published his history of Colter's solitary trek, the route itself came under intense scrutiny – where did Colter go? What did he see? Did he even visit Yellowstone? Historians have attempted to answer these questions since Chittenden's published account in 1895.[37] While the route itself is up for debate, Colter's experiences were not. He traveled on foot, alone, over hundreds of miles of Rocky Mountain terrain during the winter. It was very cold, and so he would have had layers of winter clothing with him to stay warm during the frigid nights.

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[36] For the legend of "Colter's Hell" and how it came to be, see George Black, *Empire of Shadows: The Epic Story of Yellowstone* (New York: St. Martin's Griffin, 2012). On page 35 Black discusses Irving's creation of "Colter's Hell," and gives a brief description of how that phrase persisted into the 1930s and beyond. Black ascribes "Colter's Hell" to the realm of creation myth. Colter biographers Ronald Anglin and Larry Morris in their work *Gloomy Terrors and Hidden Fires: The Mystery of John Colter and Yellowstone* also discuss the origin of "Colter's Hell" on pages 96-98. I touch on this later in the paper, and it shows up in later explorations of Yellowstone.

[37] For more on the historians who have attempted to decipher Colter's Route, see Ronald Anglin and Larry Morris's *Gloomy Terrors and Hidden Fires* Chapter 8, pgs. 75-98, which provides more information about the difficulties of ascertaining Colter's route.

Even if Colter never traveled through Yellowstone, his experience of the general region still was unique. He is credited with describing features that he saw, smelt, perhaps even felt, most likely outside of present-day Cody, Wyoming. Colter smelt sulfur, he also witnessed a certain "Boiling Spring and 'Hot Spring Brimstone.'"[38] The aspect of Colter's trek that is unique to him is that his journey took place in winter. He experienced the bone-chilling cold winds of the Rocky Mountains, snow drifts several feet deep, and long, cold, dark nights, an experience that would not be had for many decades yet.

The myth and language of Colter's Hell was the beginning of hellscape imagery to describe Yellowstone's natural features. Explorers were continually challenged to put into words the wonderful, mysterious, and sometimes fearful scenes that they witnessed. The spectacular scenes often left many at a loss for words as they struggled to comprehend what they saw. How to describe a landscape for with historical or cultural reference point? Joel Daehnke argues, "However they chose to do so, however poorly or well they managed, the Yellowstone landscape touched upon deep cultural assumptions they held about nature and natural processes which seemed to frustrate the fabric of language itself."[39] Explorers who followed Colter's footsteps continued to struggle to put Yellowstone into words.

There was little exploration of Yellowstone in the two decades following Colter's trek. Fur trappers handed down only the first few accounts of Yellowstone. Donald McKenzie, a veteran fur trapper, traveled through Yellowstone in 1819. He recalled "Boiling fountains, having different degrees of temperature, were very numerous; one or two were so very hot as to boil meat. In other

[38] Ronald M. Anglin and Larry E. Morris, *Gloomy Terrors and Hidden Fires: The Mystery of John Colter and Yellowstone* (New York: Rowman and Littlefield, 2014), 84.
[39] Daehnke, *In the Work of Their Hands is Their Prayer*,67.

parts, among the rocks, hot and cold springs might alternatively be seen within a hundred yards of each other, differing in their temperature." The description of hot and cold springs being so close together made for an interesting observation. Yellowstone is one of the few places where this type of phenomena exists and where people, both in the nineteenth century and now, have struggled to describe what they have seen and grappled with.

The French-Canadian fur trapper Baptiste Ducharme traveled through Yellowstone five years after McKenzie. While there, he described witnessing water shooting skyward. After leaving Yellowstone, Ducharme expressed an inability to narrate the wonders and sights he had seen.[40] Several explorers used similar language to McKenzie when they described boiling springs hot enough to cook meat. Other explorers echoed Ducharme's sentiment when they left Yellowstone, so overwhelmed with awe they could not accurately describe what they saw. Many used religious language drawn from the Bible. The language of heaven and hell often found its way into many journals. This remained the case for most of the first sixty years of Yellowstone exploration. Although many people today do not use religious language to describe Yellowstone, they are still left wrestling with how to describe their experiences. Pictures can only capture the park to a limited extent.

Rocky Mountain Era

The Rocky Mountain fur trade lasted from roughly 1820 through 1840, and it was in this timeframe that explorers and scientists explored and detailed their experiences in Yellowstone. Of

[40] Bruce T. Gourley, *Historic Yellowstone National Park: The Stories Behind the World's First National Park,* (Guilford, Connecticut: Lyons Press, 2022), 33-34. Gourley's work focuses on the early stories in Yellowstone. He begins by looking at the animals of Yellowstone, followed by a brief chapter on the deeper Yellowstone connections held by Indigenous people before getting to stories of Euro-American explorers. He presents early trappers accounts but doesn't investigate why they used the language that they did. It is an interesting read.

all the descriptive language that I analyze, the language of this timeframe was the most religious in nature. In 1822, William H. Ashley issued a proclamation for men to trap furs in the Rockies and received many replies. Men like Jim Bridger, Joe Meek, Osborne Russell, Daniel T. Potts, and many others joined Ashley. During this time, these men explored Yellowstone. Many of these were illiterate or semi-literate, several were born in New England, a hot bed of religious revivals in the early decades of the nineteenth century. The few early accounts of Yellowstone were poorly circulated so the region was largely unknown outside of the few scattered accounts. The Rocky Mountain fur trade was based on the rendezvous system. Instead of relying on fixed trading forts, the rendezvous established a central meeting place where the trappers would meet at a preselected time and place, trading their pelts for goods and any tools they needed.[41]

It is difficult to pinpoint when fur trappers made their initial forays into Yellowstone, but they were there by 1826 or 1827 when the first verified, published account of Yellowstone appeared in print.[42] Daniel T. Potts joined Ashley's group in 1822 as part of the initial "Ashley's Hundred," as the group became known. While trapping for furs, he made his way through Yellowstone. His letter written on July 8, 1827 to family members was the first published account of Yellowstone's features.[43] Potts's letter describes his adventures trapping for beaver and traversing the wild and varied landscape of the Rockies. During his time in Yellowstone, Potts described witnessing an erupting geyser. He wrote, "There is also a number of places where the pure sulphor is sent forth in abundance. One of our men visited one of those whilst taking his

[41] Aubrey Haines, *The Yellowstone Story: A History of Our First National Park, Vol. 1, revised edition* (Boulder, CO: University of Colorado Press, 1997), 39.
[42] Haines, *Yellowstone Story,* 39.
[43] Anne Hyde, *Daniel Potts Letters, 1824-1827, 1948,* National Park Service, https://www.nps.gov/yell/learn/historyculture/upload/MSC122Potts.pdf accessed November 16th, 2022.

recreation there at an instant the earth began a tremendous trembling and he with difficulty made his escape when an explosion took place resembling that of thunder."[44] Explorers who followed repeated the language that Potts used in various forms. Many mentioned the strong smell of sulfur, while many others also made comparisons of a geyser erupting to the noise and sound of thunder. Since Potts had never experienced a geyser, he sought and used language that he was familiar with.

Jim Bridger is perhaps one of the most well-known explorers of the West. After leaving the fur trade, he began to lead other explorers on western expeditions. Bridger made his first foray into Yellowstone as early as 1826 and continued to visit the park through the 1860s. In his first pass through Yellowstone, Bridger named what is today's Yellowstone Lake as "Sublette Lake." While exploring the lake, he heard "subterranean noises" at several spots, also witnessing "sulphurous flames" escaping from vents in the ground. His horses were skittish, their hooves echoing on the hot ground below. Yellowstone was a mystical place, and Bridger felt like he and his companions escaped a potential scalding.[45] This would not be the last time Bridger had this type of experience in Yellowstone.

Many fur trappers of the 1830s used religious language to describe Yellowstone's unique landscape. Joe Meek and Warren Angus Ferris were the first trappers to use written language to describe the geyser basin as embodying various aspects of hell. Jim Bridger, though illiterate, used religious language to describe landscape features as well. Meek, Ferris, and Bridger repeatedly returned to Yellowstone, drawn by the wonders it held. Each time they came back, they marveled

[44] Potts's letter is reproduced in several places, and the original copy is at the archives in Yellowstone National Park, donated by a family member in 1948. I accessed Potts's letter in Aubrey Haines's *The Yellowstone Story: A History of Our First National Park,* reprinted on pages 41-42.
[45] Jerry Enzler, *Jim Bridger: Trailblazer of the American West,* (Norman: University of Oklahoma Press, 2021), 49.

at what they saw. Despite the apparent hellish features of the geysers, these men were not frightened away. Instead, they felt drawn to return to this hidden wonderland.



Figure 1: Norris Geyser Basin, early morning.

Joe Meek reached for the religious language of his youth to describe his experiences exploring Yellowstone. While trapping for fur, Meek became separated from his group after an altercation with a band of Blackfeet. After running for his life, Meek crested a mountain and took in his first view of the greater Yellowstone region. Meek was overwhelmed by what he saw. Mountains, rivers, valleys – what monumental thoughts must have filled Meek's mind as he

initially took in the scene.[46] Despite his apprehensions of the landscape below, Meek decided to explore further. He entered an area smoking with the vapors as they rose from the boiling springs below. The springs burned with gases and emitted a shrill whistling sound. He later recounted the smoke, geysers, and vapors, "I have been told the sun would be blown out, and the earth burnt up. If this infernal wind keeps up, I shouldn't be surprised if the sun war blown out. If the earth is *not* burning up over thar, then it is the place the old Methodist preacher used to threaten me with. Anyway, it suits me to go and see what it's like." After he descended to the plain, Meek thought to himself, "If it war hell, it war a more agreeable climate than he had been in for some time."[47] Meek was filled with "curious thoughts" concerning hell and the day of judgment and doom that was sure to follow. Once Meek overcame his initial fear of his entrance into hell, he enjoyed exploring the thermal features. It is difficult to know how religious Meek was as an adult, but he could not quite shake the Methodist preaching of his youth – the scenes before him recalled instantly the teaching he had heard as a child. For many Christians, especially Protestants, God's wrath was demonstrated through smoke and darkness, something Yellowstone's geysers provided plenty of. Representations of hell, especially in Milton's *Paradise Lost,* combined elements fire, smoke, and darkness.[48] On this visit to Yellowstone, Meek encountered a few of his fellow fur trappers. The landscape provided much wonder for the whole group, and they all agreed that it was the "back door to that country which divines preach about," agreeing perhaps with Meek's earlier assessment about his childhood preacher.[49]

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[46] Frances Fuller Victor, *The River of the West, vol. 1, ed. Winfred Blevins* (Missoula: Mountain Press Publishing Company, 1983), 73-74.
[47] Victor, *The River of the West,* 75-76.
[48] Mark Stoll, "Milton in Yosemite: *Paradise Lost* and the National Parks Idea," *Environmental History 13* (April 2008): 242.
[49] Victory, *The River of the West,* 79.

Early Oregon historian and Meek biographer Frances Fuller Victor placed the group in the region where John Colter had travelled, noting that Meek, Smith, and the others made the comparison to hell here. There was something about the landscape that brought out the metaphor of hell. Victor wrote that the fur trapper Jedidiah Smith was a religious man, a devout Christian. So, Smith, like Meek, would have remembered his Methodist upbringing and drawn similar conclusions about the landscape he saw.[50]

Meek described a unique experience in Yellowstone, one that has since been repeated countless times by visitors in the park. Yellowstone's landscape is uniquely able to draw out feelings and responses of awe and wonder, fear, and doom. Meek experienced the full breadth of human emotion as he traversed Yellowstone's unique landscape. As will be demonstrated with later fur trappers, members of the same exploring party expressed different responses to the same landscapes. Some conveyed awe, others fear, some indifference and however people have communicated their experiences, they left Yellowstone changed, never having forgot their time in this unique wilderness.

How Bridger and Meek described their experiences was like how others understood and wrote of the sublime. William Cronon argued that one of "the best proofs that one had entered a sublime landscape was the emotion it evoked."[51] Wilderness experience for most writers and explorers of the first half of the nineteenth century was rarely a pleasurable experience. William Wordsworth recounted his trip to the top of the Alps and his crossing of the Simplon Pass. His

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[50] Victor, *The River of the West,* 79-80. Frances Victor, writing her biography of Meek in the 1860s, drew out the comparison to Colter. Victor implies that Colter described the region he wandered through to be "hell," but, as we will see later, the association between Colter's experience and hell was first put into print by fur trade historian Washington Irving in 1837. Colter did not coin the term himself.

[51] William Cronon, "The Trouble with Wilderness: Or, Getting back to the Wrong Nature," *Environmental History,* Vol. 1, No. 1, (Jan. 1996), 10.

experience was profoundly religious, comparable to one of the Old Testament prophets recalling his own mountaintop experience with the divine that left him fearfully in awe. Wordsworth described a supernatural experience that evoked awe and wonder, not joy or pleasure. Wilderness was not a place to linger in.[52]

Henry David Thoreau had an experience similar to that of Wordsworth. Thoreau described his trip to the top of Mount Katahdin in Maine, writing "She seems to say, sternly, why came ye here before your time? This ground is not prepared for you. Is it not enough that I smile in the valleys?[53] In reading Thoreau's description, one gets a sense of the smallness of humanity in nature, a feeling that would be echoed by visitors to Yellowstone. A similar feeling that overtook Thoreau also inhabited men like Joe Meek and Jim Bridger and others who have visited Yellowstone over the decades, especially before it was developed. The overwhelming vastness, and isolation of Yellowstone makes many feel overwhelmingly small. Imagine then, for a moment, being one of the first people to witness the smoke and steam of Yellowstone's geothermal features – how much that experience was unlike anything your parents or grandparents have experienced or seen or heard of. To put that feeling, that experience, into words was and is quite a difficult thing to do.

Ferris heard stories of Yellowstone from his fellow fur trappers and decided to visit the region. Ferris wrote while at rendezvous he heard the story of a large group who had regaled him of their time in Yellowstone. He said that the "accounts they gave, were so very astonishing, that I determined to examine them myself, before recording their description, though I had the united testimony of more than twenty men on the subject, all declared they saw them, and that they really

[52] Cronon, "The Trouble with Wilderness," 10-11.
[53] Cronon, "The Trouble with Nature," 11.

were as extensive and remarkable as they had been described."[54] Prior to Ferris's account, exploration of Yellowstone had been done by individual explorers. This account by Ferris reveals the first large group to have gone through Yellowstone. They all swore that the features they spoke of were in fact real, and they all agreed that what they witnessed was remarkable and "so very astonishing." Whether Yellowstone was being explored by an individual or a large fur trapping group, it elicited a strong reaction and, in this case, a positive experience. Historian Aubrey Haines argued that Ferris was the first tourist to Yellowstone because of this encounter.[55] Ferris was attracted to Yellowstone not for economic purposes or to trap fur. Rather, he went based on a story – how many of the millions of people since visited the park based on stories they had heard?

Enchanted by what he had heard, Ferris assembled a group to explore Yellowstone. Along with him were local Indigenous people who came away from Yellowstone with a different experience than he did, describing Yellowstone's features with different language. Ferris wrote on the morning of May 20, 1833, "When I arose in the morning, clouds of vapor seemed like a dense fog to overhang the springs, from which frequent reports or explosions of different loudness, constantly assailed our ears. I immediately proceeded to inspect them, and might have exclaimed with the Queen of Sheba, when their fill reality of dimensions and novelty burst upon my view, 'The half was not told me.'"[56] Ferris was awestruck. Even after hearing the trappers' stories at the

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[54] Aubrey Haines, *Yellowstone National Park: Its Exploration and Establishment* (U.S. Department of the Interior, National Park Service, Washington, 1974), 10.

[55] Haines, *The Yellowstone Story,* 47. Haines notes that Ferris was the first literate person to travel through Yellowstone and laments the fact that Ferris had only a short time to explore the park and make a few observations. Haines writes that Ferris's writings represent the first factual account but does not dwell on the different experiences that Ferris had or how the Indigenous people with him responded to the same landscape.

[56] Haines, *The Yellowstone Story*, 46. A copy of Ferris's account appears in the Helena Weekly Herald on September 12th, 1872. In it, Nathaniel Langford speculated that the author of the account was Lieutenant Bonneville, but he was not certain. It was in fact Warren Ferris. *Helena weekly herald. [volume]* (Helena, Mont.), 12 Sept. 1872. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn84036143/1872-09-12/ed-1/seq-3/> Accessed May 17th, 2023

rendezvous, Ferris was still not prepared for the majestic scenery he experienced. Ferris shook off his initial wonderment and proceeded to explore the geyser region. Ferris saw water burst forth from the ground in various dimensions, inhaled sulphurous vapors which he noted were disagreeable to the smell, and took in all the sights and sounds that the landscape had to offer. Ferris was the first to use the term 'geyser' to describe a feature in Yellowstone.[57]

Ferris was excited to explore further. However, not everyone with him experienced Yellowstone or its unique features in the same way. He approached close to one of the geysers and then retreated due to the heat. He wrote of his companions' fear of the geysers, "The Indians who were with me, were quite appalled, and could not by any means be induced to approach them. they seemed astonished at my presumption in advancing up to the large one, and when I safely returned, congratulated me on my narrow escape – They believed them to be supernatural, and supposed them to be the productions of the Evil Spirit. One of them remarked that hell, of which he had heard from the whites, must be in the vicinity."[58]

This represents a unique aspect of the early years of Yellowstone exploration accounts. Unlike the group that had presented a positive experience to Ferris, this account presents different people reacting to the same geographic features in uniquely different ways. Ferris and Meek had similar reactions of initial fear that turned into wonder, followed by a curiosity to explore further. The Indigenous people who accompanied Ferris did not want to get any closer to the geysers than they already were and could not be encouraged to do so by Ferris. They used language like Meek – religious language from the Bible to describe the place that represented hell. This supposed fear of the geysers and the associated fear of its hellish features represents a long-believed myth that

[57] Haines, *The Yellowstone Story,* 47.
[58] Haines, *The Yellowstone Story,* 47.

had been perpetuated by Euro-Americans about Indigenous relationships with Yellowstone National Park. Given the misconception by Euro-Americans about Indigenous attitudes towards Yellowstone, perhaps Ferris's story should be taken with a grain of salt.

Ferris described the effects that missionaries had on Indigenous people. He noted, "The Flatheads have received some notions of religion either from pious traders or from transient ministers who have visited the Columbia. Their ancient superstitions have given place to the more enlightened views of the Christian faith, and they seem to have become deeply and profitably impressed with the great truths of the gospel. They appear to be very devout and orderly, and never eat, drink, or sleep, without giving thanks to God."[59] The introduction of Christianity to the Indigenous tribes had many effects. One of them was that Euro-Americans believed that the Indigenous tribes had historically been afraid of Yellowstone's thermal features, a belief that had since been shown to have be wrong. Ferris himself had written about Indigenous fear of Yellowstone's features, as did Joe Meek and the Belgian priest Father Jean-Pierre De Smet in the 1850s.

Ferris concluded his diary by writing "These wonderful productions of nature, are situated near the center of a small valley, surrounded by pine covered hills, through which a small fork of the Madison flows. Highly gratified with my visit to these formidable and magnificent fountains, jets, or springs, whichever the reader may please to call them I set out after dinner to rejoin my companions."[60] This highlights the variability of language in describing Yellowstone. Not only did Ferris struggle to find an appropriate word for the features he described, but he also recognized that his readers would struggle to grasp and use the proper language themselves.

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[59] Ferris, *Life in the Rocky Mountains,* 50.
[60] Ferris, *Life in the Rocky Mountains,* 144.

Despite the myth that the local Indigenous tribes were afraid of Yellowstone's thermal features, recent scholarship has demonstrated that well over twenty tribes have held deep historical ties to Yellowstone. Peter Nabokov and Lawrence Leondorf's *Restoring a Presence: American Indians and Yellowstone National Park* examines Indigenous people's relationship with Yellowstone from an anthropological standpoint. Douglass MacDonald's *Before Yellowstone: Native American Archaeology in the National Park* demonstrates through archaeological records that there has been an Indigenous presence connected with Yellowstone that goes back over ten thousand years. Both works have helped to dispel the myth that persisted late into the twentieth century that these tribes were fearful of the park's geothermal features. Instead of being afraid, Native Americans established a far-reaching trade network centered on obsidian and other trade goods from the park that have been found as far east as Ohio and as far south as California.

Ferris was not the only literate trapper to visit Yellowstone in the 1830s. Osborne Russell explored Yellowstone throughout the 1830s and wrote extensively of his time in wonderland. Travelling with the trapper Nathaniel Wyeth and his party, Russell entered Yellowstone on July 28, 1835. During this visit, he encountered a group of Indigenous people. He described both the people and the landscape in his diary, concluding with "for my own part I almost wished I could spend the remainder of my days in a place like this, where happiness and contentment seemed to reign in wild, romantic splendor, surrounded by majestic battlements which seemed to supper the heavens and shut out all hostile intruders."[61]

Russell was the first explorer to express a desire to remain in Yellowstone forever. While descriptions of the geyser regions had garnered descriptions of hell, Russell clearly attributed

[61] Osborne Russell, *Journal of a Trapper: Nine Years in the Rocky Mountains 1834-1843* (no publisher listed, copyright Osborne Russell, 1921), 29.

Edenic attributes in Yellowstone's rich valleys, even going so far as to use the word 'heavens' itself in describing the sublime splendor he saw. But Russell's account also demonstrates that Indigenous people were actively living in and hunting beaver inside the present-day confines of the park. Instead of being afraid of Yellowstone's features, these people had an intimate knowledge and association with the landscape and could produce a map on an elk hide.

Russell later visited Yellowstone alongside Jim Bridger. They came to Yellowstone River south of Yellowstone Lake. After the group broke camp one morning and travelled through dense forests, they noticed that "the treading of our horses sounded like traveling on a plank platform covering an immense cavity in the earth, whilst the hot water and steam were spouting and hissing around us in all directions.as we were walking and leading our horses across this place, the horse that was before me broke through the crust with one hind foot and the blue steam rushed forth from the hole. The whole place was covered with a crust of limestone of a dazzling whiteness, formed by the overflow of the boiling water."[62]

Bridger and Russell both noted that the hot water was spouting and hissing as it shot out of the ground. This would not be the last time that Bridger would experience a hoof or foot falling through the ground. Moving on from that scene, Russell and Bridger continued through Yellowstone. Russell described the impact of the landscape when he wrote that "There is something in the wild, romantic scenery of this valley which I cannot, nor will I attempt, to describe, but the impressions made upon my mind while gazing from a high eminence on the surrounding landscape one evening as the sun was gently gliding behind the western mountains and casting its gigantic shadow across the vale were such as time can never efface from my

[62] Russell, *Journal*, 41.

memory, but as I am neither poet, painter, nor romance writer I must content myself to be a what I am – a humble journalist – and leave this beautiful vale in obscurity until visited by some more skillful admirer of the beauties of nature who may chance to stroll this way at some future period."[63] Russell's second trip lasted longer than his first. He saw hellscapes and the wonder of the sublime, often within a few miles and a few hours removed from the other. For all its wilderness, Yellowstone continued to captivate its visitors. Yellowstone cannot be fully experienced in a quick trip through the park. Those who have gained the most from it have slowed down to enjoy the experiences that take them off the beaten path.

For all of Russell's musings and wonderment of Yellowstone's features, not all his companions experienced Yellowstone the same way. On one occasion, Russell took some British travelers to Yellowstone. One day, Russell found himself alone, pondering the awesomeness of the scenery and landscape which he found himself in. He wrote, "In viewing scenes like this the imagination of one unskilled in science wanders to the days of the Patriarchs and after numerous conjecturing returns without any fixed decision. Wonder is put to the test, but having no proof for its argument, a doubt still remains, but supposition steps forward and taking the place of knowledge, in a few words solves the mystery of ages, centuries, and eras."[64] Enchanted though Russell was, after returning to camp, he found his British companions lackadaisical in their experience. "If you want to see a beautiful place," one said, "go to the Highland and see the Duke of Rutland's place." Another postulated that Russell would be better served by going to Ireland

[63] Russell, *Journal*, 42.
[64] Russell, *Journal*, 51-52.

and witnessing the wonderful sights there. Yellowstone did not capture them the same way it captured Russell.[65]

Already we have seen that the fur trappers used religious language to describe Yellowstone. Explorers, trappers, or tourists like Russell and Ferris were moved to awe or fear. Both saw images of heaven and hell in the landscape and applied that language over the landscape. They also reminisced about how they wanted to remain in Yellowstone forever. At the very least it would remain in their memories for the rest of their lives. Many others since, me included, will remember the time spent in the park, the anticipation of getting there, and then the appreciation of having had the opportunity to spend time in the park.

There is one final thought on Russell that is worth mentioning. What has been highlighted from his and the writings of other through this point have focused on the awe and grandeur of what he saw, felt, and experienced. But Russell also represents a shift in how people experienced and wrote of Yellowstone. During his many trips to Yellowstone, he took detailed measurements, and wrote about various features in feet and miles, colors, and smells, etc. During his last visit to Yellowstone in 1839, he anticipated a day when scientific expeditions would come and explore Yellowstone's wonders. Russell described one of the large springs, "From the west side for one-third of the diameter it was white, in the middle it was pale red, and the remaining third on the east, light sky blue. Whether it was something peculiar in the state of the atmosphere, the day being cloudy, or whether it was some chemical properties contained in the water which produced this phenomenon, I am unable to say, and shall leave the explanation to some scientific tourist who

[65] Russell, *Journal,* 52.

may have the curiosity to visit this place at some future period. What a field of speculation this presented for chemist and geologist."[66]

Russell was correct in his prediction of Yellowstone becoming a scientific research site. The geologist Ferdinand V. Hayden led a scientific group of explorers to Yellowstone in 1871, which was influential in Yellowstone being established as a national park the following year. And in recent decades, chemists and other scientists have made further discoveries into various aspects of the hot springs Russell wrote about in this passage. Yellowstone has not only been a place of religious experience but scientific discovery as well. It would be a few decades before the geologist found interest, and perhaps a century or more before the chemist came to Yellowstone to search out its hidden features. Russell's last visit in 1839 came as the Rocky Mountain fur trade was winding down. But there is still one curious aspect of this era that deserves some attention, as it is something that has been repeated over the decades since it was first put into print: "Colter's Hell."

John Colter did not coin the term "Colter's Hell". Instead, it describes his journey and experience through Yellowstone after leaving the Lewis and Clark Expedition. The phrase was first used by fur trade historian Washington Irving in 1837. Irving wrote, "A Volcanic tract … is found on the Stinking River, one of the tributaries of the Big Horn, which takes its unhappy name from the odor derived from sulphurous springs and streams. The last-mentioned place was first discovered by [John] Colter, a hunter belonging to Lewis and Clark's exploring party, who came upon it in the course of his lonely wanderings, and gave such an account of its gloomy terrors, its hidden fires, smoking pits, noxious streams and all pervading "smell of brimstone" that it received and has ever since retained among the trappers the name of 'Colter's Hell.'"[67]

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[66] Russell, *Journal*, 74.
[67] Anglin, *Gloomy Terrors and Hidden Fires*, 96-97.

While the first portion of Irving's statement is correct, when he talks of Colter having given "such accounts," he enters the realm of myth. The legend circulating at the time claimed that after Colter emerged from the Wyoming wilderness, he told his fellow trappers at Fort Raymond of the sights he had seen. His friends laughed him off and jokingly labeled the region "Colter's Hell." One Colter biographer says that this story on which Irving based his narrative does not have any foundation in the primary source documents.[68] If anything, when Colter described his trek to George Drouillard, a fellow trapper, he was most likely believed.

When Irving described Colter's trek and "Colter's Hell," he employed language that explorers were using to describe Yellowstone in the 1830s, so his language was appropriate for the context within the time which he wrote his history. From that point onward, "Colter's Hell" entered the Yellowstone lexicon and has remained a part of Yellowstone lore ever since. The Belgian priest Pierre Jean De-Smet used it in his writing, and as we have seen, Joe Meek's biographer used in when she published his biography in the 1860s.

Conclusion

What ultimately separates early trappers' experiences in Yellowstone from present-day tourists is the rawness of the trappers' wilderness experiences. The fur trappers lacked present-day conveniences and lacked most of the present-day knowledge of the park. From the few stories they did hear, the information they received was partial and limited at best. But they still determined to see it for themselves, as in the case of Warren Angus Ferris. And they also repeatedly chose to

[68] Anglin, *Gloomy Terrors and Hidden Fires,* 97.

come back to it, like Osborne Russell or Jim Bridger. For the men of this era relying on walking or horses, the park was incredibly difficult to get to.

Each experience was unique to the individual, each person witnessed something that was special to them, and they used the language they had been raised in to describe what they witness and experienced. Yellowstone was just as special, if not more overwhelming experience, for the trappers as it is for the modern-day tourist who decides to visit Yellowstone National Park. Yellowstone "horrified most observers because … their education and experience had given them no words or images to describe what they saw."[69] Yellowstone created a sensory overload for its initial explorers and continues to overwhelm the senses of current visitors and workers.

The fur trade came to an end as demands for fur-based clothing declined. By 1840, the Rocky Mountain fur trade came to an end. By the 1840s, western and scientific exploration was growing significantly though scientific exploration of Yellowstone was still many years away. Those who came to Yellowstone between 1840 and 1870 were gold miners, and they heard stories from Jim Bridger. The imagery and language they used was primarily religious, but events were taking place in the 1850s and 1860s that lead to the scientific explorations between 1869 and 1871 and ultimately the founding of the park in 1872.

[69] Daehnke, *In the Work of Their Hands is Their Prayer,* 66.

CHAPTER TWO

YELLOWSTONE ON THE BACKBURNER: FURTHER EXPLPORATIONS, 1840-1869

Exploration of the West expanded significantly between the 1840s and the 1860s. Exploration of Yellowstone continued as well, albeit more slowly. The language used to describe Yellowstone during these years remained mainly religious, as most of the people who explored the region were missionaries and illiterate or semi-literate gold miners and explorers. Other events in the West captivated the nation's attention during these decades – the issue of slavery in the West, Kansas-Nebraska Act, the Mexican War, and Oregon Territory debate with Great Britain. Kit Carson's western explorations primarily focused on the southwest and California, although he did visit Yellowstone with Jim Bridger during the 1840s. Only Captain Raynolds expedition of 1859-60 was the only Congress-funded expedition to Yellowstone.

The 1840s through the 1860s were decades of growing scientific exploration and discovery. A combination of events, from haphazard fossil collections to the founding of the Smithsonian, affected Western scientific exploration. One of the most important scientific explorers of the West was Ferdinand Hayden. During this time, the United States government recognized the need for conducting and preserving scientific artifacts collected in the West. Joseph Hartman argued that "the enduring legacy of nineteenth century fossil studies and geological observations conducted during exploration of the western territories of the United States was predicated significantly on

congressional funding and the interplay of federal agencies and the scholarly community."[70] Another historian has argued that scientific exploration reshaped the ways people experienced and thought about the West.[71] American settlers followed the footsteps of the fur trappers, explorers, and scientists who reported on their travels. The West captivated many who moved there and represented many opportunities for renewal.[72]

Founded in 1846, the Smithsonian provided a federal umbrella for exploring, researching, and preserving fossils and other similar artifacts discovered in the West. Before 1855 fossil preservation prior was quite weak. There were three expeditions prior to 1855 – Charles Fremont in 1843, Harris-Audubon in 1843, and Evans-Shumard in 1853. The explorers who found fossils before 1855 improperly cataloged them and as a result many went missing. However, these explorers did publish information about the fossils.[73] The Smithsonian's vision was to "highlight the peculiarities of the production of the American continent, with a view to ascertain what changes animals and plants have undergone, how they differ in their present as well as their past forms from those on other portions of the globe, and also the distribution of the same species, and the relations which they bear to the soil and climate where they are found."[74] On one expedition to the Missouri and Yellowstone Rivers in the 1850s, Hayden sent back 150 mammal and 600 bird

[70] Joseph Hartman. "The Importance of the Museum in Antebellum U.S. Western Territorial Exploration: Understanding the relevance of collection fossils and their conservation to solving long-standing geologic and palaeontologic problems – part 1." *Earth Sciences History, Vol. 39,* No.1 (2020): 120.
[71] Sarah Dant, *Losing Eden: An Environmental History of the American West* (Lincoln: University of Nebraska Press, 2023), 102.
[72] Dant, *Losing Eden,* 82.
[73] Hartman, *The Importance of the Museum,* 120.
[74] Diane Smith, *Yellowstone and the Smithsonian: Centers of Wildlife Conservation* (Lawrence, KS: University of Kansas Press, 2017), 19.

specimens to the Smithsonian.[75] He collected, reported, and sent back several similar specimens during his 1871 Expedition to Yellowstone.

The early discovery and loss of fossils found in western exploration goes hand in hand with the careers of influential scientific explorers Fielding Bradford Meek and Ferdinand Hayden. The mid-1800s were a messy period for museum and artifact preservation. Museums considered one fossil of each type of animal was often considered good. The Smithsonian cataloged duplicated fossils and sent the rest to other institutions. Many of the early specimens, however, were lost. Out of this messy story came a clear directive to find, catalogue, and preserve fossils. A mutual evolution of cooperation emerged between scientific institutions and western exploration, giving rise to careers for prominent scientist-explorers such as Hayden.[76] Hayden and Meek's presence and accomplishments in the West changed how geological studies in the West were approached.[77]

Hayden was hired by the Smithsonian to lead several expeditions to collect, analyze, and preserve fossils from the American West.[78] One such exploration occurred in 1856. Hayden, along with his colleague F.B. Meek, published a series of five documents in the Academy of Natural Sciences in Philadelphia on their 1856 exploration. These publications reported on new fossil specimens and were critical for understanding the stratigraphy and bio stratigraphic catalog of new species that were original to the West.[79] Hayden's expeditions and their subsequent success during the mid-1850s influenced future western exploration, including those sent to Yellowstone. The Federal government later assigned Hayden to the Warren Expedition to explore the Missouri and

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[75] Smith, *Yellowstone and the Smithsonian,* 18.
[76] Dant, *Losing Eden*, 121.
[77] Dant, *Losing Eden*, 135.
[78] Hartman, "The Importance of the Museum in Antebellum U.S. Western Territorial Exploration," 120.
[79] Joseph Hartman. "The Importance of the Museum in Antebellum U.S. Western Territorial Exploration: Part 2. The Roles of Hayden and Meek in a Paradigm Shift in Geologic and Palaeontologic Studies." *Earth Sciences History, Vol. 40,* No. 2, (2021): 365.

then the Raynolds Expedition to explore the Yellowstone region. His prior success meant that onsite, 'fact-based' mapping of fossils was now required when analyzing stratigraphic sections, expertise he would bring with him to Yellowstone in the future. Hayden's exploration, especially with the Raynolds Expedition, introduced scientific language into people's descriptions of Yellowstone National Park.

Bridger and Yellowstone

William Sublette, along with Jim Bridger, was one of the former fur-trappers who turned to leading expeditions in the West. In 1843 he guided Sir William Drummond Stewart on one such expedition to Yellowstone. A member of the party described their time in Yellowstone, "…we reached a rugged country that seemed, indeed, to be Nature's wonderworld. The rugged grandeur of the landscape was most impressive, and the beauty of the crystal-clear water falling over huge rocks was a picture to carry forever in one's mind. Here was an ideal spot to camp; so we broke ranks and settled down to our first night's rest in the region now known as Yellowstone National Park."[80] The language used here is very similar to that Osborne Russell used to describe the Secluded Valley a decade prior. Both were enthralled by the serene beauty they observed. This account was written at least thirty years after the group traveled through Yellowstone since the author noted that it was by then a National Park. And like many who have visited Yellowstone, the landscape was a "picture to carry forever in one's mind." This is something that has been lost with smart phones and cameras containing hundreds of pictures at our fingertips.

[80] Haines, *The Yellowstone Story*, 52.

Another member wrote that "In spite of our efforts to curb Nature's most potent force, when the moment of necessity came, Old Steam Boat would literally rise to the occasion and throw us all high into the air, like so many feathers. It inspired one with great awe for the wonderful works of the Creator to think that this had been going on with the regularity of clockwork for thousands of years, and the thought of our being almost the first white mean to see it did not lessen its effect."[81] This description is unique for its mixed metaphors. There are mechanical descriptions of steams boats and clockwork and organic examples of feathers. Additionally, there is religious metaphors attributing the scenes before them to the "works of the Creator." Another interesting aspect that this person noted that they had limited power to control nature. Much like the fur trappers of the 1830s, Sublette's group attributed the wonders they witnessed to the Creator, the scenes and thoughts that left the observers in awestruck wonder.

Sublette's expedition was not the only significant expedition of 1843. Two other expeditions, albeit unrelated to Yellowstone, also took place the same year. The mission of one expedition was to map roads west while the mission of the other was to shoot wildlife along the Missouri River. Both expeditions returned with fossils and geologic observations. The scientific community was very interested in the information brought back by these two groups. The first group was a federally funded expedition led by John Charles Fremont. The second group was a privately funded group which employed John Jacob Audubon. John Hall described the importance of collecting, analyzing, and preserving fossils. He wrote, "Indeed, no survey of any *unknown* region should be made, without at the same time preserving collections of the prevailing rocks, minerals, and fossils. The attention given to this subject in the foregoing reports renders the

[81] Haines, *Yellowstone National Park,* 17-18.

information of the highest value, and perfectly reliable in reference to opinions or calculations regarding the resources of the country. (Italics added)"[82] Audubon and Harris travelled through North Dakota and Montana but failed to explore Yellowstone. Their insights allow us to understand part of how Hayden would operate in his expedition to Yellowstone in 1871. Unfortunately, the collection and dispersion of fossils found during these expeditions were lost within a few years and have remained lost to this day.

Jim Bridger began applying the trapping skills he had learned, leading several expeditions in the West between 1840 and 1869, often telling stories of Yellowstone to whoever would listen. Bridger led Captain Howard Stansbury and Lieutenant John Gunnison on one such exploration trip. While they were mapping the region around the Great Salt Lake, Gunnison listened with rapt attention as Bridger described Yellowstone. Gunnison remembered that "The ground resounds to the tread of horses. Geysers spout up to seventy feet high, with a terrific hissing noise, at regular intervals. Waterfalls are sparkling, leaping and thundering down the precipices, and collects in the pool below."[83] Gunnison's recollection of Bridger's experiences is unique. It is one of the earliest published accounts to describe Yellowstone Lake. Bridger's description of waterfalls is fascinating as well, describing them as "sparkling, leaping, thundering." Bridger also repeated the fact that his horse's feet echoed on the ground below, harkening back perhaps to his trip with Osborne Russell. Not only were people describing Yellowstone's valleys and geysers, but they were also describing the lakes, rivers, and waterfalls, adding to the lore and wonder of Yellowstone.

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[82] Hartman, "Museums and Antebellum U.S. Western Territorial Exploration," 124.

[83] Gunnison, *The Mormons, or, Latter-Day Saints, in the Valley of the Great Salt Lake: A History of Their Rise and Progress, Peculiar Doctrines, Present Condition, and Prospects, Derived from Personal Observation, During a Residence Among Them,* Philadelphia, Lippincott, Grambo, & Co., 1852, 151. See also Goetzman, Exploration, 278-79.

Bridger, while leading a different exploring group in 1846, again entertained his listeners with more stories of Yellowstone. The expedition the trip took on the feel of a tourist trip, as Bridger told several stories along the way. James Gemmell, a member of the group, remembered after the trip that, "We camped for a time near the west area of the [Yellowstone] lake and here Jim Bridger proposed to show me the wonderful spouting springs at the head of the Madison. Leaving our main camp, with a small and select party we took the trail by Snake Lake (today's Shoshone Lake)[84] and visited what have of late years become so famous and the Upper and Lower Geyser basins. There we spent a week and then returned to our camp, whence we resumed our journey, skirted the Yellowstone and Mammoth Hot Springs, which appeared as wonderful to us as had the geysers. Here we camped several days to enjoy the baths and to recuperate our animals."[85] Bridger was the unique combination of explorer and story teller. Bridger had explored the West for two decades and constantly told many fascinating stories of Yellowstone. Some would be inspired to explore Yellowstone for themselves based on Bridger's stories. Four years later, in 1850, Bridger led Kit Carson and a group of fur trappers into Yellowstone. By this time, Bridger was applying the exploring skills he had spent decades acquiring, passing his knowledge to other explorers.[86]

Bridger also strongly influenced Peirre-Jean De Smet, a Belgian priest of the Jesuit order. According to historian Bronwen McShea, each Jesuit had the same assignment in America: to bring the Indigenous population to a salvific knowledge of Jesus Christ and to share with them the

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[84] Lee Whittlesey, *Yellowstone Placenames* (Second Edition, Revised: Wonderland Publishing Company, 2006), 226. Park Superintendent Philetus Norris changed the name to Shoshone Lake became he believed it a more representative name of the Indigenous people who had "frequented it."
[85] Black, *Empire of Shadows,* 57-58.
[86] Black, *Empire of Shadows,* 58.

teachings and sacraments of the Catholic Church. De Smet came to America in the 1840s, following in a long line of Jesuits that had been coming to America since 1611.[87]

In 1851 De Smet produced a map of the West which relied heavily on Bridger's knowledge of the West and of Yellowstone. De Smet's map included the "Two Ocean Riv.," which Bridger and others claimed flowed into both the Pacific and Atlantic Oceans.[88] De Smet recorded the following, "Here was perhaps the most marvelous spot of all the northern half of this continent. Bituminous, sulphurous, and boiling springs are very numerous in it. Gas, vapor, and smoke are continually escaping by a thousand openings from the base of the summit of this volcanic pile; the noise at times resembles the steam let off by a boat. Strong subterranean explosions occur, like those in 'Colter's Hell.' Near Gardiner River, a tributary of the Yellowstone, and in the vicinity of the region I have just been describing, there is a mountain of sulphur [Mammoth Hot Springs]. I have this report from Captain Bridger, who is familiar with every one of these mountains, having passed thirty years of his life near them."[89]

De Smet described the region of "Colter's Hell," writing, "This locality is often agitated with subterranean fires. The sulphurous gases which escape in great volumes from the burning soil infect the atmosphere for several miles and render the earth so barren that even the wild wormwood cannot grow on it. The beaver hunters have assured me that the frequent underground noises and explosions are frightful."[90] The language employed hellscape imagery. It is interesting to see that

[87] Bronwen McShea, *Apostles of Empire: The Jesuits and New France* (Lincoln: University of Nebraska, 2019), xv.
[88] Haines, *The Yellowstone Story*, 85-86.
[89] Pierre-Jean De Smet, with Hiram M. Chittenden and Alfred Talbot Richardson, *Life, Letters, and Travels of Father Pierre-Jean De Smet, S.J.*, (F.P. Harper, New York, 1905), 660-661.
[90] Ibid, 660.

"Colter's Hell" continued to be used as part of Yellowstone lore, four and a half decades after his experiences there.

De Smet also perpetuated the myth that local tribes were afraid of the park due to its resemblance to hell and the sound of subterranean noises.[91] George Black argued in *Empire of Shadows* that De Smet grafted together aspects of Indigenous beliefs with aspects of Christian beliefs. This myth that Indigenous avoided the region, though false, persisted into the twentieth century. The myth first took shape when Lewis and Clark travelled north of the park in 1805. It was kept alive during the fur trapping era, as demonstrated with Warren Angus Ferris's account from 1833. De Smet helped keep these erroneous beliefs alive, as did early park officials and historians. These actions contributed to the erasure of Indigenous people's presence and toponyms in the park.

Bridger was not the only ex-fur trapper to report on Yellowstone's features during the 1850s. Juaquin Miller heard of Yellowstone's features and eventually visited the park. He explained that ". . . when with my father on Bear River between Fort Hall and Salt Lake at a place then known as Steamboat Spring, in 1852, a trapper told us that there were thousands of such springs at the head of the Yellowstone, and that the Indians there used stone knives and axes. We had Lewis and Clarke's as well as some of Fremont's journals, and not finding any of these hot springs and geysers mentioned in their pages, we paid little attention to the old man's tale."[92] While Miller's group was unable to substantiate Bridger's account, he does mention a few things that are worth looking at. He references Lewis and Clark and their report of geysers, ultimately dismissing

[91] Ibid, 660-661.
[92] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 24-25.

the report as nothing more than a tall tale. Although Lewis and Clark never traveled through Yellowstone, their notes made in their journals after the fact were known to some extent.

Captain John Mullan visited Yellowstone in 1853. He recorded his experiences in the park, writing, "Upon investigating the peculiarities of the country, I learned from the Indians, and afterwards confirmed by my own explorations, the fact of the existence of an infinite number of hot springs at the headwaters of the Missouri, Columbia, and Yellowstone rivers, and that hot geysers, similar to those of California, existed at the head of the Yellowstone."[93] The geysers of California mentioned in this account had only recently been discovered, making this one of the first to compare the geysers in California and in Yellowstone. When Mullan wrote of "an infinite number of hot springs," he was following previous explorers accounts who had used similar language to describe the various geyser regions of Yellowstone. The park, within its roughly 65-by-55-mile boundary, contains over half of the world's known geysers. What is missing from Mullan's account is the associated smell of sulfur present in other written and oral accounts of the geyser regions, something that many visitors note today. Mullan, a trained engineer, provided perhaps the earliest example of scientific language. Rather than exploring the region, Mullan "investigated" the Yellowstone region, which may be why he did not think to note the sulfurous smells commonly associated with geysers.

Despite all the explorations to Yellowstone, the area was still not well-known to the public, a problem Jim Bridger hoped to rectify. Having described Yellowstone's numerous features to Father De Smet, G.K. Warren, Hayden, and many others, Bridger finally decided to discuss Yellowstone with a newspaper reporter. In 1856, Bridger met with R.T. Van Horn of the *Kansas*

[93] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 25.

City Journal and told several stories to the enthralled reporter. Van Horn prepared an article with Bridger's descriptions of steaming geysers, bubbling paint pots, obsidian glass, thermal springs, and dramatic waterfalls. Van Horn summed up Bridger's description of Yellowstone as the "place where hell bubbled up." The public, however, was not ready for Bridger's tales of Yellowstone. Van Horn was told that he would be ridiculed and laughed out of town if he were to print any of "Bridger's lies." Reluctantly, if not somewhat disappointed, he shelved his own story.[94]

Bridger was not the only one to report on the unknown region of Yellowstone. In 1857 the *New York Tribune* published an article discussing the region. It explained that "There is no part of the territory of the United States less known than the great district, equal in extent to New York and Pennsylvania put together, including between the Yellowstone on the west, the Missouri River on the north and east, and the Platte River on the south. No doubt the explorations of Lieut. Warren – who is charged with to investigate the climatology and agricultural resources of this district, as well as its topography and facilities for the construction of roads, will through a new light on this hitherto unknown region."[95] Despite decades of scientific explorations that nibbled around the edges of the greater Yellowstone region, little of the experiences in Yellowstone were widely known and reported. It was left to future scientific explorations to bring Yellowstone's features to the American public.

What is revealing about this newspaper report is how easily it cast aspersions on the geographic knowledge of the fur trappers. The article wrote that their knowledge was "often absolutely false." And yet, as previously noted, several of the former trappers were the ones often

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[94] Jerry Enzler, *Jim Bridger: Trailblazer of the American West,* (Norman: University of Oklahoma Press, 2021), 208.
[95] New-York daily tribune. [volume] (New-York [N.Y.]), 17 June 1857. Chronicling America: Historic American Newspapers. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn83030213/1857-06-17/ed-1/seq-4/>

at the head of the government sponsored expeditions leading them through these various regions that the article depicted. This and other articles of the late 1850s described large areas of the West as terra incognita and was in part what inspired Captain Raynolds' expedition of 1859.

Captain W.F. Raynolds led the first government funded, scientific expedition to Yellowstone in 1859-1860. Raynolds, a member of the U.S. Corp of Topographical Engineers, was commissioned to explore "the regions of country through which flow the principal tributaries of the Yellowstone River, and the mountains in which they, and the Gallatin and Madison Forks of the Missouri, have their source."[96] Included in the list of members in Raynolds' group were Jim Bridger and Ferdinand Hayden, who would lead the 1871 expedition to Yellowstone. Hayden's inclusion in this Yellowstone expedition was a result of his work with the Smithsonian collecting fossils. In 1857 the U.S. Natural Museum mandated that exploring expeditions collect fossils as part of their requirements.[97] Historian Hiram Chittenden noted that this exploration was significant for what it did not find, as Raynolds failed to make his way into Yellowstone. However, what Raynolds' group accomplished was gathering more accurate information concerning the general topographic features of the greater Yellowstone region and produced the most accurate map to date.[98]

Raynolds' expedition came about because of Lieutenant Gouverneur K. Warren's earlier expedition. An 1850 West Point graduate, Warren led expeditions in 1855, 1856, and 1857 to map out portions of Nebraska, South Dakota, and eastern Wyoming. Jim Bridger accompanied Warren

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[96] Marlene Deahl Merrill and Daniel D. Merrill, editors, *Up the Winds and Over the Tetons: Journal Entries and Images from the 1860 Raynolds Expedition* (University of New Mexico Press: Albuquerque, 2012), 1.
[97] Hartman, *The Importance of Museums in the Antebellum U.S.,* 139.
[98] Hiram Martin Chittenden, *The Yellowstone National Park, Historical and Descriptive* (Cincinnati, OH: Stewart and Kidd Company, 1920), 49.

in 1856, told stories of Yellowstone, which led Warren to propose an 1858 expedition to Yellowstone. Warren eventually received orders to teach at West Point, and Captain Raynolds was chosen to lead the proposed scientific exploration into Yellowstone.[99]

Raynolds' Expedition lasted from April 1859 to October 1860 and was divided into three phases. It would be during the second phase between May and July of 1860 that the group attempted to reach Yellowstone, but the early start during the spring of 1860 and late winter snows prevented them from reaching the region. However, there are several things to note from their expedition that highlight how people experienced Yellowstone, including the anticipation of reaching Yellowstone, and the disappointment of a failed expedition.

Raynolds insisted throughout the expedition that the group stop on Sundays to observe the Sabbath rest each week. His diary includes several entries where he noted the sermon text, and often bemoaned the fact that so few of his men attended his services. For example, on Sunday, May 13, 1860, Raynolds wrote, "I was awakened this morning by someone saying that it was snowing. Looking outside of my tent I found the ground white and snow falling rapidly. It continued to fall till about 11 o'clock, and tho it thawed all the time yet at that hour the ground was covered to the depth of four or five inches. The clouds broke away however and before night, but little was left in the valley. Service at 4:30 o'clock. Read Sermon from Plantation collection from text the "Lord is my Shepherd," etc. oh that we may all feel how safe we are with such a shepherd to care for us."[100]

This provides a unique insight. As will be highlighted shortly, Raynolds mention of the weather was the cause for the group not reaching Yellowstone. But throughout his journal he

[99] Merrill, *Up the Winds and Over the Tetons*, 4-5.
[100] Merrill, *Up the Winds,* 24-25.

interwove both scientific insights as well as his Christian beliefs. For Raynolds, there seemed to be no contradiction between the two. The next morning, May 14, Raynolds wrote that the morning was "cold, disagreeable" and they refrained from making an early start.

Raynolds' group moved onward, albeit at a slow pace. Raynolds' journal entry on June 1 noted that "the ground was frozen but not hard enough to bear a horse and the travelling was about as hard as it could be."[101] A few days later, on Monday, June 4, Raynolds wrote, "The road was about as bad as possible. The snow had just left the ground and it was perfectly saturated with water. Every step was through mud and the labor for animals was excessive. Tonight, it is raining hard which will give us bad traveling time for tomorrow."[102] These accounts reveal the difficulties that existed in Raynolds' attempt to reach Yellowstone. Weather difficulties meant that Raynolds' group often only gained six to eight miles a day. This, however, added to the mystique of Yellowstone, as the journey to the park itself became endowed with extra meaning simply because the destination is Yellowstone.

Raynolds expedition travelled past the Tetons on their journey towards Yellowstone. He wrote as they passed through the Teton valley on Saturday, June 9th that they had made a long march and that they had a good view. He described the Tetons "In the distance a craggy red cliff seemed to cross the valley while rising behind it and in the center of the section was the high snow-clad crags of the great Tetons dazzling in the clear atmosphere with the reflected rays of the newly risen sun, as the view burst upon us there was a simultaneous exclamation and admiration and the accompanying sketch fails to do justice to the scene, the artist confessing his inability to represent

[101] Merrill, *Up the Winds,* 43.
[102] Merrill, *Up the Winds,* 46.

the glorious coloring."[103] Raynolds' writing makes readers feel as if they are alongside him as his group passes by the Tetons. Raynolds' usage of color is also unique. He wrote of green valleys and craggy red cliffs. And like Thomas Moran nearly twelve years later, the artist accompanying Raynolds expressed his overwhelming awe at the spectacular landscape and his utter inability to properly capture the wonder and beauty of the landscape. Raynolds' use of color reveals an aesthetic wonder of the landscape.

Two days later, on Monday, June 11, Raynolds was again overcome with wonder, writing, "Passing through Jackson's hole the traveling was so fine that no one realized how far we were going. The scene too helped to while away the time. A small variety of Sun flower was in full bloom and covered large portions of the valley with their golden flowers which, in contrast with the rest of the valley and the hillsides and the snow-clad mountains, presented a picture not easily forgotten."[104] The Teton valley provided easy travel and rest for Raynolds and his men after several long, difficult weeks of traveling through mountainous country. They were so captured by the beauty of the country that they did not pay attention to the distance they traveled. Again, Raynolds journal dealt with colors, to the point where we can almost see the yellow sunflowers covering the green carpets of grass. The Raynolds Expedition ultimately did not reach Yellowstone. Raynolds missed Yellowstone due to their early start. The winter snows were still present as they drew close to Yellowstone. They also lost time while stranded at Togwotee Pass.[105] The Expedition did, however, become the first government funded group to explore and describe the Grand Tetons.

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[103] Merrill, *Up the Winds,* 50.
[104] Merrill, *Up the Winds, 53.*
[105] Merrill, *Up the Winds,* 74.

Raynolds was discouraged about not reaching Yellowstone, he still enjoyed listening to Bridger's stories of Yellowstone around the campfire. He was among the few who believed what he heard from Bridger. He recorded in his journal, "We were compelled to content ourselves with listening to marvelous tales of burning plains, immense lakes, and boiling springs, without being able to verify these wonders. I know of but two white men who claim to have visited this part of the Yellowstone valley—James Bridger and Robert Meldrum. The narratives of both men are very remarkable, and Bridger, in one of his recitals, describes an immense boiling spring that is a perfect counterpart of the Geysers of Iceland. As he is uneducated and had probably never heard of the existence of these natural marvels elsewhere, I have little doubt that he spoke of that which he had actually seen."[106] This journal entry highlights a unique dichotomy that existed at the time. While men like Raynolds and De Smet were far more willing to accept Bridger's stories of Yellowstone, the larger public was more inclined to ignore him or cast his stories into the realm of tall tales. The further away one got from Yellowstone and other unique geographic features of the American West, the less likely people were to believe reports concerning it.

The Raynolds expedition straddled the change that was taking place between religious and scientific language. The Expedition had been commissioned by the government to explore Yellowstone. Yet Raynolds still chose to stop on each Sunday to observe the Sabbath and hold Christian services. Raynolds often bemoaned the fact that the service was poorly attended by his fellow travelers. Nonetheless he was dedicated and continued to observe the Sabbath. His expedition combined both scientific and religious beliefs throughout the trip. Men such as Hayden, Raynolds, and Warren were exploring and publishing accounts that contained scientific

[106] Black, *Empire of Shadows,* 81-82.

descriptions of the West. The scientific language from these reports made their way into tourists' journals in the 1870s and 1880s.

Miners, Prospectors, and Yellowstone in the 1860s

The prospectors and miners of the 1860s were constantly on the move in their quest to find gold. Several made their way through Yellowstone. What they did not find in gold they found in stunning landscapes and scenery. The miners, like the trappers and explorers before them, brought back many stories of Yellowstone. The information they brought back excited the locals of Montana but did not warrant interest outside the territory. In the fall of 1864, several prospectors who had been through the geyser basin left the region appalled at the sights they had witnessed. They had travelled through the are in late fall, when cold air was full of vapor from the hot springs, and they miners believed the air to be suffocatingly noxious. There stories helped to keep alive the imagery of a "Death Valley," a theme that appeared throughout the decade.[107]

Walter Washington DeLacy, a trained engineer, explored Yellowstone in 1863. He described two small lakes "of a beautiful blue, and small streams flowing in opposite directions. I judged that one of them ran into the North Snake."[108] What jumps out from DeLacy's journal is his straightforward descriptions. He described the geysers, valleys, and rivers featured so prominently in previous explorers' accounts. What is notable is the lack of hellscape imagery. DeLacy and his group continued exploring for several days. His journal described the geographic features of mountains and streams. Then, on September 9, DeLacy and his group reached the Lower Geyser region. He described the geysers, "The water of which was hot, and soon entered a

[107] Haines, *The Yellowstone Story,* 64-73.
[108] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 27-28.

valley or basin, through which the stream meandered, and which was occupied on every side by hot springs. They were so thick and close that we had to dismount and lead our horses, winding in and out between them as we best could. The ground sounded hollow beneath our feet, and we were in great fear of breaking through, and proceeded with great caution. The water of these springs was intensely hot This was what was afterward called the 'Lower Geyser Basin' of the Madison, by Prof. Hayden."[109] There are several fascinating aspects here to focus on. The first thing to note is how DeLacy described the ground beneath their feet – that it "sounded hollow" and that they were fearful of breaking through. This was reminiscent of Bridger's earlier experience in Yellowstone where he described a similar experience. Another thing to note is the description of the geyser region. DeLacy, rather than using religious hyperbole, methodically described the geysers, noting their size and color. DeLacy's statement that no one in his company had seen nor heard of anything like the Yellowstone region echoes Joel Daehnke's argument that Yellowstone was unlike anything that Euro-Americans had known of or experienced previously.

DeLacy recorded in his journal on the same day, "We thus went on for several miles, stopping occasionally to admire the beauty, variety, and grandeur of the sight, and at length came to a large stream flowing northerly [Firehole River], near the banks of which were scattering hot springs, and some of which had been hot once, but had now cooled apparently, the water being tepid and muddy, with a strong smell of sulphur."[110] Again, the smell of sulphur is associated with the geyser region. Grandeur is also a word that is repeated, reminiscent of Osborne Russell or Warren Ferris from thirty years prior, only this time it is applied to the geysers! After the Hayden expedition in 1871, the science behind the geysers and hot springs were demystified. DeLacy's

[109] Haines, *Yellowstone National Park*, 29.
[110] Haines, *Yellowstone National Park*, 29.

descriptions reveal the early shift in language that was used to describe Yellowstone's geyser. The fear that was once evident in people's experience was being replaced by awe and wonder.

The following year, 1864, a member of DeLacy's expedition returned to Yellowstone. John C. Davis had joined James Stuart's Expedition to travel up the Yellowstone River to go prospecting on the Bighorn and Shoshone Rivers. Six of the men reached Jackson Hole and made their way into Yellowstone from the south. Davis wrote of entering Yellowstone, which appeared in the Louisville, Ky., *Courier Journal,* "We came into the park just above the lake, and immediately found ourselves in the midst of the wonders of this enchanted land. The boiling springs and geysers were all around us, and, accustomed as we were to the marvels of Western scenery, we hardly knew what to think of the phenomena."[111] Davis' account is full of colorful imagery and language. He writes that even for a veteran of western exploration, the scenes of wonder and awe were surprising. He was not so jaded that he could not enjoy the wonders Yellowstone had to offer. And when he came to the top of the Grand Canyon of the Yellowstone, the view was so overwhelming that he struggled to take it in.

While Davis and his group were exploring Yellowstone, Nathaniel Langford was stationed at an army fort in Montana in 1864. His was assigned to help in the skirmishes between the army and the local tribes and to contain the large influx of gold miners. Langford had been paying close attention to the miners' stories of Yellowstone. Langford met with Jim Bridger around this time. When it came to Bridger's stories of the Yellowstone, Langford had something to think about – should he believe what he was hearing? Langford wrote that Bridger's "narrations were generally

[111] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 30-31.

received with many grains of allowance by his listeners." Langford did not, however, dismiss Bridger's stories as quickly.[112] He was close enough to Yellowstone to be intrigued.

Langford was drawn to Bridger's accounts in which he described "a column of water as large as my body, spout as high as the [Virginia City] liberty pole (about 70 feet)." Langford was initially skeptical. But the more he thought over Bridger's account, the more inclined he was to believe it. He wrote, "The more I pondered upon this statement, the more I was impressed by the probability of its truth." Much like Raynolds some five years earlier, Langford thought of the geysers of Iceland. And since Bridger was famously uneducated, he would likely have not known of the Icelandic geysers. "I was therefore inclined to give credit to his statement," wrote Langford, "and to believe that such a wonder really did exist. Determined to visit it."[113] And visit it he would, writing extensively of the Yellowstone region during his exploration in 1870. Both Langford and Raynolds came to similar conclusions about Bridger after meeting him in person and listening to his stories.

The Jesuit priest Xavier Kuppens was one of many people who travelled to Yellowstone in the summer of 1865. Kuppens was stationed at the Mission of St. Peter's with the Piegan Indians. Kuppens was not sure what to do when he first heard stories about Yellowstone, but his curiosity was whetted enough that in the spring of 1866 he visited Yellowstone. He wrote "I got my first sight of the Yellowstone. I shall not attempt to describe it, that has been done by many abler pens than mine; but you may be sure that before leaving I saw the chief attraction, —the Grand Canyon, hot and cold geysers, variegated layers of rock, the Fire Hole, etc. I was very much impressed with

[112] Black, *Empire of Shadows,* 134.
[113] Black, Empire of Shadows, 134.

the wild grandeur of the scenery."[114] Like Warren Ferris thirty years prior, Kuppens was drawn to Yellowstone based on stories he had heard. He was very impressed by the scenery before him.

Reports of Yellowstone were known locally but was little reported nationally. While much was not yet known outside those who had been to the region, enough was known for a Montana based newspaper to report on its salient features. The editor of the newspaper even called for "Bierstadt to visit this portion of our Territory. He could make a picture from this piece of scenery surpassing either of his other views of the Rocky Mountains."[115] The article had compared Yellowstone to Yosemite and now wanted to present Yellowstone to a national audience.

The *Montana Post* printed an example of one group of prospectors' experiences in Yellowstone. The article, published in 1867, notes that "For eight days they traveled through a volcanic country emitting blue flame, living streams of molten brimstone, and almost every variety of minerals known to chemists. The appearance of the country was smooth and rolling, with a long level plain intervening. On the summits of the roiling mounds were crates for four to eight feet in diameter; and everywhere on the level plain, dotting it like prairie dog holes, were smaller ones, from six to nine inches upwards. The stem and blaze was constantly discharging from these subterranean channels in regular evolutions or exhaustions, like the boilers of our steamboats and gave the same roaring, whistling sound. As far as the eye could trace, this motion was observed. They were fearful to ascent the craters lest the thin crust give way and swallow them." Abbreviated portions of the story were reprinted in various newspapers across the nation, making for an interesting read while still employing the hellscape imagery of the era.[116]

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[114] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 32-33.
[115] Haines, *Yellowstone National Park: Its Exploration and Establishment,* 33.
[116] M. Mark Miller, *Rediscovering Wonderland, The Expedition That Launched Yellowstone National Park.* (Helena, MT: Two Dot, 2022), 9-10.

Several other articles were published about Yellowstone throughout the 1860s. In August 1867 the *Montana Post* wrote of Yellowstone, "The atmosphere was intensely suffocating, and they report that life could not long be sustained there. The prospectors gave it the significant name – "Hell!" They declare that they have been to that "bad place," and even seen the "Devil's Horns;" but through the interposition of Providence (not to speak profanely), their "souls have been delivered," and them emphatically aver, if a "straight and narrow" course during their sojourn on the Yellowstone will save them, they will never go their again."[117] The comparison to hell, begun in the 1830s, continued into the 1860s.

A few months later, in December 1867, the *Chicago Tribune* printed the following account, "No language can give any idea of the fearful desolation of this wonderful valley. It struck our hearts with a nameless dread. Not a wolf infested the chambered cavities of the cliffs; not a buzzard hovered over the vicinity. All was silent in this Valley of Death. One of the party of explorers bestowed upon it the significant appellation of "Hell." Let him that suffers with *ennui*, and the soul that hankers after vitalizing realities, travel in the borean regions of the Upper Yellowstone, and mighty mountains, savannahs of exceeding fertility, and valleys clothed with Edenic loveliness, will be seen side by side with a plain teeming with diabolisms, from which you cannot emerge save through the "Pass of Hell."[118] An interesting aspect to note in this article is that the author sets the scenery of Yellowstone as a wonder that is greater than anything old Europe could boast to have. And yet the language of Satan, Devil, hell, remain, inciting fear in the explorers, and

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[117] *The Montana Post. [volume]* (Virginia City, Montana Territory [i.e. Mont.]), 31 Aug. 1867. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn83025293/1867-08-31/ed-1/seq-6/>

[118] *Chicago tribune. [volume]* (Chicago, Ill.), 17 Dec. 1867. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn82014064/1867-12-17/ed-1/seq-2/>

gratefulness in their salvation from the park's unnatural features. The language of both heaven and hell is present in this article. Here Yellowstone is clearly presented as "Hell" and "Eden" at the same time. Many today may think Yellowstone is Eden, but none would go so far as to call Yellowstone "Hell."

There are several words and phrases that the prospectors used in these articles that have common usage dating back to the fur trapping era. Terms like "volcanic country," "molten brimstone," and "blue flames," among others helped keep hellscape imagery alive. By the late 1860s, the cumulative reports and stories concerning the Yellowstone region were becoming harder to ignore. While in may have been easier to dismiss the trappers' stories are nothing more than tall tales, the explorations of the 1850s and 1860s, visits by missionaries and prospectors meant that it was finally time to explore this blank spot on the map. It was finally time to put the Yellowstone rumors to rest permanently and fill in that blank spot on the cartographer's map.

Another account was published in 1867 with information provided by the surgeon Dr. James Dunlevy. "Language is not adequate to convey an idea of the marvelous beauty of the scenery, which is beyond the power of description, and begets a wonderful fascination in the mind of the beholder who reverently gazes at the snow-crowned summits, that seem as if "They were to show How earth may pierce to Heaven and leave vain man below."[119] Dunlevy used unique language is this account. What stands out are the castle references descriptions used. Words like 'spires,' 'turrets,' and even 'pyramidal' made it into Dunlevy's description. Like Osborne Russell and Joe Meeks before him, Dunlevy was left wonder that could not be described with words. Even the mountain summits seemed to Dunlevy to point their viewer towards the heavens above.

[119] Haines, *Yellowstone National Park*, 35-36.

Language being inadequate to describe Yellowstone has been a common thread from the first time people stepped foot into the park through the present day.

As rumors of the wonders of Yellowstone swirled around in greater numbers, at least one newspaper predicted that one day soon the Union Pacific Railroad would bring many thousands of visitors to Yellowstone. The article noted that "A few years more and the U.P. Railroad will bring thousands of pleasure-seekers, sight-seers, and invalids from every part of the globe, to see this land of surpassing wonders."[120] Osborne Russell wrote that one day the Yellowstone region would be of great interest to the geologist and chemist. Time bore him out to be correct in that prediction, as it would this article predicting tourists and sightseers coming from every part of the globe to see the wonders of Yellowstone National Park.

[120] Haines, *Yellowstone National Park*, 38.

CHAPTER THREE

THE THREE SCIENTIFIC EXPEDITIONS – FOLSOM (1869), WASHBURN (1870), AND HAYDEN (1871)

The three scientific expeditions to Yellowstone in 1869, 1870, and 1871 were influenced by the reports and stories that were circulating since the days of John Colter. Francis Xavier Kuppens presented a talk in 1865 about his travels in Yellowstone. Thomas Meagher, the acting territorial governor, was in attendance alongside territorial judges Lyman Munson and H.L. Hosmer, two deputy marshals, and a young lawyer by the name of Cornelius Hedges.[121] Kuppens recalled his talk and its impact on the audience. "On that occasion, I spoke to him [Meagher] about the wonders of Yellowstone" Kuppens remember. "He was greatly aroused by my recital and perhaps even more so, by that of a certain Mr. Viell – an old Canadian married to a Blackfoot squaw – who during a lull in the storm had come over to see the distinguished visitors. When he was questioned about the Yellowstone, he described everything in a most graphic manner. None of the visitors had ever heard of the wonderful place. Gen. Meagher said if things were as described the government ought to reserve the territory for a national park. All the visitors agreed that efforts should be made to explore the region and that a report of it should be sent to the government."[122] Kuppens had been recruited by Father Pierre-Jean De Smet as a Jesuit missionary to the American West, who in turn was inspired by Jim Bridger to see Yellowstone. This was perhaps the early argument for preserving Yellowstone as a national park.

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[121] Haines, *Yellowstone National Park*, 45.
[122] Ibid.

By 1867 rumors and stories of Yellowstone had been swirling around for sixty years. Although there had been many explorers, missionaries, and miners in Yellowstone, no formal scientific exploration had taken place. By 1867 a Yellowstone expedition was at least feasible and in June of that year the *Virginia City Montana Post* published an announcement calling for volunteers to join an expedition to Yellowstone. Thomas Meagher was one of the leaders of the proposed expedition. Meagher was able to muster together the funding necessary to lead an expedition to the Yellowstone two years after having heard Kuppens' presentation. And Bridger's reports of Yellowstone in 1866, while still widely disbelieved, added to the growing stories of Yellowstone.[123] The trip was not to be, however. Meagher died suddenly, drowning in the Missouri River near Fort Benton. The official exploration of Yellowstone would have to wait. A few more attempts were made in 1868 to explore the Yellowstone, but they fizzled out. That did not stop three enterprising men from setting out to Yellowstone.[124]

The Folsom Expedition

In 1869 David Folsom, Charles Cook, and William Peterson decided to join forces. Cook and Folsom were Quakers, and throughout the expedition they employed religious language to describe what they witnessed. While they were confident in their own abilities their friends who saw them off were not. Among the parting shots their friends gave them were, "good-bye, boys, look out for your hair"; "if you get into a scrap, remember I warned you"; "if you get back at all you will come on foot," and "it's the next thing to suicide."[125] These were the types of rumors

[123] Runte, *National Parks,* 35.
[124] Haines, *The Yellowstone Story,* 90-91.
[125] Ibid, 94.

about the park that do not exist today. The trio geared up and headed towards the great unknown. On their first night after crossing the Yellowstone River, Folsom was struck by the silence. He wrote, "The wolf scents us afar and the mournful cadence of his howl adds to our sense of solitude. The roar of the mountain lion awakens the sleeping echoes of the adjacent cliffs, and we hear the elk whistling in every direction. Even the horses seem filled with a feeling of dread, they stop grazing and raise their heads to listen, and then hover around our campfire as if their safety lay in our companionship."[126] Folsom, probably unintentionally, echoed the thoughts and fears of the early Puritan settlers when they landed on the east coast. They, too, found the silence of the night and the wilderness with the howling wolves and bears to be terrifying. Despite the great technological advancements that had been made by the early nineteenth century, men like Folsom were still intimidated by the vast silence and size of the wilderness.

Moving on the men then came to the valley of the upper Yellowstone. Here Folsom wrote, "After going a short distance we encountered a canyon about three miles in length, and while passing around it we caught a glimpse of scenery so grand and striking that we decided to stop for a day or two and a give it a more extended imagination."[127] Folsom's use of imagination here is compelling. The canyon was so enthralling to them that it captured their imagination beyond their normal experiences in nature. The canyon was so compelling that it forced them to stop for an extra day or two beyond what they planned. Like Osborne Russell and Warren Ferris before him, Folsom was enchanted by Yellowstone's valleys. Something about these valleys have held a magical quality that makes the viewer want to remain secluded in them alone, feeling closer to the

[126] Ibid, 97.
[127] David E. Folsom, *The Folsom-Cook Exploration of the Upper Yellowstone in the Year 1869,* (St. Paul, Minnesota, 1894), 13.

divine presence of God. Their decision to add time to their trip is something more people today should do instead of zooming off from one spot to the next.

"The most singular feature, was the formation of the perpendicular wall" Folsom wrote of the valley, "At the top there was a stratum of basalt, from thirty to forty feet thick, standing in hexagonal columns; beneath that, a bed of conglomerate eighty feet thick, composed of washed gravel and boulders; then another stratum of columnar basalt about half the thickness of the first; and lastly, what appeared to be a bed of coarse sandstone."[128] What made Folsom's account unique is that he used clear, scientific language to describe the features of the rock wall. To some extent Folsom was impacted by previous scientific explorations of the American West. He was careful to take measurements of the geological features his group saw. Folsom demonstrated a comfort level in using both scientific and religious language through the trip.

Traveling onward, the group "came to a gentle declivity at the head of a shallow ravine, from which steam rose in a hundred columns and united in a cloud so dense as to obscure the sun. In some places it spurted from the rocks in jets not larger than a pipe stem; in others it curled gracefully up from the surface of boiling pools from five to fifteen feet in diameter."[129] The group heard subterranean noises, which they compared to ocean surf breaking into a cave, subterranean passages for water, and a collection of mud springs they dubbed "The Chemical Works."[130] Unlike previous explorers who would have immediately used language and imagery of hell, Folsom instead used industrial terminology, which is evident in the use of "Chemical" as a descriptive place name for one of the many mud pots. At first glance, Folsom's description of the steam "so

[128] Ibid.
[129] Ibid, 15.
[130] Ibid.

dense as to obscure the sun" might have led others to continue with metaphors of hell. Instead, Folsom compared the various geysers to pipe stem, noting that water shot out of it, which blotted the sun. This is indicative of the impact of both scientific and industrial language making its way into descriptions of Yellowstone's geothermal features.

Cook described seeing the Grand Canyon of the Yellowstone for the first time on September 21. "I sat there in amazement, while my companions came up, and after that, it seemed to me it was five minutes before anyone spoke." The following day they explored the upper and lower waterfalls. Folsom wrote that it was "a day full of surprises." He explained, "We spent the next day at the falls – a day that was a succession of surprises; and we returned to camp realizing as we had never done before how utterly insignificant are man's mightiest efforts when compared with the fulfillment of Omnipotent will. *Language is inadequate* to convey a just conception of the awful grandeur and sublimity of this masterpiece of nature's handiwork."[131] (italics added) Folsom described the Grand Canyon as "beautiful, picturesque, magnificent, grand, sublime, awful, terrible," after which they moved on to explore other regions.[132] Despite having met with Bridger prior to his trip, still Folsom was not fully prepared for the wonders he saw. There was so much yet left to explore. He grasped for language to describe the scenery. Folsom did, like many before and after, acknowledge the role that the 'Omnipotent' played in forming the wonders they were witnessing. Others that followed in his footsteps would also describe the Grand Canyon with a nod towards the Divine.

Folsom, Cook, and Peterson continued to Yellowstone Lake. Folsom wrote at the site of what is now a crowded campground and busy marina: "As we were about departing on our

[131] Haines, *Yellowstone National Park,* 50.
[132] Folsom, *Folsom-Cook Exploration,* 20.

homeward trip we ascended the summit of a neighboring hill and took a final look at Yellowstone Lake. Nestled among the forest-crowned hills which bounded our vision, lay this inland sea, its crystal waves dancing and sparkling in the sunlight as if laughing with joy for their wild freedom. It is a scene of transcendent beauty which has been viewed by few white men, and we felt glad to have looked upon its primeval solitude should be broken by the crowds of pleasure seekers which at no distant day will throng its shores."[133] There is a sense of recognition here of the region's uniqueness, and that one day soon its peace would be disturbed, never to be returned. Yet Folsom also recognized the wild freedom in the place, lyrically noting that the waves were "dancing with joy."

Folsom had gathered information from prospectors as to what to expect in his journey. From that information, he were able to identify the region the prospectors called Burnt Hole or Death Valley. Folsom expressed his nervousness. He wrote, "Although we experienced no bad effects from passing through the 'Valley of Death,' yet we were not disposed to dispute the propriety of giving it that name." As former Yellowstone historian Aubrey Haines noted, it was easy to confuse the region with hell since there was no faunal life present.[134] Folsom and Cook were both raised in religious New England households, so they were familiar with Biblical language, which described hell in a similar vein to what they were witnessing. After more exploration, they wrapped up their sightseeing and returned to Helena.

When Peterson, Cook, and Folsom emerged from Yellowstone early in October, the list of the scenes they witnessed included the Grand Canyon, Yellowstone Lake, and the thermal wonders of the Lower Geyser Basin. Alfred Runte argues that for a second time since the discovery of

[133] Haines, *The Yellowstone Story,* 99.
[134] Haines, *The Yellowstone Story,* 100.

Yosemite, Western explorers had revealed another wonderland whose natural features and beauty could compete with and exceed similar scenery in England. For a nation woefully short on cultural history, America instead presented and upheld its natural wonders as equal to the history and castles of Old Europe. Charles Cook made several references to castles in his observations of many of Yellowstone's features. For example, he wrote that a limestone formation "bore a strong resemblance to an old castle" whose "rampart and bulwark were slowly yielding to the ravages of time. The stout old turret stood out in bold relief against the sky." The group "could almost imagine that it was the stronghold of some baron of feudal times, and that we were his retainers returning laden with the spoils of a successful foray."[135] Folsom's descriptions are engaging. Here he uses neither scientific nor religious language but architectural language when he used "castle" and "turret." Almost all Americans would have been familiar with such language. In using this language Cook and the others were showcasing how America's natural wonders competed with European landscapes and history.

After they returned to Helena, Folsom was invited by N.P. Langford to give a speech about the wonders of Yellowstone. Folsom initially agreed but later changed his mind. Langford explained, "On assembling there were so many present who were unknown to Mr. Folsom that he was unwilling to risk his reputation for veracity, by a full recital, in the presence of strangers, of the wonders he had seen. He said that he did not wish to be regarded as a liar by those who were unacquainted with his reputation. But the accounts which he gave to Hauser, Gillette, and myself renewed in us our determination to visit the region during the following year,"[136] which he did.

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[135] Runte, *National Parks,* 35.
[136] Haines, *The Yellowstone Story,* 100.

Even though Folsom trusted Langford, he did not want to have his credibility questioned while recounting his experiences in Yellowstone. He claimed to not know most of the people in the audience, and therefore did not want to risk his reputation. But if that is the case, then why did he send off his journals to be published in reputable newspapers in the east coast? And if anything, he associated with Jim Bridger, who was known to be a teller of tall tales. The local newspapers were more accepting of news coming out of Yellowstone, and so Folsom's constituents in Helena, even if he did not know them personally, would have been more likely to accept what he had to say on Yellowstone. It is possible that he simply got a version of stage fright.

Folsom, Cook, and Peterson attempted to get their journals published after their expedition, but had no luck despite previous descriptions of Yellowstone having been published. Both the *New York Tribune* and *Scribner's* magazine refused to print the journal, because "they had a reputation that they could not risk with such unreliable material. Only a small publication, the *Western Monthly Magazine* based in Chicago, printed the manuscript they were given. The account was not widely published, however, and so the wonders of the Yellowstone remained largely unknown to the public.[137] The fairy tale Yellowstone Lake was perhaps too good to be true, but more likely the language of hellscape imagery that was conjured from their childhood memories was more likely the culprit for their manuscripts being denied publication in the larger magazines of the east coast.

The Washburn Expedition

Yellowstone historian Aubrey L. Haines argued that the motivation for sending the Washburn expedition of 1870 grew out of two unrelated events: the growth of the Northern Pacific

[137] Ibid, 101.

Railway and the struggle over who would be governor of the Montana Territory. The Northern Pacific Railway was granted a charter by President Lincoln in 1864 but had not made progress in the years since, remaining a largely paper organization. By 1869, the Northern Pacific was desperate. The company had until the end of 1870 to get their line in operation or lose their charter and accompanying land-grant. The railroad found its funding after months of searching when the investment house of Jay Cooke agreed to help. It was a marriage of convenience for both sides, but it took time to consummate since neither side completely trusted the other. They reached an agreement, and the tracklaying begun in Minnesota, on the shores of Lake Superior.[138] Once the Northern Pacific and Jay Cooke agreed on terms for funding the railroad, they looked westward. They sought influence in the local government in the Montana Territory to gain access to the best lands for their railroad. After gaining the political backing they needed, the railroad began laying its tracks westward.[139]

Nathaniel Langford arrived in Montana at the beginning of August and began making plans to explore Yellowstone. Langford's expedition quickly came to fruition and would be the largest expedition to Yellowstone to date. Included in the group was surveyor general of Montana Henry Washburn, Lieutenant Gustavus Doane, and a calvary escort. The inclusion of military personnel was in response to local Indigenous activity nearby. Once everything was squared away, the expedition departed Helena on August 17, 1870.[140] Cornelius Hedges captured the sentiment of the group when he wrote, "I think a more confirmed set of skeptics never went out into a wilderness than those who compose our party."[141] Though they had heard the many reports of Yellowstone's

[138] Haines, *Yellowstone National Park,* 56-57.
[139] Ibid, 59.
[140] Ibid, 65.
[141] George Black, *Empire of Shadows,* 280.

features, they were skeptical of what they were walking into, not knowing what to expect. Washburn wrote that the group "heads towards the vast unknown. We are now fairly launched upon our expedition without the possibility of obtaining outside assistance in case we need it."[142] Despite all the rumors about Yellowstone, Washburn and the rest of the expedition remained skeptical of Yellowstone. What they had heard so far surely must have challenged what they believed was possible.

The expedition reached Yellowstone about a week after leaving Helena. Early in the exploration, the group reached the Lamar River. The waterfalls there captivated them Lieutenant Doane described Tower Fall, "Nothing can be more chastely beautiful than this lovely cascade, hidden away in the dim light of overshadowing rocks and woods. Its voice hushed to a low murmur unheard at the distance of a few hundred yards. Thousands might pass by within half a mile and not dream of its existence, but once seen, it passes to the list of most pleasant memories."[143] This is an revealing journal entry. Doane was describing the Lamar River, and his description harkens back to Osborne Russell's description of the Secluded Valley in 1833. Both use similar heavenly language to describe a landscape that would remain in their memories forever.

The group moved on, coming to the top of Mount Washburn. It was while they were at the mountain that they were convinced that they were truly in a land of wonders. Doane described the scenes, "A column of steam rising from the dense woods to the height of several hundred feet, became distinctly visible. We had all heard fabulous stories of this region and *were somewhat skeptical* as to appearances [italics added]. At first, it was pronounced a fire in the woods, but

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[142] Nathaniel Pitt Langford, *The Discovery of Yellowstone National Park: Journal of the Washburn Expedition to the Yellowstone and Firehole Rivers in the Year 1870* (University of Nebraska Press: Lincoln, 1972), 17.
[143] Haines, *Yellowstone National Park*, 68.

presently someone notice that the vapor rose in regular puff, and as if it expelled with a great force. Then conviction was forced upon us. It was indeed a great column of steam, puffing away on the lofty mountainside, escaping with a roaring sound, audible at a long distance away even through the heavy forest. A hearty cheer rang out at this discovery, and we pressed on with renewed enthusiasm."[144] Much like Folsom the previous year, Washburn was using industrial language to describe one of Yellowstone's features.

The group took credit for the discovery of Yellowstone, even though its members were not the first to go there or write of it. They continued onward with "renewed enthusiasm." When Langford organized the expedition, he did not recruit men who had been there previously. Instead, he chose men of standing and political connections so that their journals would have added weight at the end of the expedition. He had spoken with Folsom and met with Jim Bridger. He knew the struggles they had in getting their stories of Yellowstone published. Langford carefully chose men whose credibility would not be challenged.[145] That is what makes Doane's comments on top of Mount Washburn so important. When they realized what they were witnessing was in fact very real, they were encouraged, and continued with excitement for what lay ahead and to be sure to adequately record their experiences.

Continuing onward, Langford and the expedition arrived at Antelope Creek on August 27 and made camp for a few nights. While visiting a nearby waterfall, Langford wrote "The stream, in its descent to the brink of the fall, is separated into half a dozen distorted channels which have zigzagged their passage through the cement formation, working it into spires, pinnacles, towers and many other capricious objects. Many of these are of faultless symmetry, resembling the

[144] Ibid.
[145] Miller, *Rediscovering Wonderland,* 16.

minaret of a mosque, others are so grotesque as to provoke merriment as well as wonder. One of this latter character we named "The Devil's Hoof," from its supposed similarity to the proverbial foot of his Satanic majesty."[146] Washburn employed architectural language in his descriptions. Rather than make comparisons to European cathedrals or castles, however, Washburn instead made a reference to an Islamic Mosque. He did not reveal whether that is good or bad, simply making the connection.

The group applied "Devil" to many of Yellowstone's features. In addition to the "Devil's Hoof," they also came up with "Devil's Den," the "Devil's Thumb," the "Devil's Cut," and the "Devil's Kitchen." They made many other allusions to Hell and Satan. Several of the members who kept diaries alluded to the fakelore of Indian superstations around Yellowstone that had persisted for decades. Because of this Doane was unconcerned about facing any hostile encounters. Walter Trumbull, much like De Smet, employed Christian theology in ascribing fears of the geysers to the Indigenous people. He wrote, "I would rather suppose [the Indian] would give [the thermal features] a wide berth, believing them sacred to Satan,"[147] thus perpetuating the myth that the Indigenous people were afraid of the park's thermal features.

Langford's group continued onward from the Devil's Hoof and came to a "basin of boiling sulphur springs," which aroused their curiosity. Langford described the largest spring, which he estimated to be twenty feet wide. "The central spring of the group of dark leaden hue, is in the most violent agitation, its convulsions spasms frequently projecting large masses of water to the height of seven or eight feet. The spring lying to east of this, more diabolical in appearance, filled with a hot brownish substance of the consistency of mucilage, its appearance has suggested the

[146] Nathaniel Pitt Langford, *Diary of the Washburn Expedition,*17.
[147] Black, *Empire of Shadows,* 95.

name, which Hedges has given, of "Hell-Broth Springs."[148] Langford was drawn to explore the springs and geysers. He was intrigued to the point that he risked life and limb for exploration. Langford, instead of comparing the hot springs' steam to the entrance to hell, rather made the comparison to the chimney of a miner's cabin, revealing language that went beyond religion and science and employed industrial language as well.[149] Langford remarked after leaving Hell Broth Spring that Yellowstone so far had not disappointed. These few lines contained such strong images of hell and Satan. Langford was explicitly clear on the imagery and landscape that he was portraying. Though the connection to hell was still strong at this point, a shift was taking place. Slowly, the Folsom and Washburn expeditions began to change the language that they used described the Yellowstone's features. Mixed within Langford's description is both scientific and religious language.

Exploring further, the group came to the Grand Canyon of the Yellowstone on August 31. It was the best feature they had yet encountered. Langford described their feelings when he wrote that "We are all overwhelmed with astonishment and wonder at what we have seen, and we feel that we have been near the very presence of the Almighty. My own mind is so confused that I hardly know where to commence in making at this moment floating past my mental vision. As I took in this scene, I realized my own littleness, my helplessness, my dread exposure to destruction, my inability to cope with or even comprehend the mighty architecture of nature. More than all this I felt like never before my entire dependence upon that Almighty Power who had wrought these wonders."[150] Washburn quoted from the Bible when he first saw the canyon. Here we see a sense

[148] Langford, *Diary of the Washburn Expedition,* 24.
[149] Ibid.
[150] Langford, *Diary of the Washburn Expedition,* 29, 32.

of the sublime in Washburn's description, blending religious descriptions with architectural descriptions.

Langford expressed a unique dichotomy in viewing the Grand Canyon of the Yellowstone. He was both in awe of the grandeur of nature yet overwhelmed with fear at what he was witnessing. He expressed an essence of the sublime. Part of the variance of language lies in the fact that for the first-time observer of Yellowstone's features there exists no prior point of reference for what is being witnessed. The scene, either taken in part or in whole, overwhelmed to the point that observers were left grasping at literary straws to describe what they witnessed.

While exploring the canyon, Langford found a trail which appeared to be used by elk and other wildlife. Following the trail for roughly a mile, which paralleled a stream that flowed into the Yellowstone River. Here he discovered an immense bed of volcanic ash. As they did more exploring, Langford described one region as "a hideous-looking glen filled with sulfurous vapor emitted from five or six springs." The ground was covered with encrusted sinter, and jets of hot vapor laden with sulfur erupted from several hundred vents. One man exploring with Langford described the scene as the entrance to hell, a description that was commonly used for the geyser regions. Langford wrote that the scene "looked like nothing earthly we have ever seen." The sulfur, Langford noted, provided a "disagreeable sense of possible suffocation." Langford also wrote of the springs, saying that they were "all in a state of violent ebullition, throwing their liquid contents up to three or four feet." The springs were so revolting to the group that the group visited the region twice, perhaps coming back the second time to confirm that the place was as bad as they initially thought. Langford wrote when they named the region that "The name of Hell Broth Springs, which

we gave them, fully expressed our appreciation of their character."[151] When the group first travelled through Yellowstone and the Lamar Valley, they applied positive language to what they saw. But their descriptive language quickly shifted from Edenic language to hellscape language, but also with some scientific descriptions.

As they finished exploring the Canyon and began to make their way home, Langford wrote, perhaps ruefully, "The two grand falls of the Yellowstone form a fitting completion to this stupendous climax of wonders. They impart life, power, light and majesty to an assemblage of elements, which without them would be the most gloomy and horrible solitude in nature. Every object that meets the vision increases its sublimity. There is a majestic harmony in the whole, which I have never seen before in nature's grandest work."[152] The group was spellbound by what they had seen. If the geyser basins represented hell and the realm of Satan, then Washburn and other explorers saw redemption in nature in the Grand Canyon and its two magnificent waterfalls.

The Grand Canyon of the Yellowstone served as a microcosm of the Langford Expedition. The language evoked both fear and wonder, awe and terror, the work of both God and Satan. Viewing the river at the top of the canyon meant hearing a deafening silence, the river far below. Venturing down to the bottom of the falls, people hear a deafening roar. The land is at once full of excitement and a sense of foreboding.

As the group made its way onward, Langford collected his thoughts. Like many others, he experienced a region full of grandeur. That term – grandeur – was applied more to Yellowstone's Grand Canyon than any other feature of the park. As Langford sat, overlooking the great canyon with Hedges, he reminisced, "This stupendous display of nature's handiwork will be to me "a joy

[151] Miller, *Rediscovering Wonderland,* 49-50.
[152] Langford, *Diary of the Washburn Expedition,* 33-35.

forever." It lingers in my memory like the faintly defined outlines of a dream. I can scarcely realize that in the unbroken solitude of this majestic range of rocks, away from civilization, and almost inaccessible to human approach, the Almighty has placed so many of the most wonderful and magnificent objects of His creation, and that I am to be one of the first few to bring them to the notice of the world. Truly it has been said that we live to learn how little may be known, and of what we see, how much surpasses comprehension."[153] The scenes of wonder overwhelmed and stayed in Langford's memory long after he travelled in Yellowstone.

Langford and the rest of the expedition moved onward from the Grand Canyon to Yellowstone Lake. Along the way they came across a region of geysers and boiling springs, stopping to record their observations. Langford was especially careful to make thorough observations and record them in his diary. Yet for all his training and expertise, he was left in awe on several occasions. Washburn and Langford explored the mud volcano for a second time on September 3, "I especially desired to see it again for the one especial purpose, among others of a general nature, of assuring myself that the notes made in my diary a few days ago are not exaggerated. No! They are not! The sensations inspired in me today, on again witnessing its convulsions, and the dense cloud of vapor expelled in rapid succession from its crater, amid the jarring of the earth, and the ominous intonations from beneath, were those of mingled dread and wonder. At war with all former experience, it was so novel, so unnaturally natural, that I feel while now writing and thinking of it, as if my own sense might have deceived me with a mere figment of the imagination."[154] Langford presented a compelling insight into how different Yellowstone was from what he knew to be reality. Yellowstone's treasures were 'at war' with his former

[153] Langford, *Diary of the Washburn Expedition,* 37.
[154] Langford, *Diary of the Washburn Expedition,* 47-48.

experiences, so "unnaturally natural" that Langford had to go back again to the mud volcano to make sure that it was real, not a mere figment of his imagination. What Langford saw was simultaneously unnatural, not real. But clearly it was very real, and he did not know how to fully capture the wonderous scene in from of him. If only more people could have that same sense of awe and wonder at witnessing many of Yellowstone's marvelous features.

In snowed on September 13, which created an unique sight. Langford wrote that "The murky atmosphere tonight brings to view a number of springs on the opposite shore of this arm of the lake and farther back in the hills which we have not heretofore seen, and the steam is rising from fifty craters in timbered ridge, giving it the appearance of a New England factory village."[155] Not all comparisons were religious. Here Washburn made comparisons to the industrial revolution that was taking place. People could envision what a factory village looked like.

After finishing their exploration of Yellowstone Lake, Langford, Washburn, Doane, and the rest of the group finished their observations and prepared their final diary entries. Langford for one was dismayed at having to leave the lake, writing that "it is with greatest regret that I turn my face from it (Yellowstone Lake) homewards."[156] The spirit and wilderness captivated Langford to the point that he did not want to conclude the expedition.

They made it back to Helena, where they began to collect their observations and notes for publication. Despite all the striking landscapes that evoked hellscape imagery in the minds of the group, Washburn remembered one area in particular: "Surrounded by these hot springs is a beautiful cold spring of tolerable fair water. Here we found a beautiful spring or well. Raised around it was a border of pure white, carved as if by the hand of a master workman, the water pure.

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[155] Langford, *Diary of the Washburn Expedition,* 90.
[156] Langford, Diary of the Washburn Expedition, 96.

Looking down into it one can see the sides white and clear as alabaster, and carved in every conceivable shape, down, down, until the eye tires of impenetrating."[157] Even walking amid a "hell," the group still found pockets of Edenic paradise. In the Bible, white represented purity. The "master workman" Washburn described was most like a reference to God.

Washburn's reports also included, "We bid farewell to the geysers, little dreaming there were more beyond. Five miles beyond we found the 'Lake of Fire and Brimstone.' In the valley we found a lake measuring four hundred and fifty yards in diameter, gently overflowing, that had built itself up by the deposit of white substrata, at least fifty feet above the plain. This body of water was steaming hot. Below this was a similar spring, but of smaller dimensions, while between the two, and apparently having no connection with either, was a spring of enormous volume flowing into the Madison [Firehole River] and is undoubtedly the spring which *Bridger has been laughed at so much about,* as heating the Madison for two miles below [italics added]."[158]

There are a several things to note here. Firstly, Washburn noted that the group came to a place known as the "Lake of Fire and Brimstone." That imagery would have drawn the reader's mind to language and illusions that came from the Great Awakening. Some preachers were known as 'Fire and Brimstone' preachers that used the threat and fear of hell to get their congregations to repent and turn from their sinful ways. The other interesting thing to note is that the expedition reached the point that Jim Bridger had been laughed at for describing. However, this is one instance where what appeared to be an outrageous claim proved to be true.

Washburn knew the expedition used satanic connotations in association with several of the parks features. Some of the descriptive phrases they used include "Devil's slide," "Hell Broth

[157] Haines, *Yellowstone National Park,* 84.
[158] Haines, *Yellowstone National Park,* 84.

Spring," "Devil's Hoof," and "Devil's Den." Former Yellowstone historian Aubrey Haines notes that these phrases were readily understood by a public raised on "hell-fire" and brimstone" theology. Langford had misgivings about the terminology that the group used, but nonetheless wrote, "I presume that many persons will question the taste evinced by our company in the selection of names for the various objects of interest we have thus far met with; but they are all so different from any of Nature's works that we have ever seen or heard of, so entirely out of range of human experience, and withal so full of exhibitions which can suggest no other fancy that that which our good grandmothers have painted on our boyish imaginations as a destined future abode, that were are likely, almost involuntarily, to pursue the system with which we have commenced, to the end of our journey. A similar imagination has possessed travelers and visitors to other volcanic regions."[159] Yellowstone's unique geology and features have remained constant, even if the language used to describe them has changed significantly over the years.

Langford made several fascinating observations. First, he noted that because the features themselves were so far outside of what was known at the time that they struggled mightily to determine how to describe and name them. A second thing that he noted is that his upbringing, along with those of his fellow travelers, impacted how they named these features. Langford wrote that scenes they saw reminded them of what their 'good grandmothers' had warned them of as children. This echoed Joe Meek's reminiscing about his childhood pastor's remarks lingering in his memory. These factors came together to determine how this group, and others before them, described the landscape that they witnessed. It was so unique, so unlike anything they had ever

[159] Aubrey Haines, *Yellowstone Place Names: Mirrors of History*, (Niwot, CO: University Press of Colorado, 1996), 88-89.

seen before, that they could not help but reach back to their childhood upbringing to use the religious language with which they were raised to describe what they were seeing.

The responses to the Washburn Expedition, locally and nationally, were mixed. The *Rocky Mountain News*, out of Denver, Colorado, reprinted a portion of Washburn's account, prefacing Washburn's account with, "There are a great many wonderful things in the West, and many wonderful stories are told regarding them. From the *Montana Herald's* account of the recent Yellowstone expedition, we take the following, which while it may interest the reader, will also draw somewhat on his powers of credulity."[160] On the one hand, Langford and Washburn had succeeded by getting their accounts published, but they still had to work hard to convince a skeptical public of their experience in Yellowstone.

The local response in Helena was overwhelmingly positive for both Langford and Washburn. The *Helena Daily Herald* announced in late September that "We today reproduce the articles of both these gentlemen, and print a large number of extra of the paper to supply the public demand." The responses varied, from outright scoffing to excessive enthusiasm. Many of the larger national newspapers, such as the *Philadelphia Public Ledger, St. Louis Times,* and the *San Francisco Chronicle* were generally unaware of, or just not interested in the Yellowstone region to reprint any of Langford's or Washburn's accounts of their journey.[161] The further away a newspaper was from Yellowstone, it seemed, the less likely it was to hear of or report information of Yellowstone.

One member of the Washburn Expedition did something that previous explorers did not. N.P. Langford gave a series of lectures in the east coast, including in New York City. An

[160] Haines, *Yellowstone National Park*, 85.
[161] Ibid, 86.

announcement in the *Helena Herald* stated, "Hon. N.P. Langford, we understand, is to lecture in the states this winter, on the wonders of the Yellowstone country. Mr. Langford is a good writer, and the wonderful scenes which he has to describe must insure the delight and attention of any audience." Langford and Washburn were determined to make Yellowstone known. Langford presented his lecture in November of 1870. A few months later, in January 1871, he gave another speech, this time in Washington, D.C., which Ferdinand Hayden attended. Hayden had come close to entering Yellowstone in 1860, but bad weather prevented him from doing so. Hayden, like Langford, had met Bridger and was intrigued by the stories the famed mountain man spun. By the end of Langford's lecture, Hayden's desire to explore Yellowstone burned even stronger.[162] One of the early results of the Washburn Expedition was the interest that it garnered among scientists, Hayden included. After over sixty years of rumors and stories, an official scientific expedition would be sent out to unravel the mysteries of the Yellowstone.[163]

In November 1870 the *Gold Hill Daily News* out of Nevada published a description of Yellowstone's features: "Our northern exchanges contain descriptions of the extraordinary natural wonders which are said to have been discovered by an exploring party in the Yellow Stone Country. Volcanoes, huge geysers and immense waterfalls are among the curiosities mentioned. The descriptions given of that region have more of the semblance of a fairy tale than of reality. The newspapers in which the appear, however, vouch for their correctness. According to these accounts, that part promises to be as interesting a field for scientific exploration as the

[162] Haines, *The Yellowstone Story,* 137-138.
[163] Haines, *Yellowstone National Park,* 99.

Colorado."[164] While the article does not name the exploring party that it quoted, it is possible that it was based on descriptions from Langford's accounts, as he gave several public presentations of his travels in Yellowstone. The Colorado was already established as a place of scientific exploration, and Yellowstone has since proven to be an interesting region for scientific exploration.

The Hayden Expedition

Hayden sprang into action after Langford's lecture. He petitioned Congress for funding for a trip to explore Yellowstone. His request was approved, and he received $40,000 in funding and a raise in salary from $1,000 to $4,000. The funds would be available July 1 and, in the meantime, he began assembling his group at camp near Ogden, Utah. It was during this time at Ogden that painter Thomas Moran joined the expedition at the request of Jay Cooke. Moran was a critical addition to Hayden's survey for the paintings he would produce. General Philip Sheridan sent some military men that joined the expedition. Sheridan had been impressed with Lieutenant Doane's reports, authorizing men under his command to go with Hayden. The Expedition's preparations for a six-week journey into Yellowstone was done in two days. After gathering the necessary supplies, the group set out for Yellowstone.[165]

Also joining Hayden's expedition was the photographer William Henry Jackson, who worked with Hayden before. One historian has argued that Jackson's "ability to capture the many scenes of sublime beauty … did more than anything else to publicize the 'Tourist's West,'"[166] and was crucial to the Yellowstone expedition. Jackson's depictions of the American West had a huge

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[164] *Gold Hill daily news. [volume]* (Gold Hill, N.T. [Nev.]), 08 Nov. 1870. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn84022046/1870-11-08/ed-1/seq-2/> accessed May 15th, 2023.
[165] Haines, *The Yellowstone Story,* 141-142.
[166] Goetzmann, *Exploration and Empire,* 500.

impact on western exploration. His pictures of rock striations aided geographers while his photos of the barren parts of the West aided planners back in D.C. to see the challenges that settlers were facing. His pictures helped usher in a new era of realism that in many ways replaced the romanticism of an early day. His pictures also changed how Hayden operated. Because Jackson was now part of his team, Hayden tended to focus more on the picturesque geological features, which played out in Hayden's Yellowstone Expedition.[167]

Once Hayden's party was assembled, the group made their way to Bozeman, Montana, before heading south towards Yellowstone. Albert Peale described the journey from Fort Ellis to Mammoth Hot Springs. After stopping for the evening, Peale described collecting several fossil specimens. Though the group had not yet reached Yellowstone, they were already making scientific collections and observations, following in the path that Hayden had pioneered two decades prior.

The expedition entered Yellowstone from the north and traveled through Paradise Valley and Yankee Jim Canyon on its way to Mammoth Hot Springs. Albert Peale described the canyon, "As we came near the mouth of the Canyon the rocks became gniessoid, passing into granite at times. We are encamped in the midst of the Canyon having marched fourteen and a half miles. The canyon is beautiful high masses of gneissic rocks standing out in bold, rugged relief while here and there are slides of rock, the River is of a deep green color and runs close to the Mountains on its right banks which are very high."[168] What separated Peale's description of Yankee Jim Canyon from other descriptions of this canyon and others was how he saw beauty in the rock formation.

[167] Geotzmann, *Exploration and Empire,* 500.
[168] Merrill, *Yellowstone and the Great West,* 125-126.

Peale noted the striation of rocks, different types, even noting the color of the rocks. But for Peale the beauty lay in the rocks themselves more so than any other feature.

It was quickly becoming apparent, as the Devil's Slide and Mammoth Hot Springs indicated, that Yellowstone could be the best place in the world to study volcanic activity and formations. Because of the constraints Hayden faced, however, he could only give each section of Yellowstone a cursory examination.[169] Hayden wrote while traveling through the canyon, "The valley, or park, as it might be called, below the canon, is extremely beautiful to the eye, as all these oval valleys are. The canon is about three miles long; the river has cut its way through the limestone ridge nearly at right angles, forming a perfect cross-section, so that the character of the rocks down to the granites maybe examined. Passing through the canon, we came into a broad, open valley again, much larger but similar to one already described."[170]

Hayden and Peale presented similar descriptions of the valley. To be sure, everyone who came across any of Yellowstone's valleys were entranced by what they saw. Once Hayden and Peal began to describe the scenes, they overlaid their personal assumptions and training onto the land. Osborne Russell lyrically described the secluded valley. Hayden was no less expressive, instead focusing on the scientific observations of the landscape. Interwoven within his description are terms like "right angles," "cross-sections," "Carboniferous," etc. Presented here is a clear delineation between religious and scientific language.

The group next came to the Devil's Slide, a peculiar feature the group explored just north of the park boundary. Hayden described what he saw, "There is but little vegetation along the river,

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[169] William H. Goetzmann, *Exploration and Empire: The Explorer and the Scientist in the Winning of the American West* (New York: Vintage Books: Random House, 1966) 505.
[170] Hayden, *Geological Survey of the Territories,* 53.

a few trees being thinly scattered on its banks. The valleys themselves are covered with a fine dust probably originating in the finely powdered volcanic rock as in the Snake River Valley. Proceeding a little farther, passing huge, towering masses of stratified limestones, we came to Cinnabar Mountain, so called from the color of some of the rocks. Here we came to Devil's Slide."[171] What differentiates Hayden's journal from previous accounts was the terminology that denoted a scientific approach and mindset. Hayden hoped that his detailed, accurate approach would squash any doubt about the reality of the region.

What is riveting to see when reading Hayden's *Geological Survey of the Territories* is how often words like 'granite,' 'granitic,' 'gneiss/gniessoid,' 'debris,' 'Jurassic,' 'quartz,' and other similar terms appear. Describing Devil's Slide, Hayden wrote, "A bed of yellowish-gray quartzite forms one of the walls of the Devil's Slide and is probably near the summit of the Carboniferous group in this locality. The excellent illustration (Fig. 11), taken on the spot by Mr. Elliott, shows the nearly vertical wall of quartzite on the right, the broad interval covered with *debris,* grass, and a few scattered pines; and on the left, the huge wall or dike of basalt. This is a remarkable feature in the geology of this region."[172] Hayden was not given to religious language or fear of the supposed demonic feature. He was methodical in his analysis and observations. His *Survey* included a drawing of the Devil's Slide, something that had not been provided with previous descriptions of the unique formation.

Hayden's description of Mammoth Hot Spring is unique as well, if not colorful. He wrote upon reaching the Hot Springs that "It has been rainy all afternoon. At sunset the view from the top of the springs was very pretty, the white sediment in the foreground, the hills near us of a

[171] Marlene Deahl Merrill, *Yellowstone and the Great West* 126.
[172] Hayden, *Geological Survey of the Territories,* 62.

golden green color, while the Mountains, in the far distance, of a dark bule color with red exposed spots in places, while the clouds stood in masses on their sides."[173] Hayden again grounded his language in ways people could understand, which were perhaps easier to understand than previous accounts. The pictures of Jackson and paintings of Moran also helped.

Hayden was thorough in his description of Mammoth Hot Springs. He wrote that "The snowy whiteness of the deposit at once suggested the name of White Mountain Hot Spring. The eye alone could convey any adequate conception to the mind. The steep sides of the hill were ornamented with a series of semicircular basins, with margins varying in height from a few inches to 6 or 8 feet, and so beautifully scalloped and adorned with a kind of bead-work that the beholder stands amazed at this marvel of nature's handiwork."[174]

Hayden's journal continued to be full of detailed scientific descriptions. In comparing various written accounts of Yellowstone, it is compelling to see a formula appear. The region being described – valleys, geysers, waterfalls, etc., – are too wonderful for word. Hayden, like others, begins with a variation of "I will attempt to describe this most wonderful/remarkable/magnificent/sublime/etc. region." Following that introduction, the person describes what they see, followed by a general conclusion of "This place will remain in my memory forever." The difference lies in the language used to describe the various features. Earlier explorers used religious language while Hayden used scientific language. It is intriguing to note that men like Bridger, Osborne Russell, and others ascribed the wonders they witnessed to the hand of Providence or God, whereas Hayden believed that the wonders of Mammoth and the rest of Yellowstone had been sculped by nature's handiwork. Hayden thought that the photographs and

[173] Merrill, *Yellowstone and the Great West,* 128-129.
[174] Hayden, *Geological Survey of the Territories,* 64-66.

pictures being produced by Moran and Jackson did not fully capture the wonder and beauty of Mammoth Hot Springs – it had to be seen to be full experience for the beauty and wonder it had.[175] Hayden finished with saying that nature's handiwork was responsible for the formation of the features he wrote about; previous explorers attributed Yellowstone's beauty to the divine.

Even though Hayden was on a scientific journey, he still found time to stop and appreciate the beauty of the landscape. While exploring Mammoth Hot Springs, he recorded that "The meadows were covered densely with grass, and flowers of many varieties, and among the pines were charming groves of poplars, contrasting strongly by their peculiar enlivening foliage with the somber hue of the pines. The climate was perfect, and in the midst of some of the most remarkable scenery in the world, every hour of our march only increased our enthusiasm. The climate during the months of June, July, and August, in this valley, cannot be surpassed in the world for its health-giving powers."[176] There was something magical about Yellowstone's summer months, especially when spent in the hidden valleys and secluded corners of Yellowstone. Hayden used Edenic language in his description of Yellowstone in the summer.

In addition to his scientific endeavors, Hayden also demonstrated his appreciation of the sublime. "But it is to the wonderful variety of exquisitely delicate colors that this picture owes the main part of its attractiveness," he wrote. "The little orifices from which the hot water issues are beautifully enameled with the porcelain- like lining, and around the edges a layer of sulphur is precipitated. As the water flows along the valley, it lays down in its course a pavement more beautiful and elaborate in its adornment than art has ever yet conceived. The sulphur and the iron, with the green microscopic vegetation, tint the whole with an illumination of which no decoration-

[175] Hayden, *Geological Survey of the Territories,* 67.
[176] Hayden, *Geological Survey of the Territories,* 76.

painter has ever dreamed."[177] Hayden was captivated by the art-like beauty in the scene. The beauty of the landscape was in the art-like colors that was clearly visible.

The Expedition studied the active and the inactive geysers, obtaining as much information as time permitted. These hot springs opened a chapter into the planet's history. Descriptions such as this also removed several of the myths that had been swirling around Yellowstone for decades. No longer did people have to rely on just old fur trappers' stories of Yellowstone. Hayden told one of the military officers while camped at Mammoth that "I have traveled all over the world. I have been exploring seventeen years. I thought I had viewed all the great wonders. But all sink into insignificance compared with this."[178] The scientist in Hayden was able to experience and express wonder at Yellowstone's marvelous features. The scientists that accompanied Hayden were intrigued by Mammoth's many features, the group staying there two days to further explore the curiosities of the area.[179]

Another way Hayden distinguished himself from previous explorers is that he took collected and tested various samples while at Mammoth. He described his approach, "After dinner I went over towards the ranch and got some of the water and specimens. I made a qualitative analysis of the water and found a small quantity of Hydrogen Sulphide, sulphate of magnesium, and small amounts of carbonate of soda. Lime is pretty abundant, alumina is also present in quantity. There is probably carbonate of potassium present also."[180] Hayden was the first scientist, but definitely not last, to be intrigued by Yellowstone's thermal and water features. Almost one

[177] Hayden, *Geological Surveys of the Territories,* 69.
[178] Megan Kate Nelson, *Saving Yellowstone: Exploration and Preservation in Reconstruction America* (New York: Simon and Schuster, 2022), 62.
[179] Nelson, *Saving Yellowstone,* 63.
[180] Merrill, *Yellowstone and the Great West,* 131.

hundred years later, the microbiologist Thomas Brock visited Yellowstone and was intrigued by Yellowstone's thermal waters.

As the group moved on from Mammoth, Peale made a unique observation. He wrote, "Great Mountains in all directions, formed in the background, while in the foreground, far beneath us, lay the valley through which we had just passed. The central feature of the scene was the Hot Spring we had just left. Turning around, the scene in front was entirely different. Instead of the grandeur we had just been looking at, we gazed upon low rolling hills covered with beautiful verdure with here and there scattered trees, principally pines. It reminds us of Pennsylvania fields. All that was wanting to complete the picture was houses, barns, and fences."[181] Peale's account here reveals the instability of the language used. A person could literally do a 180 and see scenes that contain completely different features. On the one hand, there was the sublimity of the Hot Springs valley. Turning around, Peale saw a scene that reminded him of home, with just a house and barn missing to complete the picture. Moving on from that scene, Peale came to Wraith Falls. He described the geologic formation that helped form the waterfall, again noting beauty in geologic features. This difference of geography in such a short space contributed to the variance of the language.

Hayden's expedition made its way from Mammoth Hot Springs to Tower Falls, Yellowstone Canyon, and then to Yellowstone Lake. Hayden wrote as they travelled, "Great Mountains in all directions, most of them rounded in form, others, rising in sharp peaks, formed the background, while in the foreground, far beneath us, lay the valley through which we had just passed. The central feature of the scene was the Hot Spring we had just passed. Turning around,

[181] Merrill, *Yellowstone and the Great West,* 132.

the scene in from was entirely different. Instead of the grandeur we had just been looking at, we gazed upon low rolling hill covered with beautiful verdure with here and there scattered tees, principally pine. All that was wanting to complete the picture was houses, barns, and fences."[182] Again Hayden placed his readers into a mindset they could readily comprehend. Valleys filled with homes and barns surrounded by fences touched upon an idyllic, pastoral scene that was reminiscent of a scene out of the Hudson River school. Hayden wrote that as he turned from facing one direction to another, the scenery and landscape changed. Within Yellowstone's small confines there exists so many types of valleys, geysers, rivers, mountains, and other such features that travelers cannot help but see parts of home in Yellowstone and make comparisons to what they are familiar with.

When Hayden's group reached the great geyser basin, they used their scientific training to describe the geysers. Hayden believed the basin "one vast crater made up of thousands of smaller volcanic vents and fissures out of which the fluids of the interior of the earth, fragments of rock, and volcanic dust, were poured in unlimited quantities" at the end of the Pliocene era.[183] Where fur trappers and gold miners described visions of hell, Hayden saw the earth's deep history in the rock and volcanic formations of the geyser basin.

Hayden recorded in his official survey that, "I believe that the time of the greatest volcanic activity occurred during the Pliocene period—smoke, ashes, fragments of rock, and lava poured forth from thousands of orifices into the surrounding waters. Hundreds of cones were built up, fragments of which still remain; and around them were arranged by the water the dust and fragments of rock, the *ejectamenta* of these volcanoes, in the form of the conglomerate or breccia

[182] Merrill, *Yellowstone and the Great West,* 130.
[183] Nelson, *Saving Yellowstone,* 82.

as we find it now. The causes which have produced the phenomena here, either in the Pliocene period or the present-, are the same all over the world, and have been favorite topics of discussion by men of science."[184] Hayden was anticipating a time when scientific endeavors would be routinely carried out in Yellowstone. One of the reasons that people had been skeptical of men like Jim Bridger is because of the language used by Bridger was too fanciful, too outlandish, or otherworldly. Hayden's reports were more believable due to the language used.

Hayden also noted while at the geyser basin, "As I have previously stated, the entire Yellowstone Basin is covered more or less with dead and dying springs, but there are centers or groups where the activity is greatest at the present time.. There is one huge boiling spring which is turbid, with fine black mud all around the sides, where this fine black earth is deposited. The depth of the crater of this spring, its dark, gloomy appearance, and the tremendous force which it manifested in its operations, led us to name it the "Devil's Cauldron."[185] Even though Hayden was not a religious man, he still applied at least one "Devil" toponym to the region. Yellowstone's geothermal features continue to elicit satanic references despite Hayden's thorough descriptions. Hayden was also careful to record the temperature of the geysers as well, further grounding the place.

While exploring the geysers, Hayden came upon a spring which he had heard about from the trappers. He wrote that "This is a true intermittent spring. July 28 and 29 it played several times, throwing the water to the height of 20 to 30 feet. The impression among the mountain-men was that this is a periodic spring, and played once in six hours precisely. In order to test this belief, I directed my assistant, Mr. Campbell Carrington, with one non-commissioned officer of the escort,

[184] Hayden, *Geological Survey of the Territories,* 81.
[185] Hayden, *Geological Survey of the Territories,* 86.

to return from our camp on the lake, and note minutely the movements of this spring for twenty-four hours in succession."[186] Carrington recorded eight instances of the spring throwing water in the air in a twenty-four-hour period. Such accuracy had not yet been applied before to any portion of Yellowstone's geysers or hot springs. Hayden assigned a member of his team to test rumors he had heard from the mountain men. It is entirely possible that Hayden was referring to Jim Bridger here.

It is evident that Hayden talked to many different people prior to leaving for Yellowstone. Not only was he familiar with the stories of the mountain men, but he had also spent time with Langford. While exploring the geyser region near the Firehole River, he agreed with Langford's sentiment that the area resembled a factory village.[187] The group then made their way to Yellowstone Lake, where Hayden observed that "The lake lay before us, a vast sheet of quiet water, of a most delicate ultramarine hue, one of the most beautiful scenes I have ever beheld. The entire party were filled with enthusiasm. The great object of all our labors had been reached, and we were amply paid for all our toils. Such a vision is worth a lifetime, and only one of such marvelous beauty will ever greet human eyes. From whatever point of view, one may behold it, it presents a unique picture."[188]

As has been noted, there is a relationship between the variability of the landscape and the variable language used to describe whichever feature was being used. An observer can look at Yellowstone Lake from different angles and see something unique or different. Hayden also noted that their purpose was to make a careful topographical and geological survey of Yellowstone Lake.

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[186] Hayden, *Geological Survey of the Territories,* 94-96.
[187] Hayden, *Geological Survey of the Territories,* 104.
[188] Hayden, *Geological Survey of the Territories,* 96.

Two members of the Expedition – Elliot and Carrington – made careful topographical and pictorial charts of the lake and the islands located within.[189] Graphs, charts, pictures, paintings, many such forms were recorded and brought back on the Hayden Expedition. These replaced the myths and stories of the fur trappers, mountain men, and gold miners that had been circulating for decades.

After exploring the lake, the group continued its exploration. After it reached the Grand Canyon, Captain Barlow, one of the soldiers sent by Sheridan, succinctly captured his thoughts on the Upper and Lower Falls. He thought that the Upper Falls represented "the embodiment of beauty, the lower one that of grandeur." The colorful nature of the Grand Canyon caught painter Thomas Moran's eye. He wrote, perhaps with some regret, that the beautiful colors "were beyond the reach of human art."[190] Moran did not let that stop him, as he produced the oil painting of the Grand Canyon of the Yellowstone that resides in the U.S. Capitol.

Hayden's description of the Grand Canyon is quite different from Langford's. Whereas Langford was very poetic and in awe of the Canyon, Hayden wrote that "We took measurements with the aneroid barometer and found that the canyon was 1,000 feet deep where we descended. The falls, therefore, must be about 400 feet high. They are very pretty indeed, and the sun shining on the spray formed a beautiful rainbow. On the side of the rock where the spray dashes there is quite a good deal of vegetation of a beautiful green color. The Canyon is grand."[191] Again, Hayden described these features in terms readers could more readily comprehend. Hayden's observations of the geyser basin were rather nondescript in comparison to previous reports. He described the

[189] Hayden, *Geological Survey of the Territories,* 98.
[190] Haines, *The Yellowstone Story,* 146.
[191] Merrill, *Yellowstone and the Great West,* 136.

geysers that spouted, their frequency, and a wider variety of scientific observation. Hayden avoided the comparison to Hell in his writings.

And yet Hayden attempts to describe the waterfalls to the best of his ability, mixing poetic and scientific language. He explained that "No language can do justice to the wonderful grandeur and beauty of the canon below the Lower Falls. Here are portions of the day when these colors seem to be more vivid, and the rugged walls of the canon stand out more in perspective, so that while the falls fill one with delight and admiration, the Grand Canyon surpasses all the others as the one unique wonder, without a parallel, probably, on our continent."[192] Hayden marveled at the Grand Canyon. There is a theme that emerges when reading accounts of the Canyon and the Upper and Lower Falls. Many, including Hayden, noted that "no language can do justice" to describe the magnificence of the sight. There is a beauty here that is unmatched elsewhere. It is fascinating to note how different people have experienced that beauty.

Albert Peal, along with a colleague, climbed down the side of the canyon to collect samples and measurements. Peale thought that "The Canyon is grand. It is cut through igneous rocks of various kinds and in places is stained of a red color from the iron of numerous springs. In others, it its bright yellow from infiltration of sulphur. In others, it is green from vegetation and in still others pure white. The rocks are weathered so as to form columns, towers, etc. along the banks, from top to bottom, the river rushes through the narrow space at the bottom as if chafing against its imprisonment. It dashes against the rocks in great waves covered with foam."[193] Peale was unique in that he explained the reason behind how each of the different colors and variations of the rock wall.

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[192] Hayden, *Geological Study of the Territories,* 83-84, 86.
[193] Merrill, *Yellowstone and the Great West,* 136.

Robert Adams, another member of the expedition, was in awe when he first witnessed Yellowstone's Grand Canyon. He wrote, "There, looking down the great divide, with its mountain sides shutting out all other view, and seeing the water which passed but a moment ago flowing hundreds of feet beneath us. Oh! It was grand! Sublime! A sight never to be forgotten."[194] There is something about the act of seeing such a waterfall and being transfixed by the sights and sounds of the Yellowstone River cascading, tumbling, thundering over the Upper and Lower Falls that for well over a century has captivated those who have witnessed its enchanting views. Many of the early tourists who visited this scenic spot echoed Adams's words when he said that it was "a sight never forgotten." The Canyon is unique in Yellowstone in that it continually evokes the similar responses of awe and wonder. Hayden left Moran and Jackson to paint and photograph the Grand Canyon.

From the canyon, Hayden's team next made its way to the Lower Geyser Basin. Peale had much to say about the geysers. He described Fountain Paint Pot, "The mud is of all consistencies. The steam escaping through the mud has reduced it to an extreme degree of fineness, and in pushing its way through some places throws it back in forms resembling the leaves of a lily."[195] Where others would have simply seen hellish features, or at least used hellish language and quickly moved on from the area, Peale instead was intrigued by the paint pots and sought to put its features into words people could understand.

Peale also wrote, "We followed a string of hot springs away up a ravine taking temperatures and collecting specimens. All the springs and geysers seem to contain a great deal of silica and

[194] Nelson, *Saving Yellowstone,* 83.
[195] Merrill, *Yellowstone and the Great West,* 145.

iron which is deposited in different places."[196] This statement demonstrates that Peale, Hayden, and the rest of the expedition were serious in their endeavors. Instead of being repulsed or overwhelmed by Yellowstone's geothermal features, Peale and Hayden continued to study and explore them, and were willing to risk injury to collect samples needed to submit as part of the final package to Congress when the expedition finished.

While Peale was collecting sulphur, a geyser he called the Giant Geyser intrigued him. He described what he did next, "When we got to the Giant, everything was quiet. Supposing the spouting was all over, after collecting specimens and pebbles from pockets around the basin, we turned to leave but had gone only a short distance when it commenced action. It spouted about sixty feet although it looked a hundred. The volume of smoke was immense and as the water broke into spray, high up in the air, the sight was grand. The eruption lasted about twenty minutes when all became quiet again and we left."[197] Just when Peale and his group believed that the eruptions were over and they would not have an opportunity to witness it and decided to leave, the geyser erupted, grabbing their attention. Peale describes the eruption as "grand." Earlier witnesses, if not of the Giant Geyser than perhaps of other geysers, would have used more biblically inspired language, trembling perhaps with fear instead of excitement.

Peale collected several samples while exploring the geysers. Despite his scientific background, however, on at least one occasion he used the metaphor of the heavens to describe one of the hot springs. He wrote, "Some of the huge hot springs are filled with water clear as crystal. The tint seen is a most beautiful blue. I can compare it to nothing but the blue of a clear sky, and even then, you must imagine the colors intensified. It seems as though the cavity were

[196] Merrill, *Yellowstone and the Great West,* 145.
[197] Merrill, *Yellowstone and the Great West,* 146.

lined with a portion of the heavens above us, convoluted and rolled over the sides of the spring, each of which throws back the sunlight dispersed into its constituent colors."[198] Peale was awestruck by the clarity and depth of color of this geyser. It is intriguing to see Peale struggle to describe these geysers, the blueness is simultaneously like the sky and yet like no other shade of blue that he had even seen before.

Hayden composed a letter to Spencer Baird of the Smithsonian, describing the group's efforts to this point of their expedition. Hayden explained that "We are making most abundant sketches and Photographs of everything. Henry Elliott has been most diligent. Every cone, Pyramid, the springs in operation, etc., are all sketched. We found the hottest Springs or Geysers to vary from 188 to 198. The boiling point here is somewhere between 194 and 196. A great majority of the springs ranged from 140 to 175."[199] Hayden and his men had thus far remained faithful to their mission to collect samples and information pertaining to one of the blank spots on America's maps to this point. The group took temperatures and chemical composition of Yellowstone's hot springs, something that had not been done by previous individuals or groups of people. Even though Hayden was taking scientific measurements, he allowed himself to enjoy the wonder of Yellowstone's features, such as the geysers.

Despite Ferdinand Hayden and Albert Peale's meticulous observations, especially of the geyser regions, not all felt the same as they did. A newspaper published parts of the journals. The article, titled "A Ride to the Infernal Regions," contained the following hellscape language, "A few soldiers of the Hayden escort having been over on a scout from the lake, we followed their trail, which led us BY A WAY WE KNEW NOT, and by hell, which we will never go again. It is a

[198] Merrill, *Yellowstone and the Great West,* 147-148.
[199] Merrill, *Yellowstone and the Great West,* 153-154.

fit pat only for the soldier who contracts to wrestle with Death, or the Christian whose lamp is ever trimmed and burning. As we advanced, geysers, little lakes of boiling water, cisterns steaming and puffing mud holes – some of them perfect wonders – grew thicker and thicker, until our path was beset by pitfalls, divers gaping caverns whose tongues of sulphureous vapors and obnoxious gases were ready to lay us up, the like of which was enough to put to flight a Bunyan's Pilgrim. With all these VISIBLE TERRORS STARING AT US, and our nostrils filled with the fumes of brimstone, all it needed to complete the picture (and cause a stampede) was for the prongs of a pitchfork to be seen rising up out of a geyser. We felt that we were treading in the jaws of death. But joyfully turning our backs on SATAN'S SANCTUM, we were soon "on the heights" that an Auerbach himself might be rejoiced to see, and which may well be considered the summit of Wonderland."[200] While the primary goal of the Hayden Expedition was scientific discovery, at least one member was so taken aback by the geyser region that he resorted to using religious language to describe the geyser region, not unlike the explorers that came before.

One cannot leave with Hayden from the geyser region without examining his description of the Grand Prismatic. He wrote, "As the surface is stirred by the passing breeze, all the colors of the prism are shown, literally a series of rainbows. We called the most delicately colored springs, Prismatic Springs. In the basin yet to be described, are several of these prismatic springs of marvelous beauty, and the striking vivid- ness of the colors."[201] Part of what made Grand Prismatic so unique is how struck Hayden was when he first saw it. The colors of Grad Prismatic, the Grand Canyon, and many other Yellowstone features have caught the eyes of countless travelers to the

[200] *The new North-west. [volume]* (Deer Lodge, Mont.), 16 Dec. 1871. *Chronicling America: Historic American Newspapers*. Lib7 of Congress. <https://chroniclingamerica.loc.gov/lccn/sn84038125/1871-12-16/ed-1/seq-3/> Accessed May 15th, 2023.
[201] Hayden, *Geological Survey of the Territories,* 104-105.

park. Hayden's detailed scientific reports provided information that proved beyond a shadow of a doubt that Yellowstone's wonderous features were real. Hayden and his men were very careful about collecting detailed information about Yellowstone's geologic and geographic features. Additionally, in his July 28th journal entry, Albert Peale referenced collecting and preserving collected specimens three times while exploring Yellowstone Lake. Hayden's collections and annotations established an authoritative voice that trappers' and miners' stories did not.

Hayden's Expedition had many impacts. One was that newspapers were more willing to verify and publish accounts from Hayden's team. *The Perrysburg Journal* (Ohio) published portions of journals from the Expedition, concluding their story with the following, "We have heard enough now to be satisfied that the region in question must be the most wonderful of this wonderful central continent of ours, and to suspect that it deserves in this wise, absolute pre-eminence. Professor Hayden's official report, which, we hope, will not long be delayed, will enable us to arrive at conclusions more positive."[202] The Expedition also influenced the bill that established Yellowstone as a national park in 1872.

Even though Yellowstone was nationally known on a new level by the end of the Hayden Expedition, it was not easy for most Americans to get there. Nathaniel Langford wrote soon after assuming duties as park superintendent, "The park is at present accessible only by means of saddle and pack trains. A few years only can elapse before it will be reached by railroads; but until then it must be accommodated with good wagon-roads or remain unvisited except by the few who are willing to endure the privation and exposure incident to horseback travel."[203] As the next chapter

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[202] *Perrysburg journal.* (Perrysburg, Wood Co., O. [Ohio]), 26 Jan. 1872. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn87076843/1872-01-26/ed-1/seq-1/> Accessed <May 17th, 2023.

[203] Nelson, *Saving Yellowstone,* 189.

explores, many visitors did brave the elements to visit Yellowstone, writing extensively in journals and diaries, in wonder and awe at what Yellowstone had to offer. Langford also wrote that "New wonders are continually presenting themselves. We venture to say that there is not in the world, within the same limit, so many wonderful freaks of physical geography, much to amaze and delight the beholder."[204] Yellowstone did indeed delight and amaze the earliest tourists to the park and has ever since.

[204] Nelson, *Saving Yellowstone,* 189.

CHAPTER FOUR

YELLOWSTONE ESTABLISHED: EARLY TOURIST EXPERIENCES, 1872-1916

Americans slowly began to visit Yellowstone after it was established as a national park. These early tourists used scientific and religious language to describe the wonders they saw. Rudyard Kipling wrote that it was "a curious kinder folk who would come so far just to liken Norris Basin to Hell." Many of these early tourists had reactions like those of Langford when they saw a landscape that was "covered with a grey-white sepulchral deposit that is ghastly," where "clouds of vapor hand shroudlike above it," and "the earth trembles with a strange rumbling, and all vegetable life is extinct." This was a landscape that "emphasized the ghastly look of death and destruction."[205]

The years this chapter covers took place in a time when tourism in America was growing significantly. Marguerite Shaffer's *See America First* examines the burgeoning tourism industry in America from the late nineteenth through the mid-twentieth century. Tourism up until the 1880s had been primarily for the wealthy elites who could afford to travel to the "'sacred places' of America."[206] Mass production and rising wages meant that more people had the means and opportunity to explore places in America that they had previously only been able to see in pictures and postcards. By 1940, tourism grew to be a "ritual of American citizenship,"[207] and Yellowstone was one of the places that people visited in droves.

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[205] Daehnke, *In the Work of their Hands*, 69.
[206] Marguerite Shaffer, *See America First: Tourism and National Identity, 1880-1940* (Washington: Smithsonian National Institute, 2001), 3.
[207] Shaffer, *See America First,* 4.

Many early tourists came to the park via railroad. This came at a time in the United States when tourism was becoming more universally available. Prior to the 1880s, tourism was primarily something done by the well-to-do who tended to have romantic and religious enthusiasms that were not shared as strongly, if at all, by the working class. The railroads introduced cheaper and quicker ways to travel, opening tourism for a wider portion of the population. This meant that by the 1880s tourism was becoming more of a mass phenomenon. As a result, places like Yellowstone and Yosemite lost some of their explicit religious comparisons that had been prevalent for decades.[208]

Early tourism in the park itself was primarily on horseback and buggy. These tourists saw places like the Mud Geyser, Mud Volcano, and the Dragon's Mouth Spring. Former Park historian Lee Whittlesley explained that both Mud Geyser and Mud Volcano threw mud into the air, an activity that early tourists witnessed and described. The act of mud being thrown into the air evoked strong language from those who witnessed it. Dragon's Mouth was described as "Gothic Grotto," or the "Devil's Workshop," and even "Belching Spring." One visitor to Mud Volcano described it as "a sort of cave, like the lair of a wild beast which perpetually vomits a compound of mud, putty, nastiness."

A preacher visiting in 1873 used religious language when he wrote that "We could but think, as we looked into its steaming crater, of that [biblical] passage that speaks of 'an horrible pit." Another visitor wrote of the Dragon's Mouth, "The angry dash of rock-bound waves roar within, while a continual jarring report similar to that made by a powerful engine and heavy

[208] Sears, John F., *Sacred Places: American Tourist Attractions in the Nineteenth Century,* (Oxford University Press: New York and Oxford, 1989), 10.

machinery is heard accompanied by a rush of scalding steam from the portal."[209] Scientific language was slowly gaining prominence, many people, including this preacher, still saw Yellowstone's features in distinctively religious ways.

Conservationist John Muir described his time in Yellowstone in his journal, writing that "Nature working with enthusiasm like a man, blowing her volcanic forges like a blacksmith blowing his smithy fires, shoving glaciers over the landscapes like a carpenter shoving his planes, clearing, ploughing, harrowing, irrigating, planting, and sowing broadcast like a farmer and gardener, doing rough work and fine work, planting sequoias and pines, rose-bushes and daisies; working in gems, filling every crack and hollow with them; distilling fine essences; painting plants and shells, clouds, mountains, all the earth and heavens, like an artist, - ever working toward beauty higher and higher." In the laborious processes Muir saw the hand of God at work, as the force of revelation – "a look into a few of the tertiary volumes of the grand geological library of the Park." This allowed visitors to "see how God writes history."[210] Muir presented a unique insight. The language that he used moves beyond the religious, scientific, and industrial that has been analyzed. Muir employed language of a skilled craftsman, using words like "blacksmith," "carpenter," "gardener," and "painter." The beauty that Muir witnessed was produced by some kind of skilled labor, possible the handiwork of a creator.

A month after Yellowstone was established a portion of a journal was printed in a Pennsylvania newspaper that used both scientific and religious language. "As the men of enterprise and science advance into the unexplored recesses of our republic – pioneers, road builders, gold searchers – every step brings a new revelation of this republic's wealth and beauty. Those of our

[209] Whittlesley, *Storytelling in Yellowstone,* 188.
[210] Daehnke, *In the Work of Their Hands,* 72.

enthusiasts who care to find a new religion upon defined principles of eternal damnation will welcome the Yellowstone discoveries. What an opportunity for a powerful preacher to inculcate the doctrines of eternal punishment, the vengeance of an angry God and the sure reward of all sins! Thus, we pass to scenes with no theological association. We as yet know scarcely anything of the Yellowstone."[211] Yellowstone had only just been established as a national park, and already newspapers were printing such grand reviews of Yellowstone's many features. Included in this account is both scientific descriptions of how the geysers worked and yet those same geysers served as opportunities for pastoral condemnation.

Edwin J. Stanley was one of the first preachers to explore Yellowstone. He visited the park in 1873 and published *Rambles in Wonderland* five years later. His book was popular, and former Yellowstone historian Lee Whittlesley argued that this was perhaps because clergy tended to be educated and therefore more credible than the uneducated trappers and miners of previous generations. Stanley's work inspired other clergy to visit Yellowstone and "celebrate the glories of the Creator."

Granville Stuart visited Yellowstone in 1873. He and his companions recorded their experiences in Yellowstone. In early September the group passed by Yellowstone Lake and wrote: "Notwithstanding the horrible boiling cauldrons near us, our tents were pitched in a pine grove of a most lovely valley. The Yellowstone Lake, from our point of view, was an idealization of serenest beauty."[212] Stuart's account, though lacking religious language, still contains the good-and-evil

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[211] *The Cambria freeman. [volume]* (Ebensburg, Pa.), 13 April 1872. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn83032041/1872-04-13/ed-1/seq-4/> Accessed May 17th, 2023

[212] Grandville Stuart in *Ho! For Wonderland: Travelers' Accounts of Yellowstone, 1872-1914*, edited and annotated by Lee Whittlesley and Elizabeth Watry, (Albuquerque: University of New Mexico Press, 2009) 23.

aspects of religious language applied to Yellowstone's geography. "Villainous pits" and "horrible cauldrons" are the bad that contrasts with the good, the "rare masterpiece" and "idealization of serenest beauty," the redeeming aspects of Yellowstone's landscape. Religious or not, people's fears and hopes seem to have played themselves out on Yellowstone's landscape.

Stuart's group continued north from the lake, next reaching the Grand Canyon of the Yellowstone. A fellow companion described hearing the river before seeing the canyon, and upon looking out over the canyon, "The scene was a REVELATION OF VAST SUBLIMITY. Bewildering splendor, incomparable grandeur, the superb garniture of these gay-colored, colossal walls; thrilling the beholder and begging description. No words can express the awful beauty Nature here displays. The whole vast survey was magical – intoxicating. A beatific enchantment held me spellbound."[213] The group's experience at the Grand Canyon of Yellowstone makes the reader today feel as if we are standing there right alongside them, observing it for the first time ourselves. This account captures very well the essence of the Yellowstone experience. Of all Yellowstone's features, the Grand Canyon is perhaps the most awe-inspiring of them all. The colors, the size, the grandeur of it all, overwhelmed – positively – all those who have seen it. The Canyon, in contrast to the shifting language of the geyser regions, continually elicited visions of grandeur, both in the past and present.

Thomas Ewing Sherman, son of Civil War General William Tecumseh Sherman, explored Yellowstone in 1877. He originally entered school to study law but later left his legal studies to become a Jesuit priest. The young Sherman used religious language to describe Yellowstone. He wrote from the top of Mount Washburn, overlooking the Snake River Valley and Yellowstone,

[213] Stuart, *Ho! For Wonderland*, 25-28.

"Within a few feet of the summit, wild flowers were growing, every leaf and petal witnessing to the tender care of the One, who seems to delight to smile in the flower, rather than to frown in the storm. Which is more admirable, the delicate finish of each portion of grand painting, or the striking effect produced by the whole?"[214] Sherman, like others, was overawed by the sensations of what he witnessed, and could not quite comprehend what he was seeing. Like Granville Stuart at Yellowstone's Grand Canyon, Sherman's emotions were on full display as he waxed poetic in attributing the wonders that he witnessed to the Creator in whom he believed. He was not the last to do so.

Sherman, after descending from Mount Washburn, continued exploring. He next came to the Devil's Den. He wrote, "Not far off is the Devil's Den, a cave in the hillside, from which, clear as crystal, breaks a spring of boiling water, ejected from some cavern further under the hill, with regular beats like those of a force pump, accompanied by the sound of a huge bellows. Startled by our approach, a small snake darted into the water near the spring; the next moment he coiled up quivered and sank dead upon the pebbly bottom, boiled alive before our eyes. Where was the wisdom of the serpent?"[215] Sherman's notice of the serpent reveals his religious thinking. In asking of the wisdom of the serpent, Sherman is referencing the snake's temptation of Eve in the Garden of Eden account in the opening chapters of Genesis. Sherman's snake apparently lacked wisdom, for why else would it slither into a hot spring and instantly die?

Sherman's experience at the Devil's Den reveals a way in which scientific understanding impacted religious thinking. Previous generations of Yellowstone explorers were fearful of the Devil's Den and were often apprehensive of approaching it. Yet Sherman writes of it as if it were

[214] Sherman, *Ho! For Wonderland,* 43.
[215] Sherman, *Ho! For Wonderland,* 44-45.

simply another feature. He describes pumps and bellows forming the mechanism behind the wonder of the cave. Satan did not stop at his den as one might stop for the night at a hotel, instead there was a logical explanation what Sherman was witnessing. Science influenced the religious Sherman much in the same way religion influenced the scientifically minded Ferdinand Hayden, who was moved to religious sentiment in his descriptions of Yellowstone.

Sherman's group also spent time at the Geyser Basin, of which Sherman was mightily impressed. He wrote, "Fresh wonders meet us at every step. For twenty minutes we stood spell-bound. Imagine the picture. Firs and cedars round the valley, in the center a clear stream flowing between banks white, but not with snow, and right in front of you a bridge, one pier of which is like a mound of ice covered with hoar-frost, its causeway of limpid crystal guarded by a double rainbow, its further pier, lost in clouds of steam never ending mysteriously in the river, floods of light streaming around and through the whole fairy fabric. Suddenly it is gone like a dream."[216] Sherman's account presents a unique aspect of the Yellowstone experience. He speaks of the landscape remaining in his mind as would a dream, being nostalgic that he would never again see the "vision of light and beauty again." There is something mythical, magical, about the experience at Yellowstone, the way the rays of the sun hit the geologic features, the colors, and smells, all of which make experiencing Yellowstone unique. And of all the places that Sherman was writing of a place – the Norris Geyser Basin – that for decades was often compared to hell.

Sherman, like many before him, believed that the apparent hellish features of the geyser region kept the Indigenous peoples away. Having described the geographic features, he wrote, "No wonder the Indians avoid the region in superstitious dread; its hollow caverns, sulphurous vapors,

[216] Sherman, in *Ho! For Wonderland, 48.*

and startling discharges of boiling waters, are all to suggestive of hell and its demons."[217] Sherman was projecting his own religious beliefs onto Indigenous cultures, not realizing or knowing that Indigenous peoples had lived in and around Yellowstone for generations.

Although Sherman could have stayed at the Geyser Basin for hours, he moved on with this final though in mind "I could linger for hours about the lower Geyser Basin, but the sun is high, and many a weary mile over mountain and through forest must be passed today. So away we ride, with a last look back at the valley steaming and smoking behind us, a great manufactory or laboratory, rather a spot where the Author of Nature, Workman as He is, has left things as though his task were not quite completed, and something remained to be done in fitting together the rocks of which earth's crust is composed, or in adjusting the relations between the chemical constituents of the rock."[218] Despite the many hellish features at Norris, Sherman and his fellow travelers did not wish to depart the Geyser Basin. Sherman was also one of the first to compare the geyser basin to a manufactory or laboratory rather than hell, perhaps because he had some grasp of the inner workings of the geysers. Sherman moved beyond his religious descriptions. He lived in the context of industrial capitalism. America was becoming more and more urban and developed, and that type of language was making its way into descriptions of Yellowstone. Moving on from the geysers, Sherman made his way Yellowstone's Grand Canyon.

For Sherman, like Granville Stuart, the Grand Canyon was the most sublime piece of nature that he had ever witnessed. Having come upon the canyon late in the afternoon, Sherman was drawn to the canyon by the sound of the Lower Falls. He wrote that the Canyon was "a vast shrine in nature's bosom – curtains of gold and scarlet made of crumbling rock – fringed at the base with

[217] Ibid, 49.
[218] Sherman, in *Ho! For Wonderland,* 51.

the silver of the stream, at the top with the green of the forest, canopied by Heaven's blues – the waterfall, a cascade of delicate spray streaming down into the shrine like white winged spirits descending in vain held back by dark masses of opposing rock, the great chasm filled and glowing with sunlight, and spreading eastward toward the prairie country – a temple, in which resides the angel of the stream, to receive honor and reverence for the work done by the river, and to carry heavenward the cries of praise and wonder of poor humanity, admiring in nature's beauty the magnificence of God. "[219] The Canyon has continually produced such awe-inspiring responses. Sherman's was entirely captivated by the overwhelming sights of the Canyon and wrote lyrically of what he witnessed. For Sherman, God's handiwork was on evident display in the Canyon. It was 'enchanting,' yet 'fearful,' drawing out of Sherman reverence and a feeling of smallness.

Philetus Norris: Yellowstone's Scientific Superintendent

Scientific study did not make much progress after Hayden's expeditions to Yellowstone in 1871 and 1872. One main reason is that Congress did not provide funds to Yellowstone's first superintendent, Nathaniel Pitt Langford. Yellowstone struggled under Langford's watch, partially due to the lack of funding and since Langford spent little time in the park. He was often busy elsewhere. Langford's leadership was criticized for numerous reasons, and he was eventually ousted from Yellowstone.[220]

Philetus Norris was chosen as Yellowstone's second superintendent, assuming the position in April 1877. Norris quickly got to work upon arriving in the park. He pressed Congress for funds – he agreed that Congress had made the right decision to establish Yellowstone as a national park

[219] Sherman in *Ho! For Wonderland,* 52-54.
[220] Rydell, *Managing the "Matchless Wonders,"* 3-4.

but had been wrong to not allocate any money to administer and protect the park. Norris believed that the best way to protect the park's resources was to fund further exploration within the park. To know how to protect Yellowstone, Norris needed to know what was in Yellowstone.[221] Norris believed exploration to be essential for enhancing scientific learning, believing Yellowstone to be a scientific laboratory. He also believed that studying the geology, weather, history, inhabitants, and wildlife in Yellowstone would give the nation a better understanding of the region surrounding it. So, when Congress appropriated $15,000 for Yellowstone in 1880, Norris took advantage of the money.[222]

[221] Rydell, *Managing the "Matchless Wonders,"* 4.
[222] Rydell, *Managing the "Matchless Wonders,"* 5.



Figure 2: Grand Canyon of the Yellowstone.

Norris spent as much of his free time as he could on horseback exploring Yellowstone. He took meticulous notes of the park's cultural and natural history, the geology, and other areas of scientific interest. Norris's yearly reports to the Secretary of the Interior were long and detailed, full of data on almost every field of study. Norris believed that the information he was collecting was necessary when exploring a new region and could be used to better understand the region's past and how to best manage it in the future.[223] While on his horseback rides, Norris took

[223] Rydell, *Managing the "Matchless Wonders,"* 5.

meticulous notes on meteorological records, drew sketches, dissected, and described fish. Norris's annual report for 1880 had page after page of detailed information on geysers, hot springs, sketches of rock formations, and other natural wonders. His report for 1881 contained even more information.[224]

Norris was most interested in the fields of anthropology and archeology. He was intrigued by the cultures of the native people who had historic association with Yellowstone. During Norris's first visit to Yellowstone in 1870, he examined prehistoric sites in Paradise Valley, just to the north of the present park boundary. Norris did not have the proper tools to analyze the site, so he collected the artifacts and shipped them off to the Smithsonian to be preserved and studied there. Norris, on another archeological venture in 1878 on Mount Washburn, found further evidence of Indigenous association with Yellowstone dating back thousands of years. During his years as superintendent, Norris prioritized archeological expeditions in the park. by 1881 he had learned a lot about the park's history and his annual report for that year contained a 15-page section devoted to the park's history.[225]

Norris strongly believed that science had a role to play in Yellowstone's administration and policy. He explained his position, "…having an ambition scientific signal-officer at the Mammoth Hot Springs or the Geyser Basin, or both, might with little additional duty or expense, greatly aid science in solving many interesting and practical questions connected with the origin, character, duration, and decadence of various classes of hot springs, the degree of their connection with the earth's internal fires, and their combined influence upon the climate of the park." Norris foresaw a day in which Yellowstone would become a major draw for both student and scientist. While that

[224] Rydell, *Managing the "Matchless Wonders,"* 7-8.
[225] Rydell, *Managing the "Matchless Wonders,"* 8.

day was still many years off, Norris was correct in his assessment of the scientific value of Yellowstone's features.[226]

Ferdinand Hayden explored Yellowstone again in 1878. Norris wrote at the conclusion of Hayden's expedition that "As it will require months to compile Professor Hayden's extensive explorations and surveys of the past season and to issue a doubtless correct and valuable map of the park, I insert a small and tolerably accurate one for present use. There can be no doubt that the modern sulphur basin, mud-salses, hissing fumeroles, and spouting geysers are only dwindling remnants of the ancient volcanoes and vast and long continued eruptions of lava, which in the region of the National Park characterized the great plains and Rocky Mountain ranges from the oozy bed of a shallow ancient sea."[227] Norris's description is quite different from others during this era, especially the religious accounts that saw they geysers as an entrance to hell.

Norris's report also affirmed much of what Jim Bridger had been saying for decades. He wrote, "In 1844 Jim Bridger to me personally, and as I now know, correctly, described the canyons of the Upper Snake River, but had then neither seen nor obtain a correct conception of the geysers, deeming them real volcanoes. His description of Two Ocean Pass south of the park is now admitted to be mainly correct, and there is more of truth than sport (as per camp-fire custom) in his famous story of a foaming torrent, icy cold at is snowy fountain-head, and seething hot half a mile down the mountain side, though not cause, as he boasted and perhaps believed, by the velocity of the descent, but by a crag-hidden Firehole basing of spouting water and seething brimstone."[228]

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[226] Rydell, *Managing the "Matchless Wonders,"* 9.
[227] Norris, Philetus, *Report Upon the Yellowstone National Park to the Secretary of the Interior by P.W. Norris, Superintendent for the Year 1878,* 987.
[228] Norris, *Report,* 989.

Jim Bridger would have undoubtedly been pleased to hear that many of his so-called "stories" were eventually proven right, in this case by Norris's scientific accounts. As Norris reported, there was more truth in Bridger's stories than people believed, even if he got some of the details right. It is interesting to note that while Norris promoted scientific exploration in Yellowstone during his time there, he still used the term 'seething brimstone' in this account. In May 1879, Robert Van Horn, the newspaper reporter who shelved his newspaper story about Bridger's experiences in Yellowstone, published a public apology to Bridger for having not run the story. Van Horn heard a public lecture about Yellowstone some time before, and perhaps feeling a bit regretful, issued his apology. Bridger, if he read it, would have had some satisfaction.[229]

Norris described his scientific endeavors in his 1880 report to the Secretary of the Interior. He wrote, "During the entire season's operations I had carefully – often with great effort and hazard in cliff and canyon climbing – secured rare and interesting specimens from the various geysers and other hot spring formations, obsidian cliffs, fossil forests, and Sheep-Eater haunts, intended for the Smithsonian Institution and the Anthropological Society of Washington, and other scientific associations."[230] Norris's actions and report here clearly demonstrate how he valued and prioritized scientific learning in Yellowstone. Unfortunately, the superintendents who followed in Norris's footsteps did not prioritize scientific learning to the same extent, if at all, that Norris did. Several of the early civilian superintendents were either incompetent or worried about protecting Yellowstone from poaching and vandalism to worry about promoting scientific learning.

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[229] Enzler, *Jim Bridger,* 295-296.
[230] Norris, Philetus, *Yellowstone National Park, to the Secretary of the Interior, by P.W. Norris, Superintendent, for the year 1879,* 7.

Norris was concerned about future leadership of the park. He wrote, "While, by the language of the act of appropriating funds, as well as my instructions for its expenditure, protection and improvement of the Yellowstone National Park appear more prominent than its exploration, still, practically, considerable of the latter is indispensable for an intelligent and judicious performance of the former; the real danger, indeed, being a deficiency rather than an excess of knowledge of the local peculiarities of that wonderful region prior to the expenditure upon buildings, roads, bridle-paths, and other permanent improvements. Yet with the small amount of funds under my control for the vast improvements necessary to enable the prominent men of nation to conveniently visit and personally judge of its wonders, its necessities, and its management, I have pushed improvements, devoting less time and funds to exploration than desirable to myself, or, I fear, ultimately the most beneficial to the park. still, our carefully kept records of weather, long observance of storms, earthquake shocks, formations, eruptions, and other phenomena, rapidly accumulates valuable information of the local climate and peculiarities, which, with constant vigilance in the management of foraging and other expeditions, steadily adds to our knowledge of the approaches to, and routes of travel throughout, the park."[231] Scientific understanding was crucial to the management of the park.

The work of Norris and Hayden in the late 1870s and 1880s fulfilled a prediction of *The True Northerner* from 1872. The newspaper, located in Paw Paw, Michigan, described the alure of the park shortly after Yellowstone was established as a national park. The paper noted that "It is not only remarkable for its scenery but in a scientific point of view is said to be 'the most marvelous

[231] Norris, *Yellowstone National Park,* 9-10.

region on the face of the earth.'"[232] What is fascinating to see about this report is that the possibility for scientific advancements was as important part of the park's future as tourism.

Carrie Adell Strayhorn came to Yellowstone in 1880. When she saw Norris Geyser Basin, she could not help but use satanic language. She wrote that "the hole looked like the very entrance to Hades, and the groans and hisses seemed the diabolical laugh of Pluto and his imps giving the mythical degrees of torture to his victims. The blackness of night was upon every rock, and through the dismal, darkened dive came only the murky stream laden with the sickening fumes of sulphur from an overheated cauldron." Rudyard Kipling visited Yellowstone in 1889. As he toured the park, he continued the myth that the Indigenous people feared the park. He wondered while viewing Fountain Paint Pots, "Do you wonder that in the old days the Indians were careful to avoid the Yellowstone? Geysers are permissible, but mud is terrifying."[233] These descriptions harken back to the era of the fur trappers in the 1830s but present different descriptions than Hayden or even the religious minded Thomas Sherman did.

In 1883, a person known only as H.F.G. travelled as part of a group to Yellowstone to explore Yellowstone. During the trip, H.F.G described the Grand Canyon, "The charm of the canyon was still upon us, and so hiding our packs in the bushes again we again visited that wonderful gorge, and for miles walked along its edge, and saw by the morning light beauties that we had not noticed before."[234] H.F.G. noted that the group was enchanted by the canyon and explored it for hours, a typical experience by this point.

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[232] *The true northerner. [volume]* (Paw Paw, Mich.), 12 Jan. 1872. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn85033781/1872-01-12/ed-1/seq-2/>
[233] Daehnke, *In the Work of Their Hands,* 67-73.
[234] H.F.G., in *Ho! For Wonderland,* 99.

H.F.G. described carrying their backpacks throughout their trip, the bags growing heavy as the noonday sun appeared overhead each day. For this group, as well as many others, the altitude and low oxygen was an unforeseen challenge to overcome during their time in the park. Their hike up Mount Washburn, for example, was more challenging than they were prepared for, and the trek left them believing they were fools and idiots.[235]

The group quick adjusted to the altitude of Yellowstone and began to enjoy their trip. They enjoyed the Geyser Basin, writing "Next morning we started at 8 a.m., and arrived at the Lower Geyser at noon. The air was so bright and exhilarating that we did not dream of fatigue, the excessive dryness of the atmosphere presented all feelings of lassitude."[236] Pictures can in some way prepare the tourist to Yellowstone for what they will witness when they get to the park, but nothing can prepare them for the lightness of the air or smell of sulfur, something many people notice today as well.

H.F.G. and the group was fascinated by the geysers. They exclaimed that "The geysers exercise a strange fascination. We stayed at least three hours watching one of them, and all the afternoon was spent wandering from one to another lost in wonder and speculation."[237] Time was as nothing when encountering Yellowstone's features, as this group experienced at both the Grand Canyon and the Geysers. The group finished their diary of Yellowstone with, "Here, at least it cannot be said that "Expectation fails where most it promises," for it is well-nigh as impossible to exhaust as it is to describe the wonders and surprises of the Yellowstone."[238] No amount of language could fully convey what it is like to experience Yellowstone.

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[235] Ibid, 101.
[236] H.F.G., in *Ho! For Wonderland,* 108.
[237] Ibid, 110.
[238] Ibid, 111.

While many voices have been recorded in the written history of Yellowstone, the voices that has been most silent in the written records are those of the tribes associated with the park. Ever since William Clark entered his postscript into his expedition notes in 1809, the myth of the Indigenous people avoiding Yellowstone because of their fear of the geysers persisted long into the twentieth century. It was a myth that was false. American settlers removed the local tribes from Montana so that they could create Yellowstone as the world's first national park. One of the earliest published tourist guides in Yellowstone told prospective tourists they did not have to worry about Indigenous people, noting "Dangers from Indians there is none."[239] This insight reveals that since the foundation of Yellowstone Americans have been erasing the Indigenous toponyms of the park. It is important as we move forward to regain those place names.

An anonymous visitor to Yellowstone in 1886 was one of the first to experience the park in winter. The author recorded, "[In winter] The geysers spout with their usual regularity, the snowfall is the same as upon the surrounding country and the cold stream freeze up just about the same as they would elsewhere. But place the geyser basins in the midst of snow white valleys, with their thousands of steam vents spouting and sputtering as they always do, and the picture is far grander than when beheld in midsummer. From the Mammoth Hot Springs I rode up an old trail over the top of Summit Mountain, and I must say the scene spread out before me upon miles and miles of nature's canvas was simply sublime."[240] What a unique, early insight into the Park's features during the Yellowstone months. The author believed the hot springs to be far grander in winter than in summer, the contrast of heat and cold brought out something beautiful in the landscape. It is intriguing to note that the contrast of hot geysers and the cold weather inspires a

[239] Nabokov, *Restoring a Presence,* 24.
[240] Anonymous, *Ho! For Wonderland,* 114-116.

positive association. Then the author adds an insightful tidbit. Though the scenery is more pronounced and beautiful, the winter months and cold weather emphasizes the smell of sulfur as well, making it stronger and more unpleasant than in the summer months. The scenery in both the summer and winter are sublime. Even today most visitors come in the summer, missing out on the snow-white beauty and chilling cold of winter in Yellowstone.

The geyser basins presented a sight that the author would not soon forget. Despite the weather being some sixty degrees below freezing, the hot springs bubbled up, seemingly unaffected by the cold temperature. The author recalls "standing on a lofty precipice, the country before me spread out like a panorama on a gigantic scale."[241] Something about Yellowstone made it seem larger than life.

The author concludes his diary with the visit to the Grand Canyon, recording the following experience, "The grandest sight in the park is beyond question the lower falls pf the Yellowstone. Here was the ice bridge too, or rather an ice mountain which rose to a height of almost equal to he descent of the falls. A feeling of awe creeps over one beholding in this wilderness such desolute grandeur as cannot be seen elsewhere on earth. Nowhere in this wonderful Park nor elsewhere on the globe can there be found such an extensive view of combination of stupendous natural scenery and gorgeous coloring. On this Wintery day I cannot describe the feeling that came over me."[242]

The added aspect of winter made the Yellowstone experience that much more unique. An interesting aspect of the account is that the author did not mention how he was impacted by the cold weather. Instead, he focused on how the water by the Yellowstone falls did not freeze and

[241] Ibid, 117.
[242] Anonymous, in *Ho! For Wonderland,* 120-121.

how the cold weather did not impact the geysers from continuing to spew out their how water. Yellowstone in winter was as impressive as it was in summer.

Henry Zenas Osborne visited Yellowstone in 1888. Osborne was a printer, reporter, and newspaper publisher who lived in California. While staying in Livingston, Montana, Osborne wrote that the hotel he was staying in was full of people who had Yellowstone fever, many of whom having traveled to that point by rail on the Northern Pacific. Osborne enjoyed his trip to Yellowstone.

The geysers were one of the first features he visited. He tried to capture the scene before him when he wrote that "One cannot contemplate these wonderful evidences of the manifold works of nature without speculating as to their cause."[243] Here is perhaps an example of how Hayden's 1871 Expedition affected how people describe Yellowstone. Whereas Joe Meek attributed the geyser region to the hellish imaginations of his Methodist preacher, Henry Osborne gave his detailed scientific beliefs for why the geysers operated in the way they did.

No trip to Yellowstone is complete without a visit to the Grand Canyon, and that was true for Henry Osborne. He recorded the following description of his experience there, "The first view of this great chasm fills the beholder with wonder and admiration. The Grand Canyon extends fully twenty miles in length, but the best part of it is within the view of Inspiration Point. Thomas Moran's celebrated painting of the scene, which hangs in the Capitol at Washington, was made from the opposite side of the river."[244] Osborne, like many who witnessed the Grand Canyon's spectacular scenery before him, was overtaken with awe and wonder. He did not reference any

[243] Henry Osborne, in *Ho! For Wonderland,* 145.
[244] Osborne, *Ho! For Wonderland,* 148.

kind of religious experience but based on his description it is easy to see his background as a journalist and newspaper editor come out in how he describes the features of the Canyon.

The writer Henry Smith visited Yellowstone in the summer of 1893. His account is unique for recording the fire that happened in the park that year. Before the fire occurred, he had the opportunity to visit many of the park's well-known features. He wrote of the geyser region, "The pen or brush is equally powerless to describe the wonderful geysers of the Park. One must stand in their awful presence, see them with his own eyes, feel them with his senses, and contemplate with his mind their immensity. Space will not permit a detailed description of the attractions of this locality. 'Hell's Half Acre,' a lake fairly boiling and steaming with fury; the 'Devil's Punch Bowl,' a peculiarly wonderfully formed bowl some ten feet in diameter perpetually boiling and bubbling up several feet high; to gaze down the yawning depths some fifty feet into the 'Devil's Well,' with its clear, transparent boiling waters, makes the beholder shrink back and say, 'I have seen enough.'"[245]

Smith's experience and description differed from that of Osborne's. It was more in line with the fur trappers and gold miners of previous generations. Smith was more superstitious of the geysers and offered a less scientific explanation of how the geysers work and operate. Smith was quite descriptive of his experience with the geysers, lyrical at times, fearful at others. He noted the trepidation with which people walk around the geysers, noting their nervousness at how the ground might give way underneath them. From Smith's description of the geysers, it is easy to see why early explorers accounts of the geyser regions chalked it up to being very near the entrance to hell.

[245] Henry Smith, in *Ho! For Wonderland,* 159-160.

Smith echoed other visitors to the Grand Canyon of the Yellowstone when he wrote, "It has truly been said by those who have seen the Grand Canyon of the Yellowstone that no language can do justice to its wonderful grandeur and beauty."[246] Smith's account of his time there clearly indicates that he was enraptured with the Canyon, leaving that place with a positive review.

The artist Frederick Remington also visited Yellowstone in 1893. He was an enthusiast of western landscapes and wilderness. He argued that "Americans have a national treasure in the Yellowstone Park, and should guard it jealously. Nature has made her patterns here, has brought the boiling waters from her greatest depths to the peaks which bear eternal snow, and set her masterpiece with pools like jewels. Let us respect her moods, let the beasts she nurtures in her bosoms live, and when the man from Oshkosh writes his name with a blue pencil on her sacred face, let him spend six months where the scenery is circumscribed and entirely artificial."[247]

For Remington, and others, 'Nature' had replaced God as the driving force behind the scenes, wonders, and features of Yellowstone. When the first explorers described Yellowstone, they did so in overtly religious tones. While religious language was still employed in the 1890s to describe Yellowstone, as it is today, men and women began to view Yellowstone's wonders through other lenses as well, which comes out in descriptions like Remington's.

Yellowstone's elevation and unique features made it a challenge for construction. Hiram Martin Chittenden, who first came to the park in the 1890s, worked for the Army Corps of Engineers. He described the challenges, "The first difficulty arises from the wretched nature of the material through which the roads pass. Unquestionably there is no other spot of equal area on the

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[246] Smith, *Ho! For Yellowstone,* 161.
[247] Paul Schullery, *Searching for Yellowstone: Ecology and Wonder in the Last Wilderness* (Montana Historical Society Press, Helena, Montana, 2004), 114-115.

face of the earth where there is such a remarkable variety of substances, and such curious combinations, in the composition of the soil."[248] Yellowstone's unique features, a wonder to the artist and tourist, presented a difficult and challenging experience for the engineers who had to construct the infrastructure in the park, challenges that are still faced today.

Lyman Glover was one of the early tourists who experienced Yellowstone through bicycling around the park. His opening remarks mentions coming to Yellowstone on the Northern Pacific, fulfilling the prediction some thirty years prior by a Montana newspaper. Glover wrote, "All roads lead to Rome, but only one [railroad goes] to the Yellowstone National Park, within whose confines are embowered the grandest scenes and the most wonderful natural phenomena to be found on this continent/ the astonishing sweep of the Northern Pacific Road for 1,000 miles from the head of navigation no the Mississippi at St. Paul to the foothills of the mighty Rockies and the gateway of nature's temples of wonders on the Yellowstone is an inspiration."[249] Glover was as impressed by the achievements of the Northern Pacific as he was of the astonishing features of Yellowstone National Park. Glover was impressed by the "technological sublime" of the Northern Pacific and of Yellowstone.

Glover described the park uniquely when he wrote that "As the crow flies, a square of sixty miles is easily covered, but in the tortuous roads of the Eden primeval, leading through great gashes in the mountains, along the verge of sheer precipices, by the side of tumbling cascades, around dizzying peaks that command enchanting views, down into cool valleys that seem forever shut out from the eager sun, along heart-breaking grades full of sinuous difficulties and headlong terrors,

[248] Schullery, *Searching for Yellowstone,* 115. Chittenden's remarks are especially poignant in light of the 2022 floods in Yellowstone National Park that washed out many of the roads, many of which have to be rebuilt.
[249] Glover, in *Ho! For Wonderland,* 168.

with belching springs and geysers and peaceful canyons lying in the eternal calm of their own mystery."[250]

Glover was one of the few people who compared Yellowstone to Eden. Previous writers had described portions of Yellowstone in heavenly qualities, but none went so far to compare Yellowstone to Eden. Glover also brought out the tension of Yellowstone – the overwhelming beauty and inaccessibility of the tourist traveling to see the park for themselves. Given how lyrically he wrote of the park's features, however, it's no wonder Osborne Russell had written decades earlier that the park was a place that he wished to spend the rest of his days.

W.D. Van Blarcom visited Yellowstone in 1897. Van Blarcom left a well-written account of Yellowstone's features, noting that after spending time in Hell's Half Acre that the name was well earned. Van Blarcom described the paint pots as being the "oddest, funniest things in the entire park. They are like cauldrons of hot, boiling paint, of all colors; the most delicate pink, blue, gray, etc., all bubbling and boiling, throwing up jets of this paint like matter, which assumes all kinds of shapes, some like roses or lilies, and then again such fantastic shapes you can imagine almost anything. It is fascinating to watch them, and you leave them with regret."[251] Van Blarcom's account was unique in describing the paint pots as being 'funniest.' Most other accounts of this time recorded awe, fear, wonder, but none described a feature as being funny. Despite the apparent humor of the paint pots, however, Van Blarcom felt a twinge of regret leaving the paint pots, having spent hours in their vicinity. Few today would describe a feature in Yellowstone as funny.

John Atwood, a Kansas attorney and political organizer came to Yellowstone in 1898 and thoroughly enjoyed his time in the park. Like Van Blarcom a year prior, Atwood visited the paint

[250] Glover, in *Ho! For Wonderland,* 172.
[251] Van Blarcom, in *Ho! For Wonderland,* 190

pots and had a pleasant experience. They were, in his estimation, "one of the most remarkable things to be found in the whole park. The beauty and strangeness of the paint pots, and the brilliant loveliness of the Fountain geyser made the stay at the lower basin a noteworthy day."[252] There are similarities in the two experiences of the paint pots, but each man's accounts were still unique. Van Blarcom found the paint pots to be funny, Atwood found them lovely, both enjoyed the variety of colors that the paint pots presented.

Atwood explored the Grand Canyon, and he, like Sherman, had a deeply moving and religious experience there. He spent a few days basking in the wonder of Yellowstone great chasm, writing "The Grand Canyon of the Yellowstone! The most stupendous sight that was ever mirror on the human retina! Of such a site 'the hunger of the eye grows by feeding.'"[253] Atwood witnessed God's actions at work in forming the Canyon, built by nature as an altar to the Infinite. It is interesting to note that for many who experienced such an overwhelming sense of wonder and awe at the Canyon, they chose to end their diaries with their written experience of Yellowstone. Though many claimed words could not describe Yellowstone's Grand Canyon, many did write so poetically and forcefully of it that their passionate writing makes up for the supposed lack of words to describe this awe-inspiring feature.

Robert McGonigle came to Yellowstone 1900. He wrote one evening that "The night was beautiful. Millions and millions of starts studded the sky like myriads of twinkling diamonds." The next day he wrote as the group came to Mammoth, "It was a magnificent morning, the air was dry and the weather delightful, and the scenery surrounding us was one kaleidoscope picture of charm and beauty. Traveling under such conditions as I was then was indeed a rare pleasure, and I enjoyed

[252] Atwood, in *Ho! For Wonderland,* 204-205.
[253] Atwood, in *Ho! For Wonderland,* 211-213.

it to the fullest extent."[254] McGonigle's experience proved to be pleasant for both him and his companions.

McGonnigle recorded an experience that few others did. He wrote, "One of the most interesting sights of that whole day was, however, yet in store for us. this was the sunset. The sun seemed to be resting upon the horizon like an immense ball of fire, from which appeared to be emanating great shafts of light of various colors and shades. We all stood and looked spellbound with wonderment and admiration. I thought then, and I think so yet, that while I have seen many wonders made by the hand of man's ingenuity, the achievements of the Creator are incomparably superior and more wonderful."[255] McGonnigle's account is unique for his descriptions of the night sky and the glorious sunset that he witnessed. Most travelers to Yellowstone wrote lyrically of the park's geological features, as McGonnigle did as well. But what separated his account wass that he was equally moved by the non-geological aspects of Yellowstone. The beauty of the night sky and of the sunset were equally moving and awe-inspiring, moving him to see the works of the Creator in these experiences.

McGonnigle was enchanted by camping out. He remember, "Well, as I was saying, the evening around the campfire was a pleasure we all looked forward to day by day, and it was a great disappointment to us when it rained and we had to crawl beneath our "tarps" without indulging in a review of our days experiences and listen to the stories which were usually contributed by some to the amusement of others."[256] McGonnigle provided a unique insight into how groups traveled. A big part of the early Yellowstone experience was to pitch a tent and then proceed to tell stories

[254] McGonnigle, in *Ho! For Wonderland,* 220-221.
[255] Ibid, 224.
[256] McGonnigle, in *Ho! For Wonderland,* 231.

around the campfire. When rain didn't dampen their evenings, the group entertaining each other with their experiences that day.

Myra Emmons traveled with her friend Gertrude to Yellowstone in 1901. The pair took the train to Yellowstone and had an adventure before even getting to the park. In Cinnabar, Montana, they two women accidentally boarded the wrong train to Portland, but the conductor noticed their mistake and helped them get to the right train before it departed.[257]

Once in Yellowstone, Mary and Gertrude saw Mammoth Hot Springs, where Mary recorded the following, "Standing on the great white and red and yellow and brown plateau of Jupiter terrace we had our first sight of the marvelous boiling springs and pools, and drenched our souls in color, which to Gertrude was turquoise, to me green, and which no man knoweth."[258] This journal highlighted the otherworldly experience in Yellowstone. The entry also highlighted a unique aspect of the Yellowstone experience – that two people observing the same feature saw different colors or shades in that feature. The fact that the same landscape elicited such different reactions reveals the instability of language that was used to describe Yellowstone and how different the language can be to describe the same sight.

C.M. Skinner also travelled to Yellowstone in 1901. During his visit, Skinner lamented the lack of wilderness left in the West. He bemoaned the fact that civilization had advanced westward, taking up all the good land in the process and removed the wilderness experience.[259] But after his dialogue about the declining wilderness, Skinner turned his attention to Yellowstone, writing, "Ah, but it is a wonderful land, [Yellowstone is,] with its snow peaks, its canyon, colored like the sunset;

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[257] Emmons, in *Ho! For Wonderland,* 241.
[258] Ibid, 244.
[259] For more on wilderness in the West and the wilderness experience, see Roderick Nash's *Wilderness and the American Mind.*

its burning geysers, its seething ponds, its mud volcanoes. The Yellowstone country is a reversal of common experience. Water flows up into the air, springs are hot instead of cold, rocks so slenderly balance on their pedestals that you half expect to see the long dead buffalo hanging in the air about them, exemplifying the truth of the old frontiersman's remark that here 'the laws o' nature are petrified.'"[260]Skinner hit the nail on the head with the Yellowstone experience when he wrote that it is the reversal of any known common experience. Skinner argued that part of the Yellowstone experience should include viewing they geysers at night and seeing the Grand Canyon in the sunset light, when the sun's rays highlight the canyon in ways that cannot be seen during high noon.

Skinner also wrote about the geysers, "The earth in the vicinity of the geysers is covered with gritty nodules of ash, and has spots that are not so thick but that you can heat the rumble and gurgle below."[261] Given that description it is easy to understand why earlier generations of explorers confused the landscape for hell.

Skinner's trip to Yellowstone included a visit to the Grand Canyon. He was overwhelmed by the sight, writing that "When, having traversed the vale of mist above that leap, you suddenly reach the end of things, a fear comes on you. Nobody speaks. I was alone when I came to it, and for some moments my impulse was to rush back to the camp, for company. It was as if some part of the universe had suddenly unfolded itself; as if for the first time to a man theretofore blind, a sight of the stars had been given. As in all places, the dominant sense is that of human

[260] Skinner, in *Ho! For Wonderland*, 251-252. The reference to the old frontiersman and the petrified nature of Yellowstone is possibly a reference to Jim Bridger, who was known for telling tales of Yellowstone, including petrified forests and animals.
[261] Skinner, in *Ho! For Wonderland*, 257.

powerlessness."[262] Many experienced wonder and awe at seeing the Canyon. Skinner, happening upon it alone, was overcome with fear. Skinner's experience of feeling powerless was thus far unique to him.

Stephen Dale visited Yellowstone in 1903. Dale experienced Yellowstone through the wonder of a stage coach and had a pleasant time seeing the park's many features. He described traveling through Yellowstone via coach and buggy, writing that "the most satisfactory feature of this six days' drive as a whole is the order of climax in which the sights along the way succeed each other."[263] What stood out to Dale was how closely Yellowstone's features were to each other, and that many of them could be seen, felt, smelt, in just a few short days drive through the park.

"The roads are good, the stages comfortable, and the view, at all points, interesting, at some points is entrancing," Dale wrote, "In the endless variety there is enough to please all. In fact, the very element of uncertainty as to what would come next, at the turn of a road, or the end of the pass, was part of the pleasure."[264] For Dale, the uncertainty of which of Yellowstone's unique features lay around the next bend added to the excitement and enjoyment. Dale and his companions knew that they would experience something each day, and the tension made the trip that much more enjoyable. Dale also explored Yellowstone's Grand Canyon. He detailed its wonderous beauty which could not be exaugurated. Dale concluded that the Grand Canyon must be seen, in all parts of the day and night to truly experience its many wonders.[265] He was one of the first to note that Yellowstone was just as beautiful at night as it was during the day.

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[262] Ibid, 260.
[263] Dale, in *Ho! For Wonderland,* 278.
[264] Dale, *Ho! For Wonderland,* 279.
[265] Ibid, 284.

Elbert Hubbard and his wife Alice visited Yellowstone in 1914, just two years before the National Park Service was established. Hubbard detailed reaching Mammoth Hot Springs, "It was evening when we arrived. A guide took us out over chalk white terraces, interspersed with bubbling springs where the water was boiling hot. We saw an effect the cause of which has kept the scientist guessing, for no one has been able to say, 'I know what this is!' There is a 'Bunsen's Theory,' which many people accept as the scientific cause. But this does not interfere with the pleasure of every traveler having his own explanation of why the water perpetually boils and leaves great white cliffs as a deposit … We were children in the presence of these wonders, and, like the human race in its childhood, we made explanations to suit ourselves."[266] The shifting tide of science was making its way into the average travelers' language to describe Yellowstone's features, even if they were not scientists themselves. Hubbard explained the differences between geysers and hot springs. Hubbard described geysers as "smoking and steaming,"[267] but did not use the religious language of Meeks or Ferris.

In 1845, the chemist Robert Bunsen visited Iceland at the request of the Danish Government. While there, he visited and studied the geysers. He concluded that geyser "eruptions occurred when a column of underground water was heated around its middle by volcanic activity." After returning home from Iceland, Bunsen created an artificial geyser in his laboratory where he proved that as the water in the middle reached a boiling point an eruption occurred, demystifying the process of how geysers work.[268] It is evident that by the end of the nineteenth century his theory and experiments were widely published and read.

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[266] Hubbard, in *Ho! For Wonderland*, 307
[267] Ibid, 311.
[268] Mcgill.ca., "What causes geysers to erupt?" https://www.mcgill.ca/oss/article/history-you-asked/what-causes-geyser-

Hubbard postulated how he thought the satanic toponyms came about. “Many of the springs, geysers, and fountains, as well as places throughout the park,” Hubbard jotted down, “were named by orthodox people who believed that his Satanic Majesty was far superior in strength and power to the God of the good. He was also dramatic, alert, and active, and so, naturally, the most interesting places were named as being in the dominion of the god of the underworld.”[269] Very few of these satanic place names have lasted through the present day.

As exploration of Yellowstone grew, the placenames related to ‘Satan’ and ‘Hell’ slowly disappeared from the park. By the beginning of World War 1, only a handful of these names remained – Devil’s Thumb and Devil’s Kitchen located at Mammoth Hop Springs, and Devil’s Den. If the “Hell roaring” names, holdovers from the prospecting era, are included, then a total of six placenames associated with satanic nomenclature exists. None of the satanic names exists from the Washburn expedition. For example, their “Hell-Broth Springs” was renamed Washburn Hot Springs, and the Devil’s Hoof is now unnamed.[270]

Alma White visited Yellowstone in 1920. She later published *With God in Yellowstone.* The first thirty or so pages recount her journey to the park. White, a Christian school teacher, described various features in Yellowstone with religious language. When she first entered Yellowstone she penned “After crossing the Yellowstone boundary, about two miles west of Pahaska Tepee Lodge, I began to feel an atmosphere of freedom that I had not hitherto enjoyed on this trip. I felt that the Yellowstone National Park, with all of its wonders and many interests, belonged to me as much as to any other person on the earth; and from that moment it seemed that I was *walking with God to*

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erupt#:~:text=Bunsen%20hypothesized%20that%20eruption%20occurred,its%20middle%20by%20volcanic%20activity accessed March 8, 2024.

[269] Ibid, 313.

[270] Haines, *Yellowstone Place Names,* 89.

the very gates of heaven and to the brink of hell"[271] (emphasis added). White also bemoaned the fact that so few Americans knew of Yellowstone. She explained, "Even now only a small per cent of the 100,000,000 people of the United States know what they possess in this romantic and mysterious region, which seems to be the antechamber of heaven and the very mouth of hell."[272] Twice, in a matter of a few pages, White described herself as being near the entry point of both heaven and hell. This made her unique to mention both in the same sentence – previous accounts mentioned them separately, or one or the other depending on which part of the park they were in.

At the upper geyser basin, White exclaimed "Everywhere steaming hot springs are seen, also mounds of cones of geyserite. In this basin, within a square mile, are the grandest and mightiest geysers in the world. There are pools of scalding water whose marvelous beauty and delicacy of coloring cannot be described. Everywhere are undulations of crowned with geyser cones, or hot spring vents of a grayish white appearance. In places, the earth trembles, strange rumblings are heard, and the air is heavy with sulphurous flames. How could it be otherwise that a person should feel that he is in close proximity to the Inferno which Dante so vividly described."[273] White's description was very unique in combining both religious and scientific language, which was becoming increasingly common by the 1910s.

Yellowstone, from the time of John Colter through the founding of the National Park Service and present, has evinced a multitude of descriptions and placenames, both religious and scientific and otherwise. Throughout most of the nineteenth century, Protestantism was the main religion. Many of the explorers, trappers, missionaries, and miners that explored Yellowstone were

[271] White, Alma, *Walking with God* (Zarephath, NJ: Pillar of Fire, 1920), 33.
[272] White, *Walking with God,* 42.
[273] White, *Walking with God,* 104.

raised in deeply religious households and drew on that to describe Yellowstone's numerous features. From the Edenic to the satanic, these religious associations have evoked fear and wonder. The language that Hayden, Washburn, and other scientists used was primarily scientific in nature. In the decades that have followed the founding of Yellowstone, people have combined scientific and religious language to describe what they witnessed.

EPILOGUE

This thesis has examined several accounts and experiences in Yellowstone from the early nineteenth century through the second decade of the twentieth century. During that time, the way in which people experienced and described the park changed. Early experiences in the park focused on the fearful, hellish aspects of Yellowstone's geyser regions. By the time the park was established in 1872, people's experiences and the language they used had shifted away from the negative to the positive. Gone were the references to hell. In general, people's experiences have been positive. The park was described as a wonderland when it was first established, a description that has remained in use through today. Even though references to hell and Satan have gone by the wayside, there have been events that have caused people to reach back to that kind of language.

Yellowstone, for all the wonders and positive descriptions that it has elicited over the years, is still a dangerous place. This is an aspect that this thesis has not covered, and it is where I will now turn in my conclusion. Park historian Lee Whittlesley first published *Death in Yellowstone* in 1995 and has since gone through a second publication. Marjane Ambler published *Yellowstone has Teeth* in 2013. Both works examine darker aspects in Yellowstone, including various ways in which tourists have died in the park since its creation in 1872. The wonders and animals in Yellowstone that have attracted people to it have also been responsible for numerous deaths, perhaps most famously that of Harry Walker in 1972.[274] Yellowstone is dangerous and there are no fences keeping tourists, or even employees, from stepping off the boardwalks into geysers, hotspots, or from having potentially fatal encounters with wildlife. The unique geography of

[274] For more on the death of Walker, see Jordan Fisher Smith's *Engineering Eden: the true story of a violent death, a trial, and the fight over controlling nature.* Even Smith's title reveals something unique about language and Yellowstone: even in Eden death can occur.

Yellowstone that has made it so attractive a place to visit in the summer makes it a challenging place to live in during the winter months, as Ambler explores in *Yellowstone has Teeth*.

Since the creation of the National Park Service in 1916, there have been three events, spaced roughly thirty years apart, that have shifted how people experienced and written about Yellowstone in a negative light: the Hebgen earthquake in 1959, the fires of 1988, and the floods of 2022. Several people, including Yellowstone geologist Robert Smith, have feared a catastrophic event that traps tourists in Yellowstone without means of leaving for some unknown amount of time. Each of these three events, which will be briefly examined here, serves as examples of events that shift the way in which people have experienced Yellowstone.

Hebgen Lake Earthquake

In the late evening hours of August 17, 1959, an earthquake struck Hebgen Lake. The earthquake was officially measured at a 7.3, ultimately claiming 28 lives, mostly in the immediate hours after the quake. Most of the fatalities were from a large mudslide that was triggered in the Madison Canyon. The quake was one of the largest measured in the United States, and its effects can still be seen on the landscape even to this today.

Before the earthquake occurred, the Madison River flowed from the Hebgen Dam through a canyon in the Madison Range towards Ennis. At the end of the canyon the river dropped in elevation before entering the Madison Valley. At the point where the canyon opened into the valley sat the popular Rock Creek Campground. The initial quake that struck on the evening of August 17, 1959, lasted less than a minute. Almost instantly, the ground began falling down the mountain, which left a twenty-foot-high wall of exposed earth. The dam at Hebgen Lake was weakened,

which created fear in the residents that it would burst.[275] In the hours after the earthquake, officials were able to rescue hundreds of people who were trapped at Refuge Point. Simultaneously, others began clearing debris and repairing bridges and roads damaged by the quake and mudslides. The earthquake's environmental damage in the greater Yellowstone ecosystem was seen both immediately and, in the months, and years that followed. For example, Old Faithful's average eruption intervals increased from 65 minutes to 75 minutes. Sapphire Pool, a previously dormant hot spring, began erupting over two hundred feet. Steamboat Geyser, Yellowstone's tallest, began erupting in 1961 after over fifty years of dormancy. Scars on the mountainside from the avalanche are still visible to this day.[276]

In the moment, people were gripped by fear. The *Bozeman Daily Chronicle* noted that "Terror haunted the face of one shocked woman who saw neighboring campers buried under tons of rock within feet of her family," while the *Salt Lake Tribune* included one person's experience, "We looked out our cabin window right after the heavy tremor and were startled to find out the lake had gone down. The lake had actually tilted." Many people were already asleep by the time the earthquake hit just after 11:30 pm, several woke up in a panic trying to figure out what was happening.[277]

Since the earthquake happened late at night, newspapers recorded several different reactions in the days following. For example, the *Montana Farmer Stockman* recorded that at least one person slept through the quake and subsequent "blaring sirens," waking the following morning

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[275] Annie Jehle, "The Night Montana Fell in Yellowstone," This is Montana, University of Montana, https://www.umt.edu/this-is-montana/columns/stories/earthquake-slide.php

[276] Annie Jehle, "The Night Montana Fell in Yellowstone," https://www.umt.edu/this-is-montana/columns/stories/earthquake-slide.php

[277] National Museum of Forest History, https://forestservicemuseum.org/exhibits/madison-river-canyon-earthquake/

to find an evacuated town. A dude rancher, startled by the earthquake, ran out – stark naked – to his cabins to check on his guests. A sheepherder who was sleeping in a sheep wagon initially thought a bear was rolling rocks down the mountain side and promptly fired shots into the air to scare it away. Other sheepherders noted that while their sheep remained calm their dogs did not.[278]

Eight years after the earthquake, the U.S. Forest Service opened the Earthquake Lake Visitor Center in 1967. The center, located near the entrance at West Yellowstone, is open from May through September.[279] The visitor center provides interpretive services for visitors as they make their way to and from Yellowstone's west entrance. The center provides sweeping views of Hebgen Lake and the destruction wrought by the earthquake while also revealing how the landscape has adjusted in the decades since. The earthquake site has been an attraction for tourists since the visitor center opened and has been a site of scenic and geological study regions in the west.

1988 Fires

Almost thirty years after the Hebgen earthquake, flames engulfed Yellowstone National Park. Fires raged in Yellowstone from June through September 1988. The National Park Service notes that roughly 36 percent of the park burned that summer.[280] The Yellowstone fires, because of the size and their being in the nation's first national park, garnered a lot of attention in the press. The park has received its fair share of attention over the years for a variety of events, but the '88

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[278] *Montana farmer-stockman. [volume]* (Great Falls, Mont.), 15 Sept. 1959. *Chronicling America: Historic American Newspapers*. Lib. of Congress. <https://chroniclingamerica.loc.gov/lccn/sn86075096/1959-09-15/ed-1/seq-7/>

[279] Annie Jehle, "The Night the Mountain Fell in Yellowstone," https://www.umt.edu/this-is-montana/columns/stories/earthquake-slide.php

[280] 1988 Fires, National Park Service, last updated February 2nd, 2021 https://www.nps.gov/yell/learn/nature/1988-fires.htm

fires brought attention to the park in new ways and has shaped how people have thought of and experienced the park. In 1972, the park's centennial year, the NPS implemented a "let it burn" policy towards fires started by natural means such as lighting. This policy went well, for the most part, until 1988. That summer, the park experienced an unusual dry spell, and the combination of lighting and human carelessness meant that by July fires were burning close to 17,000 acres of the park (roughly .0075 percent of the park's 2.2 million acres). By the middle of August, the park experienced the worst of the fires, and they had expanded significantly beyond the 17,000 acres. Fires are necessary for sustaining Yellowstone's ecosystem. Bob Barbee, the park's superintendent at the time, argued that the forest began to regenerate in the months after the fire was put out. The forest began to recycle itself. Yet evidence of the fire remains in the landscape over three decades later with the large amount of new growth forest where the old had been.

People kept visiting the park that summer despite the fires. Over 2.5 million people visited the park, which was the single highest visitation year during the 1980s.[281] Yellowstone's unique spot as one of the crown jewels of the National Park Service was evident in how quickly people responded to help fight the fires and restore the park in the wake of the fires in the fall of 1988. According to the Student Conservation Association, some ten thousand people organized and came to Yellowstone to help restore the park. That cooperative effort was the largest effort of its kind in American history until that time. Liz Putnam, the organizer, and director of the SCA at the time, noted that while she was helping with the after effects of the fire, she was "covered soot, sore, tired, and elated."[282] Aaron Bible, one of the young volunteers, was struck by the devastation. He

[281]Montag, Valentina, "Fires in Yellowstone: Past, Present, and Future." Carlton.edu, no date. https://serc.carleton.edu/NZFires/megafires/Yellowstone.html
[282] https://www.thesca.org/connect/blog/and-after-yellowstone-how-national-park-recovered-wildfire-damage/

noted that the fires destroyed bridges and hiking trails, which he helped rebuild. The work of rebuilding Yellowstone in the wake of the fire deeply impacted Bible to the point that he studied ecology at Colorado State University and has had a career in ecology ever since.[283] One West Yellowstone business owner described the summer as "a long, drawn-out, very nerve-wracking summer."[284] Several people described the fires as "Armageddon." Several park rangers encouraged tourists to leave the park. Holly McKinney recalled telling people that if she did not have to be there she'd leave.[285] Most of the record number of tourists that year didn't realize the trouble they were in even though they had been admitted into the park.

Darrell Ehrlick of the *Billings Gazette* published an article in 2018 commemorating the thirty-year anniversary of the 1988 fires. "Thirty years ago, we were sure the stories we'd be telling today would be of a park still struggling to regain its footing during a long, slow recovery," he wrote. "Today, we're telling the story of a park so beautiful, so vibrant, and so popular that there's talk of now of limiting the number of people visiting…Today, I feel a different sense of relief — grateful that I get to subject my children to those same yearly journeys with a park that looks like it did when I was their age."[286] Ehrlick's poignant observation captures something unique about Yellowstone's ability to recover from a natural disaster. Not just the park's ecology, flora, and fauna, but how people across the park and the nation stepped forward to help the park in the moment and in the days, weeks, months, and years following the fires. Now, some three and a half

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[283] Ibid.
[284] Michael Wright, "Once in a Lifetime: Flames, Smoke, and Sprinkler pipe in Yellowstone in the summer of '88." Bozemandailychronicle.com, Bozeman Daily Chronicle, July 29th, 2018, https://www.bozemandailychronicle.com/news/wildfires/once-in-a-lifetime-flames-smoke-and-sprinkler-pipe-in-yellowstone-in-the-summer-of/article_13b94ec9-ae6f-5194-a99d-32ab6119cdd2.html
[285] Rocky Barker, *Scorched Earth: How the Fires of Yellowstone Changed America*. Washington: Island Press, 2005, 215.
[286] Ibid.

decades removed from the fires, very little scaring or direct evidence remain that reveal where the fires burned. The fires that burned and destroyed the landscape created an opportunity for new growth to appear. Ehrlick's story contains a unique underlying biblical idea. There is a sense of death and rebirth in his account on how Yellowstone came back stronger after the fires, presenting hope that Yellowstone can rebound after the recent floods in 2022, to which we now turn.

2022 Floods

In late June 2022, Yellowstone was ravaged by a devastating flood, causing severe damage to the environment and the local economy. Fortunately, no lives were lost. The damage from the flood is still evident on the landscape more than a year removed from the event, as scars on the river bank dot the landscape through Paradise Valley as a person gets closer to the north entrance at Gardiner. Locals, park employees, and tourists are still coming to grips with the effects of the flood. Much like the '88 fires, Yellowstone's history cannot be written without mentioning the 2022 floods. And like the '88 fires, Yellowstone will find a way to grow, flourish, and learn from the floods of 2022. Several tourists have stopped at various pullouts in the park and to the immediate north to examine the devastation wrought by the floods.

The United States Geological Survey noted that the level of flooding was "literally unprecedented," something the USGS has been able to track for over one hundred years due to accurate river records in the region that date back to the 1890s.[287] Bill Berg, a nearby local resident and county commissioner, told CBS News that "the landscape literally and figuratively has

[287] Yellowstone Volcano Observatory, usgs.gov, United States Geological Survey, June 20, 2022. https://www.usgs.gov/observatories/yvo/news/how-might-devastating-june-2022-floods-and-around-yellowstone-national-park

changed dramatically in the last 36 hours. A little bit ironic that this spectacular landscape was created by violent geographic and hydrologic events, and its not very handy when it happens while we're all here settled on it." Many locals who were impacted noted feeling a deep sadness, highlighting a deep connection with the park.[288] Much like the earthquake of 1959 and '88 fires, the floods drastically reshaped portions of Yellowstone in hours and days that had taken centuries of geological processes to create.

The floods started off quietly, almost like a horror scene playing out in slow motion. The *Billings Gazette* wrote on the year anniversary of the flood, "People will never forget the floods. But most never saw it coming."[289] The flood projections of the previous weeks did not predict the flooding that occurred, explaining why so many were caught off guard. By the time the flooding had reached its height, over ten thousand tourists were ordered out of the park. Tourists described the scenes as scary, noting that "Anything that falls into that river is gone."[290] On June 12th, the first day of the floods, news started trickling in about flooding. Within a few hours, the rivers were flowing and flooding at unprecedented levels.

Tourists were not the only ones impacted. Local towns and businesses near Yellowstone's five entrances were impacted as well. Towns like Cooke City, West Yellowstone, and Gardner experienced the economic pains from having tourists leave during the flooding and subsequent closure of the park. There were concerns about how the economy would rebound as a result.

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[288] No author listed, "87 people rescued in Montana as severe flooding leaves Yellowstone 'dramatically' changed, cbsnews.com, CBS News, June 15, 2022. https://www.cbsnews.com/news/yellowstone-park-flooding-87-people-rescued-floods-landscape-dramatic-change/

[289] Nora Shelly, "When the water recedes: The historic floods of 2022 in Yellowstone National Park and Park County, and what came next," billingsgazette.com, Billings Gazette, June 18, 2023. https://billingsgazette.com/news/state-regional/yellowstone-flooding-year-look-back/article_7969abe8-6c3d-5548-9998-478121989c97.html

[290] Matthew Brown and Lindsey Whitehurst, "Yellowstone flooding forces 10,000 to leave national park," apnews.com, AP News, June 14, 2022. https://apnews.com/article/floods-travel-montana-obituaries-evacuations-3753caa39435d9f3f45d8b582381a0c6

Restaurants and other businesses were fearful that their revenues and income would be down significantly, some wondered if they would ever recover. Additionally, summer interns and workers were impacted by the loss of work.[291] Summer tourism makes between 60 and 80 percent of some business's income, meaning that the floods occurred at the worst possible time, in more ways than one.[292]

These three events have reshaped the physical landscape of the Greater Yellowstone Ecosystem, changing it from the landscapes that the original explorers and early tourists witnessed. They also reveal that for all the wonder and awe people have experienced in and around Yellowstone, there are events that have negatively impacted how people have experienced the park. And with more people moving to the towns and cities in the Greater Yellowstone Ecosystem, as well as increased number of tourists, there will be many new opportunities for people to experience Yellowstone in all its wonder and beauty. More and more people will be able to enjoy the park in all seasons, not just in summer, witnessing the beauty of the park in the winter months. But if recent events are an indication, then how people experience Yellowstone will not be entirely positive. The 2022 floods were described as once in a lifetime or once in a five-hundred-year event. There is a sense in which the flood, like the 1988 fires, could be biblical in nature.

These three events, from the 1959 earthquake to the recent flooding in Yellowstone, took place in context of the Cold War and post-Cold War era where many people saw events through a catastrophic lens. The dawn of the nuclear age meant that people were concerned about their future

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[291] Michael Goodman, "Yellowstone flooding has cost some seasonal workers their jobs – and housing," businessinsider.org, Business Insider, August 4, 2022 https://www.businessinsider.com/yellowstone-flooding-means-job-housing-cuts-for-seasonal-workers-2022-8

[292] Ron Wirtz, "Montana's Silent Yellowstone Flood: When tourists leave," mineapolisfed.org, Federal Reserve of Minneapolis, July 15, 2022, https://www.minneapolisfed.org/article/2022/montanas-silent-yellowstone-flood-when-tourists-leave

and how much longer they had. It has impacted how scientists have talked about the potential eruption of Yellowstone's super caldera or events in Yellowstone's past.

There is an inherent instability to language that is tied to the time and place in which people lived. Osborne Russell's comparison of Yellowstone to hell was very different from a tourist visiting Yellowstone in the summer of 1988. Although a tourist visiting the park in the summer of '88 may have evoked hellscape language, the culture of the 1980s and the ever-present fears and tensions of the Cold War were different from the culture and times of the 1830s that Osborne Russell lived in. This diverse context influenced different ideas about Yellowstone and the language associated with it. Paul Schullery argued in *Searching for Yellowstone* that "our continuing attempt to understand the park and fit it into our national and international life is the most important and certainly the most exciting thing we do here."[293] That rings true in my findings. From the beginning of the nineteenth century through the present, the language employed to convey what Yellowstone contains has been diverse and fluid, an ongoing mix of ideas and words prevalent to the culture of the day. And because of that, we are continually understanding and reinterpreting how to understand, experience, and describe Yellowstone.

The findings my thesis offers are that despite the challenges that national parks such as Yellowstone have faced in the recent past, there is hope in the future that we can recapture something positive in how we experience wilderness areas. The language of hellscape that began with Colter over two hundred years ago gave way to descriptions of heaven and Eden. These descriptions can be recaptured and reapplied to Yellowstone.

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[293] Schullery, *Searching for Yellowstone,* 2.

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