

Hawai'i, the Military, and the National Park: World War II and Its Impacts on Culture and the Environment

William Chapman



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SOURCES & AUTHORIZATION

This report is the outcome of a Task Agreement between the National Park Service (NPS) and the American Society for Environmental History (ASEH), entered into for the purpose of mutual assistance in conducting research on national parks and their history. It is part of Cooperative Agreement H908608005. The overall aim is to contribute to an improved understanding of NPS resources and aid NPS staff in evaluations of existing historic features and sites and to assist in the development and improvement of interpretive programs within the parks. The project title is “Special History of World War II Activities in Pacific Island Park Units.”

The NPS posted the grant notification on September 8, 2010, as Funding Opportunity Number NPS-NOIPWR100016, a Discretionary Grant under the Funding Category, Education. The Archive Date was October 10, 2010. The project began on June 1, 2011, with an end date of June 30, 2013. It was subsequently extended to June 30, 2014. The originator was David Louter, representing the NPS as the Agreement Technical Representative (ATR). Lisa Mighetto as Principal Investigator (PI) signed for the ASEH. Elizabeth Gordon took over as NPS ATR in December 2011. The project divided into two chronological phases. Phase 1 included:

- 1) Initial meetings between NPS and ASEH;
- 2) Development of a research design and work plan;
- 3) Completion of research in Hawai‘i;
- 4) Completion of research;
- 5) Production of a working outline;
- 6) Drafting of the introduction and chapters 1 and 2;
- 7) Completion of the draft of chapters 3 and 4;
- 8) First presentation to NPS staff; and
- 9) Creation of the work plan for Phase 2.

Phase 2 included:

- 1) Completion of chapters 5 and 6;
- 2) Review and revisions to the introduction and Chapters 1–4;
- 3) Completion of chapters 7–10;
- 4) Completion of appendices and the conclusions;
- 5) Presentation of draft report to NPS staff for review; and
- 6) Revisions and preparation of the final report.

This report focuses on NPS units in Hawai‘i. This report views the developments of the World War II era through the lens of environmental history. It places emphasis on the existing natural and cultural settings of wartime Hawai‘i and the ways that military and related activities altered these places. It further examines the prewar context of Hawai‘i to better understand how circumstances of the early twentieth century influenced decision making during the buildup of the war. Foremost, it looks at ways the geophysical features of Hawai‘i, as well as existing transportation corridors, water use, and land ownership, affected decision making and how ongoing economic activities, such as plantation agriculture and ranching, also influenced wartime developments. The report further addresses ways that both the military and park officials viewed parklands and how they understood their responsibilities toward these areas. It scrutinizes as well how US service personnel interacted with their surroundings. Finally, the report examines the long-term impacts of the war, detailing the ways in which the territory and then state of Hawai‘i—and the federal government—reenvisioned their roles in the postwar era.

The report divides into ten chapters, with an introduction and conclusion. The introduction sets out the background and expectations for the report. Chapter 1 discusses approaches, themes, and research questions and provides a detailed outline of the project. Chapter 2 is an overview of World War II and its many impacts on American society and the greater environment. It also discusses the specific effects of the war on the nation’s parks. This chapter additionally looks at the broader impact of the war on Hawai‘i and how this affected Hawai‘i’s then and future attitudes toward parks and open spaces.

Chapter 3 covers the military presence in Hawai‘i at the beginning of the twentieth century and how decisions made at that time structured later developments. Chapter 4 shows the close relationship of the military to the founding of Hawai‘i’s first national park in 1916 and the continued relationship of the military to the NPS throughout the 1920s and 1930s. It further describes the environmental setting of Hawai‘i and the places that made Hawai‘i exceptional. Chapter 5 discusses the attack on Pearl Harbor and the specific impacts on the park.

The remainder of the report examines the continuing events of the war, including the use of parklands by the military and the impacts of housing, training, and recreation on parklands and areas later subsumed within the park system. Chapter 6 examines the expansion of military activities on the islands and the further impacts on the parks. Chapter 7 charts the increased development of training facilities on the islands, especially Hawai‘i Island, and the continuing effects on both parklands and other sites on the island. Chapter 8 discusses the buildup for the Pacific Campaign and the impact of Marine divisions in Hawai‘i, including training on the islands of Maui and Hawai‘i. Chapter 9 covers the end of the war and its immediate aftermath. Chapter 10 looks at postwar developments and how the war shaped expectations of residents of Hawai‘i. It also discusses postwar impacts of the military on parks in Hawai‘i and the expansion of the NPS mission. The conclusion focuses on the broader ramifications of the study and summarizes the findings. The bibliography provides a guide to the published materials. There is an additional section on manuscript sources and on photographic resources.

The report includes an appendix that itemizes each NPS unit and the specific impacts of the war within each area or site, as well as an appendix on the contributors to the project. A final short appendix covers the unique event of the proposed evacuation of the endangered Hawaiian goose (*nēnē*) at the war’s beginning.

NOTE ON HAWAIIAN LANGUAGE SPELLINGS

Hawaiian is a Polynesian language first recorded—with Roman characters—in the late eighteenth century. To better indicate Hawaiian usage, two markers, an *‘okina* and a *kahakō* (macron, in English), were introduced in the early nineteenth century as part of written Hawaiian. The *‘okina* is technically a consonant (one of eight in the Hawaiian language); the *kahakō* is a diacritic that indicates a drawn-out vowel. The *‘okina* is a glottal stop—therefore its status as a consonant. The failure to use a marker can change the meaning of a word. For example, *ko‘u* means “my,” whereas *kou* means “your”.

Most place names in Hawai‘i are Hawaiian. Waikīkī, Honolulu, Maui, and so on are all Hawaiian names, some with direct meanings, others of more oblique origins. Some technically require markers, but have been rendered so often without markers that they have become legitimate spellings—though they still do not follow correct Hawaiian spelling. The National Park Service (NPS) has been using markers for Hawaiian place names and terms since 2000.¹

This report adheres to the NPS requirements when referring to places names and Hawaiian terms. However, many organizations and other entities discussed in the report were never in fact written with pronunciation indicators in their own time. A good example is Hawaii National Park, which was never written with an *‘okina*. Other examples are the Hawaii Rifles, an older paramilitary organization revived in 1942 as a citizen (home) guard unit; the Hawaii District, an administrative entity during the period of martial law; and the Kau Desert Impact and Training Area—again, never written as the “Ka‘ū Desert Impact and Training Area” (the correct spelling for the district of Ka‘ū) during its short lifetime.

For both consistency and to avoid anachronisms, this report employs standard Hawaiian-language usage in describing places, people, and things, but uses the historic terms when these are clearly more appropriate. Therefore, “Ka‘ū” is used when referring to the place; “Kau Desert Impact and Training Area” is employed when discussing the historic World War II–period training area. This applies as well to quotations, along with spellings on book and article

In accordance with the Hawaiian National Park Language Correction Act of 2000, introduced by Senator Daniel Akaka, May 3, 1999, 106th Congress (1999–2000). The bill passed the Senate but never passed the House of Representatives.

titles and publishers' names. (The University of Hawai'i Press only began using the *ʻokina* for its own title in the 1990s). Every effort has been made to be consistent, although there are instances where inconsistencies are inevitable.

INTRODUCTION: PROJECT OVERVIEW

SCOPE AND OBJECTIVES

This project is part of an ongoing effort to better understand the impact of World War II on the national parks, specifically those not dedicated to the commemoration and interpretation of the war. Although titled “The Special History of World War II Activities in Pacific Park Units Project,” the principal focus of the study has been to better understand the impacts of World War II on Hawai‘i’s then single national park unit, Hawaii National Park, and other Hawai‘i parks established in the postwar period. Hawai‘i has seven parks that meet the criteria of the original research proposal:

- 1) Hawai‘i Volcanoes National Park (HAVO), Hawai‘i, established 1916, renamed 1960
- 2) Haleakalā National Park (HALE), Maui, established 1916, renamed 1960
- 3) Pu‘uhonua O Hōnaunau National Historical Park (PUHO), Hawai‘i, designated 1961
- 4) Pu‘ukoholā Heiau National Historic Site (PUHE), Hawai‘i, established 1972
- 5) Kaloko-Honōkohau National Historical Park (KAHO), Hawai‘i, established 1978
- 6) Kalaupapa National Historical Park (KALA) Moloka‘i, established 1980
- 7) Ala Kahakai National Historic Trail (ALKA), Hawai‘i, established 2000

The other National Park Service (NPS) unit in Hawai‘i is the USS *Arizona* Memorial and Visitor Center, the home site for the World War II Valor in the Pacific National Monument (VALR), originally established in 1962 and rededicated in 2008 to commemorate the US war effort and its many sacrifices. Located at the center of the Pearl Harbor naval facility, this park unit is not the subject of this study, although the Pearl Harbor Navy Base and Shipyard, as well as adjacent the Army Air Corps’ (later Army Air Forces’) Hickam Field and the Army and later Navy airfield at Ford Island (all now part of Joint Base Pearl Harbor-Hickam), certainly form a part of the narrative.¹



0. 1. USS *Arizona* Memorial, Pearl Harbor

Hawai‘i, as a key site in World War II and the staging area for much of the Pacific War, has a special place in the history of the war’s impacts. While the USS *Arizona* Memorial and Visitor Center do an excellent job of conveying this history, as do many other associated historic sites, memorials, and museums in the state, the wartime role of the then Hawaii National Park—

¹ “From Engagement to Peace,” World War II Valor in the Pacific National Monument, accessed April 30, 2012, <http://www.nps.gov/valr/index.htm>.

one of the oldest of the nation's parks—has been less thoroughly interpreted. The effects of World War II—period activities and events among other units added since the war has been an object of even less study. This report aims to address this imbalance and provide a significant new layer—or layers—to the interpretive story at each of NPS units in the islands. It also will serve as a framework for the assessment of any remaining structures, sites, or other features associated with the war.

PROJECT BACKGROUND

This project had its beginning in a workshop co-sponsored by the NPS and the American Society for Environmental History (ASEH) that explored the role of environmental history in the interpretation of the national parks and their future management.² With over eighty historians, archaeologists, and management specialists in attendance, the workshop focused on the intersections of history and national parks. Many admitted that the park interpretation often took a narrow view of history as something pertaining to notable events. World War II was one of the subjects frequently discussed. The war was certainly a significant focus of interpretive efforts and many park visitors seemed to be interested in stories about the war and its effects on park locations. Park historians admitted, however, that the less visible impacts of the war had not been a significant component of interpretive programs and that research had neglected the special role parks themselves had played in the war effort.

Workshop organizers David Louter (NPS) and Lisa Mighetto (ASEH) saw an opportunity to employ the special perspective of environmental history in the examination of topics outside of the field's usual purview. This idea reinforced the NPS's own conclusions, outlined in "The National Parks Second Century Commission Report" of 2009, that NPS historians needed to

² David Louter and Lisa Mighetto, "The Role of Environmental History in the Parks," *George Wright Forum* 28, no. 2 (2011): 127.

better tie the stories of parks to broader events and patterns in the nation's past.³ This was reflected as well in filmmaker Ken Burns's widely viewed documentary "The National Parks: America's Best Idea," which also placed the parks in the wider history of the United States.⁴

With many of the World War II-era veterans and others with experience of the war now reaching the end of their lives and the concern that many sources of information will be lost, the war and its impacts seemed a compelling subject for research. A better understanding of the war could help answer the questions of park visitors, offer an opportunity for new interpretive programs, encourage new dialogues, and provide a more complete framework for cultural resource managers to make assessments of remaining sites, structures, or other kinds of features.

This study attempts to place the parks and other sites now under NPS stewardship in the full context of both World War II and the place of Hawai'i in the war. Specific impacts on existing parks are certainly key topics—increased visitation during World War II by US service personnel and the wartime use of park facilities by the military had both immediate and long-term effects on the land and vegetation. However, the study also takes a much broader view of the interaction of people with their environment. It details, for example, the special role of the military in the very creation and management of Hawaii National Park from its origins in 1916 and during the war and postwar periods.

This study also looks at the important role of the war in altering people's perceptions about open spaces, seashores, and wilderness, and the significance of such shifts in perception on the development of national and state parks in the postwar years. Marines may have trampled upon the ancient ritual site of King Kamehameha at Pu'ukoholā Heiau during their training exercises, but an awareness of the significance of such sites to the culture and history of Hawai'i certainly resonated among some service personnel—as it did among park officials and the people of Hawai'i in the postwar period.

³ National Parks Second Century Commission, *Advancing the National Park Idea: Funding and Budget Committee Report* (Washington, DC: National Parks Conservation Association, 2009), accessed September 12, 2012, http://www.npca.org/assets/pdf/Committee_Funding.PDF.

In the broadest sense, the very destructiveness of the war led in significant ways to the growth of the NPS in the postwar era. The war also helped draw the lines between the military and the US parks system, as differences in approaches and ideals became more apparent during military buildup. The war also made possible the development of tourism on a global scale (for better or worse, but certainly a development significant to the growth of the NPS in the postwar period), reestablished and strengthened the ideals of family and leisure, and made both recreation and environmental protection national priorities.

In Hawai'i, the war also tied the territory more closely to the North American continent, bringing service personnel and civilian workers to a place once considered by most Americans as “the other side of the world.” This new relationship, in turn, helped generate new bonds of interdependence—bonds that led to Hawai'i's entry to the union as the fiftieth state in 1959 and to existing political connections of today. The war, therefore, had impacts at many levels, both affecting the existing national park in Hawai'i and laying the foundations for park expansion in the postwar era.



0. 2. National Park Service Sites, Hawai'i.

⁴ “The National Parks: America’s Best Idea, A Film by Ken Burns,” PBS, accessed May 27, 2012, <http://www.pbs.org/nationalparks/>.

CHAPTER 1: METHODS AND APPROACHES

Report Focus

From 1941 to 1945 and after, the military transformed Hawai'i's culture and landscapes. The Army, the Navy, and the Marines turned onetime sugar plantations into housing sites and training areas, paved, built, and extended roads and highways, dredged the seabed, and bombed smaller offshore islands. Individual soldiers and sailors had distinct impacts on their surroundings while serving in remote observation posts, when conducting maneuvers over pristine terrain, and when visiting existing parks and recreation areas. They also contributed in unforeseen ways to the postwar transformation of Hawai'i, helping to recast the once-remote islands as a place to visit, laying the foundations for the territory and, later, the state's enormously successful tourism industry. This was, therefore, not only a story of human interventions but also one of a profound repositioning of the interrelationship of humans and their environment.

The Analytical Approach Of Environmental History

Environmental history is a relatively recent discipline—with deep roots in Western thought—that seeks to better understand the interactions of humans with their surroundings.¹ Breaking with an essentially nineteenth-century perspective that juxtaposed—and in some ways contrasted—“culture” and “nature,” environmental historians over the last few decades have begun to better address the close connections between human activity and land forms and vegetation. “Nature,” as historian Richard White remarked in his 1995 book *The Organic Machine: The Remaking of the Columbia River* is, “at once a cultural construct and a set of actual things outside of us . . . ; it needs to be put into human history.”² As NPS historian Timothy Babalis has observed, environmental

¹ For an overview, see J. Donald Hughes, *What Is Environmental History?* What Is History Series (London: John Wiley & Sons, 2006).

history often begins with a discussion of physical conditions and how they evolved over time, and proceeds to a broader analysis of cultural significance.³

Environmental history has shown that humans alter their surroundings in both dramatic and subtle ways. Areas that observers might typically regard as “natural” or even “wilderness” may in fact have long been subject to human intervention. Savannahs and wetlands, forests and plains, are the product not only of wind, water, geology, and climate but also of cultural practices of indigenous peoples and later settlers. The very act of creating a national park, with all that represents in terms of regulation and management, is, in turn, yet another form of human influence over the landscape, its vegetation, and its wildlife.⁴ Once subject to frequent small fires set by Native Americans to create open forest understories and edge habitats for game animals, Yosemite, one of America’s first wilderness parks, was by the mid-twentieth century a place dramatically changed by fire suppression. The NPS’s reinstitution of controlled burning in the 1970s caused an outcry from much of the public but helped restore variety to the park’s complex ecosystem and preserve many plant and animal species that people value in the park.⁵ The same was true at other national parks, including Yellowstone and Rocky Mountain, where controlled burns became a part of park management policy.⁶

Environmental history has three primary emphases. One is the chronicle of nature and change over time, including human impacts on natural forms. A second is the ways in which humans utilize nature, including the effects of changes in population, technology, and patterns of production and consumption. A third is the ways that humans perceive nature, including varied

² Richard White, *The Organic Machine: The Remaking of the Columbia River* (London: Macmillan, 1996).

³ Timothy Babalis, “The Cross in the Wilderness: An Aesthetic History of the American Park Idea” (PhD diss., Berkeley, Graduate Theological Union, 2004).

⁴ Alton Chase, *Playing God in Yellowstone—The Destruction of America’s First National Park* (Boston: Atlantic Monthly Press, 1986).

⁵ Gregory H. Aplet, “Evolution of Wilderness Fire Policy,” *International Journal of Wilderness* 12, no. 1 (April 2006): 9–13.

⁶ Jan W. van Wagtendonk, “The History and Evolution of Wildland Fire Use,” *Fire Ecology* 3, no. 2 (2007): 3–17. For the results, see Rocky Barker, *Scorched Earth: How the Fires of Yellowstone Changed America* (Washington, DC: Island Press, 2005); and K. W. Reinhardt, *Yellowstone’s Rebirth by Fire: Rising from the Ashes of the 1988 Wildfires* (Helena, MT: Far Country Press, 2009).

ways of understanding—whether religious, scientific, or now, often in moral and ethical terms.⁷ Understandably “a very big tent,” as ASEH past president Douglas R. Weiner recently remarked, environmental history attempts to bridge human history and natural history in ways that shed fresh light on old problems.⁸

Issues In Environmental History

Environmental history is by no means a settled discipline. There are many questions still about the scale of inquiry, the time spans to be scrutinized, and the ways in which “human agency” can be interpreted. Some scholars feel that many writers still unduly separate “culture” and “nature” as unique phenomena. Others suggest that the idea of “culpability” remains in the background of discussion. Still others take a different position, seeing human actions as inherently subject to historical and cultural contexts. Understanding these issues help establish the basis for inquiries such as this one and help define the direction of research and interpretation.

Sustainability

Environmental history often emphasizes problems of the present and a concern for the future. Population growth, climate change, deforestation, waste disposal, species extinction, and resource depletion are common themes. As early as 1864, pioneering conservationist George Perkins Marsh (1801–1882) cautioned against abuse of the environment, emphasizing that the changes each generation made would be passed on to their descendants.⁹ “Sustainability” became an ideal beginning in the late nineteenth century, because of thinkers such as Marsh. The concept

⁷ Samuel P. Hays, *Beauty, Health, and Permanence: Environmental Politics in the United States, 1955–1985* (Cambridge: Cambridge University Press, 1987).

⁸ Douglas R. Weiner, “A Death-defying Attempt to Articulate a Coherent Definition of Environmental History,” *Environmental History* 10, no. 3 (2009): 404–20.

⁹ George Perkins Marsh, *The Earth as Modified by Human Action*, rev. ed. (1874; repr., New York: C. Scribner’s Sons, 1885).

still underlies much of current thinking about the environment, influencing as well how scholars view the past.



1. 1. View of Pearl Harbor and Hickam Army Air Corps Base, 1940.

Advocacy

As with “sustainability,” the notion that environmental historians are also advocates for the wise treatment of the environment is a constant theme. That their work may influence policy and decision making clearly is a consideration. Few would argue for the retention of an unsustainable agricultural landscape, even if it were part of the “historic scene.” This is a decision NPS park managers frequently encounter when interpreting Civil War battlefields, for example.¹⁰ Similar expectations would apply to World War II sites and practices, which rarely would warrant reconstruction or preservation in their wartime state.

“Declensionist” Narratives

A frequent subtext of much environmental history is the claim that nature suffers from human exploitation and, as a consequence, has been long in a state of decline. The implicit sense is that “nature” was once in a pristine state and that humans have detracted from that original condition. Of course, the notion of decline and decay and the inevitability of human greed and destruction lay in part behind the origin of the NPS, the intention of which was to protect places and sites uncontaminated by human intervention. Many environmental historians now eschew the simplicity of this narrative of decline, understanding that human interventions have long been part of even so-called “natural” environments and that nature has its own forms of resilience and accommodation.

“Presentism” and Culpability

Some critics argue that environmental history takes the problems of the present and projects them onto the past. Most environmental historians, however, recognize that circumstances differ from the past to the present and understand the pitfalls of judging past actions in terms of present values. This is certainly a cautionary principle when considering the actions of the military during an exceptional time of world crisis. This report considers this understanding and strives toward circumspection when considering the damage the US military caused at natural and cultural sites. Writers must always consider “the standards of the time,” as part of the process of analysis. To do otherwise would be unfair to past actors.¹¹

¹⁰ John Hennessy, “Interpreting the Civil War Moving beyond Battlefields,” *CRM* 10, no. 4 (2002): 10–12, accessed September 3, 2012, <http://crm.cr.nps.gov/archive/25-04/25-04-3.pdf>.

¹¹ See, especially, David Hackett Fischer, *Historian’s Fallacy: Toward a Logic of Historical Thought* (New York: Harper Torch Books, 1970).



1. 2. Downtown Honolulu, ca. 1944.

Environmental Determinism

Another common historiographical pitfall facing environmental historians is arguing that the conditions of nature and the environment can predict universal human responses. This argument situates humans in a context in which their practices, assumptions, and ideas are somehow the result of *a priori* conditions of the environment.¹² The other extreme is that of cultural determinism, which presupposes that cultural proclivities determine all choices and outcomes.¹³ Current work of environmental historians tends not to exclusively embrace one or the other perspective but instead seeks a more nuanced understanding of the interaction of environmental conditions and human cultures.

¹² Hughes, *What Is Environmental History?*

¹³ William Cronon, ed., *Uncommon Ground: Toward Reinventing Nature* (New York: W. W. Norton, 1995).

Methodological Considerations

The core ideas in environmental history remain those set out by Donald Worster in the 1980s: the environment itself, human actions, and ways that humans think about their surroundings. Overall, the field strives toward impartiality and rigor in its appraisals of the story of humanity and the place of humans on the earth over many millennia.

Research Design

The principal intent of this study is to better understand the impact of World War II on NPS lands and later NPS units in Hawai'i, impacts that were both direct and indirect. The direction of this effort is twofold. One is to better understand how the military presence in Hawai'i during World War II affected existing national park lands. A second is to place the history of the NPS in a broader social, economic, and historical context of the war and its aftermath.

During the first phase of the project, research of existing documents and secondary literature was conducted to develop and refine the following research questions and themes for this study:

- What was the nature and extent of military activities in the Hawai'i National Park and other lands not originally owned by the park but now park property?
- What were the extent and nature of prior military uses and contributions to the national park in Hawai'i?
- What was the impact of military activities on the natural environment? And did military officials need to adjust their plans to accommodate the terrain or natural environment in Hawai'i? Were there any surprises?
- In what ways did the park contribute to the recreational life of service personnel in Hawai'i?
- In what ways did activities, both military and recreational, alter the parks? What buildings resulted from military uses? How were roads or trails affected by the military

- presence? How, if at all, did the military presence affect “natural” features within parklands? This includes impacts on terrain, vegetation, etc.
- What was the nature of interaction between park officials, both local and national, with military and civilian leaders in Hawai‘i?
- Who were the principal military and government figures involved in park use during the period of greater military involvement?
- Was there a “residual” impact on park management because of the wartime experience? Did park and local governmental officials change the way they thought about parks and their value for recreation, development, and tourism as an outcome of the war experience?
- To what extent did activities within the parks mirror military involvements at other sites in the territory of Hawai‘i? Are there important parallels among state and county parks? Did military uses on private land, especially ranches on both Maui and Hawai‘i, parallel those on parklands?
- What role specifically did the parks play in the confinement of Japanese residents and citizens during the war years? How did park officials work with civil and military authorities to expedite the confinement efforts on Maui and Hawai‘i especially?
- In what ways did the NPS allow for the use of parklands and other places now associated with or now part of the NPS system for training during the war? What was the attitude of NPS administrators to these uses?
- What specific buildings, sites (including roads, trails, airstrips, or encampments), structures or collections of buildings (districts) still retain a sense of association with the World War II period? Are there places that still demonstrate the direct result of military involvement in the parks today—including both older parklands and those absorbed into the system more recently? Are there other sites, buildings, or structures with strong historical connections to the military presence?
- Are there opportunities for enhancement and interpretation among any of the sites now recognized as contributing in some way to the war effort?

Primary Themes

Impacts on the Environment

A key theme for this project is the impact of the military on the environment. This is a complex topic and one that touches upon the obvious “negative” impacts of military training (and even artillery practice) on or near parklands to more “positive” aspects of the military presence both inside and outside the parks. Individual soldiers and sailors no doubt caused damage within the parks, in the form of littering and small acts of vandalism, as noted especially at Haleakalā. They also left their imprint due to their very presence in the parks and the sheer numbers of military visitors during the war. However, they also assisted park officials in the maintenance of roads (sometimes disagreeing on what required repair or improvement), worked on park buildings, and policed the grounds of encampments. Their presence also justified the very reasons for existence of the parks, reminding military personnel, park managers, and the public of the value of these preserved open spaces.

Disagreements and Disparities in Missions

What park officials expected in 1941 or 1942 was clearly different from what they perceived in 1943 or 1944. What began as a wholehearted commitment to the war effort evolved over four years to first, a more tentative support and finally, opposition to many of the steps the military saw as essential, but which park officials—notably Superintendent Edward Wingate—saw as unnecessary. This evolution of the relationship between the military and the parks would be one of the most telling developments of the war years and would underline a growing separation between the military and the parks.

There were numerous personal issues as well—ones that pointed to underlying attitudinal and even “structural” differences in mission and priorities. Superintendent Wingate of the NPS was frequently at odds with military commanders despite his overall aim to assist in the war effort. Some of the problems that arose were an outgrowth of long-standing disagreements over the place of the military in the parks. The friction also demonstrated a level of institutional conflict between the Army and the NPS. The war helped bring these issues to the surface, highlighting some of the areas in which there was fundamental disagreement in values and approach. The war also helped to identify the separate interests of the military and the NPS in a profound way.

The military was very close to the NPS in its early years—a fact that is sometimes forgotten. Prior to the passage of the Organic Act of 1916, the Army often took responsibility for the management of parklands. It detailed its troops to oversee Yellowstone and other western parks while its military engineers and cavalry units developed roads and enforced regulations governing hunting, cattle grazing, commercial timber operations, and vandalism. Army staff also acted as early visitor guides—in effect, inventing the protocol for later NPS employees. Culturally, the first NPS rangers and superintendents had close ties to the military as well. Many NPS employees had seen military service and shared the views and attitude of their military counterparts. The uniforms of the early—and even later—NPS closely followed those of the Army; the riding jodhpurs of park rangers were identical to those of the US Cavalry, as was the iconic felt hat. The parks and the military also shared a propensity for organizational hierarchy.

In Hawai‘i, this close connection of the military to the parks was equally strong. Cavalry troopers—the famous Buffalo Soldiers—built some of the earliest trails and roads in Hawaii National Park. Likewise, entrepreneur Lorrin Thurston’s efforts to establish Hawai‘i’s first national park hinged on the cooperation of the military. The park’s potential as a place for “rest and relaxation” and for training was one of Thurston’s key rationales at the time he was promoting the idea with territorial and federal officials and elected representatives.

The NPS Contribution to the War Effort

Despite disagreements, the NPS also served the war effort. The parklands accomplished their mission to provide a respite from the hazards of war and a time for recreation for American soldiers and sailors. The NPS offered its facilities at Kīlauea, including its not-yet-complete new administration building and visitor center. At Haleakalā, the NPS gave up rights to the summit of the mountain for a radar tower and allowed the Army to occupy buildings formerly used by the Civilian Conservation Corps (CCC). Reluctantly—though with recognition of the importance to the war effort—the NPS allowed for training on parklands and accepted the potential for damage.

Other places outside NPS jurisdiction served similar functions. Huge swaths of land on O‘ahu, Hawai‘i, Maui, and Moloka‘i became military training sites. Great stretches of beach throughout the islands became practice sites for amphibious invasions. On each island, the military built bunkers and outposts to defend against possible invasion by the Japanese. All of this reflected the exigencies of total war. Landing training, bomb practice, and inland maneuvers also contributed directly to the success of the US campaign in the Pacific that led ultimately to US victory in the war. For students of American history and the veterans who fought to ensure that the US prevailed in this great conflict, these were no small matters.



1. 3. Crossing at toggle bridge, with dynamite simulating mortar fire, ca. 1944.



1. 4. 34th Infantry on Waikane Trail, O'ahu, 1943.

Secondary Themes

Changing Public Attitudes toward the Environment and the NPS

A secondary area of inquiry in this study is that of changing “consciousness”—looking at ways attitudes toward nature and places that enshrined and protected nature altered the ways both the military and the public viewed national parks and simply, the spaces yet trammled by humans. “Environmental awareness” among the general public was not widespread at the time of the war—indeed, the idea of careful stewardship of resources barely existed outside of the relatively specialized field of wildlife conservation and the NPS itself. Novelist James Jones, for example, thought nothing of dynamiting a hole in the reef at Hanauma Bay on O‘ahu (now a state park) to create a bigger swimming hole for himself and his companions while occupying a nearby coastal battery.¹⁴ Soldiers and sailors in the parks were often similarly thoughtless, little considering the long-term impacts of their presence on fragile places. Other wartime visitors, however, doubtless appreciated the respite from training and war to relax among the seemingly pristine landscapes of Haleakalā and Kīlauea. In profound ways, the experience of the parks and Hawai‘i’s own special beauty may well have helped change the perception of nature and seemingly unspoiled areas and engendered an appreciation for quiet places unaffected by the war.

The war, in Hawai‘i and elsewhere, also created the social, economic, and political context of the postwar era. The war interrupted the “normal” lives of millions of Americans, delayed families and the birth of children, postponed dreams for businesses, houses, and the simple joy of leisure time. For many Americans, the postwar period would be one of recapturing lost time. The NPS, with the increasing financial support of Congress, answered this call. Parks returned to their original uses as places of recreation, now poised to face the onslaught of ever-

¹⁴ The story may be apocryphal. See Tim Ryan, review of *Hanaumu Bay: Hawaii’s Coastal Treasure*, by Cheryl Chee Tsutsumi, *Honolulu Star-Bulletin*, August 1, 2005, accessed May 23, 2014, <http://archives.starbulletin.com/2005/08/01/features/index2.html>. James Jones’s wartime experiences are recounted in *From Here to Eternity* (New York: Scribner’s, 1951), *The Thin Red Line* (New York: Charles Scribner’s Sons, 1962), and *Whistle* (New York: Delacorte Press, 1978). He served in both the 27th and 25th Infantry Divisions.

greater numbers of visitors. They met this challenge with new campgrounds, visitor centers, and interpretive programs. Although they wanted to keep their new cars, eat familiar foods, and experience nature, American families also wanted things “to do” in the parks, albeit in carefully controlled doses. Rather than remote wilderness areas as they once had been, postwar parks became places for family entertainment.

This was true in Hawai‘i as it was the rest of the country. Local residents and returning military personnel sought out the places they valued before the war. Hawai‘i residents also recognized the important of special places, such as Pu‘uhonua O Hōnaunau and Pu‘ukoholā Heiau and—mostly—supported NPS efforts to protect them. The expansion of park facilities at Hawaii National Park and the 1960 creation of the two park sections were both part of this broader response to park purposes and ideals.

The Postwar Role of the NPS

The war altered the overall character of the United States in many ways. Suburban homes, cars, and increasing urbanization were the legacy of the wartime period. The Interstate and Defense Highways, imitating German autobahns, allowed Americans to live farther from work and to travel with greater ease. Weekend getaways, family beach vacations, and visits to historic sites became an important part of the culture middle-class life in the United States to an unprecedented degree.

The NPS responded to this, and in some ways led the nation, by creating new recreational sites. Protection of seashores at Cape Cod and on the Maryland and North Carolina shores anticipated the needs of a more mobile America. The development of such urban sites as Independence National Park in Philadelphia moved the NPS into fresh territory. Historic battlefield sites, often near East Coast urban centers, also received fresh attention. The NPS took fresh initiatives as well. The National Historic Landmark (NHL) Program expanded during this period to aid in recognizing and preserving historic sites, towns, and buildings. Often closely tied to tourism, the NPS found itself cooperating with the owners of resorts and locals business

interests. There were also new “concessions” for NPS administrators to deal with, from boat tours and mule rides to in-park hotels and snack bars.

There were similar developments in Hawai‘i. The old whaling town and former capital of Lahaina on Maui received NHL designation, both to help protect historic buildings and to encourage sympathetic commercial development. The NPS took the initiative at Pu‘uhonua O Hōnaunau, acquiring the ancient *heiau* and its surroundings both as a visitor attraction and to recognize and protect a fragile cultural and historic heritage. The creation of the Pu‘ukoholā Heiau National Historic Site in 1972 and of the Kaloko-Honōkōhau National Historical Park in 1978 was partially in response to the development of the Kona Coast of the island of Hawai‘i as a new tourism draw.¹⁵ The NPS’s involvement at Pu‘ukoholā Heiau was reportedly one of the inducements presented to the RockResorts company prior to the building of the Mauna Kea Resort.¹⁶



1. 5. Kilauea, View from Mauna Loa Lookout Station.

¹⁵ Robert Fox, architect, personal communication, Robert Fox, Honolulu, June 16, 2012.

Impacts on Native People

An additional story, and one often not considered when examining a historical topic of this kind, is the impact of decisions about land and land use might have had on the native population. This story is particularly important in Hawai'i, where Native Hawaiians, from the time of early Western contact, generally were not party to such decisions.¹⁷ The parceling out of designated tracts in the mid-nineteenth century by Hawaiian *ali'i*, under the influence of Western advisors, was not in accord with traditional Hawaiian ideas of land tenure and access. In the early twentieth century, Native Hawaiians living in rural areas and along the coasts of the islands witnessed their hereditary claims to land and resources as the first sugar growers ignored, and then the US Navy and Army took control of territory previously held in common. Rural inhabitants especially viewed the NPS and US Army and Navy as outside “federal” powers exercising control in similarly distressing ways over native lands, no matter how the ideals of the NPS and the military might in time come to differ.¹⁸

¹⁶ “History of Mauna Kea,” Mauna Kea Beach Hotel, accessed November 1, 2012,

<http://www.princeresortshawaii.com/mauna-kea-beach-hotel/mauna-kea-hawaii-history.php>.

¹⁷ George Cooper and Gavan Daws, *Land and Power in Hawaii* (Honolulu: University of Hawai'i Press, 1990).

¹⁸ Many of the resident Hawaiian population, notably the Pai family (*ohana*), opposed the park the proposed creation of a national park at Kaloko-Honōkohau, feeling it threatened traditional access and traditions. This reflected many years of concern over the loss of traditional claims. See US Department of the Interior, Record of Decision, General Management Plan, Final Environmental Impact Statement, Kaloko-Honokokau National Historical Park, Hawaii ¹⁹



1. 6. US Marine landing training near Makena, Maui, February 1945

The World War II era was no different. While many Hawaiians served proudly in the US military, their families nonetheless saw yet further diminution of control over traditional claims, as the military staked out larger areas for training and temporary installations. Hunting, fishing, and even walking across seemingly empty landscapes were suddenly prohibited. New federal managers also ignored past family associations—often tied to responsibilities, or in Hawaiian, *kuleana*—and Hawaiian sacred sites, such as places of family burials or birth rituals, including the deposit of *piko* or umbilical cords, as well as long-accepted family fishing and gathering areas.¹⁹

In the postwar era, as tourism expanded and well-intentioned efforts to preserve Native Hawaiian sites became more part of the state of Hawai'i's efforts, state and federal officials continued to overlook these traditional claims. However, for many Native Hawaiians, World War II seemed, in retrospect, part of an ongoing period during which they continued to lose control of their own lands and environment.

¹⁹ County, Hawaii, December 9, 1994, accessed May 21, 2014, <http://www.botany.hawaii.edu/basch/uhnpscesu/pdfs/GMPdecision.pdf>.

Methods

This study includes a combination of library and archival research and fieldwork. A review of primary and secondary sources and “gray literature” in the form of environmental and archaeological reports took place at Hamilton Library at the University of Hawai‘i at Mānoa, Hawai‘i State Library Hawai‘i State Archives, and NPS archives at Haleakalā National Park on Maui and Hawai‘i Volcanoes National Park on Hawai‘i. Records held by local historical societies were also useful, as were records contained in the National Archives and Records Administration (NARA) collections in San Francisco (San Bruno), California, and Washington, DC (College Park), Maryland. Researchers conducted fieldwork in Haleakalā and Hawai‘i Volcanoes National Parks, and conducted interviews with NPS personnel and with knowledgeable residents and others familiar with the military story in Hawai‘i.²⁰

The underlying approach has been to provide a narrative of events in Hawai‘i during the war and to link these to the larger context of World War II. Chronology, in accordance with long-standing historical convention, has been a key factor. Unlike other studies of the Hawaii National Park during the war—notably Frances Jackson’s several treatments and recent analysis by Jadelyn J. Moniz Nakamura²¹—this study divides the materials into discrete blocks based primarily on the sequence of events.

²⁰ “Pu‘u Loa Petroglyphs,” Hawai‘i Volcanoes National Park, accessed September 12, 2013, <http://www.nps.gov/havo/historyculture/puuloa.htm>.

²¹ Frances Jackson, “Military Use of Haleakala National Park,” *Hawaiian Journal of History* 6 (1972): 129–41, Frances Jackson, “Bombs in a National Park: Military Use of Hawaii National Park during World War II,” *Hawaiian Journal of History* 10 (1976): 102–7, Frances Jackson, *An Administrative History of Hawaii Volcanoes National Park, Haleakala National Park* (Kilauea, HI: Hawaii Volcanoes National Park [HAVO] for the National Park Service, US Department of the Interior, 1972); and Jadelyn J. Moniz Nakamura, “Up in Arms! The Struggle to Preserve the Legacy of the National Park Service during Wartime,” typescript, 2013, HAVO, revised and printed as “Up in Arms! The Struggle to Preserve the Legacy of the National Park Service during Wartime,” *Hawaiian Journal of History* 47 (2013): 179–209.

CHAPTER 2: THE NATIONAL CONTEXT

World War II in World History

World War II was arguably the seminal event of the twentieth century. From its origins in regional conflicts in Europe, Asia, and parts of Africa, the war lasted from 1939 to 1945 with repercussions well beyond its specific events. The aftermath of the war continues to color our lives today.¹ Fought between the Axis Powers (Germany and Italy, in alliance with the Japanese), and the Allies (Great Britain and its longtime colonies, exiled governments in Europe, the United States, and eventually, the Soviet Union), the war stretched across five continents, involved as many as 70 million combatants and directly affected ten times as many civilians.²

Throughout the spring, summer, and fall of 1941, Great Britain was subjected to daily and nightly attacks by German bombers. Victories in the Middle East and then a larger triumph against Italian and German troops in North Africa in 1940 and 1941 started to shift the balance in Great Britain's favor.³ Hitler's decision in June 1941 to break Germany's opportunistic truce with the Soviet Union further marked the Axis's decline, as German troops began their unsuccessful attempt to strike at the population centers of Russia.⁴ Although the Germans reached the outskirts of Moscow, by December 1941, when the United States entered the war, the advantage in Europe had begun shifting to the Allies.⁵

¹ Gerhard L. Weinberg, *A World at Arms: A Global History of World War II* (Cambridge: Cambridge University Press, 1995). For an overview of principal campaigns and battles, see Donald Sommerville, *The Complete Illustrated History of World War Two: An Authoritative Account of the Deadliest Conflict in Human History with Analysis of Decisive Encounters and Landmark Engagements* (London: Lorenz Books, 2008). On the numbers of civilian and military casualties, see Michael Clodfelter, *Warfare and Armed Conflicts- A Statistical Reference to Casualty and Other Figures, 1500-2000*, 2nd ed. (London: MacFarland and Company, 2002). The volume of literature on World War II is staggering. This report can only cite a few texts that support the narrative.

² The Soviet Union, unprepared for conflict, signed a nonaggression treaty with the Germans and extended its control over parts of Poland, Lithuania, Latvia, Estonia, and Finland. See David Fisher and Anthony Read, *The Deadly Embrace: Hitler, Stalin, and the Nazi-Soviet Pact, 1939-1941* (New York: W. W. Norton, 1999). In November 1940, the puppet governments of Hungary, Romania, and Slovakia joined the Axis, followed by Bulgaria early the next year.

³ Alan Moorhead, *Desert War: The North Africa Campaign, 1940-1943* (Harmondsworth: Penguin Books, 2001).

⁴ Alan Clark, *Barbarossa: The German-Russian Conflict, 1941-45* (London: William Morrow, 1985).

⁵ David M. Glantz and Jonathan M. House, *When Titans Clashed: How the Red Army Stopped Hitler* (Lawrence: University Press of Kansas, 1995).

In Asia, the Japanese had taken advantage of the turmoil in Europe to expand their territorial control.⁶ Replacing Western colonies with what the Japanese called the Greater East Asian Co-Prosperity Sphere, the Japanese extended their hold over parts of China and took over French colonies in Indochina.⁷ The United States responded by freezing Japanese assets and imposing an embargo on oil. On December 7, 1941, with the hopes of delaying any American response to its conquest of Asia, Japan struck the US Pacific Fleet in Hawai'i and invaded the Philippines, which the United States had administered since 1898. Simultaneously, the Japanese invaded British-held Hong Kong, Singapore, Malaysia, and Burma.⁸

By mid-1942, Japan controlled most of China and all of Southeast Asia. In May 1942, the Japanese had attempted to invade Port Moresby in New Guinea and cut supply and communication lines to Australia.⁹ The Germans, in the meantime, harassed shipping in the Atlantic by attacking US convoys and threatening coastal areas with incessant submarine activity.¹⁰ Decisive US victories at the Battle of the Coral Sea and Midway shifted the advantage to the United States.¹¹ By summer 1942, US forces had begun their long advance over Japanese held islands in the Pacific, a march that would eventually take the war to Japan's doorstep.¹²

While the United States (with support from Australia and New Zealand) carried the weight of the war in the Pacific, both British and US forces began to force the Germans out of Africa. After occupying Egypt by fall 1942, the Allies then took control of Morocco, Libya, and

⁶ Robert Smith Thomas, *Empires on the Pacific: World War II and the Struggle for Mastery of Asia* (New York: Basic Books, 2001).

⁷ Ramon Hawley Myers and Mark R. Peattie, *The Japanese Colonial Empire, 1895–1945* (Princeton, NJ: Princeton University Press, 1984).

⁸ Gordon Prange, *At Dawn We Slept: The Untold Story of Pearl Harbor* (New York: Penguin, 1981); and Christopher Bayly and Tim Harper, *Forgotten Armies: The Fall of British Asia, 1941–1945* (Cambridge, MA: Belknap Press, 2005).

⁹ James B. Wood, *Japanese Strategy in the Pacific: Was Defeat Inevitable?* (London: Roman & Littlefield Publishers, 2007).

¹⁰ Samuel Eliot Morison in *The Two-Ocean War: A Short History of the United States Navy in the Second World War* (New York: Little Brown, 1963).

¹¹ Chis Henry, *The Battle of the Coral Sea* (Annapolis, MD: Naval Institute Press, 2003); and Samuel Eliot Morison, *Coral Sea, Midway, and Submarine Actions, May 1942–August 1942*, Vol. 4, *History of United States Naval Operations in World War II* (1949; repr., Urbana: University of Illinois Press, 2001).

¹² William B. Hopkins, *The Pacific War: The Strategy, Politics, and Players that Won the War* (London: Zenith Press, 2009).

Tunisia by May 1943.¹³ Soviet forces had similar success beginning in summer 1942, effectively blocking further advances by the Germans by the following summer.¹⁴ In the meantime, the British and Americans put new pressure on the Germans and their disheartened allies, the Italians, first invading Sicily in July 1943 and the Italian peninsula two months later.¹⁵ Over the next six months, Soviet and Allied troops continued to gain victories, slowly pushing back German and Japanese troops on all fronts.

June 6, 1944, was D-Day, marking the invasion of Europe at Normandy and the beginning of the Allied offensive on the continent. On June 22, Soviet troops began a new attack in Belarus, eventually folding back German troops on Germany's Eastern Front. Further Allied and Soviet advances—marked by significant counteroffensives, including that in Belgium known as the Battle of the Bulge or the Ardennes Offensive—eventually pushed German troops back to their own borders.¹⁶ With withering supplies and a constantly diminished army and pressed between Allied and Soviet troops, the remnants of the Third Reich fell to Allied troops on April 30, 1945. The formal surrender was on May 7, 1945.¹⁷

In the Pacific Theater, the United States and its allies made comparable advances, retaking the Philippines in winter and spring 1945. Australian, British, and American forces also retook Borneo and Burma, while the Chinese, with Allied assistance, defeated the Japanese at the Battle of West Hunan in June 1945.¹⁸ American forces invaded Okinawa and Iwo Jima the same month, while continuing to bomb Japanese cities and cutting the country off from much-needed supplies through continual US naval harassment. With fears that Japan would not surrender without great further loss of American troops, the United States chose to drop atomic bombs on

¹³ Rick Atkinson, *An Army at Dawn: The War in North Africa, 1942–1943* (New York: Simon & Schuster, 2007).

¹⁴ Glantz and House, *When Titans Clashed*.

¹⁵ Carlo d'Este, *Bitter Victory: The Battle for Sicily 1943* (London: Arum Press Ltd., 2008).

¹⁶ Trevor N. Duprey, David L. Bongard, and Richard C. Anderson Jr., *Hitler's Last Gamble: The Battle of the Bulge, December 1944–January 1945* (New York: HarperCollins, 1994).

¹⁷ Antony Beevor, *Berlin—The Downfall, 1945* (New York: Viking-Penguin, 2002).

¹⁸ Dick Wilson, *When Tigers Fight* (New York: Viking, 1982); and Theresa L. Kraus, *US Army Campaigns of World War II: China Offensive* (Washington, DC: US Army Center of Military History, 1992).

Hiroshima and Nagasaki in early August.¹⁹ The Soviet Union invaded Manchuria, quickly defeating the remnants of the Japanese army there.²⁰ The Soviets then joined the Allied cause, declaring war on Japan while taking control of the Kuril Islands off the Japanese coast. Japan finally surrendered on August 15, 1945. Japanese and American representatives signed the final documents on September 2, on the deck of the USS *Missouri*, then in Tokyo Harbor, thus bringing the war formally to an end.²¹



2. 1. Approaching Omaha Beach, Normandy, June 6, 1944. An iconic image of World War II, the Normandy landing was a turning point for the Allied forces in the European Theater.

¹⁹ Richard B. Frank, *Downfall: The End of Imperial Japan* (Harmondsworth: Penguin, 2001); Herbert Feiss, *The Atomic Bomb and the End of World War II*, 2nd rev. ed. (Princeton, NJ: Princeton University Press, 1967); Richard Rhodes, *The Making of the Atomic Bomb* (New York: Simon & Schuster, 1986); and Dennis Wainstock, *The Decision to Drop the Atomic Bomb* (New York: Greenwood, 1996).

²⁰ Tsuyoshi Hasegawa, *Racing the Enemy: Stalin, Truman, and the Surrender of Japan* (Cambridge, MA: Belknap Press, 2006).

²¹ Robert J. C. Butow, *Japan's Decision to Surrender* (Palo Alto, CA: Stanford University Press, 1954).



2. 2. Extent of Japanese conquests in 1942.

The US Home Front

The war had an enormous impact on the United States long before the country's formal entry into the conflict. Emerging from a nearly decade-long economic depression, US civilians experienced a new level of prosperity due directly as a result of the war, with students, retirees, single women, and homemakers entering the work force as part of an unparalleled national effort to win the war.²² American citizens also faced rationing, food, clothing, and housing shortages;

²² David M. Kennedy, *Freedom from Fear: The American People in Depression and War, 1929–1945*, Oxford History of the United States (New York: Oxford University Press, 2001); Richard Polenberg, *War and Society: The United States, 1941–1945* (London: Praeger, 1980); and Allan M. Winkler, *Home Front U.S.A.: America during World War II*, 2nd ed. (New York: Harlan, 2000).

many factory workers had to “double-up” in already cramped quarters, sharing bathrooms and ad hoc cooking facilities.²³ Despite privations, everyday Americans could save money again. They also began to increasingly move around the country, drawn especially to the new centers of wartime production in the Pacific Northwest and California. Others pressed into existing industrial areas, such as Detroit and Pittsburgh, expanding already substantial workforces there.²⁴

To meet the financial costs of the war, Congress revised tax rates, imposing higher taxes on upper- and lower income earners alike and reducing exemptions and deductions at even the lowest income levels.²⁵ The country also assumed new debt, raising money through War Bond sales as well as taking on other obligations. War Bonds, often promoted by war heroes and movie stars, were popular with the public, providing ways to reinvest their new savings while helping the country in the war effort.²⁶ The economy was also subject to increased government oversight. There were strict controls on prices of commodities and wages. The War Production Board (WPB) and Army and Navy Departments had priority in purchasing, further shaping the course of industrial production.²⁷

The war caused significant shifts in the nation’s workforce as well. Originally a supplement to volunteer forces, by 1942 the military relied entirely on draftees, taking in as many as 200,000 new service personnel each month to reach the mid-war goal of 9 million in uniform.²⁸ To fill the gaps left by departing men, women took on industrial jobs previously

²³ Howard Zinn, *A People's History of the United States* (New York: Harper & Row, 1980).

²⁴ Michael C. C. Adams, *The Best War Ever: America and World War II* (Baltimore, MD: Johns Hopkins University Press, 1993); and John Morton Blum, *V Was for Victory: Politics and American Culture during World War II* (1976; repr., New York: Harcourt, Brace, Jovanovich, 1995).

²⁵ John Woolley and Gerhard Peters, “Executive Order 9250 Establishing the Office of Economic Stabilization,” American Presidency Project, University of California at Santa Barbara, accessed September 6, 2012, <http://www.presidency.ucsb.edu/ws/index.php?pid=16171#axzz1qK2AszpJ>.

²⁶ James J. Kimble, *Mobilizing the Home Front: War Bonds and Domestic Propaganda*, Presidential Rhetoric Series (College Station: Texas A&M University Press, 2006).

²⁷ Paul A. C. Koistinen, *Arsenal of World War II: The Political Economy of American Warfare, 1940–1945* (Lawrence: University Press of Kansas, 2004).

²⁸ Clifford J. Garry and Samuel R. Spencer, Jr., *The First Peacetime Draft*, Modern War Series (Lawrence: University Press of Kansas, 1986); and George Q. Flynn, *The Draft, 1940–1973* (Lawrence: University Press of Kansas, 1993).

denied them.²⁹ African Americans also entered the industrial workforce, leaving poorly paid jobs in agriculture for new work in the North and West.³⁰ “Rosie the Riveter,” a figure popularized by Norman Rockwell’s 1943 cover for the *Saturday Evening Post*, became the new symbol of women workers.³¹

The war led also to increasing volunteerism as well. Older Americans joined organizations such as the Civil Air Patrol (CAP) and the Coast Guard Auxiliary.³² The United Service Organization (USO), Salvation Army, Young Men’s Christian Association (YMCA), Young Women’s Christian Association (YWCA), National Catholic Community Service, Travelers Aid Association, and National Jewish Welfare Board boosted the morale of soldiers, sailors, and marines, many of whom were away from their homes for the first time.³³ The Red Cross sponsored blood drives and many citizens participated in war bond campaigns.³⁴ There were neighborhood scrap and paper drives, and even efforts to collect fat for soap and milkweed for life preservers.³⁵

²⁹ For a popular account, see Penny Coleman, *Rosie the Riveter: Women Working on the Home Front in World War II* (New York: Crown Books, 1998). A more scholarly reference is Susan M. Hartmann, *Home Front and Beyond: American Women in the 1940s* (New York: G. K. Hall and Company, 1983).

³⁰ Daniel Kryder, *Divided Arsenal: Race and the American State during World War II* (Cambridge: Cambridge University Press, 2001).

³¹ Artist J. Howard Miller’s “We Can Do It!” poster was one of a series commissioned by Westinghouse’s War Production Co-Ordinating Committee. (Interestingly, the “We Can Do It!” poster was only exhibited at Westinghouse, and only for two weeks. It didn’t become famous until after the war.) Rockwell painted “Rosie the Riveter” for the May 29, 1943, *Saturday Evening Post* cover. See National Parks Traveler, Quiz 31: World War II, 2008, accessed May 3, 2012, <http://www.nationalparkstraveler.com/2008/12/national-park-quiz-31-world-war-ii>.

³² Robert E. Neprud, *Flying Minute Men: The Story of the Civil Air Patrol* (New York: Duell, Sloan, and Pearce, 1948); and Historical Section, Information Division, US Coast Guard, *The Coast Guard at War, Auxiliary XIX* (Washington, DC: US Coast Guard, US Department of Transportation, 1948).

³³ Rachel M. McCleary, *Global Compassion: Private Voluntary Organizations and U.S. Foreign Policy since 1939* (Oxford: Oxford University Press, 2009), accessed May 12, 2012, <http://www.oxfordscholarship.com/view/10.1093/acprof:oso/9780195371178.001.1/acprof:9780195371178-chapter-2>.

³⁴ Foster Rhea Dulles, *The American Red Cross, a History* (New York: Harper & Brothers, 1950).

³⁵ “Home Sweet Home Front: Scrap Drives,” *Dayton during World War II*, Dayton History Books online, accessed May 23, 2012, <http://www.daytonhistorybooks.com/page/page/1652512.htm>.

The relocation of more than 15 million Americans to war production centers constituted the greatest internal migration in the nation's history.³⁶ Between 1940 and 1944, more than 500,000 people moved to Los Angeles alone.³⁷ Many of these people worked in new aircraft plants on the city's outskirts, and developers built residential projects nearby, hastening the decentralization of Los Angeles. Not only housing but also highways changed as well. Los Angeles built many new roads and exploited its existing bus and trolley capacity. In Detroit, civil engineers devised the first tri-level highway interchange, built in 1942 near the Willow Run bomber plant outside Detroit, to accommodate thousands of its commuting workers.³⁸



2. 3. Manufacturing bomber nosecones for A-20 attack bombers, Douglas Aircraft Plant, Long Beach, California, October 1942.

³⁶ Christopher J. Tassava, "The American Economy during World War II," EHNet, Encyclopedia, Economic History Association, May 2, 2010, accessed May 21, 2012, <http://eh.net/encyclopedia/article/tassava.WWII>; Arthur Herman, *Freedom's Forge: How American Business Produced Victory in World War II* (New York: Random House, 2012); and Steve Fraser, *Labor Will Rule: Sidney Hillman and the Rise of American Labor* (New York: Free Press, 1991).

³⁷ Arthur C. Verge, "The Impact of the Second World War on Los Angeles," *Pacific Historical Review* 63, no. 3 (1994): 289–314; Harold G. Vatter, *The U.S. Economy in World War II* (New York: Columbia University Press, 1985); and Alan Steele Milward, *War, Economy, and Society: 1939–1945* (Berkeley: University of California Press, 1979).

³⁸ "US 12–Willow Run Exchange," Bridge Browser, Historic Bridges.org, accessed May 13, 2012, <http://www.historicbridges.org/bridges/browser/?bridgebrowser=michigan/willowrun1>.

The war effort resulted in over \$304 billion of direct government expenditures and many more billions in associated private investment.³⁹ The wartime program included factories to produce munitions, planes, and vehicles; test facilities; and housing for defense workers. Many of the new plants were located in coastal areas in order to increase access to ports and decrease shipping time and costs. These included numerous munitions factories—thirty-four new plants were under construction by the end of 1941—as well as clothing factories, automobile and truck manufactories, and especially, shipyards.⁴⁰ Construction of the four-million-square-foot Pentagon began in 1941, before the United States entered the war. This effort alone employed hundreds of workers and eventually housed over 40,000 War Department employees.⁴¹

The war had the effect of unifying Americans and enlisting them in a single enterprise. There was little resistance to the draft and, with the exception of gasoline rationing, little opposition to the government's economic strictures. Unfortunately, egregious suspensions of civil liberties occurred as well. Over 100,000 Americans of Japanese heritage were forced from their homes and businesses into internment camps located throughout the US interior, a step now recognized as a particularly unfortunate chapter in the nation's history.⁴²

³⁹ Tassava, "The American Economy during World War II."

⁴⁰ "World War II and the American Dream: How Wartime Building Saved a Nation," exhibit, November 11, 1994–December 31, 1995, accessed May 23, 2012, <http://www.h-net.org/~local/exhibitions/dream.html>.

⁴¹ "Concept to Early Construction (1941–1942)," Pentagon History, The Pentagon, Washington, DC, US Department of the Defense, accessed May 6, 2012, <http://pentagon.afis.osd.mil/history.html>; and Steve Vogel. *The Pentagon—A History: The Untold Story of the Wartime Race to Build the Pentagon and to Restore It Sixty Years Later* (New York: Random House, 2006).

⁴² Audrie Girdner, *The Great Betrayal: The Evacuation of the Japanese-Americans during World War II* (New York: Macmillan, 1969); Greg Robinson, *By Order of the President: FDR and the Internment of Japanese Americans* (Cambridge, MA: Harvard University Press, 2001); Michi Weglyn, *Years of Infamy: The Untold Story of America's Concentration Camps*, rev. ed. (1976; repr., Tacoma: University of Washington Press, 1996); and Wendy Ng, *Japanese American Internment during World War II: A History and Reference Guide* (New York: Greenwood, 2001). The FBI also arrested many Germans and Italians living in the United States with apparent ties to their homelands. On the US government's recognition of overreaction, see Internment Archives, S. 1009, Page 002, Senate Bill, Findings of the Commission on Wartime

Growth of the Military

While the civilian response to the war was important, the mobilization of the US military was even more evident. Engineers expanded old shore batteries and constructed new defensive works in coastal areas. Newer guns soon replaced older models; the new 16-inch coastal guns, first tested in 1940 at Fort Cronkite north of San Francisco's Golden Gate Bridge, could now fire 2,000-pound projectiles twenty-five miles toward enemy ships.⁴³ At first relying on naval guns taken from older warships, coastal batteries along the East Coast adopted larger 16-inch guns and rapid-firing 6-inch and 90-mm guns for use against torpedo boats.⁴⁴ Fields of submarine mines also protected channels and ports.⁴⁵

To prepare for possible sea invasion, the Army and Navy installed mines, searchlights, radar, and anti-aircraft guns. Soldiers stretched barbed wire and stood guard at lookout posts.⁴⁶ Following the Pearl Harbor attack, the Navy supplemented minefields with submarine nets outside of major harbors, and patrolled approaches by aircraft.⁴⁷ The government soon expanded existing Navy and Army bases and took control of federal lands for training. Oregon's Camp Abbott, occupying a 5,500-acre US Forest Service preserve, trained approximately 10,000 soldiers every seventeen-week cycle, with over 90,000 combat engineers completing the course by

Relocation and Internment of Civilians, accessed May 12, 2012,

http://www.internmentarchives.com/showdoc.php?docid=00055&search_id=19269&pagenum=2.

⁴³ Mark B. Chin, *Artillery at the Golden Gate: The Harbor Defenses of San Francisco in World War II* (Missoula, MT: Pictorial History Series Publishing Co., 1994); and Mark A. Berhow, ed. *American Seacoast Defenses: A Reference Guide*, 2nd ed. (Bel Air, MD: CDSG Press, 2004).

⁴⁴ "A Brief History of Fort Story, 1914–Present," North American Forts.com, accessed May 23, 2012, http://www.northamericanforts.com/East/Virginia/Fort_Story/history.htm.

⁴⁵ Gregory K. Hartmann and Scott C. Truver, *Weapons that Wait: Mine Warfare in the U.S. Navy* (Annapolis, MD: Naval Institute Press, 1991).

⁴⁶ Terrance McGovern and Bolling Smith, *American Coastal Defences, 1885–1950* (Botley, Oxford: Osprey Publishing, 2006).

the time the camp closed in June 1944.⁴⁸ Fort Leonard Wood in Missouri and Fort Belvoir in Virginia served similar roles.⁴⁹

A list published in 2012 shows 209 full-scale bases throughout the country and hundreds of specialized training areas.⁵⁰ These included sites for coastal and field artillery, antiaircraft and tank crews, infantry, cavalry (mostly tank units), military police, and the ordnance and signal corps. There were also special training units for desert and mountain warfare, chemical warfare and even dog handlers. Located throughout the United States—desert training took place in New Mexico and Arizona; mountaineers received their training in places such as Wyoming—many of the new bases were located in the South and California, where winter weather would not be an impediment.⁵¹

⁴⁷ “World War II Harbor Defenses,” NPS, Golden Gate National Recreation Area, California, US Department of the Interior, accessed October 12, 2012, <http://www.nps.gov/goga/historyculture/world-war-ii-harbor-defenses.htm>.

⁴⁸ “Here Come the Servicemen: Oregon Military Facilities,” Life on the Home Front, Oregon Responds to World War II, Oregon State Archives, State of Oregon, 2008, accessed May 23, 2012, <http://arcweb.sos.state.or.us/pages/exhibits/ww2/life/camp.htm>.

⁴⁹ “Fort Leonard Wood: A Colorful Past,” Conus Assignments, August 28, 2012, accessed October 23, 2012, http://nasaa-home.org/lake/lw_history.html; Fort Belvoir, “World War II Period: 1940–1945,” accessed October 23, 2012, Historic Fort Belvoir, <http://www.belvoir.army.mil/history/WWII.asp>.

⁵⁰ “General Overview of WWII U.S. Army Military Installations, 1942–1945,” US Army Installations, 2012, accessed April 12, 2012, <http://users.skynet.be/jeeper/installations.html>.

⁵¹ See, for example, Brad Melton and Dean Smith, *Arizona Goes to War: The Home Front and the Front Lines during World War II* (Tucson: University of Arizona Press, 2003).



2. 4. M4 Sherman Tank manufacture, 1942. Detroit's automakers converted to the construction of tanks and other military vehicles.

In addition to regular Army bases were new facilities for the Navy, Coast Guard, Marines, and the branches' air corps. Florida, for example, had 172 military units, from naval air stations through infantry and artillery training camps and numerous bombing ranges.⁵² Two of the larger installations were Camp Blanding and Jacksonville Naval Air Station.⁵³ In addition to new facilities, the military reactivated older bases at Key West, Tampa, and Valparaiso, and significantly expanded the Pensacola Naval Air Base.⁵⁴ Specializing in the training of bomber pilots—including the crews for Lieutenant Colonel Jimmy Doolittle's April 1942 B-25 Mitchell Bomber raid on Japan⁵⁵—Pensacola was training 1,100 pilots and aircrew a month during the war's peak years.

⁵² Nick Wyne, *Florida in World War II: Floating Fortress* (Charleston, SC: The History Press, 2010).

⁵³ Eliot Kleinberg, *War in Paradise: Stories of World War II in Florida* (Cocoa: Florida Historical Society Press, 1999); and "Building the Navy's Bases in World War II: The Air Stations," Department of the Navy, Bureau of Yards and Docks, US Department of Defense, accessed May 12, 2012, http://www.ibiblio.org/hyperwar/USN/Building_Bases/bases-10.html.

⁵⁴ "Naval Air Station Pensacola," *Pensapedia: The Pensacola Encyclopedia*, August 28, 2009, accessed May 23, 2012, http://www.pensapedia.com/wiki/Naval_Air_Station_Pensacola.

⁵⁵ Craig Nelson, *The First Heroes: The Extraordinary Story of the Doolittle Raid—America's First World War II Victory* (London: Penguin, 2002).



2. 5. Draftees, Clarksburg, West Virginia, 1942

Texas, Louisiana, Georgia, and Alabama all experienced a similar buildup of forces, many to service the several branches' air wings. The Army alone ordered the construction of 200 new air facilities, pilot and crew training bases, technical schools, and bombing ranges. By 1943, the Army had 345 air bases, 166 secondary airfields, and 322 auxiliary fields scattered throughout the country, mostly in rural areas previously unfamiliar with a military presence.⁵⁶

Because of the United States' focus on the Pacific, California would become a prime area for military expansion. San Diego's Camp Elliot grew to 26,034 acres and Camp Kearney covered a comparable land area. To the north of the city, Camp Joseph Pendleton, acquired in 1942, became a principal training site for marines destined for the Pacific War.⁵⁷ With its long stretch of ocean frontage, Camp Pendleton was an ideal site for amphibious training. It also had areas for infantry and tank maneuvers and field artillery ranges. As the training site for the 5th

⁵⁶ Anthony Mauer, ed., *Air Force Combat Units of World War II* (Washington, DC: GPO, 1961); and Charles A. Ravenstein, *Air Force Combat Wings Lineage and Honors Histories, 1947–1977* (Maxwell AFB, AL: Office of Air Force History, 1984).

⁵⁷ "History," *Marines: The Official Site of the US Marine Corps*, US Department of Defense, accessed May 23, 2012, <http://www.pendleton.marines.mil/About/History.aspx>; Elmore A. Champie, *A Brief History of the Marine*

and 3rd Marine Divisions, the camp's population peaked in 1944 at 86,749, counting marines, sailors, and civilian employees.⁵⁸

San Diego was host to other kinds of military facilities as well, including Fort Rosecrans, a nineteenth-century fortification that became the Army's headquarters for coastal defense of the San Diego area, and the Naval Air Station, San Diego, another older base that became the Navy's primary regional air support station.⁵⁹ Several smaller airfields and training areas dotted the area.⁶⁰ San Diego was also the home of the Naval Hospital, San Diego. An outgrowth of a Marine hospital created in 1914, by the war's end, Naval Hospital, San Diego, comprised 241 buildings that contained 10,499 beds. Over 172,000 injured sailors and marines received treatment there during the height of the war.⁶¹



2. 6. Ford River Rouge Plant, Detroit. Automobile manufacturers converted to the production of tanks and other war-needed equipment. This plant was one of the largest.

Corps Base and Recruit Depot, San Diego, California (Washington, DC: Historical Branch, US Marine Corps, 1958); and M. L. Shettle, Jr., *United States Marine Corps Air Stations of World War II* (Bowersville, GA: Schaertel, 2001), 84.

⁵⁸ "California and the Second World War: San Diego Metropolitan Area during World War II," California State Military Museum, May 18, 2008, accessed May 23, 2012, <http://www.militarymuseum.org/SDWW2.html>; and Patrick Clancey, "U.S. Naval Activities, World War II, by State, California," Patrick Clancey, HyperWar, 2002, accessed May 23, 2012, <http://www.ibiblio.org/hyperwar/USN/ref/USN-Act/CA.html>.

⁵⁹ "California and the Second World War: San Diego Metropolitan Area during World War II."

⁶⁰ Mauer, *Air Force Combat Units*; and Ravenstein, *Air Force Combat Wings Lineage*.

⁶¹ Naval Medical Center San Diego, "History," US Navy, US Department of Defense, 2012, accessed May 23, 2012, <http://www.med.navy.mil/sites/nmcSD/CommandInfo/Pages/AboutUs.aspx>; and Robert La Tourette, *The San Diego Naval Complex* (Annapolis, MD: US Naval Institute. 1968).



2. 7. US Navy Repair Base, San Diego. Between 1943 and 1945 the base performed conversion, overhaul, maintenance, and battle damage repair to more than 5,117 ships. Central to this maintenance were the Navy's construction and delivery of 155 new floating dry docks deployed to various bases, including three 3,000-ton, three 1,000-ton, and one 900-ton floating docks remaining at the San Diego Repair Base.



2. 8. Beach exercises, Camp Pendleton, ca. 1942.



2. 9. Rifle range, Camp Pendleton, ca. 1942.

Impacts on Natural Resources

Military expansion and dramatic changes in civilian life were at the forefront of the national consciousness. However, broader impacts on natural resources and the environment were another important aspect of the war. Oil was a key component in the Allied victory, much of which came from US domestic production.⁶² Oil provided material for runways, was essential in the manufacture of toluene (the main component of TNT) for bombs, and served as a substitute for rubber to make tires and hoses. Oil also fueled trucks, tanks, jeeps, and airplanes and was essential as a lubricant for guns and machines.

Rubber was another essential wartime material. Grown and processed in the East Indies, mostly in Dutch-held Java and Sumatra, as well as parts of British-controlled Malaya, rubber was key to many industrial operations, but mostly important for the manufacture of automobile

⁶² Keith Miller, "How Important Was Oil in World War II?" HNN, History News Network, George Mason University, July 5, 2002, accessed March 2, 2012, <http://hnn.us/articles/339.html>. Middle Eastern oil also played a significant role in the progress of the war and affected many early strategic decisions. For an overview of oil's significance to World War II and other conflicts, see Daniel Yergin, *The Prize: The Epic Quest for Oil, Money, and Power* (repr., New York: Free Press, 2008).

tires.⁶³ The manufacture of a synthetic substitute required the making of butadiene, rubber's underlying material. Standard Oil of Louisiana and the Humble Oil and Refining Company, both subsidiaries of Standard Oil of New Jersey, quickly went into full production, much of it at plants in the Baton Rouge and Baytown.⁶⁴ Although tires remained a difficult commodity for civilians to find, no US forces ever complained of a shortage of tires.

Another important aspect of the oil industry during the war was the delivery of raw petroleum and finished products to distribution points. Known as the "Big Inch" pipeline, a new pipeline stretched from the Texas oil fields to the existing rail terminal at Norris City, Illinois, and from there to Phoenixville, Pennsylvania. At Phoenixville, the new 24-inch-diameter pipe branched into two segments, one leading to Linden, New Jersey, where it supplied New York City, and the other leading to Philadelphia. A second line, known as "Little Big Inch"—made from 20-inch-circumference pipe segments—traveled parallel to the larger line.⁶⁵

⁶³ Japanese recognition of this necessity directly motivated this necessity, and the understanding directly motivated their conquest of the Netherlands East Indies in March 1942. See Peter Post, ed., *The Encyclopedia of Indonesia in the Pacific War* (Leiden: Brill, 2010); Paul Wendt, "The Control of Rubber in World War II," *Southern Economic Journal* 13, no. 3 (January 1947): 203–27; and John McNickle Ball, *Reclaimed Rubber: The Story of an American Raw Material* (Washington, DC: Rubber Reclaimers Association, 1947).

⁶⁴ Frank A. Howard, *Buna Rubber: The Birth of an Industry* (New York: D. van Nostrand, 1947); and Vernon Herbert and Attilio Bisio, *Synthetic Rubber: A Project that Had to Succeed* (Westport, CT: Greenwood, 1985).

⁶⁵ Jerrell Dean Palmer and John G. Johnson, "Big Inch and Little Big Inch," *Handbook of Texas*, Texas Historical Commission, A Digital Gateway to Texas History, accessed May 23, 2012, <http://www.tshaonline.org/handbook/online/articles/doe04>.



2. 10. Laying Big Inch. Begun in August 1942 and completed within a year, Big Inch delivered critical oil to the eastern seaboard to support the Allies in Europe.

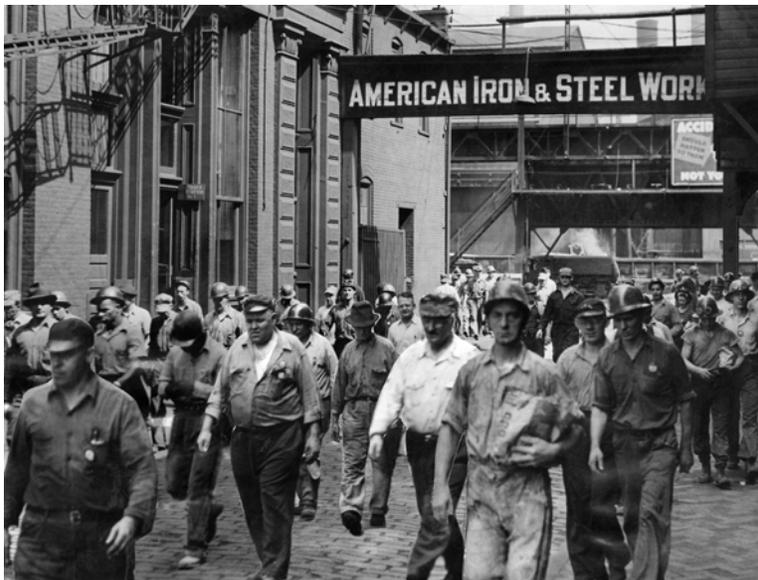
Capable of delivering 300,000 barrels of oil a day, Big Inch and Little Inch made American oil production second to none. Of the estimated 7 billion barrels of oil used by the Allies during the war, an estimated 6 billion came from the oil fields of Texas, Arkansas, and Louisiana, with California and other producers adding additional reserves. America's oil wealth, most scholars agree, was what in fact won the war.⁶⁶ The country's leadership certainly recognized the importance of oil, as did soldiers in the field; General George Patton, commander of the US Third Army, was outraged at fuel shortages during his 1945 drive into Germany.⁶⁷ As the Chairman of the Joint Chief of Staff's Army-Navy Board stated in a letter to the consortium of oil producers behind the effort written at the war's end: "at no time did the services lack oil in proper quantities, in the proper kinds and at the proper places."⁶⁸

⁶⁶ Palmer and Johnson, "Big Inch and Little Big Inch."

⁶⁷ "The Early Days of Coal Research," US Department of Energy, Fossil Energy, January 10, 2006, accessed May 12, 2012, http://fossil.energy.gov/aboutus/history/syntheticfuels_history.html.

⁶⁸ Chriss W. Street, "The Old Democrat Party: FDR Expanded US Domestic Oil Production," *Breitbart*, Big Government, March 23, 2012, accessed May 12, 2012, <http://www.breitbart.com/Big-Government/2012/03/23/the-old-democrat-party-fdr-expanded-us-domestic-oil-production>.

Increased production of steel was another most dramatic wartime development. Mired in low productivity during the Depression, steel plants returned to full capacity in the war years. At the war's peak in 1943, the industry had over 340,000 employees.⁶⁹ US Steel was the powerhouse in the Pittsburgh area, but numerous smaller producers, such as Bethlehem Steel in east central Pennsylvania and others, existed in other parts of the country. The small foundry of Sloss-Sheffield Company in Alabama, a progenitor of Birmingham Steel, became a major producer of pipe during the war after its purchase by United States Pipe and Foundry Company in 1942.⁷⁰



2. 11. American steel workers, Pittsburgh, Pennsylvania.

Once a rare metal employed in jewelry production, by World War II, aluminum, because of its lightness and resistance to corrosion, had become a key component for the manufacture of airplanes and parts of ships and boats. Fearful that the supply of aluminum would be insufficient

⁶⁹ Len Boselovic, "Steel Standing: US Steel Celebrates 100 Years," *Post-Gazette*, Business, February 25, 2001, accessed May 23, 2012, <http://old.post-gazette.com/businessnews/20010225ussteel2.asp>. See Robert P. Rogers, *An Economic History of the American Steel Industry* (New York: Taylor & Francis US, 2009); and Milward, *War, Economy, and Society*.

⁷⁰ "Alabama Mines," accessed May 30, 2012, <http://www.miningartifacts.org/AlabamaMines.html>; and W. David Lewis, "Birmingham Iron and Steel Companies," *Encyclopedia of Alabama*, online, accessed May 23, 2012, <http://encyclopediaofalabama.org/face/Article.jsp?id=h-1597>. See also W. David Lewis, *Sloss Furnaces and the Rise of the Birmingham Industrial District* (Tuscaloosa: University of Alabama Press, 1994).

for wartime needs, the government worked with private companies such as the Alcoa Company and R. S. Reynolds to increase production. Alcoa went into full production to meet the military's needs. Over three years, beginning two years before the outbreak of the war, Alcoa constructed over twenty plants, eight smelters, eleven fabrication plants, and four refineries. From 1939 to 1944, production rose from 146,000 tons to over 800,000 tons, with additional purchases adding another 600,000 tons. Employment rose from 26,179 in 1939 to 95,044 by 1944. Total industry investments, of which about two-thirds can be attributed to Alcoa, reached \$672 million.⁷¹



2. 12. Aluminum projectile points. Aluminum was a key new material in World War II.

A key material for aircraft manufacture, aluminum was derived from bauxite, most of it extracted from surface mines in Arkansas and Georgia. Alcoa vastly expanded its operations in Arkansas especially, relying on both local labor and workers imported from Mexico.⁷² Aluminum

⁷¹ "Alcoa in the USA: The Alcoa Story," Alcoa Corporation, accessed May 23, 2012, http://www.alcoa.com/usa/en/alcoa_usa/history.asp.

⁷² J. Michael Howard, "Bauxite Mining," *Encyclopedia of Arkansas*, online, accessed May 23, 2012, <http://www.encyclopediaofarkansas.net/encyclopedia/entry-detail.aspx?entryID=2145>; and R. B. Stroud, R. H. Arndt, F. B. Fulkerson, and W. G. Diamond, *Mineral and Mineral Industries of Arkansas*, US Bureau of Mines, *Bulletin* 645 (Washington DC: US Bureau of Mines, 1969).

drives also were common throughout the war. The government sponsored posters, newspaper advertisements, and pamphlets and broadcasting stations hosted radio shows asking the public to contribute.⁷³

Along with aluminum, the US government monopolized the production of other metals as well: copper, magnesium, nickel, and tin all entered the list of essential industries. Brass and bronze require copper and tin; aluminum commonly employs magnesium as an alloy for strength. Communications systems required copper wire. Tin was used to coat steel cans and was a common ingredient in solder to seal them. The war also demanded lead, iron (in forms other than processed steel), gold, silver, and platinum for special uses. The government also needed mercury for uses ranging from thermometers to “floats” for lighthouse lenses.

One of the most exploited resources during the war was timber. Necessary for housing for both civilian workers and military forces, wood was also important for airplane manufacture and for parts of boats and ships.⁷⁴ The war meant having to rely as well on local sources. Asian teak, the material for ship decking, for example, was no longer available, so builders had to turn to Douglas fir as a substitute.⁷⁵

⁷³ “Aluminum for Defense”: Rationing at Home during World War II,” History Matters, The US Survey Course on the Web, accessed May 24, 2012, <http://historymatters.gmu.edu/d/5158/>.

⁷⁴ Robert E. Ficken, *The Forested Land: A History of Lumbering in Western Washington* (Seattle: University of Washington Press, 1987); Nancy Langston, *Forest Dreams, Forest Nightmares* (Seattle: University of Washington Press, 1995); Ron Vorderstrauss, “The Timber Industry and its Effects on the Pacific Northwest,” University of Western Oregon, 2006, accessed May 23, 2012, <https://www.wou.edu/las/socsci/history/hist%20pdf%20scans/timber%20industry.pdf>; “Forest Products Research,” *Encyclopedia of American Forest and Conservation History*, ed. Richard C. Davis (New York: Macmillan, 1983), 231–38; Maureen Smith, *The US Paper Industry and Sustainable Production: An Argument for Restructuring* (Cambridge, MA: MIT Press, 1997), 168–69; Richa Wilson and Kathleen Snodgrass, “Early Twentieth Century Materials: Fiberboard and Plywood,” Technology and Development, US Department of Agriculture, Forest Service, MTDC: Technology and Development Center, US Forest Service, April 2007, accessed May 21, 2012, <http://www.fs.fed.us/t-d/pubs/htmlpubs/hm07732308/index.htm>; “Milestones in the History of Plywood,” APA: The Engineered Wood Association, 2012, accessed May 6, 2012, http://www.apawood.org/level_b.cfm?content=srv_med_new_bkgd_plycen; and Thomas C. Jester, ed., *Twentieth-Century Building Materials* (New York: McGraw-Hill, 1995). Terry Sellers, Jr., addresses the history, manufacture, and applications of plywood in *Plywood and Adhesive Technology* (New York: Marcel Dekker, 1985).

⁷⁵ Frieda E. Knobloch, *The Culture of Wilderness: Agriculture as Colonization in the American West* (Chapel Hill: University of North Carolina Press, 1996), 38–39.

The US Forest Service controlled much of the timber production during the war. Founded in 1881 as a branch of the Department of Agriculture, the Forest Service emerged in 1905 as the lead agency in the management of forest resources.⁷⁶ By the time of the war, the service managed ten regions, distributed throughout the country.⁷⁷ With control over the largest old-growth forests, the Northern Pacific, Intermountain, California, North Central, and Alaska Districts were the most important to the war effort.⁷⁸

In August 1940—at government instigation—a group of timber industry leaders, working with the Forest Service, started the Lumber and Timber Producers Defense Committee. With the government placing an initial order for two million board feet of lumber, the board moved to increase production and capacity. Production of lumber required cutting, hauling, shipping, and milling. The bumped-up industry attracted workers to the Pacific Northwest and Alaska. Within two years of the war’s beginning, loggers and mill operators had produced seventy-five million board feet of timber from Washington’s Meadow Creek-Cougar area alone.⁷⁹

By the war’s end, the timber industry had extracted at least nineteen billion board feet of lumber. Older East Coast forests had contributed tons of chipped wood for pulp and for products such as Celotex, Beaverboard, and Masonite for interior walls and insulation.⁸⁰ Wood was also important for manufacturing alcohol and other industrial uses.⁸¹ Most of the harvested timber

⁷⁶ William W. Bergotten, *100 Years of Federal Forestry* (Washington, DC: US Department of Agriculture, 1976).

⁷⁷ Sarah Beth Pralle, *Branching Out, Digging in: Environmental Advocacy and Agenda Setting*, American Governance and Public Policy Series (Washington, DC: Georgetown University Press, 2006).

⁷⁸ “US Forest Service,” United States History, accessed May 24, 2012, <http://www.u-s-history.com/pages/h1602.html>.

⁷⁹ “Idaho County History,” Idaho County Courthouse, State of Idaho, accessed May 16, 2012, http://www.idahocounty.org/index.php?option=com_content&view=article&id=128&Itemid=155.

⁸⁰ “Celotex History, Celotex Insulation Specialists,” 2010, Celotex Insulation, Ltd., accessed May 23, 2012, <http://www.celotex.co.uk/celotex-history>; “Fiberboard Building Wall & Roof Sheathing, Insulating Board Sheathing, Sound Insulation Board Product Guide,” *InspectApedia, Free Encyclopedia of Building & Environmental Inspection, Testing, Diagnosis, Repair*, accessed May 12, 2012,

http://inspectapedia.com/structure/Fiberboard_Sheathing.htm; “The History of Masonite,” Masonite Corporation, accessed May 12, 2012, http://www.masonite.com/masonite_history.php; and Bill Kibbel, “Leave It to Beaver Board,” Old House Web, Ideas and Advice for Old House Owners, accessed May 12, 2012, <http://www.oldhouseweb.com/blog/beaver-board/>.

⁸¹ P. C. Badger, “Ethanol from Cellulose: A General Review,” in *Trends in New Crops and New Uses*, ed. J. Janick and A. Whipkey (Alexandria, VA: ASHA Press, 2002).

was Douglas fir and spruce, though the military also employed hardwoods in furniture and for other specialized applications.⁸² The war also led to numerous innovations in manufacture and proved the value of such prewar products as plywood—used for purposes ranging from PT boats and Quonset huts to PBVs and gliders and the British de Havilland Mosquito.⁸³



2. 13. Logging in the Pacific Northwest. International Harvester truck, 1945. Timber production increased enormously as a result of wartime needs.

Concrete manufacture was another important development of the war years. Airport runways, culverts, overpasses, walls, roofs, and other building features consumed an estimated ten million tons of concrete during the war.⁸⁴ A composite of cement, water, and aggregates, concrete manufacturing relies on a number of industrial and extractive processes, including the mining and processing of limestone, additives such as clay, gypsum, fly ash, and slag, and large-

⁸² Erin Henley, “Parks Are for People: A History of Land Use at Bernheim Forest from 1929 to 1950,” *Sustain: A Journal of Environmental and Sustainability Issues* 19 (Fall/Winter 2009): 32–39.

⁸³ Martin Bowman, *de Havilland Mosquito*, Crowood Aviation Series (Ramsbury, Marlborough, Wiltshire: Crowood Press, 2005).

scale excavation of sand and stone for gravel. Utilizing large open-pit quarries, the increase of concrete use had an enormous impact on roads, hills and mountains, and farmlands.

Demand for other commodities, such as salt, coal, magnesium, copper, and even gold, silver, and diamonds—the latter needed for many industrial processes—also had impacts on US and world resources.⁸⁵ Asbestos was a key product for the war, used for everything from brake linings to fire shields and as an ingredient for flooring and fiberboard.⁸⁶ The manufacture of the atomic bomb by the Manhattan Project required the importation of uranium ore from the Belgian Congo and Canada, together with that extracted from the carnotite-bearing sandstones of Colorado and Utah.⁸⁷



2. 14. Helena Sand & Gravel Company, Helena, Montana. The manufacture of cement was another product of wartime requirements.

⁸⁴ Milward, *War, Economy, and Society*, 164.

⁸⁵ See, for example, Maya Bornstein, “Applications of Silver in the Second World War,” Cash for Silver USA, September 10, 2012, accessed October 13, 2012, <http://cashforsilverusa.com/applications-of-silver-in-the-second-world-war>.

⁸⁶ J. K. Corn and J Starr, “Historical Perspective on Asbestos: Policies and Protective Measures in World War II Shipbuilding,” *American Journal of Industrial Medicine* 11, no. 3 (1987): 359–73.

⁸⁷ Richard Rhodes, *The Making of the Atomic Bomb* (New York: Simon & Schuster, 1986); and E. J. McKay, *Geology of Carnotite-bearing Sandstone in the Uravan and Gateway Districts, Montrose and Mesa Counties, Colorado, and Grand County, Utah* (Washington, DC: US Geological Survey, US Department of the Interior, 1953).

Military Training and Testing Areas

The war put new demands not only on resources but also on open areas for training and testing. At Bend, Oregon, the War Department secured the assistance of the Forest Service in expanding Camp Abbot, a 5,500-acre training facility along the Deschutes River.⁸⁸ Camp Hale in west-central Colorado became a center for winter and mountain warfare training. For the base, the War Department purchased lands from private owners and acquired through a lease arrangement with the Forest Service.⁸⁹ The Dolly Sods region of the Monongahela National Forest in West Virginia similarly became a training area for artillery and mortar practice.⁹⁰ Likewise, units at Forts Polk, Claiborne, and Livingston used lands that were part of the Kisatchie National Forest in Louisiana for regular maneuvers beginning in 1941.⁹¹ At Shawnee National Forest in southern Illinois, the military created the Elwood Ordnance Plant and Kankakee Ordnance Works to test bombs and other explosive devices.⁹²

One of the largest infantry training facilities was that at Camp Shelby in Hattiesburg, Mississippi.⁹³ The 31st, 37th, 38th, 43rd, 63rd, 65th, 69th, 85th, 94th, and 99th Divisions all trained at Camp Shelby as did the Japanese American 442nd Regimental Combat Team and the 100th Infantry Battalion. The camp eventually extended to 134,820 acres, spread over three counties, establishing a permanent presence on former Forest Service property.⁹⁴

⁸⁸ "Here Come the Servicemen: Oregon Military Facilities."

⁸⁹ Camp Hale, "Site History," Camp Hale Military Munitions Project, US Army Corps of Engineers, Omaha District, accessed October 23, 2012, <http://www.camphale.org/History/History.htm>.

⁹⁰ Donald L. Rice, "West Virginia Maneuver Area," *Goldenseal: West Virginia Traditional Life* 33, no. 3 (Fall 2007): 16–17.

⁹¹ "Camp History," Camp Claiborne Historical Research Center, 2012, accessed May 30, 2012, <http://www.campclaiborne.com/about/camp-history.php>.

⁹² Mary R. McCorvie and Patricia M. Welch, "The Home Front: The Joliet Arsenal during World War II," CEO Document, US Forest Service, US Department of Agriculture, 1997, accessed May 12, 2012, http://www.fs.fed.us/outernet/mntp/Library/Article_JolietArsenal1940-1997.pdf.

⁹³ "Camp Shelby, "Camp Shelby Joint Forces Training Center," National Guard Mississippi, accessed October 23, 2012, <http://ms.ng.mil/aboutus/installations/shelby/Pages/default.aspx>.

⁹⁴ "Camp Shelby, History of Training Camp during World War II and Today," CusterMen.com, October 25, 2008, accessed May 6, 2012, <http://www.custermen.com/AtTheFront/CampShelby.htm>.

The military chose many sites based on their training potential. Beaches on both coasts became sites for amphibious training; remote patches of desert and islands in the Pacific and Caribbean became targets for bombing.⁹⁵ The most famous of wartime test sites was the “Trinity” site near Alamogordo, New Mexico, where Manhattan Project scientists tested the first nuclear bomb on July 16, 1945.⁹⁶ In the late 1940s and 1950s, these tests continued, all as a direct outgrowth of the war. Shifted to Nevada and the Marshall Islands, the US government’s nuclear testing program was one of many wartime programs with postwar impacts on people and environments.⁹⁷ Some of these projects involved federal lands, including National Wildlife Refuges and US Forest Service lands. These included bombing ranges and training sites, as well as internment camps for many Americans of Japanese ancestry, as well as facilities for prisoners of war and conscientious objectors.

The War and the National Parks

As with the US Forest Service, the National Park Service (NPS) was under pressure to use its lands to help the war effort. Private timbering, mining, and grazing interests attempted unsuccessfully to gain increased acreage. Wartime NPS director Newton B. Drury (1889–1978) fended off most efforts to exploit parks, although the NPS was willing to accede sites for critical needs.⁹⁸ For the most part, military uses would be temporary under special-use permits for the war’s duration.

⁹⁵ Ronald O’Rourke, “Vieques, Puerto Rico Naval Training Range: Background and Issues for Congress,” Congressional Research Service Report for Congress Navy Department Library, Naval History and Heritage Command, US Department of Defense, December 17, 2001, accessed May 6, 2012, <http://www.history.navy.mil/library/online/vieques.htm>.

⁹⁶ Gregory Walker, “Trinity Site,” Trinity Atomic Web Site, Nuclear Weapons: History, Technology, and Consequences in Historic Documents, Photos, and Videos, accessed May 23, 2012, <http://www.cddc.vt.edu/host/atomic/trinity/trinity1.html>.

⁹⁷ Jane Dibblin, *Day of Two Suns: U.S. Nuclear Testing and the Pacific Islanders* (New York: New Amsterdam, 1998).

⁹⁸ “National Park Quiz 31: World War II,” National Parks Traveler, accessed May 24, 2012, <http://www.nationalparkstraveler.com/2008/12/national-park-quiz-31-world-war-ii>.

With only minimal protest, the War Department selected Joshua Tree National Monument in southeastern California as a site for desert training. Under NPS control since 1936, this enormous area—fully 790,636 acres, roughly the size of the state of Rhode Island—proved ideal for infantry and tank maneuvers as well as desert survival training.⁹⁹ Mount Rainier National Park in Washington performed a similar function for mountain training.¹⁰⁰ The 87th Mountain Infantry Regiment of the later 10th Mountain Division trained at Mount Rainier beginning in winter 1942, as did the 3rd Division's 15th Regiment from nearby Fort Lewis, taking over earlier CCC camps and utilizing the rough terrain for exercises. The Army also built new barracks and other facilities.¹⁰¹

On the East Coast, the military gained the use of several parks, notably the Catoctin Recreational Demonstration Area in Maryland (since 1954, Catoctin Mountain National Park). Located in north central Maryland and composed of older agricultural parcels replanted by the CCC as a conservation measure, Catoctin Mountain was an ideal training center for the recently organized Office of Strategic Services (OSS)—the national intelligence agency and precursor to the Central Intelligence Agency (CIA)—and the US Special Forces. Established through the efforts of William J. “Wild Bill” Donovan in 1942, the OSS conducted night “ops” and infiltration of enemy positions training at both Catoctin Mountain and at Chopawamsic Recreational Demonstration Area, now part of Prince William Forest Park, near Quantico, Virginia.¹⁰² Catoctin's 10,000-plus acres also served as the site of President Franklin D. Roosevelt's “Shangri-La”—a hidden retreat used by the president for high-level meetings mixed

⁹⁹ “Historic Camp Posts: Camp Young,” California State Military Museum, accessed May 23, 2012, <http://www.militarymuseum.org/CpYoung.html>.

¹⁰⁰ “Mount Rainier Centennial Timeline 1940s,” Mount Rainier National Park, accessed May 23, 2012, http://www.nps.gov/features/mora_cenn/forties/forties.htm.

¹⁰¹ “History of the 10th Mountain Division,” 10th Mountain Division History, Fort Drum, US Army, accessed May 30, 2012, http://www.drum.army.mil/AboutFortDrum/Pages/hist_10thMountainHistory_lv3.aspx.

¹⁰² John Whiteclay Chambers II, “Office of Strategic Services Training during World War II,” Central Intelligence Agency, Center for the Study of Intelligence, *Studies in Intelligence* 54, no. 2 (June 2010): 1–26; “Training Agents at Catoctin,” accessed May 30, 2012, <http://www.nps.gov/cato/historyculture/oss-training1.htm>; and “Catoctin Recreational Area Taken over for War Effort,” accessed May 30, 2012, <http://www.nps.gov/cato/historyculture/oss-training.htm>.

with relaxation. Comprising several existing CCC-era cabins, the complex eventually became Camp David, named after Dwight Eisenhower's grandson David Eisenhower.¹⁰³



2. 15. Mountaineer training, 10th Mountain Division, Mount Ranier National Park, 1941.

Despite these exceptions, most NPS lands remained protected. Secretary of the Interior Harold L. Ickes (1874–1952, secretary from 1933–1946) backed Director Drury and tried to avoid unnecessary use of the parks by the military or, at least, minimize damage if the military did secure temporary use. A proposed installation at Red Rock Lakes National Wildlife Refuge near Yellowstone National Park faced strong opposition due to the presence the endangered trumpeter swan.¹⁰⁴ Recognizing that only seventy adult swans remained, both the Forest Service

¹⁰³ “Camp David (Catoctin Mountain Park), Maryland,” accessed May 30, 2012, http://www.nps.gov/history/history/online_books/presidents/site26.htm; and “Survey of Historic Sites and Buildings, Camp David (Catoctin Mountain Park),” January 22, 2004, accessed March 23, 2012, http://www.nps.gov/history/history/online_books/presidents/site26.htm.

¹⁰⁴ Elinor Langer, “Conservation: Local and National Interests Conflict on Proposals Awaiting Action in Congress,” *Science* 143, no. 3609 (February 28, 1964): 941–43.

and NPS pressed to disapprove the proposed use—a decision backed by President Roosevelt as well.¹⁰⁵

The parks, nonetheless, continued to make contributions to the war in other ways. With civilian visitation plummeting at most parks—total numbers of visitors fell from 21 million in 1941 to 6.8 million in 1943, due in part to gas rationing and decreased leisure time—the NPS and the War Department decided that the parks could serve military recreation as well. Many military personnel on leave visited nearby parks; Muir Woods and Yosemite remained popular sites for troops and navy personnel stationed in the Bay Area.¹⁰⁶ Other parks became homes for more permanent rest-and-relaxation areas for troops returning from combat. These included camps set up at Sequoia, Carlsbad Caverns, and Grand Canyon. The Army transformed Mount McKinley National Park into a full-time recreation area, where soldiers stationed in the Aleutian Islands could fish, hike, ski, and enjoy the scenery. Park records show that in 1943, 1.6 million military personnel visited the national parks, constituting more than 25 percent of the visitors in that year.¹⁰⁷

¹⁰⁵ Alice Wondrak Biel, “History of Research Permitting in Yellowstone National Park,” *Yellowstone Science* 12, no. 3 (Summer 2004): 12–23, described in “The National Park Service: America’s Best Idea—Great Nature, 1933–1945, A Film by Ken Burns,” transcript, accessed October 29, 2012, [http://www.livedash.com/transcript/the_national_parks__america's_best_idea-\(great_nature_\(1933-1945\)\)/1020/KTEH/Wednesday_February_24_2010/206024/](http://www.livedash.com/transcript/the_national_parks__america's_best_idea-(great_nature_(1933-1945))/1020/KTEH/Wednesday_February_24_2010/206024/).

¹⁰⁶ “Mount Rainier Centennial Timeline 1940s.” The attractions of the parks are described by Richard K. Long in his *A Cook’s Tour of World War II: From Yosemite to Utah Beach and beyond with Staff Sergeant Al Akers and the 850th Engineer Aviation Battalion* (Troy, MI: Sabre Press, 1990).

¹⁰⁷ “The National Park Service: America’s Best Idea—Great Nature, 1933–1945.”



2. 16. Office of Strategic Services (OSS) training class, Catoctin Recreational Demonstration Area in Maryland, 1942. This was one of the few neational parks utilized directly during the war. It remains in special use as the presidential retreat, Camp David.

Impacts on Hawai‘i

Hawai‘i, as a territory of the United States and as the focus of the Japanese attack that led to the US entry into the war, felt the war’s impacts perhaps more so than any other part of the country. With its sizable Japanese community, the territory’s citizenry came under heavy scrutiny. The military rounded up suspicious “aliens” (many, in fact, citizens). These especially included Japanese leaders, such as clergy, teachers, and newspaper editors.¹⁰⁸ Confinement camps sprang up on each of the islands, the largest being that at Sand Island outside of Honolulu Harbor.¹⁰⁹

¹⁰⁸ US Air Force, “History of Hickam Field, Joint Base Pearl Harbor-Hickam, Hawaii,” US Air Force Fact Sheet, June 2010, accessed May 12, 2012, http://www.15wing.af.mil/library/factsheets/factsheet_print.asp?fsID=5104&page=1.

¹⁰⁹ “World War II Internment in Hawai‘i, An Online Resource for Instructors and Students,” Japanese Cultural Center of Hawai‘i, Education through Cultural and Historical Organizations Project, US Department of Education, accessed October 12, 2012, <http://www.hawaiiinternment.org>.

Authorities later moved some of those confined to Honouliuli on the western plain of O‘ahu, where they lived in tents within a barbed-wire compound.

Placed under martial law, Hawai‘i’s citizens were subject to strict military rule, with tribunals substituting for courts, imposed mandatory curfews, censorship, and food and gasoline rationing.¹¹⁰ Military police recorded the fingerprints of all citizens over six years old. The military government also set prices for food, established wage levels, and set rents. Taking offices in ‘Iolani Palace, the government directed the construction of air shelters, trenches, and batteries to guard against future attacks. Public buildings, including Honolulu Harbor’s famous Aloha Tower, received coats of camouflage paint.

As the war progressed and the threat of Japanese Imperial Navy invasion receded, Hawai‘i became an important training and transit area for American troops in the Pacific Theater. Hundreds of thousands of US personnel passed through Hawai‘i, where most saw palm trees for the first time and had a chance to experience Honolulu’s famous nightlife. Bars, restaurants, and movie houses catered to soldiers and sailors.¹¹¹ The government created a special red-light district in Chinatown for US troops, following a long tradition of both legalized and ignored prostitution on the islands.¹¹² To fill the need, mainland women moved to Hawai‘i, where they worked in one of the regulated establishments or operated independently in suburban houses, many frequented by military officers. The officer class interacted with the islands’ plutocrats, while everyday military visitors played on the beaches, watched hula performances, and attended USO shows. Others convalesced at Aiea Naval Hospital or in one of the many schools or colleges turned into makeshift medical facilities.¹¹³

¹¹⁰ Mackinnon Simpson, *Hawaii Homefront: Life in the Islands during World War II* (Honolulu: Bess Press, 2008).

¹¹¹ Beth L. Bailey and David Farber, *The First Strange Place: Race and Sex in World War II Hawaii* (Baltimore, MD: Johns Hopkins University Press, 1994).

¹¹² Desoto Brown, *Hawaii Goes to War: Life in Hawaii from Pearl Harbor to Peace* (Honolulu: Editions Ltd, 1989), 134–35.

¹¹³ Gwenfread Allen, *Hawaii’s War Years* (Kailua, HI: Pacific Monograph, 1999); and Wilbur D. Jones, Jr., and Carroll Robbins Jones, *Hawaii Goes to War: The Aftermath of Pearl Harbor* (Shippensburg, PA: White Mane Books, 2001).

At the war's peak, Hawai'i had almost as many military personnel as civilians. The overall service population increased from 28,000 in 1940 to 378,000 in 1944.¹¹⁴ Other personnel—shipbuilders, electricians, mechanics, carpenters—came to the islands as well. During the war, with the military personnel considered, the total population increased to 858,000—the estimated figure for 1944—thereby increasing the demand for retail, restaurant, and other services.¹¹⁵

Over the course of the war, an estimated two million servicemen and servicewomen lived or passed through Hawai'i. Schofield Barracks alone oversaw the training of 300,000 soldiers in “jungle warfare” during the war's four-plus years.¹¹⁶ The Royal Hawaiian Hotel issued as many as 200,000 passes to military “guests,” giving them access to the hotel's facilities and the barbed-wired beach outside its doors.¹¹⁷ Both temporary and long-term personnel needed housing as well. There were also needs for new supply depots, offices, repair shops, bunkers, and much else. By the end of the war, the military controlled some 400,000 of Hawai'i's four million acres.¹¹⁸ These contained tent cities, wood barracks, Quonset huts, and offices for all of Hawai'i's forces and trainees. Camp Tarawa (named after the recent battle), in Waimea on the big island of Hawai'i housed over 20,000 marines (40,000 over two occupations).¹¹⁹ O'ahu was host to at least fifty similar installations. Hawai'i's waterfronts were virtual hives of activity, with materials

¹¹⁴ Sumner J. La Croix, “An Economic History of Hawai'i: A Short Introduction,” Working Paper 02-3, January 2002, Department of Economics, University of Hawai'i and the East West Center, 11, accessed May 23, 2012, http://www2.soc.hawaii.edu/css/dept/econ/research/workingpapers/WP_02-3.pdf.

¹¹⁵ “Hawaii's History in 1944,” HawaiiHistory.org, A Community Learning Center, 2012, accessed May 19, 2012, <http://www.hawaiihistory.org/index.cfm?fuseaction=ig.page&year=1944>.

¹¹⁶ *Schofield Barracks: A Historic Treasure*, Schofield Barracks, Tropic Lightning Museum, August 2008, accessed May 27, 2012, <http://www.garrison.hawaii.army.mil/tlm/files/history.pdf>.

¹¹⁷ “Historic Waikiki,” *Hawaiian Encyclopedia* online, 2010, accessed June 27, 2012, <http://www.hawaiianencyclopedia.com/1900--1950.asp>.

¹¹⁸ La Croix, “An Economic History of Hawai'i,” 11.

¹¹⁹ “The Big Island Goes to War: Camp Tarawa, 1943–1946,” Clark Realty Corporation, Big Island Real Estate and Community News, November 10, 2010, accessed May 26, 2012, <http://clarkhawaii.com/blog2010/11/10/the-big-island-goes-to-war-camp-tarawa-1943-1946/>.

shipped in by the thousands of tons. These included cement and concrete block, wood for buildings, and sheet metal for roofing.

Hawai'i's wartime boom had immediate benefits for the civilian population. Many worked as carpenters and masons, digging foundations and pushing fill into Hawai'i's coastal waters. Japanese residents were particularly eager to prove their loyalty, at first joining auxiliary brigades such as the Varsity Victory Volunteers and then enlisting in disproportionate numbers to fight in Europe. On June 15, 1942, Hawai'i's Japanese volunteers became the 100th Battalion, which combined with the 442nd Regimental Combat Team to become one of the most decorated units of the war.¹²⁰

The war would have both short- and long-term impacts on Hawai'i's lands as well. Territorial lands, including areas once ceded to Hawaiians, were leased to the military for training sites. Other parts of the islands became home of special bases, including new radar installations and air bases and landing strips.¹²¹ Sections of the islands served for amphibious landing exercises or as bombing targets. New roads and expanded highways served new military needs, transforming Hawai'i's landscape and population patterns.

¹²⁰ Robert Asahina, *Just Americans: The Story of the 100th Battalion/442nd Regimental Combat Team in World War II* (New York: Gotham Books, 2007).

¹²¹ Charles A. Jones, *Hawai'i's World War II Military Sites: A Comprehensive Guide Focusing on Oahu* (Honolulu: Mutual Publishing, 2002).

CHAPTER 3: THE MILITARY AND HAWAII NATIONAL PARK

The US Military and the Annexation of Hawai‘i

Although the war in the Pacific would expand the military’s presence in Hawai‘i, the United States had a long history of involvement in the islands. The first visit by US military officers was in 1849. Shortly afterward, the US government began its gradual process of involvement in the region.¹ The first Pacific acquisitions were guano islands, sought out for their economic importance.² However, Midway Atoll, a site with clear strategic significance, fell under US control in 1867.³ Recognizing the vulnerability of US vessels during the Civil War, the Navy created a North Pacific Squadron in 1865.⁴ Following the United States’ purchase of Alaska in 1867, the American naval presence took on added meaning.⁵ In 1869, the US Congress appropriated money to build a coaling station at Midway Atoll.⁶ Unsuccessful from the outset, the United States soon began looking for a better location at which to site a permanent facility—Hawai‘i would become a prime candidate.

Major General John M. Schofield (1831–1906) and Lieutenant Colonel Burton S. Alexander visited Hawai‘i in 1872 to assess the islands’ military potential. General Schofield argued strenuously for the creation of a mid-Pacific base at what came to be known as Pearl

¹ William C. Addleman, *History of the United States Army in Hawaii* (Honolulu: Hawaii State Archives, [1939]), 1. A Major J. S. Hathaway commanding a contingent of US troops stopped at Honolulu in May 1849. The same year, a Major C. A. Ogden traveled to Honolulu on what appears to have been a fact-finding mission. See Addleman, *History of the United States Army*, 1.

² Jimmy M. Skaggs, *The Great Guano Rush: Entrepreneurs and American Overseas Expansion* (New York: St. Martin’s Press, 1994).

³ Addleman, *History of the United States Army*, 1–2.

⁴ Lynn Schooler, *The Last Shot: The Incredible Story of the CSS Shenandoah and the True Conclusion of the Civil War* (New York: Harper Collins, 2005); and John Baldwin, *Last Flag Down: The Epic Journey of the Last Confederate Warship* (New York: Crown Publishers, 2007).

⁵ “Historical Summary 1820–1887,” Navy Historical Center, accessed September 23, 2012, http://www.phnsy.navy.mil/timeline/timeline_1820-1887.

⁶ Mark J. Rauzon, *Isles of Refuge: Wildlife and History of the Northwestern Hawaiian Islands* (Honolulu: University of Hawai‘i Press, 2001).

Harbor.⁷ By 1873, negotiations were well underway between US officials and King Lunalilo.⁸ Intent on the passage of a favorable tariff agreement with the United States, his successor, King Kalākaua (1836–1891), further pressed for his legislature’s support for a US lease.⁹ On March 18, 1875, the US Senate approved the measure, which King Kalākaua ratified on April 18, 1875, and President Ulysses S. Grant signed on August 15, 1876.¹⁰

Despite increasing American involvement in Hawai‘i’s affairs, US military authorities did not move quickly to shore up the country’s aims for Pearl Harbor. However, a further agreement called the Hawaii–United States Convention of 1884, gave the United States direct claim to Pearl Bay.¹¹ Ratified by Hawai‘i’s by-then *haole* (European and North American Caucasian)-dominated legislature in 1887, the new version of the convention granted to the US government “the exclusive right to enter the harbor of Pearl River, in the Island of Oahu, and to establish and maintain there a coaling and repair station for the use of vessels of the US and to that end the US may improve the entrance to said harbor and do all things useful to the purpose aforesaid.”¹²

With passage of the 1887 treaty, American ambitions in the Hawaiian Islands became more explicit. At the same time, developments in the kingdom under the growing influence of American planters and merchants tipped the scales further in favor of US ascendancy in the islands. Faced with a loss of Hawai‘i’s special tariff status as a result of the 1890 McKinley Act, a

⁷ Addleman, *History of the United States Army*, 1.

⁸ “Pearl Harbor—US Naval Station at Pearl Harbor History,” Military History, accessed August 23, 2012, <http://militaryhistory.about.com/od/shippfiles/p/pearlharbor.htm>. The king, supported a bill proposing the cessation of Pearl River Bay, as it was often called, a move opposed by the kingdom’s legislature at the time.

⁹ “David Kalakaua Biography,” *Encyclopedia of World Biography*, accessed August 23, 2012, <http://www.bookrags.com/biography/david-kalakaua/>. Tacit reliance on US power was familiar to both Kalakaua and business interests in Hawai‘i. At the time of his election in 1874, Kalakaua acceded to the wishes of local business leaders and American minister Henry A. Peirce in calling upon sailors from the warships USS *Tuscarora* and USS *Portsmouth* to assist in quelling civil unrest over the disputed outcome. See A. Grove Day, *Hawai‘i and Its People* (Honolulu: Mutual Publishing, 1993), 200. His full name was David La‘amea Kamanakapu‘u Mahinulani Nalaiachuokalani Lumialani Kalākaua.

¹⁰ Gavan Daws, *Shoal of Time: A History of the Hawaiian Islands* (Honolulu: University of Hawaii Press, 1989), 201–5.

¹¹ “Hawaii Kingdom Treaty, United States Convention 1884,” Hawaiian Kingdom Organization, accessed August 14, 2012, http://www.hawaiiankingdom.org/treaty_us-1884.shtml.

¹² “Pearl Harbor—US Naval Station at Pearl Harbor History.”

small contingent of political dissidents, led by missionary descendant Lorrin A. Thurston (1858–1931), seized control of the kingdom, removing King Kalākaua’s sister Queen Lili‘uokalani (1838–1917), from the throne on January 16, 1893.¹³

Thurston immediately petitioned the assistance of US minister John L. Stevens (1820–1895), claiming threats to US property and lives. Stevens in turn summoned a company of US Marines and additional sailors from the USS *Boston*, then at anchor in Honolulu Harbor. Avoiding the palace grounds and other government property, the 162 sailors and marines nonetheless represented an intimidating force and effectively prevented resistance by royalist defenders.¹⁴ Recognizing the impasse, the queen asked her supporters to surrender, allowing the coup’s leaders to maintain control.

In July 1894, the members of the provisional government of Hawaii declared a new state, with Sanford B. Dole (1844–1926) acting as president of the Republic of Hawaii.¹⁵ With the election as US president of the pro-expansionist William McKinley (1843–1901) and outbreak of the Spanish-American War, Hawaii’s importance to the United States became increasingly evident and the US government signed a treaty of annexation with the Republic of Hawaii on June 16, 1898.¹⁶ On July 7, 1898, President McKinley signed the bill and, on August 12, 1898, a crowd of enthusiastic American supporters, including a contingent of US troops from the USS

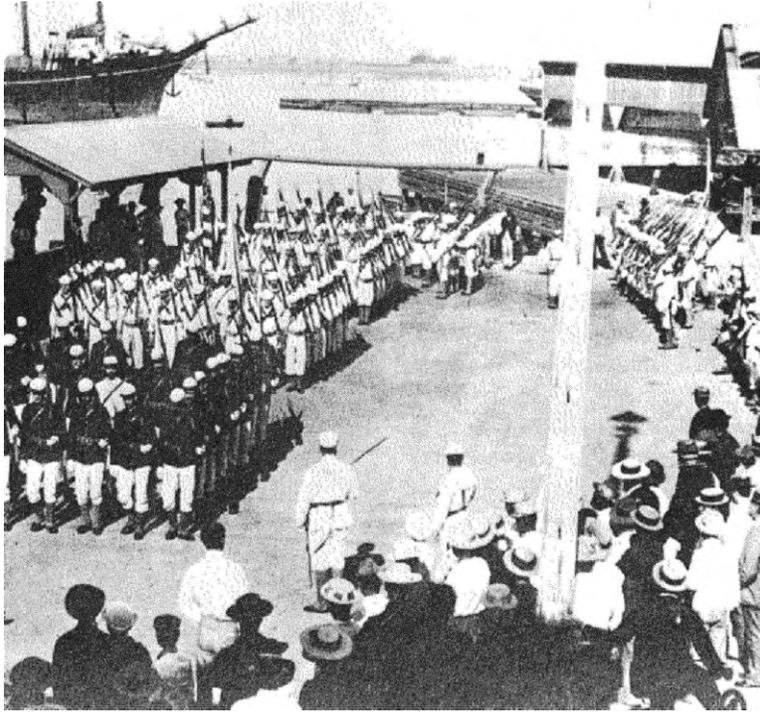
¹³ F. W. Taussig, *The Tariff History of the United States*, 8th ed. (New York: G. P. Putnam's Sons, 1892), 291; John Patterson, “The United States and Hawaiian Reciprocity, 1867–1870,” *Pacific Historical Review* 7, no. 1 (March 1938): 14–26; Ralph S. Kuykendall and A. Grove Day, *Hawaii: A History: From Polynesian Kingdom to American State* (New York: Prentice Hall, 1961), 115–17; and Daws, *Shoal of Time*, 202–6, 270–80. The queen’s story of events is in Liliuokalani, Queen of Hawaii, *Hawaii’s Story by Hawaii’s Queen* (Boston: Lee and Shepard, 1898), chap. 15. See also William Adam Russ, *The Hawaiian Revolution (1893–94)* (Blue Ridge Summit, PA: Associated University Presses, 1992), 90; and Ralph S. Kuykendall, *The Hawaiian Kingdom, 1874–1893*, Vol. 1, *Foundation and Transformation, 1778–1854*, Hawaiian Kingdom Series (Honolulu: University of Hawaii Press, 1938), 350–52.

¹⁴ Russ, *Hawaiian Revolution*, 90.

¹⁵ Daws, *Shoal of Time*, 270–80.

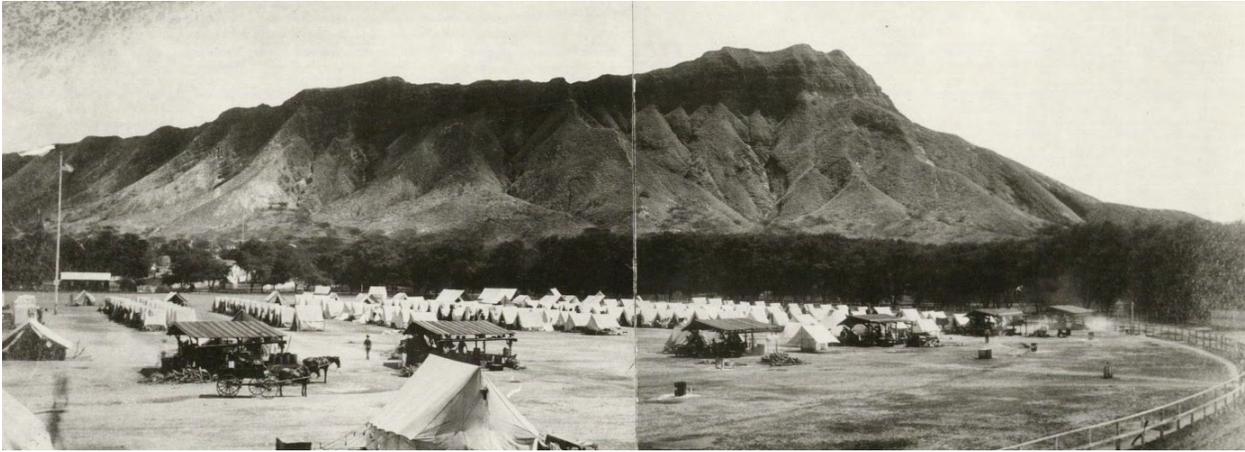
¹⁶ John E. Seward, *A Kingdom Lost: The U.S. Annexation of Hawaii*, Strategy Research Project (Carlisle, PA: US Army War College, 2001), 7–8. See also Ernest Andrade, Jr., *Unconquerable Rebel: Robert W. Wilcox and Hawaiian Politics, 1880–1903* (Boulder: University Press of Colorado, 1996); and Queen Liliuokalani, *Hawaii’s Story*.

Philadelphia, witnessed the formal transfer of sovereignty of the Hawaiian Islands on the steps of 'Iolani Palace.¹⁷



3. 1. Requested by the American minister, John L. Stevens, US Marines land from the USS Boston for "the protection of the United States legation, United States consulate, and to secure the safety of American life and property".

¹⁷ Mike Gordon, "Annexation," *Honolulu Advertiser*, July 6, 2002, accessed August 21, 2012, <http://the.honoluluadvertiser.com/150/sesqlannexation>.



3. 2. Camp McKinley, at the base of Diamond Head, Honolulu. The troops occupied the former racecourse and park. Photograph ca. 1898.

Hawai‘i’s First Defenses

On August 16, 1898, 1,300 officers and men of the 1st New York Volunteer Infantry Regiment and 3rd Battalion, 2nd US Volunteer Engineers, en route to the Philippines, arrived at Honolulu, soon afterward constructing a temporary bivouac at the Diamond Head end of Kapiolani Park near Waikīkī.¹⁸ Divided into two units, known as Camp Otis and Camp McKinley, the encampment consisted of white canvas tents set in neat rows at the center of the old Kapiolani Racetrack and on the lower slopes of Diamond Head.¹⁹

Within a few months of their arrival, officers and men from the 2nd US Volunteer Engineers had surveyed the island of O‘ahu. Their commander, Major William C. Langfitt, presented an initial report to the secretary of war in 1899. Langfitt emphasized that the islands possessed no defenses at all and recommended coastal gun emplacements around Pearl Harbor and at the approaches to Honolulu, including Waikīkī and Diamond Head. A subsequent board, convened two years later, concurred with Langfitt, but also recommended additional defensive

¹⁸ Addleman, *History of the United States Army*, 1.

¹⁹ Addleman, *History of the United States Army*, 1; and Robert R. Weyeneth and MacKinnon Simpson, *Kapi‘olani Park: A History* (Honolulu: Kapiolani Park Preservation Society, 2002), 58.

works on the broad Waianae Plain, which it perceived as particularly vulnerable to land attack from the north.²⁰

By November 1898, construction had begun on new, more permanent facilities on the elevation above the park. The army also created a convalescent facility known as Camp Kaalawai on the southeast side of Diamond Head near Kahala Beach. A second facility on Nuʻuanu Avenue entitled both the Nuuanu Military Hospital and Buena Vista Hospital opened soon afterward.²¹ Other military acquisitions included a waterfront parcel spanning much of the harbor area of Honolulu and a substantial thirty-lot parcel further inland toward Punchbowl.²² The army also was in negotiation for a large tract of former Crown Land near Moanalua, situated midway between Honolulu and the envisioned naval facilities at Pearl Harbor—a site that finally came into the military’s possession in 1905.²³



3. 3. 211th Regiment, Company M, moving supplies with mule and wagons, Kapiolani Park, ca. 1921.

²⁰ Patricia Alvarez, *A History of Schofield Barracks Military Reservation*, Report for the US Army Engineer Division Pacific Ocean, Fort Shafter, March 1982 (Honolulu: US Army Engineer Division Pacific Ocean, 1982).

²¹ Fred Greguras, “Spanish-American War Sites in Honolulu,” *Hawaiian Journal of History* 39 (2005): 19–34.

²² Addleman, *History of the United States Army*, 1.

²³ Addleman, *History of the United States Army*, 3.

The most important acquisition of this early period, however, was a large plot located at Waianae-Uka in an area recommended by the 1901 board. Rejected by a second board of officers as lacking sufficient water, this parcel would later serve as the site of Schofield Barracks. The Waianae-Uka tract consisted of some 14,400 acres, valued at the time at \$360,000.²⁴ Located nineteen miles from Honolulu and nine miles from Pearl City, the former ranchland served initially as a place of rest and relaxation for soldiers returning from the Philippines Campaign and as a training site for Hawaii's Organized Militia, a body created in 1905 and the forerunner of the National Guard.²⁵ While the final decision on the Waianae-Uka site remained unsettled, the 1903 board recommended that work begin at what would become Fort Shafter.²⁶

Much of the Army's earliest efforts focused on coastal protection.²⁷ Fort Armstrong, located at the east (Diamond Head) approach to Honolulu Harbor, was the principal installation in Honolulu itself and occupied a site that had been acquired in November 1899.²⁸ Covering 65 acres of existing and reclaimed land, the facility was complete by 1907. With an area of 755 acres, the complementary Fort Ruger spread over much of Diamond Head, including its north and northwest slopes. Begun in 1906, initial work on the base was complete by August 1909, when the 105th and 109th Companies, Coast Artillery arrived to take up their new station.

²⁴ Addleman, *History of the U.S. Military*, 2.

²⁵ Alvarez, *History of Schofield Barracks*, n.p.; and Addleman, *History of the United States Army*, 4.

²⁶ Addleman, *History of the United States Army*, 5.

²⁷ Berhow, ed., *American Seacoast Defenses*.

²⁸ Addleman, *History of the United States Army*, 2; and Fort Armstrong Container Terminal Improvements, Environmental Assessment Report, August 1992, accessed July 23, 2012, http://oeqc.doh.hawaii.gov/Shared%20Documents/EA_and_EIS_Online_Library/Oahu/1990s/1992-10-08-OA-FEA-FORT-ARMSTRONG-CONTAINER-TERMINAL.pdf. The fort's name honored General Samuel Chapman Armstrong, son of missionary Richard Armstrong and Clarissa Chapman Armstrong and brother of William Armstrong, local business leader and onetime advisor to King Kalakaua; General Armstrong had distinguished himself as the commander of the 8th US Colored Troops, a unit noted for its action at the Siege of Petersburg in 1864 and also as one of the founders of Hampton Institute in Virginia, an training institute for newly freed African-Americans. See Edith Armstrong Talbot, *Samuel Chapman Armstrong: A Biographical Study* (New York: Doubleday, 1904); and Robert Francis Engs, *Educating the Disenfranchised and Disinherited: Samuel Chapman Armstrong and Hampton Institute* (Knoxville: University of Tennessee Press, 1999).

Located at the west end of the marshy stretch of Waikīkī Beach, Fort DeRussy would become the third component of O‘ahu’s coastal defensive system. Military planners began acquisition of the site in 1904, and condemnation was complete in January 1905.²⁹ Originally referred to as the Kalia Military Reservation, the new fortification gained the designation Fort DeRussy in 1909.³⁰ A final component in the coastal protection network was Fort Upton, soon afterward redesignated Fort Kamehameha. Acquired by the military in 1907, it was first occupied by troops on January 14, 1913 and then designated as an independent post in the Artillery District of Hawaii on February 15, 1913.³¹

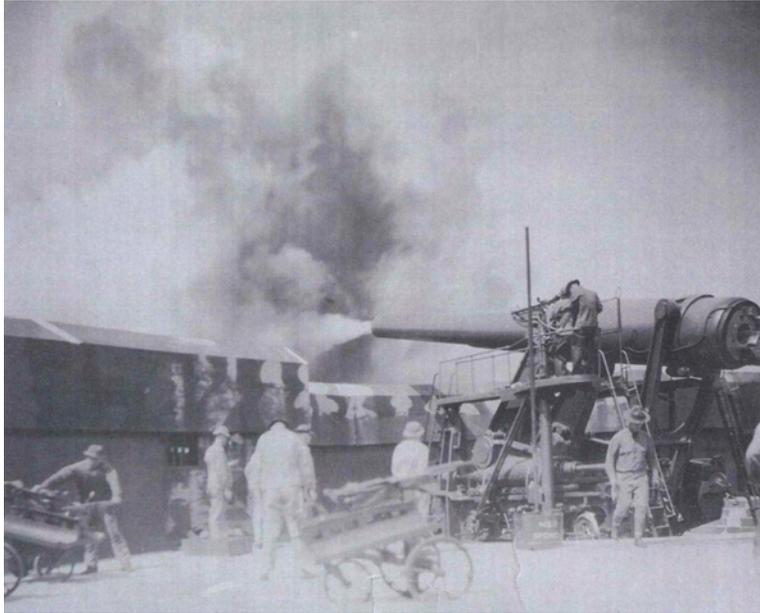
Recognizing the vulnerability of these coastal batteries from land attack—a lesson the US forces had learned in the Philippines—and the limited traverse (degree to which a gun could turn on its mounting) of its large guns, military planners added four batteries between 1914 and 1916: Bari at Ewa Beach, Hulings at Diamond Head, Adair on Ford Island, and Boyd in the Ewa Plain.³²

²⁹ Addleman, *History of the United States Army*, 7. See also George S. Kanahela, *Waikīkī, 100 BC to 1900 AD: An Untold Story* (Honolulu: University of Hawai‘i Press, 1996).

³⁰ It was named after General René Edward DeRussy, whose career spanned the War of 1812 and the Civil War. See Pierre Moulin, *A History of Fort DeRussy: U.S. Army Museum of Hawaii* (Honolulu: Mutual Publishing Co., 2008). See also Ross Stephenson, “The Importance of Planning to Waikiki: A History and Analysis” (PhD diss., University of Hawai‘i at Mānoa, 2008); Glen Grant, *Waikīkī Yesteryear* (Honolulu: Mutual Publishing Co., 1996); and Don Hibbard and David Franzen, *The View from Diamond Head: Royal Residence to Urban Resort* (Honolulu: Editions Ltd., 1995).

³¹ Addleman, *History of the United States Army*, 10.

³² William H. Dorrance, “Land Defenses of O‘ahu’s Forts, 1908–1920,” *Hawaiian Journal of History* 29 (1995), 156.



3. 4. Battery, Fort DeRussy, ca. 1926. Hawai'i's defense relied largely on stationary guns guarding the approaches to Pear Harbor. Established in 1911, the 14-inch guns at Battery Randolph at Waikiki could send projectiles of over 1,000 pounds up to twenty-five miles.

Fort Shafter and Schofield Barracks

The next cog in the wheel would be land defense. In 1907, four officers representing what came to be known as the National Land Defense Board recommended a concentration of forces at “pinch” points on the landward side of O‘ahu. One of its members, Major William G. Haan visited Hawai‘i in 1908 and reasserted the need for an infantry garrison located along the vulnerable uplands area of Waianae-Uka.³³ In the meantime, the intermediary base of Fort Shafter, located nine miles west of Honolulu, would serve as the army’s principal inland base.

Known initially as Kahauiki Military Reservation, Fort Shafter began to take form after 1905.³⁴ Work included barracks and other facilities primarily for infantry regiments and field artillery. The army also constructed a post hospital, the progenitor of Tripler Hospital, today the army's principal medical facility in the Pacific. Work on the first battalion cantonment, later called Palm Circle, began in 1907.³⁵ This complex included fifteen two-story dwellings for officers and separate barracks for enlisted personnel. This was followed, beginning in 1914, by the addition of a new regimental cantonment area encompassing new barracks for enlisted men and officers' and noncommissioned officers' quarters. In 1917, construction crews completed work on a new Ordnance Depot on the seaward side of the reservation in an area.³⁶

The jewel in the crown of the army's installations on O'ahu would be Schofield Barracks. Located nineteen miles from Honolulu, the installation was intentionally remote. Its establishment still contested by some military planners as late as 1907, the army proceeded with its original plans, completing initial work by the beginning of the following year.³⁷ On January 13, 1909, the 5th Cavalry, minus one squadron, arrived in Honolulu, immediately traveling by rail, horse, and foot to the new camp.³⁸ Interestingly, the unit's prior posting had been at Yosemite Park, one of several national parks policed by the Army at the time.³⁹

³³ Dorrance, "Land Defenses of O'ahu's Forts," 151–53.

³⁴ Given its new name in 1907—in honor of Major General William R. Shafter (1835–1906), a Civil War leader, holder of the Medal of Honor, and commander of the Department of California during the Spanish-American War—groundbreaking on the new installation took place in 1905. See S. R. Meeken, *A History of Fort Shafter, 1898–1974* (Honolulu: Office of the Deputy Installation Commander, Fort Shafter Area, HQ, US Army Support Command, 1974), 3.

³⁵ Palm Circle, 100 Area, Fort Shafter, National Register Nomination, June 13, 1986, Erwin N. Thompson, accessed July 12, 2012, <http://pdfhost.focus.nps.gov/docs/NHLS/Text/84000104.pdf>.

³⁶ Addleman, *History of the United States Army*, 14; Meeken, *History of Fort Shafter*, 40; and M. J. Tomonari-Tuggle, S. Hamilton, and K. Slocumb, *Integrated Cultural Resources Management Plan for Fort Shafter Military Reservation* (Honolulu: International Archaeological Research Institute, Inc. for the US Army Corps of Engineers, Pacific Ocean Division, 2000), n.p.

³⁷ "Big Work to Start Soon at Leilehua," *Pacific Commercial Advertiser*, December 5, 1908.

³⁸ Addleman, *History of the United States Army*, 6; US War Department, *Annual Reports of the Secretary of War*, Vol. 3 (Washington, DC: GPO, 1909), 132; and Addleman, *History of the United States Army*, 7.

³⁹ The Army managed the day-to-day operations of the national parks from 1886 until 1916, when the National Park Service came into existence. William H. Sontag, *National Park Service: The First 75 Years* (Philadelphia: Eastern National Park and Monument Association, 1991).

At the beginning of 1909, the base included 248 buildings, “both temporary and permanent,” including some 171 “tent floors.” By May, there were also an officers’ mess hall, noncommissioned officers’ quarters, a base hospital, horse corrals, blacksmith and saddlers’ shops, a post exchange, gymnasium, a gatehouse, a commissary, storehouses, workshops, a bakery, stone crusher, and a “sewerage system.”⁴⁰ By the end of the year, the post had a population of over 6,000 men and officers and a permanent school for the base’s growing number of children.⁴¹



3. 5. Soldiers drilling at Schofield Barracks, ca. 1928. The "jewel in the crown" of Hawai'i's defensive works, Schofield's primary purpose was to protect the landside approach to Pearl Harbor and to provide a training area for infantry and field artillery. Quad D, behind the soldiers, was completed in 1916.

⁴⁰ US War Department, *Annual Reports of the Secretary of War*, Vol. 3 (Washington, DC: GPO, 1909), 132; and Addleman, *History of the United States Army*, 7–8.

Due to improvements introduced by Major General William H. Carter (1851–1925), the base soon included a new permanent block for officers, barracks for three companies (called Quad B and Quad C), another for the military police and ordnance unit, an officers' club, a bank, and post laundry.⁴² There was also a post library—stocked with books from General Carter's own collection.⁴³

To deal with the persistent problem of inadequate water, the army contracted a local firm to build a reservoir and dam and install pipes to the base facilities. Completed in 1916, the new facility would provide water for an eventual 10,000 officers and men and their families, although strict conservation measures would also remain a part of base policy. In 1925, the construction of the Ku Tree Dam helped mediate conditions, although it was only in 1936 that a well meeting the camp's needs finally reached completion.⁴⁴

In addition to regular army troops, Hawai'i's defenses depended on the local militia. In 1904, General Arthur MacArthur (1845–1912), soon to be appointed Commander of the Pacific Division, had envisioned a force of 5,000. The military failed to achieve this number at first, although by 1914 there would be 1,879 members of what was then the Hawaii National Guard, up from 416 in 1906, the year MacArthur assumed command.⁴⁵ In 1914, with the outbreak of war in Europe, Territorial Governor Lucius E. Pinkham pressed for a preparedness plan for

⁴¹ Katharine S. Bouthillier, "Schofield Barracks Historic District, National Register Nomination," November 1996, accessed August 24, 2012, <http://pdfhost.focus.nps.gov/docs/NRHP/Text/98000889.pdf>; and Addleman, *History of the United States Army*, 12.

⁴² Addleman, *History of the United States Army*, 13.

⁴³ Addleman, *History of the United States Army*, 13. See also Katharine S. Bouthillier, "Schofield Barracks Stockade, National Register Nomination," January 1997, accessed July 15, 2012, <http://pdfhost.focus.nps.gov/docs/NRHP/Text/98000974.pdf>.

⁴⁴ Alvarez, *History of Schofield Barracks*, 150; Don Hibbard, *Schofield Barracks Military Reservation, Ku Tree Reservoir*, Historic American Engineering Record, National Park Service, US Department of the Interior, June 2008 (Washington, DC: Historic American Engineering Record, 2008), accessed June 21, 2012, <http://memory.loc.gov/pnp/habshaer/hi/hi0800/hi0860/data/hi0860data.pdf>; and *Schofield Barracks: A Historic Treasure*, <http://www.garrison.hawaii.army.mil/tlm/files/history.pdf>.

⁴⁵ Brian McAllister Linn, *Guardians of Empire: The U.S. Army and the Pacific, 1902–1940* (Chapel Hill: University of North Carolina Press, 1997), 110.

Hawai'i. His efforts resulted in a doubling of the size of the guard to 3,693 men and officers in 1915 and 5,150 by August 1916.⁴⁶

Pearl Harbor

The US military presence in Hawai'i was due primarily to a single consideration: the protection of Pearl Harbor. Situated on O'ahu's south shore, Pearl Harbor provided one of the only deepwater harbors in the Pacific.⁴⁷ Midway Atoll's capacity was limited and the construction of an entrance through the surrounding reefs had proved problematic.⁴⁸ The atoll was also isolated and had few resources to sustain visiting ships.

Pearl Harbor's potential had been noted for many years prior to US interest in the area. Captain George Vancouver had begun a survey of the lagoon and Captain John Kendrick had landed a force from his ship *Lady Washington*.⁴⁹ Captain Archibald Campbell had further described the harbor in detail in his account *A Voyage around the World from 1806 to 1812*.⁵⁰ In 1824, Lieutenant Charles R. Malden of the HMS *Blonde* surveyed of Pearl Harbor. Another member of the *Blonde*'s crew, Andrew Bloxom, explored the entrance to the harbor, noting the harbor itself had "room enough for the entire Navy of England."⁵¹ A few years later, in 1841,

⁴⁶ Linn, *Guardians of Empire*, 110. The guard's commander was Ignatieff Samuel Johnson (1874–1948), a colorful recruit from Russia and veteran of the US Army's Philippines Campaign, by then held the rank of brigadier general.

⁴⁷ It was known as known as Pu'uloa, or "long hill" (alternatively "hill of long life") to Hawaiians. The other important Hawaiian ports of call were Honolulu and Lahaina, neither of which was capable of serving the US fleet. See Mary Pukui, S. Elbert and E. Mookini, *Place Names of Hawaii* (Honolulu: University of Hawaii Press, 1974), 200–201; and "Pu'uloa Petroglyphs, Hawaii," Science Views.com, accessed October 3, 2012, <http://www.scienceviews.com/islands/puuloapetroglyphs.html>. See also Maui Historical Society, *Lahaina Historical Guide* (Tokyo: Charles E. Tuttle, Co., 1971).

⁴⁸ Rauzon, *Isles of Refuge*.

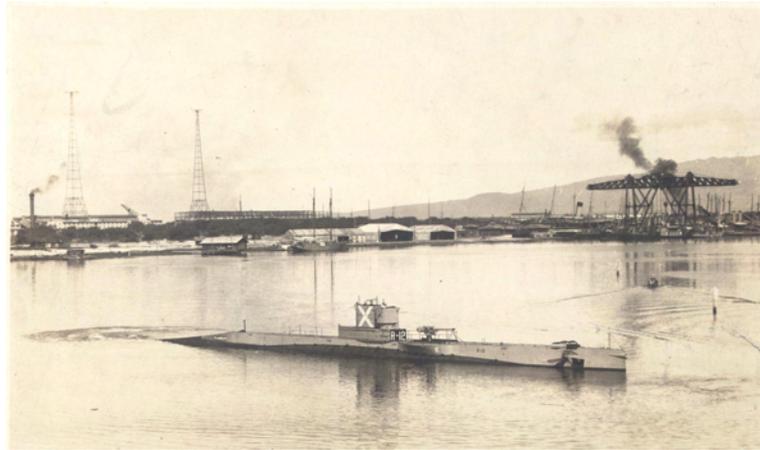
⁴⁹ Daws, *Shoal of Time*, 39.

⁵⁰ Peter Corney, *Voyages in the Northern Pacific; Narrative of Several Trading Voyages from 1813 to 1818* (Honolulu: Thm. G. Thrum, 1896).

⁵¹ George Byron, *Voyage of H.M.S. Blonde to the Sandwich Islands, in the Years 1824–1825* (London: J. Murray, 1826).

Charles Wilkes, commander of the US Exploring Expedition, said that the lagoon “would afford the best and most capacious harbor in the Pacific.”⁵²

Perceiving challenges to its own strategic interests in the Pacific, the United States began to take a closer interest in Pearl Harbor during the late nineteenth century. The Reciprocity Treaty of 1875 and its 1887 extension were first steps toward gaining a permanent base there. However, until the time of the Spanish-American War there had been no solid steps toward developing a US presence in Hawai‘i.⁵³ Annexation would finally open the door to exploitation of Pearl Harbor’s unique attributes.



3. 6. R-Boat 12, Pearl Harbor, ca. 1925. The US Navy developed Pearl Harbor after 1909 as an important submarine and fleet base. It also served as a repair facility.

At first, the Navy concentrated its efforts on improving Honolulu Harbor. Commander John F. Merry erected new sheds and warehouses, quarters for personnel, fencing, and a new ten-ton crane and water system. Working with local contractors, the Navy also dredged the old port’s harbor to accommodate larger ships.⁵⁴ In May 1903, the harbor received its first

⁵² Charles Wilkes, *Voyage Round the World: Embracing the Principal Events of the Narrative of the United States* (Philadelphia: Geo. W. Gorton, 1849).

⁵³ Taussig, *Tariff History of the United States*, 291.

⁵⁴ W. Snowbarger, “Development of Pearl Harbor” (PhD diss., University of California, 1950); and Army Times, *Pearl Harbor and Hawaii, A Military History* (New York: Army Times, 1971).

battleship, the USS *Wisconsin*.⁵⁵ The needs of transport and supply ships soon indicated that Honolulu Harbor was inadequate for the Navy's purposes; in 1901, the Hawai'i command took the first steps to improve the channel at Pearl Harbor. Fighting resistance from landowners, the Navy eventually secured title to surrounding lands and to a section of Ford Island at the center.⁵⁶ In January 1905, the gunboat USS *Petrol* was the first US naval vessel to enter the harbor.⁵⁷

In the meantime, work continued at Honolulu Harbor, with both the Army and Navy contending for priority.⁵⁸ In part to alleviate conflicts between branches, on May 13, 1908, Congress authorized the enlargement and dredging of the Pearl Harbor channel and the locks—located at the west end of the lagoon—“to admit the largest ships.”⁵⁹ There were also provisions of machine shops, coal sheds housing, storehouses, and a single, large dry dock. The work met severe obstacles as well. Budgeted at \$3 million, the dry dock collapsed in 1913 due to unanticipated ground pressure during construction.⁶⁰ Completion of the structure would take another five years and an additional \$5 million.

In August 1913, the Navy Station moved officially from Honolulu to Pearl Harbor. Its cost estimated at \$20 million, the new facility represented a huge advance over the earlier operations.⁶¹ In total, Pearl Harbor Naval Station included separate facilities for fueling—after 1910, switching over a period of about four years from coal to oil⁶²—a Navy yard for ship repair, a Naval Supply Depot, a hospital and radio station, a separate reservation for marines, officers'

⁵⁵ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History,” Navy Department Library, Navy Department, Naval History and Heritage Command, US Navy, U.S. Department of Defense, accessed May 29, 2012, <http://www.history.navy.mil/docs/wwii/pearl/hawaii-3.htm>.

⁵⁶ “Ford Island History,” Hawaii Aviation: An Archive of Historic Photos and Facts, State of Hawaii Department of Transportation, Airports Division, accessed May 19, 2012, <http://hawaii.gov/hawaiiaviation/hawaii-airfields-airports/oahu-pre-world-war-ii/ford-island>.

⁵⁷ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History.”

⁵⁸ Addleman, *History of the United States Army*.

⁵⁹ Thos. G. Thrum, *All about Hawaii: The Recognized Book of Authentic Information on Hawaii, combined with Thrum's Hawaiian Annual and Standard Guide* (Honolulu: Honolulu Star-Bulletin, 1910), 163–64.

⁶⁰ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History.”

⁶¹ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History.”

⁶² “Petroleum and Sea Power,” American Oil and Gas Historical Society, accessed August 16, 2012, <http://aoghs.org/offshore/petroleum-and-sea-power/>.

and enlisted men's quarters, an incipient submarine base, and an ammunition depot located on Kuahua Island.⁶³ The base was capable of refueling and repairing several ships simultaneously and was able to offer anchorage and marine services to their own ships as well as commercial vessels and ships of other countries.⁶⁴



3. 7. Pearl Harbor from Pearl Loch, 1929.

In addition to its actual facilities, the new station also presented a formidable symbol of the US presence in the Pacific. Still facing disagreements over land titles, the Navy continued to develop the naval station, hoping as well to allow passenger liners and other commercial vessels to use the facility—a hope shared by the Matson Steamship Company and the American Hawaiian Company. With US entry into the war in 1917, however, the Navy set these plans aside. By 1919, government procurers had secured ownership of the remaining parcels on Ford Island and soon work was underway on a new joint Army and Navy air station there.⁶⁵

⁶³ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History.”

⁶⁴ The U.S. Navy seized both ships in 1917 after the United States’ entry into the war. See Kuykendall and Day, *Hawaii: A History*, 211; and Bob Krauss, “Not Many in Hawai‘i Remember the Hizer,” *Honolulu Advertiser*, October 10, 2004, accessed May 5, 2012, <http://the.honoluluadvertiser.com/article/2004/Oct/10/lh/lh47pbob.html>.

⁶⁵ “Ford Island History.”



3. 8. Aircraft of the 18th Pursuit Squadron, Wheeler Field, ca. 1929. Aircraft comprised the third prong of defense for the islands, though many felt Hawai'i's air forces inadequate to the task.

The Beginnings of the Park

Confined at first to O‘ahu, the US military would eventually have an impact on other islands as well.⁶⁶ Most significant was its involvement on Hawai‘i Island, in large part because of the efforts of local entrepreneur Lorrin Thurston—a principal leader of the 1893 overthrow—to involve the military in his own plans for a national park. Politician, government official, and Hawai‘i booster, Thurston had long been interested in the scenic beauties of Hawai‘i and for years had made excursions to the dramatic volcano at Kīlauea and to Haleakalā, Maui’s famous volcanic peak.⁶⁷ In 1891, he purchased Volcano House, near the edge of the Kīlauea Caldera

⁶⁶ In 1910, Major E. Eveleth Winslow (1883–1928) of the Army’s Corps of Engineers told a group of influential citizens that Hilo would never be fortified. See Addleman, *History of the United States Army*, 8.

⁶⁷ As a teenager on Maui he hiked to the summit of Haleakalā, later guiding tourists up to the peak. See I. J. Castro, “A History of Hawaii National Park,” undated typescript, 20, on file at Hawaii National Park, Kilauea, Hawaii; A. Grove Day, *A Biogeographical Dictionary: History Makers of Hawaii* (Honolulu: Mutual Publishing, 1984), 121; Darlene E. Kelley, “Lorrin Andrews Thurston (1858–1931),” Historical Collections of Hawaii, US Gen Web Archives, accessed October 25, 2012, <http://files.usgwarchives.net/hi/statewide/newspapers/importan77nnw.txt>; and Jadelyn J. Moniz Nakamura, *Fire on the Rim: The Creation of Hawaii National Park*, Hawai‘i Volcanoes National Park, n.d., occasional papers 1, p. 9, HAVO.

and expanded the small hostelry into a multiroom hotel.⁶⁸ To help publicize Hawai'i attractions, he commissioned a cyclorama of Kīlauea for the 1893 World's Columbian Exposition, an exhibit displayed as well at the California International Exposition the following year.⁶⁹

In 1898, Thurston purchased Honolulu's principal newspaper, the *Pacific Commercial Advertiser*, later the *Honolulu Advertiser*.⁷⁰ Head of the Hawai'i Promotion Committee, the progenitor of the Hawai'i Visitors and Convention Bureau, he worked closely with the Inter-Island Steam Navigation Company to create an excursion business from Honolulu to his hotel at Kīlauea.⁷¹ Although he sold his interest in Volcano House to hotelier George Lycurgus (1858–1960) in 1904, Thurston nonetheless continued to promote Kīlauea and Hawai'i's other natural sites.⁷²

A meeting with young Massachusetts Institute of Technology (MIT) geologist Thomas A. Jaggar (1871–1953) in 1909, further sparked Thurston's vision.⁷³ With Jaggar's support and a \$25,000 grant from the Whitney Foundation, Thurston turned to making Kīlauea a center for the study of volcanoes.⁷⁴ In 1911, Jaggar and the center secured additional funding for the observatory through an organization called the Hawaiian Volcanoes Research Association,

⁶⁸ "Incorporation of the Volcano House," *Daily Commercial Pacific Advertiser (Honolulu)*, March 5, 1891, 2; "The Volcano House Born," *Daily Pacific Commercial Advertiser (Honolulu)*, November 14, 1891, 2; Gunder E. Olson, *The Story of Volcano House* (Hilo: Hawaii Tribune-Herald, 1941); and Kent Warshauer, "The Evolution of the Volcano House, Part 1," *Volcano Gazette* (January/February 2000): 10.

⁶⁹ Ralph S. Kuykendall, *Kingdom of Hawaii*, Vol. 3, 1874–1893, 115; and Moniz Nakamura, *Fire on the Rim*, 10.

⁷⁰ Day, *Biogeographical Dictionary*, 122; and George Chaplin, *Presstime in Paradise: The Life and Times of the Honolulu Advertiser, 1856–1995* (Honolulu: University of Hawai'i Press, 1998), 129.

⁷¹ Castro, "History of Hawaii National Park," 7; and Jackson, *Administrative History*, 22.

⁷² Harry Miller Blickhahn, *Uncle George of Kīlauea: The Story of George Lycurgus* (Kīlauea: Hawaii National Park and Volcano House, 1961); and Castro, "History of Hawaii National Park," 15–17.

⁷³ Castro, "History of Hawaii National Park," 15–17; Moniz Nakamura, *Fire on the Rim*, 11–12; and Carey & Co., *Hawaii Volcanoes and Haleakala National Parks* (San Francisco: For the National Park Service, 2002), 9.

⁷⁴ T. A. Jaggar, *Special Report of the Hawaiian Volcano Observatory* (1st through 4th) (Boston: Society of Arts of the Massachusetts Institute of Technology, 1912), reprinted as T. A. Jaggar, *Special Report of the Hawaiian Volcano Observatory* (1st through 4th); *Special Bulletin of the Hawaiian Volcano Observatory; Bibliographic References to Volcanoes and Volcanic Activity on the Island of Hawaii*. Vol. 1 of *The Early Serial Publications of the Hawaiian Volcano Observatory*, ed. Darcy

strongly backed by Thurston.⁷⁵ In 1912, Volcano House provided a portion of its leased land for an observatory, a house for Jaggar, and other support buildings.⁷⁶

In 1907, Thurston hosted a congressional delegation at Kīlauea as a first step in gaining federal support for a park there.⁷⁷ A visit by the Secretary of the Interior James R. Garfield (1865–1950) followed.⁷⁸ Then in 1909, a second Congressional delegation visited Hawai‘i to explore Thurston’s idea. Lobbying both Congress and the territorial legislature, Thurston finally convinced Territorial Governor Walter E. Frear (1863–1948) to support the idea of a national park spanning Maui and Hawai‘i.⁷⁹ In 1911, Frear submitted the draft of a proposed bill for a “Kilauea National Park.”⁸⁰

In 1914, the Hawai‘i park proposal obtained the support of Stephen T. Mather (1867–1930), one of the chief advocates for national parks. Another congressional visit and strong backing from Prince Jonah Kūhiō Kalaniana‘ole Pi‘ikoi (1871–1922), Hawai‘i’s delegate to Congress, brought Thurston’s dream closer to reality. Following passage of the bill in spring 1916, on August 1, 1916, President Woodrow Wilson officially signed the act creating the Hawaii National Park, an entity to encompass both Kīlauea and Haleakalā.⁸¹ Hawai‘i’s new park would be the thirteenth in the new system and the first in a US territory.⁸²

Bevens, Taeko Jane Takahashi, and Thomas L. Wright (Kilauea, Hawaii National Park: Hawaii Natural History Association, 1988): 14; and Castro, “History of Hawaii National Park,” 21, 24.

⁷⁵ Jaggar, *Special Report*, 68; Castro, “History of Hawaii National Park,” 23; Jackson, *Administrative History*, 41; and Moniz Nakamura, *Fire on the Rim*, 12.

⁷⁶ Castro, “History of Hawaii National Park,” 24.

⁷⁷ Castro, “History of Hawaii National Park,” 21; and Moniz Nakamura, *Fire on the Rim*, 10.

⁷⁸ Russell Apple, “History of Land Acquisition in Hawaii National Park to December 31, 1950” (master’s thesis, University of Hawaii, 1954), 14; and Castro, “History of Hawaii National Park,” 21.

⁷⁹ Apple, “History of Land Acquisition,” 17–18; Castro, “History of Hawaii National Park,” 25; and Moniz Nakamura, *Fire on the Rim*, 11.

⁸⁰ Castro, “History of Hawaii National Park,” 29.

⁸¹ H.R. Hearing before the Committee on Public Lands, House of Representatives, 64th Congress, A Bill to Establish a National Park in the Territory of Hawaii, Hawaii State Archives; Castro, “History of Hawaii National Park,” 30; and Apple, “History of Land Acquisition,” 28.

⁸² Robert Shankland, *Steve Mather of the National Parks* (New York: Knopf, 1970); William C. Everhart, *The National Park Service* (New York: Praeger Publishers, 1972); and Horace M. Albright and Marian Albright Schenck, *Creating the National Park Service: The Missing Years* (Norman: University of Oklahoma Press, 1999), chap. 4.



3. 9. Kīlauea Volcano and Mauna Loa. Kīlauea eruption, 1924. The active volcano at Hawaii National Park was the principal attraction in the newly created park.

As written into the original law, the new park was to include three parcels of land: 35,865 acres of land around Kīlauea; 17,920 acres of land at the summit of Mauna Loa, with a strip of land connecting the two sufficient for a roadway; and 21,159 acres of Haleakalā on Maui.⁸³ Much of this land, however, remained in private hands—including about 12,195 acres belonging to the Bishop Estate—an entity established by banker Charles Reed Bishop (1822–1915) in memory of his wife, the Princess Bernice Pauahi (née Pākī) Bishop (1831–1884).⁸⁴ Governor Pinkham negotiated with the Bishop Estate and other private owners for title to additional lands, finally exercising a land exchange for most of the Kīlauea property; 650 acres containing Volcano House and its surroundings remained in the estate’s possession.⁸⁵ In 1921, a further

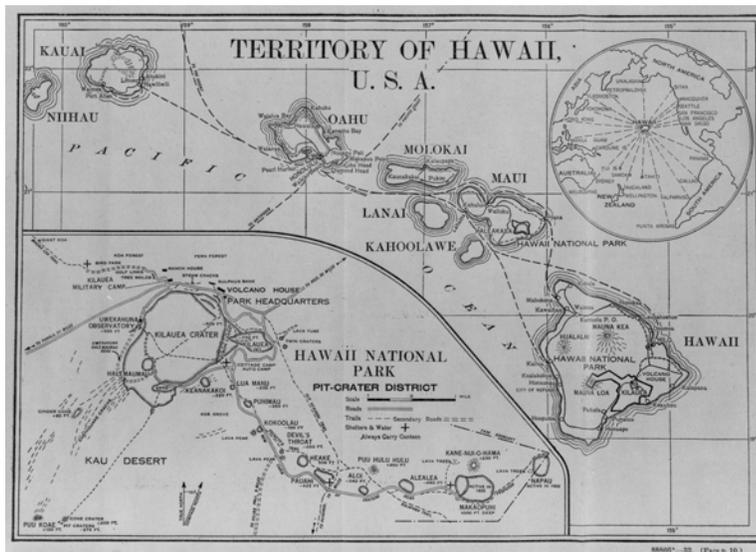
⁸³ Map Showing Tracks Proposed for Volcano National Park, Island of Hawaii, 1911, Hawaii State Archives; Hearing before the Committee on the Territories on H.R. 13699, February 19, 1919, Hawai‘i State Archives; Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 8; Apple, “History of Land Acquisition,” 28; and Moniz Nakamura, *Fire on the Rim*, 3.

⁸⁴ T. A. Jaggar, Report on Bill H. R. 9525, January 20, 1920, p1, Hawai‘i State Archives; Nash Castro, “The Land of Pele: A Historical Sketch of Hawaii National Park,” Volume 5, *Hawaii Nature Notes* (Hilo: Hilo Tribune-Herald, 1953), 57; Moniz Nakamura, *Fire on the Rim*, 12–15; Kepa Maly and Onaoana Maly, *He Wahi Mo’olelo No Keauhou A Me Na Wahi Pana Ma Laila: A Collection of Traditions, Historical Accounts and Kama’aina Recollections of Keauhou and Its Storied Places; With Notes from Adjoining Lands in Ka’u and Puna, Island of Hawai‘i* (Hilo: Kumu Pono Associates, LLC, 2005).

⁸⁵ Moniz Nakamura, *Fire on the Rim*, 15.

exchange of lands reduced the Bishop Estate parcel to 170 acres, then under lease to hotelier George Lycurgus.⁸⁶

In 1922, Hawaii National Park had its first superintendent, Albert O. Burkland, a former engineer with the US Geological Survey.⁸⁷ With an initial appropriation of \$10,000 for fiscal year 1922, he would begin the actual work of making the park accessible to the public. Up until this time, the park had depended upon the territorial government for support. This had included building a road around the edge of the caldera, a trail along the present Chain of Craters Road, and a third trail across the caldera floor, all using prison labor.⁸⁸



3. 10. Hawaii National Park and a detail of the Kilauea Section, 1938.

A third early project was a trail from Kilauea to the top of Mauna Loa. Employing funds gathered from the Hilo business community, Thurston and Jaggard managed to obtain the help of the US Army, beginning a relationship with Hawaii National Park that would last for decades.

⁸⁶ Lucius Pinkham Letter to A. F. Judd, September 5, 1916, Hawai'i State Archives; Apple, "History of Land Acquisition," 78; C. T. Bailey, Commissioner of Public Lands, to C. J. McCarthy, Governor of Hawai'i, Territory of Hawai'i Land Files, Hawai'i State Archives, November 1, 1920; and Apple, "History of Land Acquisition," 22.

⁸⁷ Castro, "History of Hawaii National Park," 31; and Jackson, *Administrative History*, 103–4.

⁸⁸ Moniz Nakamura, *Fire on the Rim*, 9, 14–15; Castro, "Land of Pele," 55; and Jackson, *Administrative History*, 104.

The project employed troops from the 25th Infantry, an “all-colored” regiment—the so-called Buffalo Soldiers—and lasted from October to December 1915.⁸⁹ Involving about 140 men and officers of Company E, the project included the construction of several campsites along the 34-mile-long trail and completion of a 10-person cabin at the peak and stables for horses.⁹⁰

The military’s collaboration with the park was entirely in character with the times. Several Hawai‘i units had seen service in national parks before coming to Hawai‘i, notably the 5th Cavalry, which had come directly from a tour of duty at Yosemite. The 25th Infantry, stationed at Schofield Barracks since 1913, also had experience in the national parks, serving both at Yosemite and Sequoia. Thurston and other park supporters maintained close relations with the US Army’s Hawaiian Department and its commanding officer General William H. Carter (1851–1925) and his successor John P. Wisser (1852–1927), as well as Schofield Barracks commander Colonel Walter Schuyler.⁹¹ A partnership between the park and the US Army would become a signature part of Kīlauea’s early years, laying the foundations for future military and park cooperation.

⁸⁹ Castro, “Land of Pele,” 57; Castro, “History of Hawaii National Park,” 57; and Moniz Nakamura, *Fire on the Rim*, 14.

⁹⁰ Some accounts list 60 personnel, but given that a full company participated in the work, 140 is probably the most accurate number. See, for example, M. J. Tomonari-Tuggle and Katharine Bouthillier, *Integrated Cultural Resources Management Plan for Kīlauea Military Camp*, Hawai‘i Volcanoes National Park, Island of Hawai‘i, International Archaeological Research Institute, Inc. November 1998, a Draft Report for the US Army Corps of Engineers, Pacific Ocean Division (Honolulu: International Archaeological Research Institute, Inc., 1998), III-27; Kathryn Waddell Takara, “Trailblazers,” *Hana Hou! The Magazine of Hawaiian Airlines*, accessed October 20, 2012, <http://www.hanahou.com/pages/magazine.asp?Action=DrawArticle&ArticleID=750&MagazineID=47&Page=3>; and “Mauna Loa,” USGS: Science for a Changing World, Hawaiian Volcano Observatory, accessed October 30, 2012, http://hvo.wr.usgs.gov/observatory/hvo_history_mloa.html.

⁹¹ Addleman, *History of the United States Army*, 8.

Kilauea Military Camp

In 1911, a visiting army officer suggested a camp at Kīlauea to serve as a place of recreation for US soldiers stationed on O‘ahu.⁹² In September 1911, the military command on O‘ahu sent the first troops to the area on a combined training and recreational visit. Other units followed over the next year.⁹³ Two years later, Hilo entrepreneur John M. Giles envisioned a more permanent installation. On August 13, 1913, one hundred men and officers of Company D, 1st US Infantry traveled from O‘ahu, camping in an area near to the Volcano House.⁹⁴ In March the following year, R. W. Filler, superintendent of the Hilo Railroad Company, offered excursion rates to the Army to reinforce Giles’s idea.⁹⁵

The first visiting troops disembarked at Hilo, took a train to Glenwood, and continued the trip to Kīlauea from the railhead on foot.⁹⁶ One member of the 25th Infantry remembered his journey:

H Company spent a pleasant week on the island of Hawaii, camped in a barrack on the rim of Kilauea volcano. We traveled by inter-island steamer to Hilo, then by wide-gauge railroad to the railhead at the foot of Mauna Loa mountain, the twin of Mauna Kea, and from thence we hiked up to the 4,000 foot plateau where the fiery crater of Halemaumau was inside the Kilauea volcano.⁹⁷

Several officers saw greater potential for the site. In 1916, Lieutenant Charles H. Bonesteel, the first regular Army officer assigned to the island of Hawai‘i, envisioned Kīlauea as a training area for National Guard troops. Echoing Bonesteel’s suggestion, Captain J. P. Fair, head of the Construction Quartermaster’s Department at Schofield Barracks, concluded that the

⁹² Kent Warshauer, “History of Kilauea Military Camp,” typescript, 1998, chap. 1, on file at Hawaii Volcanoes National Park.

⁹³ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-27.

⁹⁴ Warshauer, “History of Kilauea Military Camp,” chap. 1.

⁹⁵ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-27.

military could make good use of Kīlauea if they could obtain sufficient water; he estimated a daily requirement of 80,000 gallons.⁹⁸

Hawai‘i Island boosters gave further support to the idea. Thurston promoted Kīlauea as a permanent camp along with Brigadier General Ignatieff S. Johnson (1874–1948), commander of the Hawaii National Guard⁹⁹ and Brigadier General Robert Evans, commanding officer of the US Army’s Hawaiian Department. Evans concluded that Kīlauea would be an excellent site for a recreation area for troops—“the bracing climate affording a splendid tonic for men who have been for some time stationed near sea level.”¹⁰⁰ Johnson saw the proposed new camp as an opportunity to consolidate the National Guard’s training, at that point scattered throughout the islands.¹⁰¹

Thurston immediately began to raise funds for the new camp, soon amassing \$24,000. He also secured a twenty-year lease from the Bishop Estate for a site south of Volcano House, near the edge of the Kīlauea Caldera.¹⁰² From the latter part of 1916 into early 1917, the newly designated Kilauea Military Camp witnessed a steady stream of military units. Most of the

⁹⁶ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-27.

⁹⁷ Schuyler, cited in Takara, “Trailblazers.”

⁹⁸ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-27.

⁹⁹ Johnson was certainly one of the most colorful figures to head the Hawaii National Guard. A native of Russia, he had fought with a Cossack cavalry division in the war against the Turks, later immigrating to South America to serve as a “soldier of fortune.” Moving on the United States, where he became a citizen in 1895, he fought in the Spanish American War, returning to Hawaii in 1899 to become a member of and then commander of the guard. “Death Overcomes ‘Sam’ Johnson, Cossack-Born Soldier of Fortune Former Hawaii Resident,” unknown newspaper, February 25, 1948, Honolulu County Archives Obituaries, accessed October 23, 2012, <http://files.usgwarchives.net/hi/honolulu/obits/johnson221gob.txt>.

¹⁰⁰ Warshauer, “History of Kilauea Military Camp, chap. 3, cited in Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-28.

¹⁰¹ US Army, “History of Kilauea Military Camp, Hawaii National Park,” Report for the National Park Service by Headquarters, Hawaiian Department, G-1 Section, May 23, 1929, HAVO Archives.

¹⁰² The annual fee was \$50. Signatories were General Evans, General Johnson, Lieutenant Colonel John T. Moir (of the Hawaii National Guard in Hilo), H. G. Vicars, and Thurston. See Warshauer, “History of Kilauea Military Camp,” chap. 1.

soldiers stayed in tents located on the site of the present complex. By late November 1916, work was complete on the first wood buildings.¹⁰³

The completed Kilauea Military Camp, known typically as KMC, occupied a flat area of land on the south edge of Kīlauea Caldera. As the *Pacific-Commercial Advertiser* described it, the site was “nearly level, slightly undulating [and consisted of] a sandy loam with perfect drainage, and has a sparse growth of native trees and shrubs.”¹⁰⁴ The few buildings were all single story and included an officers building and two large structures for enlisted men. Both officers and men slept in tents, which they carried with them each time to the site. Washrooms and latrines were located adjacent to the three main buildings.¹⁰⁵ Constructed at an initial cost of \$17,000, all of which was supplied by interested donors¹⁰⁶, the Army now had a self-contained recreation area well away from Honolulu. Although there were still plans for the National Guard to train at the site, as of early 1917 the camp’s principal purpose was rest and relaxation for O‘ahu-based troops, most staying a week at a time.

On April 6, 1917, the United States declared war on Germany and developments at Kīlauea came to an abrupt halt; a coastal artillery company was the last Army unit on the site, and quickly packed their gear to return to O‘ahu.¹⁰⁷ Although World War I resulted in an expansion of US military holdings in Hawai‘i, the actual military presence diminished during the war years. Virtually all of the troops in Hawai‘i prior to 1917 had transferred to the continental United States, many of them then moving on in succeeding months to the trenches of France and Belgium.¹⁰⁸

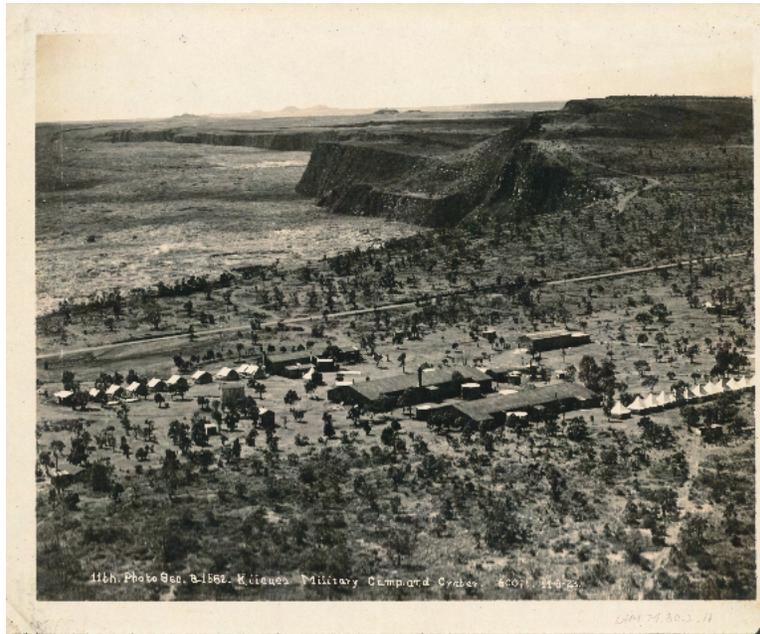
¹⁰³ The first unit on site was Company A of the 2nd US Infantry. “Kilauea Military Camp in Popular: Troops from Oahu Garrison Report Splendid Time at Volcanoes Reservation,” *Hilo Tribune-Herald*, March 23, 1917, cited in Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-30.

¹⁰⁴ “Status of the ‘Kilauea Military Camp’— Objects Set by Trustees,” *Pacific Commercial Advertiser*, February 4, 1917.

¹⁰⁵ “The Kilauea Military Camp,” *Pacific Commercial Advertiser*, February 5, 1917.

¹⁰⁶ US Army, “History of Kilauea Military Camp,” 12.

¹⁰⁷ Addleman, *History of the United States Army*, 17; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-32.



3. 11. Kilauea Military Camp, 1923.

KMC languished during this period, and Thurston and other supporters were hard-pressed to find a use for the camp or a substitute for the money US troops spent during their rest periods. With the war's end in November 1918, however, the Army hoped to move ahead with new plans. Hoping to be free of civilian oversight, General Charles G. Morton, commander of the Hawaiian Department, insisted that the Army have full control of the camp, an expectation prevented by the conditions the Bishop Estate had on the KMC lease.¹⁰⁹

To make up for lost revenue, Thurston and the other trustees came up with a plan to create a summer camp for teachers and students. They also approached the local council of the Boy Scouts to encourage the scouts to use the site for a summer outing. In summer 1919, 500 teachers and students stayed at the camp; the following year the camp welcomed 350 Boy

¹⁰⁸ Addleman, *History of the United States Army*, 20; and Linn, *Guardians of Empire*, 110.

¹⁰⁹ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-28; and US Army, "History of Kilauea Military Camp," chap. 3.

Scouts.¹¹⁰ Despite contributions by Hawai'i businesses, notably the firm of Theo H. Davies & Co., the trustees faced continuing expenses, including repairs due to severe storm damage in December 1920.¹¹¹ Hoping to disengage from their obligations to the Bishop Estate, the camp's trustees settled on transferring the lease to the NPS. The territorial government helped facilitate the transaction through a land-swap with the estate, thereby becoming the owner of most of the Kilauea parcels.¹¹²

Expansion of Kilauea Military Camp

On June 28, 1921, the Territory of Hawai'i transferred its holdings to the US government to become part of Hawaii National Park with the understanding that existing leases, including that held by the trustees of KMC, be honored.¹¹³ Two months later, General Charles P. Summerall (1867–1955), the new commander of the Hawaiian Department, drew up an agreement with the trustees giving the military use of the site free of charge. The Hawaiian Department, for its part, would pay the insurance premiums on the buildings, maintain and repair the existing facilities, and pay the cost of any new structures on the site. The Hawaiian Department also agreed to use the camp continuously; any break in the tenancy over a month would render the agreement null and void.¹¹⁴

Under the agreement, KMC fell under the authority of the Recreation Officer for the Hawaiian Department. This officer arranged for equipment and supplies and drew up the annual roster for troops to visit the site. The first twenty-four men and their commanding officer arrived on October 30, 1921.¹¹⁵ This group included maintenance specialists (caretakers), cooks,

¹¹⁰ "Pioneer Troop Ready to Receive Hawaii Boys," *Hilo Daily Tribune*, September 2, 1920.

¹¹¹ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-29.

¹¹² Jackson, *Administrative History*, 56; and Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 8.

¹¹³ Moniz Nakamura, *Fire on the Rim*, 15.

¹¹⁴ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-32.

¹¹⁵ Jackson, *Administrative History*, 57; Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-33; and Warshauer, "History of Kilauea Military Camp," chap. 6.

electricians, plumbers, and carpenters. Captain B. F. Flannigan of the Coast Artillery Corps was the camp's first full-time commander.¹¹⁶ The first soldiers on recreation leave arrived at the camp on November 4, 1921, traveling by Liberty trucks from the railroad station at Glenwood to the camp and carrying with them tents, ranges, cots, and blankets.¹¹⁷ To help with the organization of the camp, the department hired Lola Kennedy to serve as a "camp hostess." She spent a month at the camp decorating the officers' quarters and clubroom and supervising the planting of trees, shrubs, and grounds maintenance.¹¹⁸

In the first year, approximately 5,000 soldiers took advantage of the opportunity to get away from their stations in Honolulu and spend a week or two at Kīlauea.¹¹⁹ The Army granted soldiers fourteen days annually at KMC, taken either at one time or over multiple visits. The camp's population varied from as few as 200 to as many as nearly 400. In August 1923, there were 327 enlisted men and 69 officers in residence. Facilities included separate clubrooms for men and officers, a library, and pool tables. The recreation hall sponsored three movies weekly. There was also a monthly dance, at which local residents were also welcome. The average cost for an enlisted man was \$11.15; for an officer, \$18.75. Round-trip fare from Honolulu to Hilo and from Hilo to the camp was included in the price.¹²⁰

Still under a lease arrangement with the NPS, the Army hoped to obtain a more permanent standing for the camp. Working through details of outstanding debt, much of it owed to Hilo merchants, the army, KMC trustees, and NPS dithered for two years over the details of an agreement.¹²¹ As part of the arrangement, the National Guard, which had never in fact exercised its rights to use the area for training, agreed to relinquish its interest in the camp. The

¹¹⁶ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-33.

¹¹⁷ Jackson, *Administrative History*, 57; and Warshauer, "History of Kilauea Military Camp," chap. 6.

¹¹⁸ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-33.

¹¹⁹ Warshauer, "History of Kilauea Military Camp," chap. 6.

¹²⁰ "Military Camp at Volcano Rare Resort for Uncle Sam's Troopers," *Honolulu Advertiser*, March 3, 1924; "Army Camp at Site of Historic Volcano," *Honolulu Advertiser*, March 3, 1924; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-33.

¹²¹ Jackson, *Administrative History*, 58.

Navy, however, which up to that time seemed unaware of its own access to the site, suddenly wanted to enforce its rights.¹²² As a compromise, the Army agreed to give the Navy a 14-acre section of the camp's 52.7 acres if the Navy would agree to pay \$15 of the annual \$50 ground rent. In 1925, the Navy allocated \$5,000 to the costs of building its own facilities on site, a process that began in July that year and included plans for constructing a 36-by-85-foot dormitory and 36-by-60-foot mess hall, sufficient for 100 men.¹²³

The Army formally entered into an agreement with the NPS to take over the prior lease at the beginning of 1925.¹²⁴ Since the existing lease was approaching its expiration and the trustees were prohibited from directly granting furtherance on their lease through the Bishop Estate, the Army suggested that "the Secretary of the Interior under the broad authority conferred upon him by the terms the Act creating the Hawaii National Park might permit or licensee the War Department upon the expiration of the existing lease to continue to occupy and use the property as a military recreation camp."¹²⁵ Although the NPS repeatedly argued that the older Bishop Estate lease was null and void, the Department of the Interior's own solicitor ruled that the park had to accede to the terms of existing leases.¹²⁶ For the time being, the lease of the Army with the original trustees would remain in effect.¹²⁷

At the time the Army took control, the facilities included the three principal wood buildings, the caretaker's cottage, and a number of sheds and other supporting structures. Officers and their families had tents on either side of the wood buildings; the central building was the recreation hall and enlisted men's mess; and the northernmost building served as the enlisted men's barracks. The Army had provided a fireplace for the recreation hall in 1922, and the

¹²² Jackson, *Administrative History*, 52; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-38.

¹²³ "Materials for Naval Camp at Kilauea Arrive," *Hilo Tribune-Herald*, June 30, 1925; and Navy Recreation Camp at Kilauea Starts Tomorrow," *Hilo Tribune-Herald*, March 11, 1926.

¹²⁴ "Military Camp Develops Permanent Status," *Hilo Herald-Tribune*, June 30, 1925.

¹²⁵ Major General J. A. Hull, Judge Advocate General, to C. H. Bridges, Adjunct General War Department, cited in Jackson, *Administrative History*, 59.

¹²⁶ Jackson, *Administrative History*, 62.

¹²⁷ "Military Camp Develops Permanent Status."

camp's custodians had built additional ancillary structures and carved out the separate clubrooms in the recreation center.¹²⁸ The protocol was that enlisted men would stay in tents the first three days, after which time they could move into the barracks as other soldiers returned to Honolulu.¹²⁹

By the beginning of 1925, the camp had expanded to include a total of forty-two buildings and secondary structures, now including a bakery, laundry, barbershop, post exchange, camera shop, and a new set of cottages replacing the older officers' tents.¹³⁰ Paid for out of a subscription initiated at Schofield Barracks and other O'ahu posts, the facility's new power plant and water facility also provided electric lights and hot water.¹³¹ Other improvements in 1925 included an extension to the officers' building to serve as a residence for the camp's commander and paved roads and walkways.¹³²

The following year, the camp's crews took further steps to improve the facility. Workers completed additional paved drives within the camp and constructed a section of road opposite the camp, now part of Crater Rim Drive.¹³³ Workers also extended the officers' mess hall to twice its original size (now able to accommodate up to ninety diners) and added a new kitchen replete with ice available from the new ice-making and refrigeration plant. There were also several new bathhouses built over vents near the camp.¹³⁴ In addition, the camp had a tennis court, an expanded and improved baseball diamond, and by the end of 1926, a five-hole golf

¹²⁸ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-34.

¹²⁹ Warshauer, "History of Kilauea Military Camp," chap. 7.

¹³⁰ "Kilauea Recreation Camp Lures Soldier: Enlisted Men, Officers, and Families Have Access to Fine Vacation Land on Big Island," *Honolulu Star-Bulletin*, December 14, 1924.

¹³¹ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-34.

¹³² Warshauer, "History of Kilauea Military Camp," chap. 7; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-34.

¹³³ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-34.

course.¹³⁵ By the end of the decade, the camp's staff had expanded to four officers, fifty men, and the camp's hostess, who still presided over housekeeping.¹³⁶

The last major addition to KMC was the provision of an airfield. In 1924, Army officials began work on a landing strip in the area known as Spit Horst, just south of Halema'uma'u Crater. However, in May 1924, an unexpected explosive eruption broadcast large boulders over the site.¹³⁷ By early the next year, work had begun on a new landing area between Uwēkahuna and KMC.¹³⁸ Named Boles Field to honor the park's superintendent Thomas R. Boles (1881–1973), the field soon proved too short for newer military aircraft.¹³⁹ In spite of its shortcomings, however, the field would remain in mostly military use for fifteen years, primarily for recreation and to give well-connected visitors a view of the volcano.¹⁴⁰

¹³⁴ "Improvement Is Done at Kilauea Military Resort," *Hilo Daily Tribune*, December 14, 1926.

¹³⁵ "Kilauea Military Camp Has Practice Golf Course," *Hilo Tribune-Herald*, January 19, 1920; and "New Trail, Golf Course Are Added at Military Camp," *Hilo Tribune-Herald*, March 11, 1926. In 1928, camp officials expanded this to nine holes. See Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-37.

¹³⁶ "Military Camp's Permanent Force Slates Program," *Hilo Daily Tribune*, December 21, 1929.

¹³⁷ USGS, "Explosive Eruptions at Kilauea Volcano, Hawai'i," accessed October 19, 2012, <http://pubs.usgs.gov/fs/fs132-98/>.

¹³⁸ "Boles Field' Name of New Volcano Airport," *Hilo Tribune-Herald*, March 16, 1925.

¹³⁹ "Landing Field for Volcano Assured Soon," *Honolulu Advertiser*, January 6, 1925; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-38-41.



3. 12. Kilauea airfield, 1923. It was named Boles Field after the park's first superintendent.

Growth of the Park

The history of KMC closely mirrored that of the national park. At the time of its establishment, the park had few if any “improvements” under the government’s control. There were several roads, including one maintained by the Territory of Hawaii running from Hilo to Volcano Village. Another road, the Peter Lee Road, had been a private venture. As of 1921, the only permanent buildings at Kilauea were Volcano House and Jaggar’s wood-frame dwelling and laboratory, the official home of the Hawaiian Volcano Observatory.¹⁴¹ Established in 1916, the new park had in fact received little in the way of financial support over its first five years of existence. Only after 1921 did the newly dedicated Hawaii National Park begin to receive an annual budget for the maintenance of roads and trails, but nothing for new construction.¹⁴²

¹⁴⁰ Jackson, *Administrative History*, 87.

¹⁴¹ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 9.

¹⁴² Castro, “History of Hawaii National Park,” 30- 31; and Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 8. Before that, the park had received only \$750, both in 1919 and 1920, and an additional \$1,000 in 1921. See Nash Castro, “Land of Pele,” 22; Jadelyn J. Moniz Nakamura, *Gathering on the Rim: People Build a Park* (Kilauea, HI: Hawai‘i Volcanoes National Park, n.d.), 6.



3. 13. Soldiers and sailors at Kilauea Military Camp, ca. 1929.

Correspondingly, there was no real provision for managing the park. From 1916 to 1921, the park was the responsibility of B. G. Rivenburgh, the territorial land commissioner. In 1922, the government had appointed A. O. Burkland, head of the US Geological Survey for the territory, to serve as acting superintendent. A few months later, in April 1922, Thomas Boles became the first superintendent at the park.¹⁴³

The same year, Congress provided \$10,000 to pay for long-needed improvements at the park. Seemingly lavish when compared to earlier funding levels, this amount was to cover all costs of road and trail improvement, as well as administrative facilities for the park's staff. To deal with the most pressing needs, Boles began an aggressive campaign of private fundraising, much of it contributed by the auxiliary organization Hui O Pele, founded by staunch park supporter C.

C. Moore.¹⁴⁴ Funds from the organization would pay for shelters, walkways, and benches, including a shelter at the famous Thurston Lava Tube.¹⁴⁵

¹⁴³ Castro, "History of Hawaii National Park," 31; and Moniz Nakamura, *Gathering on the Rim*, 6.

¹⁴⁴ Moniz Nakamura, *Gathering on the Rim*, 6–8. The work is discussed in L. W. De Vis-Norton, "Kilauea Volcano during 1921" *Hawaiian Almanac and Annual for 1922: The Reference Book of Information and Statistics Relating to the Territory of Hawai'i, of Value to Merchants, Tourists, and Others* (Honolulu: Thos. G. Thrum, 1921), 157.



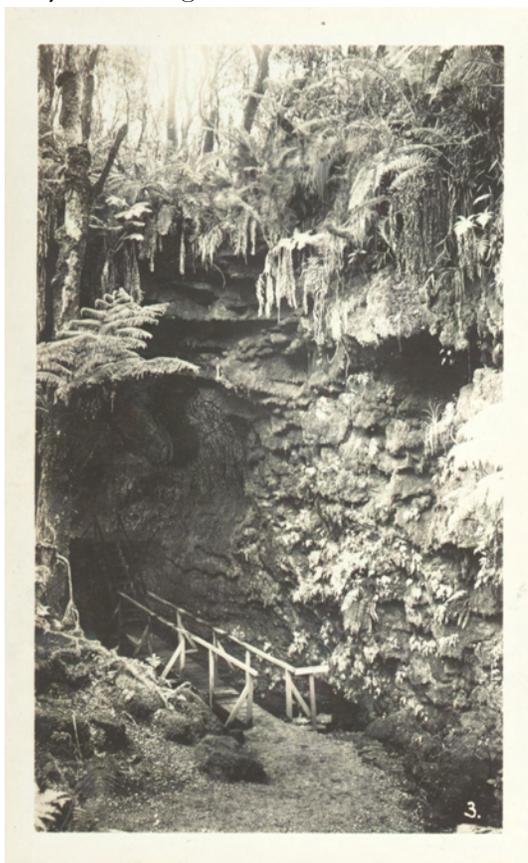
3. 14. Sailors at Halemaumau Crater overlook, ca. 1927.

While Hui O Pele helped with park facilities, Boles pressed on with the development of his much-needed administrative center. Purchasing secondhand office furniture at auction and obtaining a display case and filing cabinets, he began construction on an office building in spring 1923. Completed for only \$1,470, the new administrative building opened in July. It featured an information room and museum, an office, and a drafting room.¹⁴⁶ Needing an entrance station, Boles purchased a three-room cottage located outside the park boundaries and moved it to the park. Early in 1923, he acquired a second cottage from the site of the old Crater House near Volcano Village and moving it to a location near the new Administrative Building. While Boles remained in a guest cottage at the Volcano House, one of his rangers moved into the new house; Boles soon afterward purchased another building to serve as housing for temporary laborers.

In 1926, Boles finally obtained a superintendent's residence, near the Volcano House. Boles also found funding for another residence in the administrative area. By 1927, under the

¹⁴⁵ "Discovered" by Lorrin Thurston in 1913, it is also known by its Hawaiian name Nahuku. See "Thurston Lava Tube," Hawai'i Volcanoes National Park, accessed November 9, 2012, http://www.nps.gov/havo/planyourvisit/craterintour_tube.htm.

stewardship of Boles's successor Richard T. Evans, a separate residential area began to take shape to the southeast of the Hawaiian Volcano Observatory.¹⁴⁷ Other efforts focused on road improvements. One of Boles's main projects was further work on the Rim of Craters Road and on a road through the Fern Jungle. Trail improvements included repairs to the Kīlauea Caldera pathway, trails in the Ohia Forest and Fern Tree Forest areas, and upgrading of access to the Thurston Lava Tube and Byron's Ridge and the Kīlauea-iki Crater.¹⁴⁸



3. 15. Thurston Lava Tube, a popular natural feature of Kīlauea and a "must-see" in the park even today.

¹⁴⁶ Jackson, *Administrative History*, 105–6.

¹⁴⁷ Evans became superintendent in January 1927, after a half year in which A. O. Buckland served as acting superintendent. Boles left in July 1926. See Castro, "History of Hawaii National Park," 31–32. Also, Jackson, *Administrative History*, 109–10.

¹⁴⁸ *Circular of General Information Regarding Hawaii National Park* (Washington, DC: GPO, 1929); and Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 9; and Jackson, *Administrative History*, 115–16.

The park's Haleakalā section on Maui received far less attention. Boles made his first trip to Maui in 1924, two years after his arrival in the park. Meeting with local business leaders and residents from nearby communities, he concluded that a major infusion of capital was needed to build a road to the summit—at that time accessible only on horseback.¹⁴⁹ In 1925, the survey for the Haleakalā Road was complete. With help from the Maui Chamber of Commerce, the NPS also added an extension to “Kalahaku,” a rest house at the summit, expanding its occupancy to sixty visitors (each assigned a single bunk). Haleakalā's development would wait until 1935 and the completion of the highway to the top.¹⁵⁰



3. 16. Haleakalā, the park's second section.

One of the main challenges facing Superintendent Boles and his successors was day-to-day interaction with personnel at KMC. Many infractions were noted in the superintendents' records. In 1924, soldiers from KMC broke into a garage leased by the Mana Transportation Company and absconded with illegally produced spirits. A few days later, several soldiers caused an uproar at the Volcano House servants' quarters, stealing a clothesline when the hotel's manager asked them to leave. There was also the matter of a brush fire, again, apparently, caused by careless soldiers, and at least five cases of men reported drunk while driving.

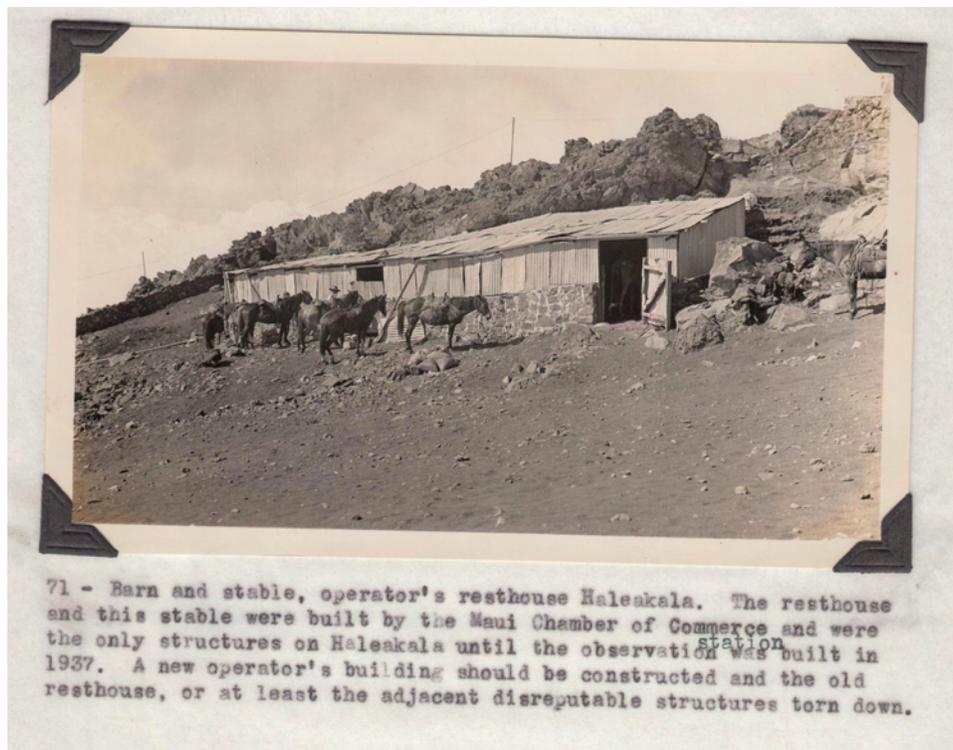
¹⁴⁹ Dawn E. Duensing, “Haleakala Highway,” *Historic American Engineering Record*, HAER No. HI-52 (Haleakala, Maui: Haleakala National Park, 1999), 24.

¹⁵⁰ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 9.

Superintendent Boles was especially vexed by drivers of military vehicles refusing to yield to tourists on the park's roads. There were also incidents of men shooting at signs and using boulders to spell out their names and those of their units.¹⁵¹

None of this behavior was truly malicious. With average daily residency hovering around three hundred men and officers, it was hardly surprising that a few men would get out of line. Drinking was a common pastime for soldiers, even if camp rules officially prohibited it. Rarely on leave, American military personnel of the period could be a rough lot, familiar with seedy parts of towns and back alleys of port cities, and quick to scrap. Thrown into a natural setting such as Kīlauea, many were bored with access to few sources of entertainment. Conflicts between park officials and troops would be a predictable outcome of the military's presence in the park.

By the early 1930s, the Hawaii National Park had become a significant presence in the Hawaiian Islands—one of the nation's first national parks and a site of important interest to scientists, travelers, and local residents. The presence of the KMC added an unusual wrinkle to the park's management. Although other parks had depended upon military support in their early years, Hawaii National Park was unique in its standing relationship with the military. For the park and park supporters, the military provided an important source of visitors. With O'ahu's standing military population hovering at between 12,000 and 15,000 troops, all of them were eager to make the trip to the cool sanctuary of Kīlauea for a week or two each year.

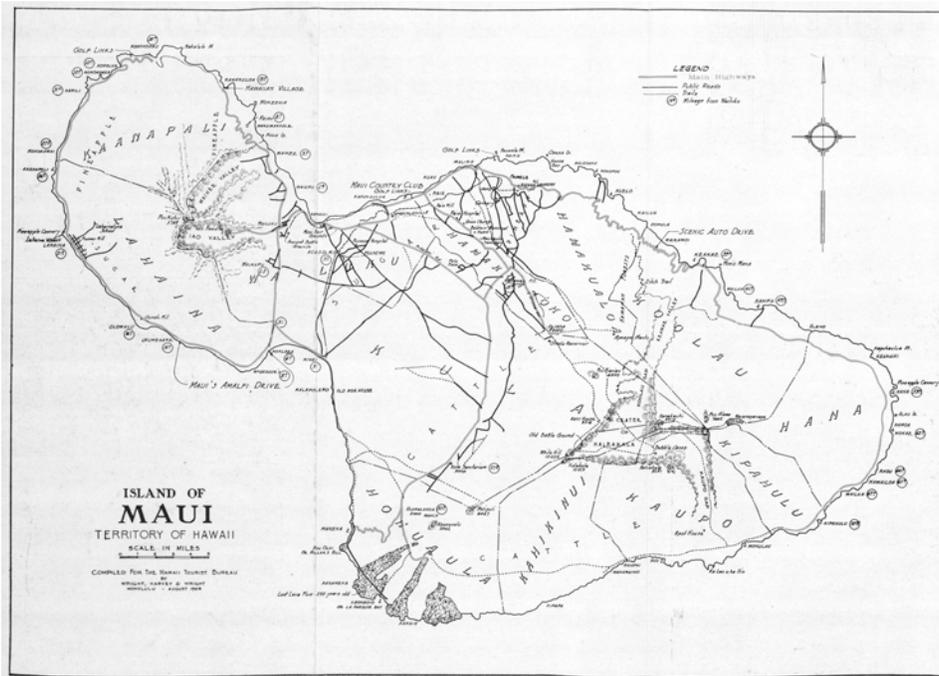


3. 17. Rest house (rest station) on Haleakalā. Until completion of a road in the mid-1930s, Haleakalā was not easily accessible. Visitor numbers rarely exceeded a few hundred monthly.

From the Army's point of view, the park at Kīlauea provided respite from the heat and accompanying enervation of posting in a tropical climate—the equivalent of Baguio in the Philippines or any number of hill stations created by other Western powers throughout India, Africa, and Asia. That the park possessed special qualities in need of protection—not only the active volcanoes but also rare species of plants and animals—was yet a remote concept. For soldiers and their officers, Kīlauea was at most an unusual and dry landscape affording cool nights and a change from daily drill.

¹⁵¹ Jackson, *Administrative History*, 60–63; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-37.

The close relationship between the park and the Army, nonetheless, would lead in time to instances of disagreement and even acrimony. The Army came to view Kīlauea as its own reserve. It also saw the parklands as open to military uses in time of need. This expectation would become even more apparent as the 1930s progressed and war loomed on the horizon.



3. 18. Hawaii tourist Bureau, Map of Maui, Territory of Hawaii, Wright, Harvey and Wright, 1928. The park is located at the upper reaches of the 10,000-foot-high dormant volcano.

CHAPTER 4: BUILDUP TO THE WAR

Hawai'i in the 1920s and 1930s

Hawai'i in the 1920s and 1930s was a very different place from the Hawai'i of the late nineteenth and first two decades of the twentieth centuries. With a total population of 89,990 during the last years of the Kingdom of Hawaii, the population jumped in the early territorial period to 154,001. By 1910, the figure had grown to 191,874; in 1920, 255,851; and in 1930, 368,300. Expanded by increasing numbers of imported laborers and their families—first Japanese, then Korean, and after 1925, with the Asian Exclusion Act, Filipino—Hawai'i's population by the end of the next decade had reached 422,770, nearly five times its size fifty years before.¹ Of these, 103,791 were Caucasian; 157,905 Japanese; 28,774 Chinese; and 14,375 ethnic Hawaiian.²

In the early twentieth century, the great drivers of Hawai'i's economy were sugar and pineapple, with commercial rice production ranking third among exports. As of 1934, 130,000 acres were in sugar, producing a yield of over 900,000 raw tons.³ Pineapple, Hawai'i's second agricultural export, dominated the agricultural plains of O'ahu and Maui. Introduced by James Dole (1877–1958), a cousin of Sanford Dole, pineapple turned out to be the ideal crop for Hawai'i's somewhat arid, tropical environment.⁴ In 1922, Dole purchased the island of Lanai,

¹ "Population and Visitor Statistics, Kingdom of Hawaii, Republic of Hawaii, Territory and State of Hawaii," *Hawaiian Encyclopedia*, [2010], accessed October 24, 2012, <http://www.hawaiianencyclopedia.com/population-and-visitor-statist.asp>; Negative Population Growth, State Population Facts, NPG, October 3, 2011, accessed October 24, 2012, <http://www.npg.org/states/hi.htm>. In 1900, the white (Caucasian) population—including Portuguese and Puerto Ricans—stood at 28,819; Japanese at 61,111; Chinese at 25,767; and Hawaiians at 37,656. By this point, those claiming mixed parentage had grown as well, with those claiming mixed Hawaiian background numbering 73,885.

² US Department of Commerce, US Census Bureau, "Data," December 7, 2012, accessed December 12, 2012, <http://www.census.gov>.

³ Hawaiian Sugar Planters' Association, *Sugar in Hawaii* (Honolulu: Hawaiian Sugar Planters' Association, 1949); and US Department of Agriculture, Crop Production Reports, 1934–2000, accessed October 23, 28, 2012, January 12, 2013, <http://www.google.com/search?client=safari&rls=en&q=Sugarcane+Harvested+United+States+Department+of+Agriculture,+National+Agricultural+Statistics+Service&ie=UTF-8&oe=UTF-8>; and Daws, *Shoal of Time*, 190, 208.

⁴ Hawaii Department of Agriculture, "History of Agriculture in Hawaii," December 28, 1999, accessed October 12, 2012, <http://hawaii.gov/hdoa/ag-resources/history>; Melissa C. Miller and Linda K. Menton, eds., *Pineapple in*

creating a single pineapple plantation of over 200,000 acres.⁵



4. 1. Honolulu and Honolulu Harbor, 1928.

Control of Hawai‘i’s plantation economy was in the hands of a few major companies known as the “Big Five”: Castle & Cooke, Alexander & Baldwin, C. Brewer & Co., American Factors, and Theo H. Davies & Co.⁶ While plantation workers periodically fought for better wages and conditions—both Japanese and Filipino workers staged strikes between 1909 and 1922—the reigning oligarchy maintained a tight grip on the islands. The Republic Party, of which most of the elite were members, controlled the territory’s politics as well.⁷

Another important factor in pre–World War II Hawai‘i was the growth of tourism, fueled

Hawaii: A Guide to Historical Resources (Honolulu: State Foundation on Culture and the Arts and Hawaiian Historical Society, 1990); and Day, *Hawai‘i and Its People*, 242–44.

⁵ “Lanai History—Glimpses into an Island History,” Lanai Cultural and Heritage Center, January 10, 2013, accessed January 14, 2013, http://www.lanaichc.org/lanai-glimpses/Lanai_Glimpses.html.

⁶ Daws, *Shoal of Time*, 312–14; and “The Big Five,” Hawaiian History.org, Graflk, 2013, accessed January 13, 2013, <http://www.hawaiihistory.org/index.cfm?fuseaction=ig.page&PageID=29>.

⁷ Charlotte Curtis and Carl T. Gossett, Jr., “Where Aristocrats Do the Hula and Vote Republican; Land and Commerce Screens from Japan New England Heritage Attended Punahou Cousins Society Plumeria and Orchids,”

in large part by the expansion of steamship traffic.⁸ The opening of the Royal Hawaiian Hotel in 1927 gave new impetus to the industry, as did the newly established Hawaii National Park.⁹ Visiting celebrities such as Shirley Temple, Bing Crosby, and Charlie Chaplin added luster to Hawai'i's image as a travel destination.¹⁰ To serve this growing clientele, Inter-Island Airway, a subsidiary of the Inter-Island Steam Navigation Company, began service to the "outer islands" in 1929.¹¹

While many of the ruling elite preferred a continuation of the existing territorial status, others, including Hawai'i's delegate to Congress, Prince Kūhiō, advanced the idea of statehood.¹² Although congressional efforts in this direction made little headway, Hawai'i benefited economically from New Deal initiatives, including funds for roads and bridges, as well as for military construction.¹³ The territorial government oversaw advances in education, including new schools and federal support for Hawai'i's fledgling university.

New York Times, November 27, 1966, accessed January 13, 2013,

<http://select.nytimes.com/gst/abstract.html?res=F10710FE3D59157A8EDDAE0A94D9415B868AF1D3>.

⁸ Sumner La Croix, "Economic History of Hawaii," February 1, 2010, EHNNet, Economic History Association of Hawaii, accessed October 13, 2013, <http://eh.net/encyclopedia/article/lacroix.hawaii.history>.

⁹ Don Hibbard, *Designing Paradise: The Allure of the Hawaiian Resort* (Princeton, NJ: Princeton Architectural Press, 2006).

¹⁰ Hibbard and Franzen, *View from Diamond Head*; and Stan Cohen, *The Pink Palace: The Royal Hawaiian Hotel, A Sheraton Hotel in Hawaii* (Missoula, MT: Pictorial Histories Publishing Co., 1986).

¹¹ Erika Engle, "The Buzz: Hawaiian Air's First Plane in 1929 Is Returning Home," *Honolulu Star-Bulletin*, July 14, 2009; and Barnaby Conrad, *Pan Am: An Aviation Legend* (Manchester: Woodford Press, 1999).

¹² Michael Tsai, "Prince Jonah Kūhiō Kalaniana'ole," *Honolulu Advertiser*, July 2, 2006, accessed October 12, 2012, <http://the.honoluluadvertiser.com/150/sesq2kalanianaole>; "Kalaniana'ole, Jonah Kuhio (1871–1922),"

Biographical Directory of the United States Congress, 1774–Present, accessed October 12, 2012,

<http://bioguide.congress.gov/scripts/biodisplay.pl?index=K000004>; Leonard Schlup, "Prince Cupid: Jonah Kuhio Kalaniana'ole and the Quest for Hawaiian Progressivism," *International Review of History and Political Science* 19 (1982):

54–58; and Lori Kuulei Kamae, *The Empty Throne: A Biography of Hawaii's Prince Cupid* (Honolulu: Topgallant Publishing Company, 1980).

¹³ Donald S. Howard, *The WPA and Federal Relief Policy* (New York: Da Capo Press, 1943); Jason Scott Smith, *Building New Deal Liberalism: The Political Economy of Public Works, 1933–1956* (Cambridge: Cambridge University Press, 2005); Nancy Rose, *Put to Work: The WPA and Public Employment in the Great Depression*, 2nd ed. (New York: Monthly Review Press, 2009); and Nick Taylor, *American-Made: The Enduring Legacy of the WPA, When FDR Put the Nation to Work* (New York: Bantam, 2008).

Hawai‘i’s society remained, nonetheless, highly stratified. As of 1933, the Big Five produced 96 percent of the islands’ sugar.¹⁴ Dependent on immigrant labor, Hawai‘i’s elite delegated workers to company towns, where they resided in ethnically separated “camps.”¹⁵ Some immigrants managed to break free of the system, establishing their own businesses or farms.¹⁶ Others found employment on the military bases or in Pearl Harbor Shipyard, where wages were higher than in agriculture.



4. 2. Panorama of south shore of O'ahu, 1928.

¹⁴ La Croix, “Economic History of Hawaii.”

¹⁵ William Dorrance and Francis S. Morgan, *Sugar Islands; The 165-Year History of Sugar in Hawaii* (Honolulu: Mutual Publishing, 2001); Ronald Takaki, *Pau Hana: Plantation Life and Labor in Hawaii, 1835–1920*, Honolulu: University of Hawaii Press, 1983), and Ronald Takaki, *Raising Cane: The World of Plantation Hawaii* (New York, New York: Chelsea House Publishers, 1994).

¹⁶ William Chapman, “Coffee Farms on the Kona Coast,” *Preserving Hawai‘i’s Traditional Landscapes*, ed. William Chapman and Christine Kirk-Kuwaye (Honolulu: Historic Preservation Program, University of Hawai‘i and the National Park Service, US Department of the Interior, 1998), 105–12, William Chapman, *Coffee in Hawai‘i: An Overview* (Honolulu: For the Kona Historical Society, 1995); Dorothy Riconda, “Chinatown Historic District,” National Register of Historic Places Nomination Form, May 2, 1972; and Michael M. Okihiro, *A‘ala; The Story of a Japanese Community in Hawaii* (Honolulu: Japanese Cultural Center, 2003).

Clear class divisions persisted, however. Whereas elites had automobiles, Hawai‘i’s plantation workers relied on trains and communal taxis.¹⁷ New suburbs arose to serve growing management and professional classes—many of them recruits from the US mainland.¹⁸ As with plantations, neighborhoods reflected ethnic differences, with areas such as Lanikai and Mānoa discouraging entry to nonwhite buyers.¹⁹ Hawai‘i’s public school system similarly separated white and nonwhite children, leaving the education of more talented immigrant and Hawaiian children to a few parochial and private schools.²⁰



4. 3. Pineapple workers, ca. 1920.

¹⁷ Hawaii Automobile Dealers Association (HADA), “HADA History,” accessed January 12, 2013, <http://www.hawaiiautodealer.com/about/historyfr.html>.

¹⁸ Edward B. Scott, *The Saga of the Sandwich Islands* (Lake Tahoe, NV: Sierra-Tahoe Publishing Co., 1968); and MacKinnon Simpson and John Brizdle, *Streetcar Days in Honolulu: Breezing through Paradise* (Honolulu: JLB Press, 2000).

¹⁹ Gary George Aguiar, “Class and Ethnicity: The Case of Hawaii, 1930–1964” (PhD diss., Indiana University, 1966); and Ronald Takaki, *A Different Mirror: A History of Multicultural America* (Boston: Little Brown, 1993). On race generally, see Day, *Hawai‘i and Its People*, 232–36.

²⁰ Celeste Cheeseman, “History of Education and Schools in Hawaii,” Active Rain, Active Rain Corporation, 2013, accessed January 14, 2013, <http://activerain.com/blogsvievw/120259/the-history-of-education-and-schools-in-hawaii>; James R. Hunt, *Hawaii Department of Education: Historical Development and Outlook* (Washington, DC: National Education Association, 1969); Mary C. Alexander, C. P. Dodge, and William R. Castle, *Punahou, 1841–1941*, (Berkeley: University California Press, 1941); and Daniel J. Dever, “Catholic Schools of Hawaii,” *Educational Perspectives* 20, no. 4 (Winter 1981): 31–35.

Opposed by owners and management and carefully monitored by the US military, Hawai'i's labor movement made important inroads during this period. Successful strikes by government workers, dockworkers, and newspaper printers led to a major sugar worker strike in Pu'unene, Maui, in 1937 and the following year in Hilo.²¹ Improvements in plantation housing matched gains in wages, both ultimately the result of growing sugar and pineapple profits. Planation communities came increasingly to resemble army camps, with standardized housing, recreational facilities, schools, clubhouses, and churches and temples.²² Honolulu and other urban areas gained as well from the economic expansion, witnessing the growth of new inner-city residential areas for Hawai'i's working-class residents.²³

Native Hawaiians during this period had become a mere cipher in the equation of Hawai'i's new economy. Marginalized, denied their language, and pressed into the least desirable lands, Native Hawaiians became a kind of symbol of a former time.²⁴ Often romanticized, Native Hawaiian culture became a powerful vehicle for the growing tourism industry, helping engender a romantic illusion of a tropical paradise.²⁵

²¹ Gerald Horne, *Fighting in Paradise: Labor Unions, Racism, and Communists in the Making of Hawai'i* (Honolulu: University of Hawai'i Press, 2011); "Immigrant Laborers," *Hawaiian Encyclopedia* online, accessed January 23, 2013, <http://www.hawaiianencyclopedia.com/1900--1950.asp>; Day, *Hawai'i and Its People*, 279–80; and Daws, *Shoal of Time*, 359–60.

²² See, for example, Marie D. Strazer, *Ewa in History: A Guide to the Resources* (Honolulu: History and Humanities Program of the Hawai'i State Foundation on Culture and the Arts, 2000).

²³ Jill Byus Radke, "Kaimuki: A Brief History," Historic Hawai'i Foundation, online newsletter, accessed January 12, 2013, http://www.historichawaii.org/Historic_Sites/Oahu/O-Kaimuki.html.

²⁴ Mary Kawena Pukui and Samuel H. Elbert, *Hawaiian Dictionary* (Honolulu: University of Hawaii Press, 1986); and Paul F. Nahoia Lucas, "E Ola Mau Kakou I Ka 'Olelo Makuahine: Hawaiian Language Policy and the Courts," *Hawaiian Journal of History* 34 (2000): 1–28. A move by the federal government in 1921 to provide homestead lands for those of Hawaiian descent proved largely ineffective; most of the lands were unsuited for agriculture and Hawaiian claimants had to prove a 50 percent "blood quantum," a requirement that many could then not meet. See Hawaii Advisory Committee, United States Commission on Civil Rights, *A Broken Trust: The Hawaiian Homelands Program: Seventy Years of Failure of the Federal and State Governments to Protect the Civil Rights of the Hawaiian People* (Ann Arbor: University of Michigan Press, 1991).

²⁵ Alana Egan, "Grass Skirts and Coconut Bras," New Moon Publishing, 2005, accessed January 13, 2013, <http://www.amazon.com/Grass-skirts-coconut-bras-dancing/dp/B000825UL4>. Compare with Stephanie Nohelani



4. 4. Waikiki Beach in the early 1930s, only a few years after completion of the Royal Hawaiian Hotel.

The Military Presence

The period between 1920 and 1935 was one of relative stasis for Hawai‘i-based US troops and naval personnel. Under the plan of Chief of Staff General Peyton C. March (1864–1955), Hawai‘i’s garrison would have increased to 22,000. However, under President Warren G. Harding, this number reduced to around 14,000. In 1921, the Hawaiian Department had 15,368 men; in 1924, the number had dropped to 13,096. Only in 1936 was this figure to change, first to 19,000 troops then to 21,500 in the following year, directly in response to looming Japanese threats to the United States in Asia.²⁶

Frustrated in 1920 when Congress cut a proposed road-building project from \$600,000 to \$70,000, Hawai‘i’s commander, General Charles G. Morton (1861–1933) had to content himself with continuing upkeep of existing roads and bridges and incremental improvements at O‘ahu’s existing bases. His successor, General Charles P. Summerall (1867–1955), proposed an integrated island-defense approach to include naval, mobile forces, coast artillery, and further air

Treves, “We’re All Hawaiians Now: Kanaka Maoli Performance and the Politics of Aloha” (PhD diss., University of Michigan, 2012).

²⁶ Linn, *Guardians of Empire*, 146.

support. His proposed budget of \$9 million included substantial expenditures for roads, searchlights, bridges, new guns, and additional ordnance and signal equipment, as well as large increases to air defenses.²⁷

A priority of the Hawaiian Department throughout the 1920s and early 1930s was the improvement of existing bases. Schofield Barracks was the focus of repairs to the officers' club, work on the new "Boxing Bowl"—illegal in the territory at the time—and additions to the motor repair shop and artillery motor school building. By the mid-1920s, there was also a new golf clubhouse, another officers' block, a new barracks for enlisted men, and a new noncommissioned officer (NCO) housing area, as well as additional warehouses and a fire station and ice plant.²⁸

The late 1920s witnessed additional improvements: a new school in 1926, improvements to roads in 1927, a new gym, and improvements to the base hospital in 1928. Typically utilitarian in character, Schofield's buildings took a new turn in 1932 with the completion of three gateways designed in the Art Deco style, along with a roof for the boxing bowl, 4 new barracks, 52 new officers' quarters, 42 sets of NCO quarters, a bachelor quarters also for NCOs, and a new officer and NCO medical unit.²⁹ The base theater, a bowling alley, new boiler houses, additions to the base infirmary, and a new beer garden followed soon after.³⁰

Similar steps occurred at other bases. Fort Weaver, established in 1922 to fortify O'ahu's western defenses, obtained several new batteries. Wheeler Field, designated in 1922 adjacent to Schofield Barracks, received new equipment and hangers.³¹ There were new bathhouses for officers at Fort DeRussy to go along with a new "bathing tank."³² Fort Shafter, headquarters of the Hawaiian Department after 1921, also underwent a new construction campaign beginning in 1928, with the completion of the Shafter Bowl, a new golf course and club building, and

²⁷ "Basic Project for the Defense of Oahu," 1924, Record Group 395, National Archives and Records Group, College Park, MD (hereafter NARA College Park), cited in Linn, *Guardians of Empire*, 196.

²⁸ Addleman, *History of the United States Army*, 38, 41, 43; and Alvarez, *History of Schofield Barracks*, 54–56.

²⁹ Addleman, *History of the United States Army*, 52.

³⁰ Cited in Alvarez, *History of Schofield Barracks*, 51

³¹ Addleman, *History of the United States Army*, 34–35.

³² Addleman, *History of the United States Army*, 37.

expansion of housing off the base's Palm Circle.³³



4. 5. Schofield Barracks, 1929.

Other improvements occurred in the 1930s. In 1932, Wheeler Field gained a new barracks and officers' quarters, a freshly paved airfield, fire station, guardhouse, warehouses, new hangars, and a new administration building at a cost of \$2,367,579.³⁴ The Hawaiian Department also completed five new airstrips throughout O'ahu and, in 1935, purchased land adjacent to Fort Kamehameha for its new airfield, to be known as Hickam Field after an officer killed in a training accident the previous year.³⁵

Despite the many improvements, it was apparent to many that the Army had little changed from its pre-World War I character. Much of the troops' equipment was outmoded and training consisted often of parade drill only. The territorial government discouraged the exercise

³³ M. J. Tomonari-Tuggle, S. Hamilton, and K. Slocumb, *Integrated Cultural Resources Management Plan for Fort Shafter Military Reservation*. Honolulu: International Archaeological Research Institute, Inc. for the US Army Corps of Engineers, Pacific Ocean Division, 2000. citing Meeken, *History of Fort Shafter*, 43.

³⁴ Addleman, *History of the United States Army*, 52.

³⁵ Addleman, *History of the United States Army*, 55.

of coastal guns as annoying to tourists.³⁶ Rather than military training, the troops spent much of their time on various details, often those involving construction. In 1924, fully one-fourth of the men were on detail, in the base hospitals, or in jail. In 1931, 15 percent of the enlisted men's time was devoted to construction and grounds keeping.³⁷

The Army, recognizing the problem of troop morale, moved to improve conditions through an increasing number of organized activities, including baseball, football, and basketball, and the creation of a new boxing program. A vaudeville society and polo team also provided recreational outlets.³⁸ In 1924, the Army developed a new recreation area at Haleiwa Beach, and military personnel had the annual opportunity to visit the big island of Hawai'i for a two-week's stay at the Kilauea Military Camp.



4. 6. Wheeler Field under construction, 1930.

Although life for both soldiers and dependent families gradually improved in the interwar years, the Army was mired in the past. Hawai'i's defensive strategy still relied on fixed positions

³⁶ Linn, *Guardians of Empire*, 200.

and heavy guns, notably the powerful, 16-inch rifled guns first introduced in 1919. Installed at Fort Weaver and Fort Kamehameha in the 1920s—and in 1935 at the newly created Fort Barrette in the highlands of Kapolei west of Pearl Harbor—these guns were considered a match for naval guns offshore.³⁹ Although military planners shifted some fixed-battery crews to mobile anti-aircraft units and augmented existing rail-mounted units, the threat of air attack remained inadequately addressed, as events later proved.

Overall, O‘ahu’s defensive strategy depended on fixed positions with mobile support heavily supplemented by chemical weapons, including enormous quantities of chlorine, phosgene, chloropicrin, and mustard gas. By the mid-1930s, the island held “the largest known concentrated reserve of lethal gas in the world.”⁴⁰ In 1935, to increase Hawai‘i’s capacity for defense, the Army authorized a chemical plant for O‘ahu to produce an additional 200 tons of mustard gas considered necessary to protect one of the key US military sites.⁴¹

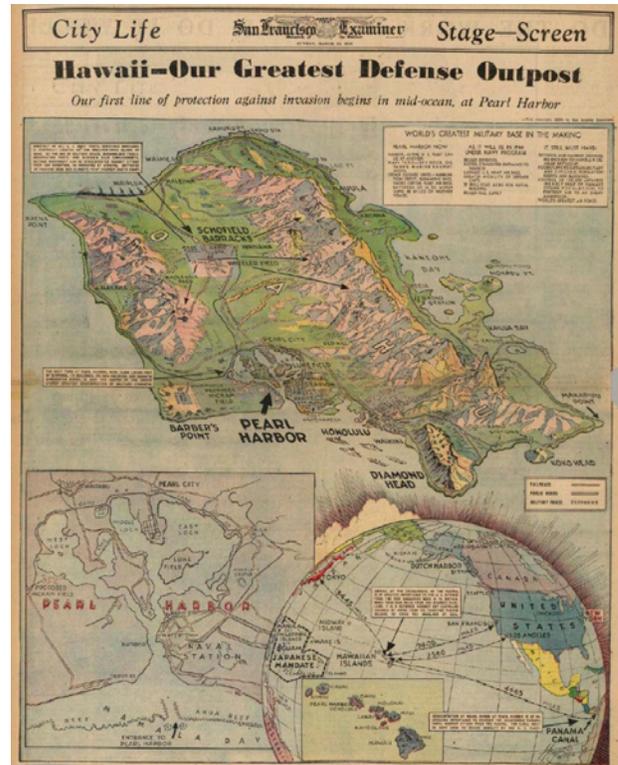
³⁷ Linn, *Guardians of Empire*, 201.

³⁸ Alvarez, *History of Schofield Barracks*, 54–56.

³⁹ Alvarez, *History of Schofield Barracks*, 52; and Linn, *Guardians of Empire*, 197.

⁴⁰ Cited in Linn, *Guardians of Empire*, 198. See Ian Speller and Christopher Tuck, *Amphibious Warfare*, Strategy and Tactics Series (London: Spellmount, 2001); Frank O. Hough, Verle E. Ludwig, and Henry I. Shaw, *Pearl Harbor to Guadalcanal: History of U.S. Marine Corps Operations in World War II*, Vol. 1 (Washington, DC: Historical Branch, G-3 Division, Headquarters, US Marine Corps, 1958), chap. 2, 14.

⁴¹ Linn, *Guardians of Empire*, 198.



4. 7. Hawaii's defenses, *San Francisco Examiner*, March 18, 1938.

Expansion of Pearl Harbor

For Pearl Harbor, the period between 1908 and 1919 had been one of continuous expansion and improvement, notwithstanding the difficulty with the dry dock in 1913.⁴² The purchase of Ford Island and development of Luke Field—a joint US Army and Navy venture—were among the most significant development of the immediate postwar period. However, by the mid-1920s, funding for the Naval Air Station had been cut and its operations reduced to a few training flights

⁴² "Development of the Naval Establishment in Hawaii," *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, 5–6, accessed January 12, 2013, <http://www.history.navy.mil/docs/wwii/pearl/hawaii.htm>.

each year.⁴³ Most of the appropriations of the 1920s went toward deepening the channel into Pearl Harbor and gradual improvements to the existing facilities.⁴⁴ By 1934, \$40 million had been spent in the development of Pearl Harbor; by 1936, the channel could handle even the largest of US vessels.⁴⁵

Although the Navy had operated a few submarines from Pearl Harbor as early as 1912, the first modern vessels arrived in 1919. Under Commander Chester W. Nimitz (1885–1966), the submarine base occupied a few naval buildings at the edge of the harbor until the completion of its own facilities in 1923. In the 1930s, the Navy expanded the facility, adding torpedo shops, housing for sailors, officers' quarters, a theater, and a headquarters building. A report in 1935 noted that “with the planting of coconut trees, palms and other shrubberies, the Submarine Base became not only a place military in nature, but also pleasant in appearance.”⁴⁶

In 1928, the Navy had divided the Navy Shipyard from the Naval Command. Overall, the Pearl Harbor facility included the District Headquarters, Navy Shipyard, Supply Department, Submarine Base, Naval Air Station, Ammunition Depot, Naval Hospital, Marine Barracks, Radio Station, and Receiving Barracks. Permanent staff had increased during this period from 586 enlisted men in 1925 to 703 in 1930 and to 1,049 in 1936.⁴⁷ The Navy Yard experienced a similar level of growth.⁴⁸ Many local residents gained work through the shipyard,

⁴³ US Navy, *History of the Naval Air Station, Pearl Harbor, Territory of Hawaii* (San Francisco: US Fleet Post Office, US Naval Air Station, San Francisco, 1945), 6–9.

⁴⁴ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6–10.

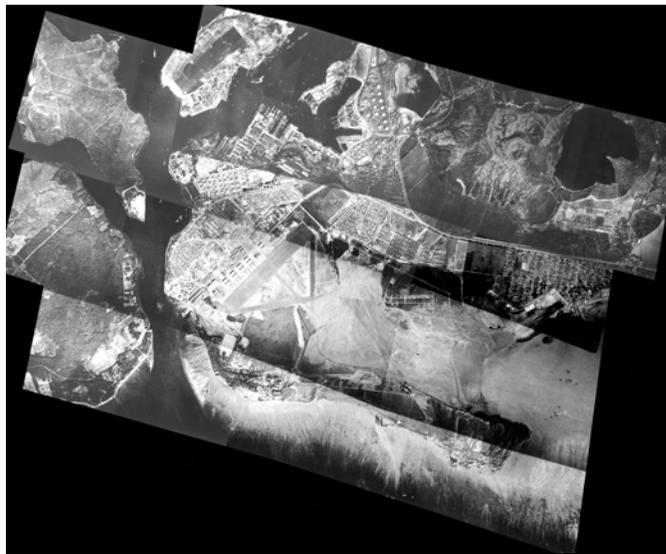
⁴⁵ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

⁴⁶ “Pearl Harbor Submarine Base, 1918–1945,” Naval History and Heritage Command, Historical Section, Submarine Commands, *Submarine Commands*, Vol. 2 (1946): 602–12. This manuscript is identified as *United States Naval Administrative History of World War II #170-B*, accessed October 23, 2013, <http://www.history.navy.mil/faqs/faq66-5a.htm>.

⁴⁷ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

⁴⁸ Gary Fry, “Pearl Harbor Naval Shipyard: The Interwar Years 1919–1941,” in *Pearl Harbor Naval Shipyard: A Centennial of Strength, Spirit, and Technology*, ed. Justin W. Vance (Honolulu: Military Campus Programs, Hawaii Pacific University and Honolulu Council of the Naval League, 2008), accessed October 12, 2012,

making the facility an integral part of Hawai'i's social and economic fabric. Typical employment was about 1,000 men during the late 1920s and early 1930s; recruitment during the war would eventually top 4,300, with both men and women employed.⁴⁹



4. 8. Pearl Harbor, composite map, 1941.

In 1922, the Pacific Fleet became the Battle Fleet with the earlier Atlantic Fleet becoming the “Scouting Fleet.” The 14th Naval District had jurisdiction over the Navy Shipyard and the naval base; the submarine force remained a separate entity, outside the district commandant’s direct control. In 1930, the Battle Fleet and Scouting Fleet were renamed the Battle Force and the Scouting Force. The district commandant’s responsibilities included coordination with federal and territorial authorities and representatives of other service divisions. Only in time of emergency was he to take command of “Fleet units based or present within or in the vicinity of the district under his command”⁵⁰—a source of continuing frustration for the succession of naval

<http://www.navsea.navy.mil/shipyards/pearl/media/SYCentenniaHPUBook.pdf>.

⁴⁹ Fry, “Pearl Harbor Naval Shipyard, the Inter-War Years, 1919–1941,” 15–19.

⁵⁰ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

commandants.

The 14th District also conducted annual fleet exercises, known as Fleet Problems, at or near the Hawaiian Islands. The Navy held Fleet Problem VIII near Hawai‘i, pitting a cruiser force from Pearl Harbor against a fleet from San Diego. Fleet Problem XII, held in 1931, also took place in Hawaiian waters, as did Fleet Problems XV and XVI, held in 1934 and 1935. The 1935, Fleet Problem XVI, conducted between Hawai‘i and Midway Atoll, simulated an offense against Manila and Ryukyu Islands—a fact not lost on Japanese observers.⁵¹ Occurring off Alaska and Hawai‘i in 1937, Fleet Problem XVIII prominently featured amphibious landing exercises.

Relations with Civilians

Soldiers and sailors were the mainstay for many shops and small businesses, providing support for local families. The military was also a boon to local entrepreneurs and Hawai‘i’s larger and well-established companies, funneling money into construction projects and employing local residents at the Navy Yard and other operations.⁵² However, the sheer number of young sailors and soldiers created tensions between the military and civilian populations. On fleet days, sailors lined the streets, some to see movies, others to drink and carouse. Shore patrols and military police regularly collected drunk and disorderly men—a privilege granted by the city in 1925—taking them to military brigs and stockades.⁵³ Although enlisted personnel and local residents typically frequented different venues, occasional fights and other disagreements arose among them. So too did friendships among soldiers and sailors and Hawai‘i residents, with some

⁵¹ John Jason Stephen, *Hawaii under the Rising Sun: Japan’s Plans for Conquest after Pearl Harbor* (Honolulu: University of Hawaii Press, 1987), 75.

⁵² *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

⁵³ Linn, *Guardians of Empire*, 135.

resulting in marriages. Honolulu's upper classes invited Army and Navy officers to their homes and interacted at officers' clubs. Both civilians and the military enjoyed polo matches—George Patton, for example, kept a team of polo ponies when serving in Hawai'i as an intelligence officer (G-2) with the Hawaiian Department in 1935⁵⁴—bridge and tennis tournaments, and croquet and lawn parties.

Race was a singular component of military-civilian relations and an important factor within the military as well. The officer class in the army was still disproportionately Southern and Southern attitudes and mannerisms predominated within the military culture. Prejudices against people of color extended to the civilian population in Hawai'i, including the many Asian immigrants as well as indigenous Hawaiians. African Americans, who had played an important role in the military since the late nineteenth century, experienced a new level of prejudice. Black sailors, prohibited from enlistment from 1919 until 1932, served entirely in subordinate positions as cooks and waiters throughout the services.⁵⁵

Unfavorable attitudes toward nonwhites lay behind the Hawaiian Department's failure to develop a meaningful reserve force. At the end of World War I, the Hawaii National Guard consisted of about 1,000 men. Roughly representative of the islands' diversity, the force included Hawaiian, Filipinos, Japanese, Korean, and Japanese soldiers, with a preponderance of white officers. Reorganized in 1923 as the 299th and 298th Infantry Regiments, the military judged the home units to be "an excellent force," though its small size limited its potential as a defensive body.⁵⁶

Due to the prejudices of the Hawaiian Department's leadership, the corresponding Organized Reserve, part of the military's national Four Army initiative, never grew larger than

⁵⁴ "Biographical Notes: General George Smith Patton, Jr.," *Wandering Lizard History*, accessed December 12, 2012, <http://www.inn-california.com/Articles/biographic/patton2.html>.

⁵⁵ Rudi Williams, "African Americans in the Navy," *News, American Forces Press Services*, US Department of the Defense, February 1, 2001, accessed January 12, 2012, <http://www.defense.gov/News/NewsArticle.aspx?ID=45742>.

⁵⁶ Linn, *Guardians of Empire*, 149.

1,500, a size it achieved in 1924. By the mid-1930s, this number fell to 532 reserve officers and the enlisted body was eliminated altogether. The officers largely were young men recruited through Reserve Officers' Training Corps (ROTC) programs established in Hawai'i's secondary schools during this period. Despite General Summerall's reservations, many were in fact of Japanese background. To bolster local capabilities, Summerall's successor, General Hugh H. Drum (1879–1951), established a Service Command, essentially a civil defense force. Composed for the most part of plantation managers, business leaders, and local *haole* professionals and technocrats, this force failed to meet the War Department's standards and disbanded in 1937.⁵⁷ As a further indication of distrust, Colonel (and later General) George Patton (1885–1945), as head of intelligence for the Hawaiian Department in 1935, drew up his famous "Plan for the Initial Seizure of Orange [Japanese] Nationals," which became a blueprint for US authorities after the Pearl Harbor attack in 1941.⁵⁸

Hawai'i's sometimes strained ethnic relations gained national attention in 1931 and 1932 as a result of the infamous Massie Affair. The outcome of an alleged attack on a Navy officer's wife by four local youths, and the subsequent kidnapping and murder of one of the accused by the victim's mother and several Navy personnel, the events attracted the attention of mainland newspaper and radio correspondents who reported daily on the two trials.⁵⁹ Throughout the

⁵⁷ Linn, *Guardians of Empire*, 154. General Summerall and his successors with the Hawaiian Department had little faith in the idea of a citizen army in the territory. Characterizing the Chinese as "cautious and secretive," the Koreans as "easily excited," the native Hawaiians as simply "lighthearted," and Filipinos as prone to anti-Americanism, he found Hawai'i's labor pool "of low quality," and lacking in "homogeneity, community interests, and unity of purpose." Only the Japanese and local *haole* population had potential, in Summerall's estimation, as soldiers; the Japanese, however, were insufficiently loyal—he thought—to American ideals. See Linn, *Guardians of Empire*, 152.

⁵⁸ Linn, *Guardians of Empire*, 162; citing [George S. Patton], "Plan for the Initial Seizure of Orange Nationals, [1935]," Box 3, Hawaiian Department Records, Records of the US Army Forces in the Middle Pacific, 494.2, Records of the Hawaiian Department, 1922–45, NARA College Park. Although Patton's plan called for the detention of only ninety-seven people, including two *haoles*, it still indicates something of the uncertainty of Hawai'i's military leadership in the period leading to the war.

⁵⁹ The case has been the subject of several books, including Peter Packer and Bob Thomas, *The Massie Case* (New York: Bantam, 1966); Cobey Black, *Hawaiian Scandal; The Case that Had Everything* (Honolulu: Heritage Books, 2002); and David Stannard, *Honor Killing: How the Infamous "Massie Case" Transformed Hawai'i* (New York: Vintage, 2005).

affair, the Navy made it clear that the service's honor was at stake. Reacting to military pressure, Territorial Governor Lawrence M. Judd commuted the sentences of the convicted Grace Fontescue, the alleged victim's mother, and her accomplices, to the dismay of many local residents who perceived that justice had been mishandled.

The islands' economy also began to suffer in the 1930s. A dramatic drop in sugar prices led to a drop in employment. By the end of 1936, fully one quarter of Hawai'i's labor force was out of work.⁶⁰ Hawai'i would receive federal funds through the Works Progress and Works Projects Administration's programs. There were also CCC camps on most of the islands—including several on Army bases to help on construction projects there. As an indication of his support, President Roosevelt visited Hawai'i in July 1934, where he witnessed a parade of 15,000 soldiers at Schofield Barracks and received the honor of a twenty-one-gun salute from the battery at Fort Armstrong.⁶¹



4. 9. President Franklin Roosevelt's visit to Hawai'i in 1934. As with other visitors the islands' scenic wonders captured his attention.

⁶⁰ La Croix, "Economic History of Hawaii."

Work at Hawai‘i’s National Park

Among President Roosevelt’s stops during his 1934 visit was to the Hawaii National Park. Under the stewardship of Thomas P. Boles and his successors, A. O. Burkland (a temporary replacement in 1926), Richard T. Evans (superintendent in 1927–1928), Thomas T. Allen (in 1928–1931), and Ernest P. Leavitt (appointed in 1931) the park had experienced a continual state of improvement, a condition expedited by Superintendent Edward G. Wingate (1898–1975, superintendent from 1933 to 1946).

Completion of Sulfur Banks Road in 1928 followed on the heels of that of Chain of Craters Road. Improvements to Route 11 from Hilo made the park more easily accessible to visitors.⁶² By the end of 1929, the park contained fully twenty-five miles of well-maintained roads and over ninety miles of trails.⁶³ Superintendents and rangers ensured that they were well marked, a tradition beginning during Boles’s tenure. By 1932, work had begun on a new road as well to the Halemaumau Bird Park just north of the park entrance.⁶⁴

Throughout this time, park officials, working with private owners and representatives of the territorial government, proceeded with land purchases and property exchanges to bring cohesion to the Kīlauea section of the park. The Bishop Estate finalized the sale of much of its remaining interests, as did other owners. The territory of Hawaii also contributed approximately

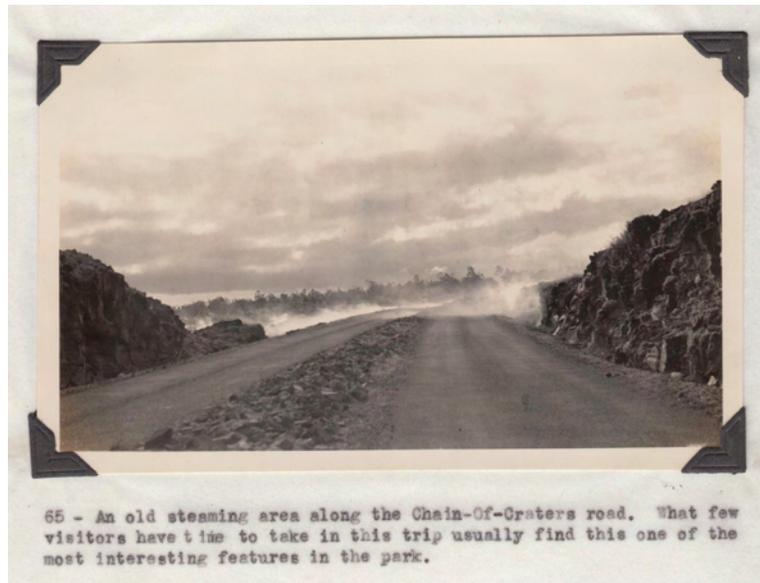
⁶¹ “FDR Visits Hawaii,” July 28, 2010, Navy History Hawaii, accessed October 23, 2012, http://navyhistoryhawaii.blogspot.com/2010/07/fdr-visits-hawaii_28.html.

⁶² Jackson, *Administrative History*, 116–18. A long-standing hope of Lorrin Thurston to build a road connecting Kīlauea and Mauna Loa nearly came to fruition as well. Park Service engineer Frank A Kittredge completed a survey in 1925, but despite the enthusiasm of Boles and later superintendents, the project was never realized. See F. A. Kittredge, Highway Engineer, report to L. I. Hewes, Deputy Chief Engineer, USBPR, November 1925, HAVO Archives; Jackson, *Administrative History*, 115; “Frank Alva Kittredge, Cornelius Amory Pugsley Silver Medal Award, 1950,” from Rebecca Stine, “People in Public Works: Frank Alva Kittredge,” *American Public Works Association Reporter*, February 1982, 8–9, accessed January 12, 2013, <http://www.aapra.org/Pugsley/KittredgeFrank.html>.

⁶³ “Development,” *Hawaii Nature Notes: The Publication of the Naturalist Division, Hawaii National Park and the Hawaii Natural History Association* 5, no. 2 (1953), accessed October 23, 2013, http://www.nps.gov/history/history/online_books/hawaii-notes/vol5-2k.htm.

⁶⁴ Jackson, *Administrative History*, 119; and Dawn Elizabeth Duensing, “The View from the Road: An Alternate Route through Hawai‘i’s History” (PhD diss., Australian National University, 2011), 241–99.

5,500 acres to the parks holdings. In 1927, the territory contributed a 46,050-acre tract of land connecting Kīlauea and Mauna Loa. An additional 43,400-acre tract in the Ka‘ū Desert area became part of the park in 1928.⁶⁵



4. 10. Chain of Craters Road, late 1930s. The road made the park far more accessible to motoring visitors.

There were gradual improvements as well to other park facilities, many initiated by private developers. In 1927, the Kilauea Volcano House Company, Ltd., opened a twelve-cabin summer camp. The Hawaiian Volcano Research Association, still under Jaggar’s forceful leadership, completed a new museum and exhibit building in 1927 and a new lecture hall in 1931. The park itself replaced its circa 1923 offices with a new administration building in 1932. New shelters were built, including one on the Hilina Pali, built in 1930, and the beginnings of a forestry program were instituted.⁶⁶

A major accomplishment of the 1930s was the completion of a permanent residential area

⁶⁵ “Development,” *Hawaii Nature Notes*.

⁶⁶ “Development,” *Hawaii Nature Notes*.

at Kilauea for the park's growing number of rangers.⁶⁷ Known eventually as the Kilauea Administration and Employee Area, the complex featured rustic-style cottages placed in naturalistic settings that became a hallmark of the park's infrastructure.⁶⁸ By 1932, the new residential area had five permanent houses completed and five under construction.⁶⁹ Utilizing CCC labor, the area would eventually grow to include at least twenty-four dwellings, along with carports, storage buildings, and sheds.⁷⁰

Less accessible and consequently host to fewer visitors, Haleakalā remained the responsibility of the Maui Chamber of Commerce, which managed the trails and summit shelter. Although the park gained an additional 9,543 acres through a purchase from the Haleakala Ranch Company, Congress reduced the projected park acreage to 17,130 acres from its originally planned 21,159.⁷¹ Until 1929, when the Park Service budgeted funds for the improvement of Halemau'u Trail, the government had in fact spent nothing to improve the site or facilities. This began to change in 1933, with the start of construction of a new surfaced road to the summit—a project supported as well by the territory of Hawaii, which paid the cost of improvements to the park's edge.⁷² In 1936, the NPS built an observation station at the mountain's peak, an event marking the completion of the final segment.⁷³

⁶⁷ Jackson, *Administrative History*, 126.

⁶⁸ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 16–17; and “Kilauea Administrative and Employee Housing Historic District, Cultural Landscape Inventory,” 2006, National Park Service, accessed October 14, 2013, http://www.nps.gov/havo/historyculture/upload/Kilauea%20Admin%20CLI_prt1-2.pdf.

⁶⁹ Jackson, *Administrative History*, 126.

⁷⁰ “Kilauea Administrative and Employee Housing Historic District, Cultural Landscape Inventory.”

⁷¹ Apple, “History of Land Acquisition,” 28.

⁷² “Development,” *Hawaii Nature Notes*.



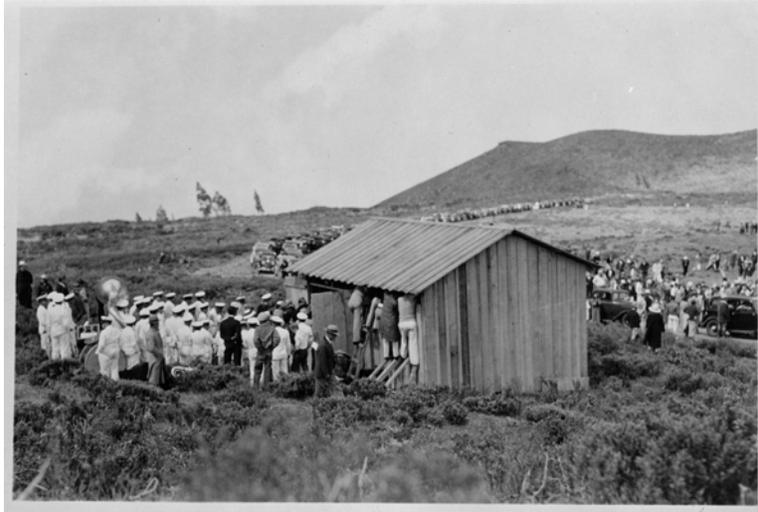
4. 11. Switchback, Halemauu Trail, Haleakalā.

Facilities for visitors at Haleakalā, however, remained primitive. In 1925, the Maui Chamber of Commerce added two dormitories, an observation room, and a water tank to the existing rest station house.⁷⁴ Battling vandalism and constant repairs, the Park Service assumed control of the park's facilities in 1934. With completion of the road, visitors could now reach the summit in a few hours, not days required by foot. From 1934 on, the NPS concentrated on improving roads and trails and making the site generally more accessible for visitors.⁷⁵

⁷³ Jackson, *Administrative History*, 42.

⁷⁴ "The House of the Sun," *Hawaii Nature Notes: The Publication of the Naturalist Division, Hawaii National Park and the Hawaii Natural History Association* 5, no. 2 (1953), accessed October 23, 2012, http://www.nps.gov/history/history/online_books/hawaii-notes/vol5-2k.htm.

⁷⁵ Jackson, *Administrative History*, 13–14; and "House of the Sun," *Hawaii Nature Notes*.



4. 12. Spectators at the opening ceremonies for the new road to the summit of Haleakalā, 1934.

Many of the improvements at both sections of Hawaii National Park would not have happened without the support of federal funding and programs during the economically hard-pressed 1930s. Paramount among these was the CCC, which had a profound impact on both Haleakalā and the Kīlauea sections of the park. Begun in 1933 as part of the Emergency Conservation Work Program, the CCC evolved during the period between 1934 and 1940—the program ended in 1942 as the war absorbed the national attention—as a key element in the construction and rehabilitation of NPS lands and properties.⁷⁶ Work ranged from soil erosion prevention and insect control programs to road building and trail construction. In Hawai‘i, the CCC contributed to reforestation projects, construction at military bases, and the creation of the territory’s own parks and recreation areas.⁷⁷

⁷⁶ John C. Paige, *The Civilian Conservation Corps and the National Park Service, 1933–1942: An Administrative History* (Washington, DC: National Park Service, 1985).

⁷⁷ Jackson, *Administrative History*, 144–46; and “Development,” *Hawaii Nature Notes*.



4. 13. Road cut, Haleakalā, 1935

During the Depression, administration of the Hawaii National Park's program was the responsibility of the governor's office and Superintendent Wingate. Immediate objectives were completion of the Haleakalā Road and resumption of work on the Halemaumau Bird Park Road at Kīlauea.⁷⁸ However, Wingate quickly developed a list of other projects and moved to create establish a two-hundred-man CCC camp at Kīlauea and a second unit at Haleakalā. Recruitment began in early 1934 and by late spring, the park had its first complement of CCC workers at Kīlauea.⁷⁹

The CCC camp at Kīlauea initially occupied the Volcano House's summer camp property, located near Byron's Ledge southeast of the Volcano House. The CCC workers expanded this modest property to a twelve-cottage facility, with a central lodge, latrines, a bathhouse, and separate five-hundred-gallon water tanks for each unit. In 1938, the NPS relocated the camp to a site north of Kīlauea Iki; the new camp included a recreation hall, a

⁷⁸ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21.

barracks, a bath and laundry house, a mess hall, a second employee dormitory, latrines, and a garage and water tanks, together with a hospital, an office building, and a gas and oil station.⁸⁰

In 1934, the NPS established a second CCC camp on Haleakalā. Initially housed in the summit rest station, the workers moved to a more substantial facility, featuring wood barracks and other structures, near the park headquarters area. There they built a residence and supporting structures for the park's ranger. The CCC also worked on trails, notably the Halemau'u Trail, and built four remote cabins for visitors.⁸¹



4. 14. Civilian Conservation Corps (CCC) crews constructing walls as road barriers and lookouts, 1934. As with similar projects elsewhere in the United States, the CCC maintained a high level of artisanship and their work did much to enhance the scenic value of the Hawaii National Park's two sections.

⁷⁹ Jackson, *Administrative History*, 144–46.

⁸⁰ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21.

⁸¹ Jackson, *Administrative History*, 144–46; and Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21.



2 views of Footprint Museum shelter under construction by CCC (job B-19). Building is to provide shelter for visitors while viewing footprints which will be enclosed in concrete and glass case. Materials donated by Hui O Pele.



4. 15. Building the Footprints shelter, Kilauea, 1938.



4. 16. CCC workers completed the staff housing at Kīlauea throughout the 1930s and built most of the structures at Haleakalā as well. The program ended in July 1942.

Military Uses of the Park

Park improvements coincided with changes at the Army's recreation and relaxation area in Kīlauea. Still operating still under its 1916 lease, the Army continued adding to its facilities at

Kilauea Military Camp (KMC), in 1930, opening a new infirmary, a joint Army-Navy initiative.⁸² In 1931, maintenance staff installed a new diesel engine to improve service and capability. There was also a new twelve-stall garage, improvements to the kitchen facilities, and an expansion of the water collection and storage system.⁸³ Moreover, in May 1933, work began on a set of nine stone cottages to house the camp's full-time staff, a project funded through the Federal Emergency Relief Administration (FERA).⁸⁴



4. 17. Kilauea Military Camp, 1936.

With its existing twenty-year lease scheduled to expire in 1936, the Army, with the support of the War Department in Washington, proposed that the land containing KMC and the associated Navy facility transfer to the military as part of a move to create a permanent rest-and-relaxation center there comparable to Baguio in the Philippines.⁸⁵ Bitterly opposed by NPS

⁸² Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-43.

⁸³ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-43; and US Army, "Digest of Information, Kilauea Military Camp," Prepared for the National Park Service by Department Recreation Office, Headquarters, Hawaiian Department, 1932.

⁸⁴ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-41-42.

⁸⁵ Warshauer, "History of Kilauea Military Camp," chaps. 10–12; and Jackson, *Administrative History*, 63-70. See Linn, *Guardians of Empire*, 119; "Camp John Hay: A Brief History, 1903–1945," Camp John Hay, accessed January 12, 2013, <http://www.campjohnhay.com.ph/history.php>; and "A Brief History of Baguio City," Go Baguio!

officials—especially Superintendent Wingate—the military shifted their proposal to a renewed twenty-year lease and resumption of the existing arrangement between the park and the military.

The NPS stance was that the military, including both Army and Navy personnel, were guests of the park and subject to the park’s oversight. Problems of authority over military visitors—military personnel were subject to military authority only, not that of civilian or other agency law enforcement officers or courts⁸⁶—was a particular grievance of the Park Service, since it exempted errant soldiers and sailors from penalties or arrest by NPS rangers. In a lengthy memorandum dated June 17, 1934, Wingate presented a litany of transgressions, including the destruction of government property, the setting of fires (either intentionally or unintentionally), and the persistent rudeness of military personnel. Despite supportive evidence presented by the park’s naturalist, John E. Doerr, Jr., Wingate forcefully concluded, “the Camps are foreign to the park,” suggesting that the military were “neither nature loving nor naturally conservative [as a] class.”⁸⁷

As a compromise to a twenty-year renewal, the Park Service extended the camp’s lease for five years, beginning in 1935.⁸⁸ The new lease was with the Army alone; the Navy dropped its claims to the site.⁸⁹ As part of the new agreement, the Army was to ensure that work within the camp met NPS standards; the Army was also to provide closer supervision of camp parties and excursions, better maintain their grounds, and more effectively monitor the behavior of military

Complete Guide to Baguio City, Philippines, 2012, accessed January 13, 2013, <http://www.gobaguio.com/history-of-baguio-city.html#.UPxRu6XU7FI>.

⁸⁶ By that point, complaints over the behavior of military personnel within the park had a long history. In 1924, Thomas Boles had complained of the theft of an automobile. In 1930, Ranger Brumahgin had arrested two soldiers for rolling stones over the Uwēkahuna Cliffs. See Jackson, *Administrative History*, 60–62; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-41.

⁸⁷ Edward G. Wingate, to Director, memorandum, June 17, 1934, Superintendent’s Monthly Reports, May 1934. Compare with John E. Doerr, Jr., to Superintendent, memorandum, May 18, 1934, Superintendent’s Monthly Reports, April 1934, HAVO Archives. Note that future references to the monthly reports will note month and date only.

⁸⁸ “Retention Kilauea Camp Now Planned,” *Honolulu Star-Bulletin*, June 21, 1934; “Kilauea Camp Will Remain,” *Honolulu Star-Bulletin*, August 7, 1934; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-41; Jackson, *Administrative History*, 68.

visitors. Facing pressure from the military authorities and local merchants, on March 26, 1936, the Secretary of the Interior signed a new lease with the War Department for another twenty years.⁹⁰

Among the stipulations of the new agreement was that the military would consult with the NPS when contemplating major changes. As a further gesture of cooperation, the military agreed to aid in fighting forest fires and enforce discipline among its service personnel in the park. The NPS, for its part, permitted continued use of a baseball field and allowed the camp's staff to maintain gardens. Park officials also agreed to provide additional educational programs for camp visitors on a regular basis.⁹¹

With the new lease in effect, the military began a new campaign of camp improvements. In 1936, Army crews installed a new system of fire hydrants and erected two new larger-capacity water tanks. Army engineers also built a second water catchment about a mile from the camp.⁹² The same year, the Army painted all of its buildings brown and cream in conformance with NPS standards within the park.⁹³

Other improvements followed rapidly. The year 1937 saw improvements to the bakery and construction of a new utility building and infirmary extension.⁹⁴ A former Navy barracks became a theater and other buildings were incorporated within the overall KMC plant.⁹⁵ By

⁸⁹ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-42; and "Kilauea Camp of Navy Is Closed," *Honolulu Advertiser*, July 1, 1934.

⁹⁰ Jackson, *Administrative History*, 71; and Apple, "History of Land Acquisition," 78–82.

⁹¹ Jackson, *Administrative History*, 71–74; and "Army Kilauea Camp Reservation," *Honolulu Star-Bulletin*, February 11, 1936.

⁹² Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-44.

⁹³ Warshauer, "History of Kilauea Military Camp," chap. 12.

⁹⁴ "Camp Hospital Is Accomplished Goal," *Hilo Tribune-Herald*, July 11, 1937.

⁹⁵ "Kalapana Park Work Finished under FERA," *Hilo Herald-Tribune*, May 24, 1935; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-44.

1937, there was also an improved baseball diamond and a new enlisted men's barracks.⁹⁶ Using federal funds and CCC workers, the Army also constructed four new entrance portals and additional "rock" walls at the front of the camp, improved facility roads, and installed stone curbs.⁹⁷

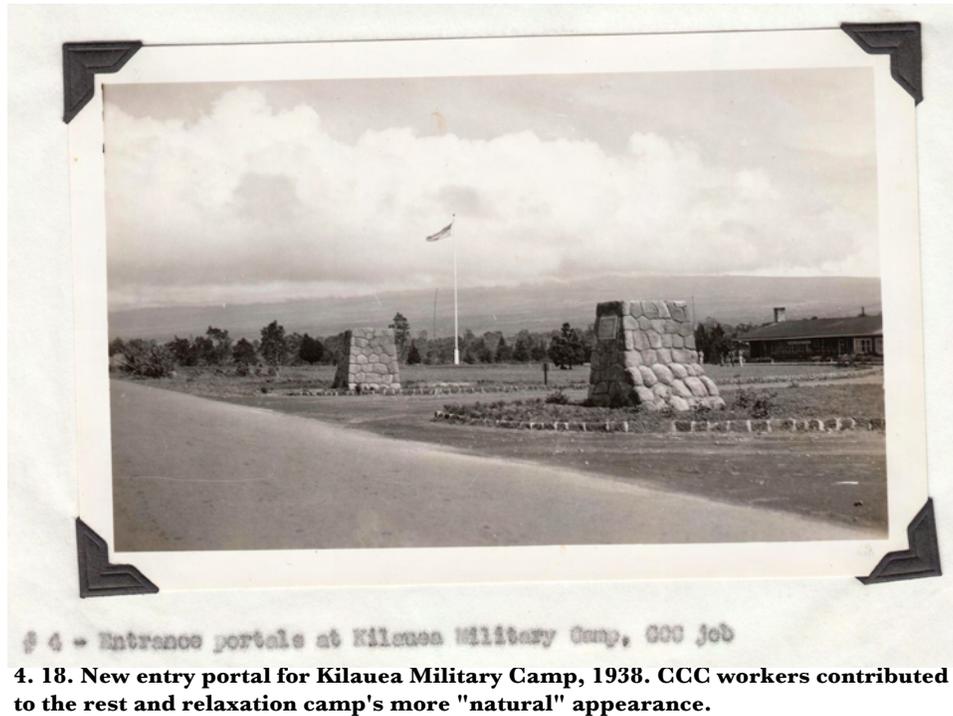
By the late 1930s, the KMC and the national park had reached a new point of accommodation. The theater, which could hold 250 people, hosted park lectures as well as movies and musical performances open to the community. For military visitors, there was an improved golf course, provisions for horseback riding, a tennis court, and three handball courts. The Army also provided a second small camp at Punalu'u Beach with separate quarters for enlisted men and officers, a diving board, and a raft.⁹⁸ British visitor General L. H. R. Pope-Hennessy (1875–1942) called it "the best camp of its kind he had ever visited."⁹⁹

⁹⁶ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-44; "KMC Contains 40 Buildings," *Hilo Herald-Tribune*, March 12, 1936; and "Recreation Camp for Men of Army Visited by Many Thousands during 21 Years," *Hilo Herald-Tribune*, June 13, 1937.

⁹⁷ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-46.

⁹⁸ "Army Acquires Marine Cottage on Big Island," *Honolulu Advertiser*, April 7, 1935; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-46.

⁹⁹ "Captain Thom Ends at Kilauea Camp," *Honolulu Star-Bulletin*, September 27, 1930.



The Growing Threat of War

The events of peacetime Hawai'i belied more ominous developments on the international front. For the Pacific region, the most significant threat to stability was an expanding Japan. An ally of the United States in World War I, Japan had assumed control of Germany's former holdings of the Mariana, Caroline, and Marshall Islands and Palau as part of the South Pacific Mandate created by the League of Nations.¹⁰⁰ Extending their reach, Japanese authorities had begun to populate the island colonies with laborers from Taiwan, Korea, and Okinawa.¹⁰¹ By the mid-

¹⁰⁰ W. G. Beasley, *Japanese Imperialism 1894–1945* (London: Oxford University Press, 1991); Ian Nish, *Japanese Foreign Policy in the Interwar Period* (London: Praeger Publishers, 1991); and Mark Peattie, *Nan'Yo: The Rise and Fall of the Japanese in Micronesia, 1885–1945*, Pacific Islands Monograph Series (Honolulu: University of Hawai'i Press, 1992).

¹⁰¹ Tadao Yanaihara, *Pacific Islands under Japanese Mandate* (London: Oxford University Press, 1940).

1930s, many of these possessions had become well-fortified extensions of Japanese power—“unsinkable aircraft carriers” in the later parlance of US military planners.¹⁰²

Japan had gradually adopted a similarly expansive strategy in Asia. In 1875, the island nation took control of the Kuril Islands and, following the first Sino-Japanese War of 1894–1895, assumed jurisdiction over the Liaodong Peninsula.¹⁰³ With the defeat of the Russians in 1905, Japan strengthened its grip on Manchuria—where it had gained a foothold during the Boxer Rebellion¹⁰⁴—and by 1910, moved to annex Korea.¹⁰⁵ Japan soon afterward occupied much of the Siberian coast, including, for a short time, Russia’s maritime ports.¹⁰⁶ Restrained in the post-World War I period by US and European claims over much of Asia, Japan began a new course of expansionism after 1932, under the continual pressure of military leaders such as War Minister General Sadao Araki (1877–1966) and his counterpart in China, General Baron Shigeru Honjō (1876–1945).¹⁰⁷ In 1937, despite objections of the United States and several European powers, Japan invaded China, occupying Shanghai and many other key cities.¹⁰⁸

¹⁰² “Unsinkable Aircraft Carrier,” *Wikipedia*, November 24, 2012, accessed January 19, 2013, http://en.wikipedia.org/wiki/Unsinkable_aircraft_carrier.

¹⁰³ Stepan Petrovich Krashenninnikov and James Greive, *The History of Kamtschatka and the Kurilski Islands, with the Countries Adjacent* (Chicago: Quadrangle Books, 1963); David Rees, *The Soviet Seizure of the Kuriles* (New York: Praeger, 1985); S. C. M. Paine, *The Sino-Japanese War of 1894–1895: Perception, Power, and Primacy* (Cambridge, MA: Harvard University Press, 2003); and Stewart Lone, *Japan’s First Modern War: Army and Society in the Conflict with China, 1894–1895* (New York: St. Martin’s Press, 1994).

¹⁰⁴ Paul A. Cohen, *History in Three Keys: The Boxers as Event, Experience, and Myth* (New York: Columbia University Press, 1997); and Jane E. Elliott, *Some Did It for Civilisation, Some Did It for Their Country: A Revised View of the Boxer War* (Hong Kong: Chinese University Press, 2002).

¹⁰⁵ R. M. Connaughton, *The War of the Rising Sun and the Tumbling Bear—A Military History of the Russo-Japanese War 1904–5* (New York: Routledge, 1988); and Jun Uchida, *Brokers of Empire: Japanese Settler Colonialism in Korea, 1876–1945*, Harvard East Asian Monographs (Cambridge, MA: Harvard University Asia Center, 2011).

¹⁰⁶ David S. Foglesong, *America’s Secret War against Bolshevism: U.S. Intervention in the Russian Civil War, 1917–1920* (Chapel Hill: University of North Carolina Press, 1995); Robert L. Willett Jr., *Russian Sideshow: America’s Undeclared War, 1918–1920* (Washington, DC: Potomac Books, 2005); and Paul E. Dunscomb, *Japan’s Siberian Intervention, 1918–1922: “A Great Disobedience against the People”* (New York: Lexington Books, 2011).

¹⁰⁷ W. G. Beasley, *The Rise of Modern Japan: Political, Economic, and Social Change since 1850*, 3rd ed. (London: Palgrave Macmillan, 2007); and Richard Sims *Japanese Political History since the Meiji Renovation, 1868–2000* (London: Palgrave Macmillan, 2001), 193–97.

¹⁰⁸ Marius B. Jansen, *The Making of Modern Japan* (Cambridge, MA: Harvard University Press, 2002); Beasley, *Japanese Imperialism*; Andrew Gordon, *A Modern History of Japan: From Tokugawa Times to the Present* (London: Oxford University Press, 2003); Yoshihisa Tak Matsusaka, *The Making of Japanese Manchuria, 1904–1932*, Harvard University Asia

The United States and its European allies had been monitoring these developments over nearly twenty years; and, though military planners expressed concern, France, the Netherlands, Great Britain, and the United States remained constrained by post–World War I arms limitations agreements and by political opposition at home. Under the terms of the Washington Naval Treaty of 1922, the Pacific powers were limited to five ships for the British, five for the United States, and three for Japan.¹⁰⁹ In 1930, at the London Naval Conference, the parties to the 1922 treaty agreed to additional force reductions, an agreement that resulted in a net loss in the number of US and British battle cruisers, destroyers, and submarines.¹¹⁰

Testing the limits of the treaty, a number of Western powers continued building and improving their ships.¹¹¹ The Japanese ignored the treaty even more aggressively, adding new ships and surreptitiously flouting limits on tonnage and gun caliber.¹¹² By the end of the 1930s, the Japanese Imperial Navy had grown to a force of 10 battleships, 10 aircraft carriers, 38 cruisers (heavy and light), 112 destroyers, 65 submarines, and various auxiliary ships—a force far larger than that of the United States in the Pacific.¹¹³ The Japanese also developed its airpower to

Center (Cambridge, MA: Harvard University Press, 2003); Richard Samuels, *Securing Japan: Tokyo's Grand Strategy and the Future of East Asia* (Ithaca, NY: Cornell University Press, 2007); Hsu Long-hsuen and Chang Ming-kai, *History of the Sino-Japanese war (1937–1945)* (Hong Kong: Chung Wu Publishers, 1972); James Chieh Hsiung and Steven I. Levine, eds., *China's Bitter Victory: The War with Japan, 1937–1945* (Armonk, NY: M. E. Sharpe, 1992); and Wilson, *When Tigers Fight*.

¹⁰⁹ Paul Kennedy, *The Rise and Fall of British Naval Mastery* (London: Macmillan, 1983); David Evans and Mark Peattie, *Kaigun: Strategy, Tactics and Technology in the Imperial Japanese Navy, 1887–1941* (Annapolis, MD: Naval Institute Press, 1997); and Leo Marriot, *Treaty Cruisers: The First International Warship Building Competition* (Barnsley, Great Britain: Pen & Sword, 2005).

¹¹⁰ “The London Naval Conference, 1930,” Milestones: 1921–1936, Office of the Historian, US Department of State, accessed January 14, 2013, <http://history.state.gov/milestones/1921-1936/LondonNavalConf>; and Zara S. Steiner, *The Lights that Failed: European International History, 1919–1933* (London: Oxford University Press, 2005), 587–91.

¹¹¹ “The U.S. Navy in the Interwar Period [Excerpted from Admiral Earnest J. King, *First Report to the Secretary of the Navy: Covering Our Peacetime Navy and Our Wartime Navy and Including Combat Operations up to 1 March 1944* [April 1944, pp. 4–11],” accessed October 3, 2013, http://www.shsu.edu/~his_ncp/IntNav.html; Siegfried Breyer, *Battleships and Battle Cruisers 1905–1970* (Garden City, NY: Doubleday Gardiner, 1973); and Robert Gardiner and Roger Chesneau, eds., *Conway's All the World's Fighting Ships, 1922–1946* (Annapolis, MD: Naval Institute Press, 1980).

¹¹² Hansgeorg Jentschura, Dieter Jung, and Peter Mickel, eds., *Warships of the Imperial Japanese Navy, 1869–1945* (Annapolis, MD: US Naval Institute, 1977).

¹¹³ J. N. Westwood, *Fighting Ships of World War II* (Chicago: Follet, 1975).

a greater extent than its potential opponents. In response, US military planners shifted focus toward the Pacific. The United States versus Japan games, called War Plan Orange, originated as early as 1919, but became a more regular feature of naval exercises after 1924.¹¹⁴ By 1930, the Pacific-based Navy's annual Fleet Problems were almost always scenarios based on responses to Japanese attacks.

The United States also began expanding its forces as well. Soon after his election in 1932, President Roosevelt pushed through additional funds for defense as part of his general relief programs. This included \$238 million for thirty-two new Navy vessels. In 1934, Congress passed the Vinson-Trammell Act, which authorized additional ship construction.¹¹⁵ In 1938, the US Congress overturned the limits set by earlier treaties, increasing the number and tonnage of US naval vessels by 23 percent.¹¹⁶ The same act expanded the number of naval airplanes and authorized the expansion of the Naval and Marine Reserves.

In late 1938, a committee headed by Admiral Arthur J. Hepburn (1877–1964) recommended a significant expansion of US naval forces, at an initial cost of \$316,216,000.¹¹⁷ This figure included the costs of overhauling and enlarging the US fleet, substantially improving docking and port facilities, and expanding ground and air defenses near naval bases. In response

¹¹⁴ Edward S. Miller, *War Plan Orange: The U.S. Strategy to Defeat Japan, 1897–1945* (Annapolis, MD: US Naval Institute Press, 1991).

¹¹⁵ “Ship Building, 1933–1945—Roosevelt, Franklin D.,” Military, Global Security.org, accessed January 20, 2013, <http://www.globalsecurity.org/military/systems/ship/scn-1933-roosevelt.htm>. Three years later, Congress authorized \$50 million to build six auxiliary ships, necessary for the maintenance of the treaty navy. See David L. Walsh, US Senate, “The Decline and Renaissance of the Navy, 1922–1944,” Report to the US Senate, June 7, 1944, accessed January 14, 2013, <http://www.ibiblio.org/pha/USN/77-2s202.html>; and Paul H. Silverstone, *US Warships of World War II* (Annapolis, MD: Naval Institute Press, 1965).

¹¹⁶ Walsh, “Decline and Renaissance of the Navy, 1922–1944.”

¹¹⁷ Naval History and Heritage Command, “Hepburn,” *Dictionary of American Naval Fighting Ships* (Washington, DC: Department of the Navy, n.d.) online edition, accessed October 25, 2013, <http://www.history.navy.mil/danfs/h5/hepburn.htm>; and Linda S. Keefer, *Base Support for U.S. Naval Operations in the Western Pacific: A Survey of 19th and Early 20th Century Developments* (Alexandria, VA: Center for Naval Analyses, 1992), accessed January 20, 2013, <http://www.cna.org/sites/default/files/research/9502590000.pdf>.

to what became known as the Hepburn Board Report, Congress set aside additional funds for the naval air bases and docking and repair facilities, much of it earmarked for ports in the states of Washington and California and for Pearl Harbor in Hawai‘i.¹¹⁸

The Defense of Hawai‘i

Together with Panama, Hawai‘i represented one of the great outposts of military strength and was a key element in the defense of the US mainland from outside attack and an obvious springboard for any offensive actions in the Pacific and Asia. Relying on a defensive strategy drawn up after World War I, however, military planners placed primary emphasis on coastal batteries and a mobile force stationed at Schofield Barracks, leaving other islands in the Hawaiian chain unprotected. Considering the US position impregnable, the new commander of the Hawaiian Department, General Charles D. Herron, commented that he would not “want to be given the job of cracking the nut [of O‘ahu’s defenses]” and that the coastal reefs and difficult terrain made sea attack almost impossible.¹¹⁹

Although congressional action increased funding, many of the Hepburn Board’s recommendations remained unrealized. As of 1938, the Navy command in Hawai‘i included a separate Minecraft Base, Fleet Air Base, and Submarine Base, but all of these units were still understaffed and underfunded. Nonetheless, the dredging and widening of Pearl Harbor’s entrance and expansion of the Navy Shipyard placed the facility in a better position for future expansion.¹²⁰ The Naval Air Station at Ford Island—shared with the US Army Air Corps (after 1942, the Army Air Forces) since 1923—also underwent significant upgrades.¹²¹

¹¹⁸ Walsh, “Decline and Renaissance of the Navy, 1922–1944.”

¹¹⁹ Stetson Conn, Rose C. Engelman, and Byron Fairchild, *Guarding the United States and Its Outposts* (Washington, DC: Center of Military History, United States Army, 2000), chap. 6, “The Reinforcement of Oahu,” 152–53.

¹²⁰ “Financing War Construction,” *Building the Navy’s Bases in World War II: History of the Bureau of Yards and Docks and the Civil Engineer Corps*, chap. 2, 1940–1946, Bureau of Yards and Docks, Department of the Navy, accessed October 12, 2013, http://www.ibiblio.org/hyperwar/USN/Building_Bases/bases-2.html.

While generally trusting its impressive array of land-based defenses, the military also made strides in the development of air capability. This included upgrading island anti-aircraft guns and expanding its air facilities. Equipping Hickam Field to handle a new class of medium-range bombers, General Drum pushed strongly for the Army's new "flying fortress" B-17.¹²² Colonel Edward M. Markham (1877–1950), reporting to the president and the secretary of war in 1937, also stressed the need for further air defenses.¹²³ Acceding to the Hawaiian Department's requests, the War Department proposed to increase the Army Air Corps combat strength from 124 to 256 aircraft, including 140 bomber and 100 pursuit planes.¹²⁴

The Navy took parallel steps to upgrade its air support, scouting secondary bases on the windward and leeward sides of the island of O'ahu. Among the new projects were a seaplane facility at the Army's former Kuwaahoe Military Reservation and a new facility at Barbers Point—replacing the 1920s-era dirigible station with a new airstrip and improved facilities.¹²⁵ Soon afterward, the Navy assumed control of the windward Mokapu Peninsula, developing what would soon become the Kaneohe Naval Air Station.¹²⁶

New planes and personnel required increased levels of training. This was true for both the Army and Navy pilots and for troops on the ground. Navy and Army pilots pressed to extend their training areas, and in 1939, the new facility at Barber's Point acquired an additional 3,500

¹²¹ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, "Development of the Naval Establishment in Hawaii," 6; and US Navy, *History of the Naval Air Station*.

¹²² Conn, Engelman, and Fairchild, *Guarding the United States*, 153. Markham retired as a Major General in 1938. See "Edward M. Markham, 1899," Cullum 3872, September 14, 1950, accessed January 12, 2014, <https://apps.westpointaog.org/Memorials/Article/3872/>.

¹²³ Conn, Engelman, and Fairchild, *Guarding the United States*, 154.

¹²⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, 156.

¹²⁵ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, "Development of the Naval Establishment in Hawaii," 6; and "MCB, Hawaii, Hawaii," Military Installations, US Government, revised January 14, 2013, accessed January 20, 2013,

http://www.militaryinstallations.dod.mil/MOS/?p=MI:CONTENT:0:::P4_INST_ID,P4_CONTENT_TITLE,P4_CONTENT_EKMT_ID,P4_CONTENT_DIRECTORY:2155,Installation%20Overview,30.90.30.30.0.0.0.0,1.

¹²⁶ "MCB, Hawaii, Hawaii."

acres to accommodate new aircraft and facilitate training missions.¹²⁷ The Army similarly pressed to extend its air strength, scouting secondary airfields on the North Shore of O‘ahu and other islands, notably Maui and Kaua‘i.¹²⁸ Although troop maneuvers were limited for the time being to the Army’s extensive facility at Schofield Barracks, commanders began searching out other types of terrain and conditions to test new field equipment and troop capabilities.¹²⁹

While a war in the Pacific still seemed remote to most in the military and civil administrations, events in Europe and Asia began affecting Hawai‘i’s preparedness. Improved defensive positions, new guns and roads, and expansion of facilities for both the Army and Navy shifted the climate of military operations. There was also a notable increase in troops stationed in the islands, due in large part to the possibility of US involvement in China following Japan’s invasion of 1937.¹³⁰ From a low of 13,096 soldiers and officers in 1924, by 1939 there were fully 19,000 troops distributed among O‘ahu’s several bases.¹³¹ Coupled with increasing naval activity and training, it was apparent to many that new challenges were on the horizon.

¹²⁷ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

¹²⁸ Paul Freeman, *Abandoned and Little-Known Airfields: Hawaii, Northern Oahu Island*, Paula and Terry Freeman, revised January 13, 2013, accessed January 20, 2013, http://www.airfields-freeman.com/HI/Airfields_HI_Oahu_N.htm; and William H. Dorrance, “The U.S. Army on Kaua‘i, 1909–1942,” *Hawaiian Journal of History* 32 (1998): 162.

¹²⁹ Rich Anderson, “The U.S. Army in World War II: Introduction and Organization,” *MilitaryHistoryonline.com*, accessed October 19, 2013, <http://www.militaryhistoryonline.com/wwii/usarmy/introduction.aspx>.

¹³⁰ The United States began to supply aid to China after 1937; and many US officials saw a possibility of further involvement. US Department of State, Office of the Historian, 1937–1945, “Japan, China, the United States and the Road to Pearl Harbor,” US Department of State, History, accessed August 12, 2013, <http://history.state.gov/milestones/1937-1945/PearlHarbor>.

¹³¹ Linn, *Guardians of Empire*, 146.

CHAPTER 5: ON THE BRINK OF CONFLICT

End of the Thirties

Despite the threat of future involvements in Europe or Asia, it was by no means certain that Hawai‘i would be at the center of the coming storm. Increased military spending improved to Hawai‘i’s economy, creating a vigorous new housing sector and improved opportunities for employment outside the traditional plantation system.¹ Hawai‘i’s multicultural society also became increasingly “Americanized.”² Many children of immigrant agricultural laborers were now English speakers, a positive sign for labor analysts. Honolulu, the territory’s urban center had grown too, from a population of 114,630 in 1930 to 179,326 by the end of the decade.³

Hawai‘i in the late 1930s was also in the midst of a significant growth in tourism, with Pan American Airlines beginning its famous clipper service to Hawai‘i in October 1936, adding another method of travel to the islands.⁴ The 1930s also witnessed striking growth in both transit passengers and “regular tourists,” from 19,268 “through-passengers” in 1931 to 41,156 in 1939; and a corresponding increase in “staying tourists” from 15,780 to 24,381.⁵ Attracted by the allure of Hawai‘i’s exotic image, tourists visited the famous resorts of Waikīkī and traveled to Haleakalā and Kīlauea to witness nature’s extremes.⁶

¹ La Croix, “Economic History of Hawai‘i”; James H. Shoemaker, *Labor in the Territory of Hawaii, 1939*, Vol. 681, *Bulletin of the United States Bureau of Labor Statistics* (Washington, DC: US Bureau of Labor Statistics, 1939), 226–28.

² Shoemaker, *Labor in the Territory of Hawaii, 1939*, 226.

³ Leon E. Truesdell, *Fifteenth Census of the United States*, US Bureau of the Census, Population, Vol. 1, Number and Distribution of Inhabitants, Population of Hawaii (Washington, DC: GPO, 1931), 1240; Daniel Harrington, *Hawaiian Encyclopedia, Population and Visitor Statistics*, History, *Hawaiian Encyclopedia*, online, accessed December 3, 2012, <http://www.hawaiianencyclopedia.com/population-and-visitor-statist.asp>; and Leon E. Truesdell, *Sixteenth Census of the United States*, US Bureau of the Census, Population, Vol. 1, Number of Inhabitants, Population of Hawaii (Washington, DC: GPO, 1942), 1212.

⁴ “Pan American Airways,” Hawaiian Aviation: An Archive of Historic Photos and Facts, accessed July 12, 2012, <http://hawaii.gov/hawaiiaviation/hawaii-commercial-aviation/pan-american-airways>; and Hibbard, *Designing Paradise*, 56.

⁵ Shoemaker, *Labor in the Territory of Hawaii, 1939*, 131.

⁶ “Humble Beginnings,” Corporate Information, Hawaii Visitors and Convention Bureau, accessed December 13, 2012, <http://www.hvcb.org/corporate/history.htm>; and “Hula and Tourism,” HawaiiHistory.org, accessed December 23, 2012, <http://www.hawaiihistory.org/index.cfm?PageID=439>.



5. 1. Aerial view, downtown Honolulu, 1938.

However, against this backdrop of growing tourism traffic, Hawai‘i faced the reality of labor disputes. Hawai‘i’s workers became increasingly vocal in the late 1930s, a situation that many in both the business community and military found disquieting.⁷ In 1937, the first International Workers Parade took place on Maui, with several thousand mostly Filipino marchers calling for better wages.⁸ The following year, following a seven-month Longshoremen’s union strike against the Inter-Island Steamship Company, the battle for better pay turned violent

⁷ Daws, *Shoal of Time*, 358–64; Edward D. Beechert, *Working in Hawaii: A Labor History* (Honolulu: University of Hawaii Press, 1985); “History of Labor in Hawai‘i,” Center for Labor Education and Research, University of Hawaii - West Oahu, accessed December 13, 2012, <http://clear.uhwo.hawaii.edu/HawaiiLaborHistory.html>; and “Labor Unions in Hawai‘i,” Honolulu Civil Beat, accessed December 23, 2012, <http://www.civilbeat.com/topics/labor-unions-in-hawaii/>. On the military response, see Linn, *Guardians of Empire*, 158–62.

⁸ “Hawai‘i Labor History Timeline,” Center for Labor Education and Research, University of Hawai‘i - West Oahu accessed December 14, 2012, <http://clear.uhwo.hawaii.edu/Timeline.html>.

when the Hilo police attacked a large group of marchers, later dubbed the “Hilo Massacre.”⁹ Considered a threat to the territory’s stability, the clash led to increased caution on the part of the civil authorities. The military also remained on alert and was prepared to assist civil authorities if required.¹⁰

Coming at a time when some in Hawai‘i sought statehood, the labor disputes, combined with traditional prejudices against people of color, forestalled efforts to join the union on equal footing with other US jurisdictions.¹¹ The prominent role of the Japanese in both the workforce and the labor movement added further to misgivings of many American politicians and their constituents. Suspicions were further exacerbated by the expansion of Japanese power in Asia and increasingly voiced doubts over the loyalty of Hawai‘i’s own Japanese population—all significant factors in the years just before the war.¹²

Routines in the Park

Life in the park was largely routine during the late 1930s. With a staff of about twenty “appointed” workers and another ten or eleven temporary and part-time staff members, Hawaii National Park was popular with outside visitors and local residents alike. In January 1938, visitation at Kīlauea was at 13,550, up nearly 2,000 from the previous year; Haleakalā reported

⁹ William J. Puette, *The Hilo Massacre: Hawai‘i’s Bloody Monday, August 1st, 1938* (Honolulu: University of Hawai‘i, Center for Labor Education & Research, 1988); This followed an even larger strike in 1934. See International Longshore and Warehouse Union, “The ILWU Story,” *The Dispatcher Paper*, accessed December 12, 2012, http://www.ilwu.org/?page_id=814; and Harvey Schwartz, *Solidarity Stories: An Oral History of the ILWU* (Tacoma: University of Washington Press, 2009). For a broader perspective, see Gloria Skurzynski, *Sweat and Blood, A History of U.S. Labor Unions* (Minneapolis, MN: Twenty-First Century Books, 2008).

¹⁰ Linn, *Guardians of Empire*, 160; and Addleman, *History of the United States Army*, 62. See also Horne, *Fighting in Paradise*.

¹¹ Day, *Hawai‘i and Its People*, 269–70.

1,605 visitors compared to 1,465 in January 1937.¹³ The initial strike by crewmembers of the Inter-Island Steamship Company curtailed visitation slightly, but no real interruption in visitor numbers occurred until labor trouble surfaced again in summer 1938, when freight and passenger service experienced a general disruption.¹⁴

By November 1938, with the end of the Longshoremen's strike, the visitor count was at 11,926 persons for Kīlauea and 1,985 for Haleakalā.¹⁵ By September 1939, the annual total reached 199,801 for Kīlauea and 26,940 for Haleakalā, compared to 173,255 and 22,605, respectively, the previous year.¹⁶

Well-known visitors included entertainers George Burns and Gracie Allen, radio comedian Bob Burns, boxers Max and Buddy Baer, and noted artist and painter Georgia O'Keefe—referred to by the superintendent as a woman of “ungovernable temper”¹⁷—who visited in March 1939. Military visitors during the same time included the crews of the USS *Lark* (August 1938), a group of 182 officers and airmen representing the Bombing Squadron from Pearl Harbor (October 1938), and the crew of the USS *Nevada*, during their call in Hilo in June 1939. Major General Herron, commander of the Hawaiian Department, visited Haleakalā in September 1938 in large part to see the much-publicized silverswords in bloom.¹⁸

¹² Gary Y. Okihiro, *Cane Fires: The Anti-Japanese Movement in Hawaii, 1865–1945* (Philadelphia: Temple University Press, 1992); and Stacey Hirose and Brian Niiya, *Japanese American History: An A-to-Z Reference from 1868 to the Present* (Berlin: Verlag für die Deutsche Wirtschaft AG, 1993), 163.

¹³ Superintendent's Monthly Reports, January 1938.

¹⁴ Superintendent's Monthly Reports, July and August 1938.

¹⁵ Superintendent's Monthly Reports, November 1938.

¹⁶ Superintendent's Monthly Reports, September 1939.

¹⁷ Superintendent's Monthly Reports, March 1939.

¹⁸ Superintendent's Monthly Reports, Hawaii National Park, Report of J. A. Peck, District Ranger, September 30, 1938.



5. 2. Amelia Earhart visiting Kīlauea, ca. 1935. HAVO Photographic Collection.

Particularly noteworthy was the large number of Japanese visitors. These included a Japanese acrobatic troupe who toured Kīlauea in October 1938. In April 1939, the park entertained the officers and crew of the Japanese tanker *Shriya Maru*. In October 1939, the superintendent wrote a letter of welcome to officers and crews of the Japanese training ships HIJMS *Iwate* and HIJMS *Yakumo*, then stopping at several island ports as part of a goodwill tour. Shortly afterward, approximately 2,000 officers and crew of both ships along with personnel from their accompanying tanker, the HIJMS *Shiretoko*, visited Kīlauea and toured the park.¹⁹

Relations between the park and military appear to have been cordial. There were, nonetheless, a few incidents. In April 1938, a sailor from the USS *Portland* fell into a “concealed hole” near the Thurston Lava tube. A stolen car showed up at KMC in November the same year; and in January 1939, Kīlauea-based rangers apprehended six soldiers with *naio* (*Myoporum sandwicense*, known as false sandalwood) in their possession, turning them over “to the military authorities for discipline.” In July 1939, several soldiers at KMC were “apprehended for infractions of park rules”—the military handled their cases.²⁰

¹⁹ Superintendent’s Monthly Reports, December 1939.

Signs of cooperation between the NPS and military abounded. Park rangers gave lectures at KMC, utilizing the new 250-person capacity theater for larger groups. In May 1938, Capt. J. K. Cullen, KMC's medical officer, offered a Red Cross first-aid course open to all park personnel, including rangers and their wives and supervisory staff from the Civilian Conservation Corps (CCC). In September 1939, the Army gave the park four Springfield rifles—technically “on loan”—and 2,000 rounds of ammunition.²¹ The Army also helped transplant trees at KMC.²²

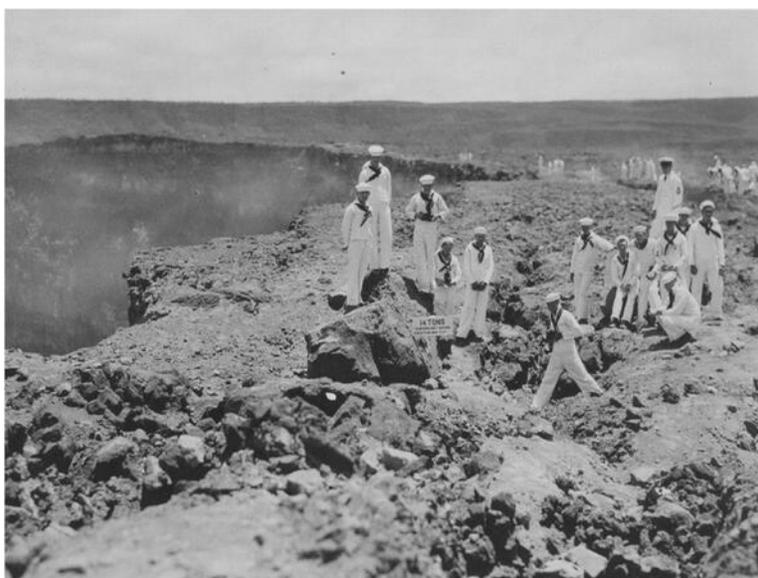


5. 3. The famous "Hole in One" overlook. Superintendent Wingate was especially concerned that the park and Kīlauea be treated with respect. This view was included in his 1938 report.

²⁰ Superintendent's Monthly Reports, July 1939.

²¹ Superintendent's Monthly Reports, September 1939.

²² Superintendent's Monthly Reports, September 1939.



5. 4. US sailors visiting Kilauea, ca. 1935. HAVO Photographic Collection.

Growth of the Park

One of the most important park developments during the late 1930s was the significant expansion of the federal government's landholdings. Adding to large acquisitions in the late 1920s, National Park Service (NPS) officials completed negotiations in 1938 for a 49,340-acre tract of land stretching north and east of the original park known as the Kalapana Extension.²³ Authorized by Congress and strongly supported by the territorial government, this tract incorporated as a large part of the Puna District, an area noted for its preserved Native Hawaiian structures and its legacy of Hawaiian farming and fishing villages.²⁴ Originally proposed by a citizen support group, the idea of the purchase stretched back to the tenure of Ernest Leavitt, but Superintendent Wingate made the acquisition his special mission.

²³ Apple, "History of Land Acquisition," 39; and "Boundaries," *Hawaii Nature Notes*.



5. 5. The Kalapana Extension area of the park today. A dramatic and desolate area that still supported a few Hawaiians at the time of the National Park Service's initial steps toward acquisition in 1938.

Sympathetic to Hawaiian interests, Wingate insisted that traditional rights of passage and access be honored and lobbied congressional delegate Samuel W. King (1886–1959) to recognize traditional Hawaiian claims of use within the measure.²⁵ The total cost of the land purchase to the federal government was \$10,800. Since 11,675 acres were in public ownership, the cost breakdown was: “waste area, 17,985 acres at 40¢ an acre; inferior pasture land, 9,550 acres at \$1.00 an acre; forest area, 13,230 acres at \$1.50 an acre; and forest-pasture land, 8,575 at \$2.00 an acre.”²⁶

In addition to the Kalapana Extension, in 1938, Congress also authorized the acquisition of a 5,730-acre tract to the south of Kīlauea known as the Footprints Addition. This section adjacent to the Ka‘ū Desert tract was significant for its large, preserved set of ashen footprints, originally identified as evidence of the retreat of the Hawaiian chief Keōua Kuahu‘ula’s forces

²⁴ “Boundaries,” *Hawaii Nature Notes*.

²⁵ “Boundaries,” *Hawaii Nature Notes*.

following defeat by Kamehameha I in 1790.²⁷ Both parcels officially became designated parts of the park on June 20, 1938, although the actual transfer of titles and lands stretched well into the next decade until completion in 1950.²⁸

The Kalapana Extension and the Footprints Addition added new complexity to NPS land management practices. In addition to residual Native Hawaiian fishing, farming, and gathering rights, the new acquisitions were not free of other encumbrances. As with the Mauna Loa Extension before, both parcels incorporated reserved grazing rights, retained by the territorial government. Private companies, notably the Hawaiian Agriculture Company, operator of Kapapala Ranch, also still claimed grazing rights.²⁹ This practice was cause for continuing legal disputes between the NPS and the territory of Hawaii and individual owners located within park boundaries, revealing the precariousness of the federal agency's control over its property.³⁰ As late as 1939, C. Brewer Company, the factor (agent) for Hawaiian Agriculture, was still contesting NPS claims to parts of the Footprints Area due to continuing operations there.³¹

²⁶ Apple, "History of Land Acquisition," 50–60; and "Boundaries," *Hawaii Nature Notes*.

²⁷ Castro, "Land of Pele," 71; and Jadelyn J. Moniz-Nakamura, "Keonehelelei—The Story of the Footprints Area," Hawaii Volcanoes, US Department of the Interior, National Park Service, accessed June 23, 2013, <http://web.archive.org/web/20081205042034/http://www.nps.gov/havo/historyculture/footprints.htm>. See also Jadelyn J. Moniz Nakamura, *Keonehelelei—The Falling Sands: Uncovering the Origin of the Preserved Footprints and Associated Ka'u Desert Features: A Historical Overview and Archaeological Survey of the Ka'u Desert*, Hawaii'i Volcanoes National Park, National Park Service, US Department of the Interior, Pacific Islands Cluster, Publications in Anthropology #2, 2003, accessed June 12, 2013, <http://www.nps.gov/havo/historyculture/upload/Keonehelelei.pdf>.

²⁸ Apple, "History of Land Acquisition," 135–40.

²⁹ Apple, "History of Land Acquisition," 119.

³⁰ Superintendent's Monthly Reports, June 1938. See Apple, "History of Land Acquisition," 89.

³¹ Apple, "History of Land Acquisition," 136–37.



5. 6. Footprints Area, Kīlauea. Also acquired by the park in 1938, Footprints (Keonehelelei, or "Falling sands", in Hawaiian) was at The edge of the Ka'ū Desert Area. Ostensibly the fossilized record of a large contingent of Hawaiian warriors, led by the *ali'i* Keoua caught by a volcanic ash storm, the actual history is far more complex.

New Military Involvements in the Park

On November 17, 1938, Majors Stribling and Clark, Captain Lindsay of the Army Air Corps, and Major Billing, commander of KMC, met with Superintendent Wingate and his assistant Benjamin F. Moomaw, Jr., to discuss the possible use of park property as an aerial bomb training range.³² Wingate indicated that he had no objection in principle to the military plan, but asked the Army to agree to relinquish its claims in the event the proposed range was no longer needed. He also insisted that no permanent structures be added and suggested that the range be located

outside existing park boundaries.³³

The Army Air Corps' proposal, stated in an application to the Department of the Interior in April 1939, was for a nine-square-mile area along the Ka'ū coast. In his response to Deputy Director Arthur E. Demaray (1887–1958), Wingate explained that this was an area greater than that discussed in November 1938; the Army, he explained, had asked for seven square miles, not nine.³⁴ Wingate further explained that the Army had not considered his suggestion of the alternative site of Manuka, a remote desert site, but insisted that only the coastal area would suit their requirements. Wingate also expressed concern about the future status of the area, hoping that the NPS would wait for the formal transfer of the lands authorized as part of the Kalapana Extension and Footprints Addition.³⁵

On May 26, 1939, Secretary of the Interior Ickes informed Secretary of War Harry H. Woodring (1890–1967) that if the War Department believed the park was the only possible site for the proposed bombing range, then the Interior Department would make no objections. The only requirement would be that the area be deleted from the area authorized in the 1938 Act and that the range area be separately designated.³⁶ The War Department turned to Senator J. Morris Sheppard (1875–1941) of Texas to introduce a bill in spring 1940 to designate a nine-square-mile parcel—approximately 6,450 acres—to be known as the Elemakule Range (referred to simply as the Kau Bombing Range or Kau Reservation). The area would incorporate the scenic Hilina Pali (cliffs) area and several NPS trails and roads.³⁷

³² Superintendent's Monthly Reports, November 1938.

³³ Edward Wingate to Director, memorandum, April 19, 1939, Hawaii National Park Records, File 601-04, HAVO Archives, cited in Jackson, *Administrative History*, 90.

³⁴ Edward Wingate to Director, memorandum, May 26, 1939, Hawaii National Park Records, File 601-04, HAVO Archives, cited in Jackson, "Bombs in a National Park," 102.

³⁵ Jackson, "Bombs in a National Park," 102–3. See Apple, "History of Land Acquisition," 138–40.

³⁶ Jackson, *Administrative History*, 90.

³⁷ Conrad L. Wirth, Regional Director, to Edward Wingate, memorandum, April 11, 1940, Hawaii National Park Records, File 601-04, HAVO Archives, cited Jackson, "Bombs in a National Park," 103. The superintendent discussed the bill in his introduction to the park's March report. See Superintendent's Monthly Reports, March 1940. The full name was Na Puu O Na Elemakule (Nāpu'uonā'elemākule) Range.



5. 7. First selected by the Army in 1938, this approximately 6,450-acre parcel became known as the Elemakule ('Elemākule) Range (referred to also simply as the Kau Bombing Range or the Kau Reservation). Its use was a matter of contention throughout the war, though in fact, the Army never actually utilized the area for bombing practice; the Navy did, however.

Wingate made one last effort to dissuade the Army, requesting that the area be reduced to six square miles (3,840 acres) and that they consider other alternative sites, such as the one in the Kalapana area.³⁸ With further expressions of concern coming from conservation organizations and individuals, notably the Izaak Walton League and the influential editor of *Nature* magazine, Richard W. Westwood, General Herron of the Hawaiian Department agreed to reduce the area an area to 3,052 acres, or approximately 4.8 square miles.³⁹ General Herron also

³⁸ Wingate, Resume of Activities, July 1, 1939–June 30, 1940, Hawaii National Park Records, Annual Reports to the Governor of the Territory of Hawaii, File 207-01.1, cited in Moniz Nakamura, “Up in Arms!

³⁹ Jackson, *Administrative History*, 89–91; and Hawaii National Park Files, 6001–04, clippings, HAVO Archives; Superintendent’s Monthly Reports, April 1940, July 1940, August 1940. Additional support for the park’s position came from the Manuiki Audubon Society and Ashley Brown of the University of Hawaii. See Superintendent’s Monthly Reports, April 1940.

agreed to the provision that the land would revert to the National Park Service once it was no longer needed.⁴⁰

By July 1940, the Army had its bombing range, although smaller than originally requested. In its final form, bills H.R. 9171 and S. 3676 decreased the range size to about 4.5 square miles (2,880 acres).⁴¹ Formal withdrawal of lands, with the provision that control would revert to the NPS when the site was no longer required, occurred on July 16, 1940, with final papers deposited in December.⁴² That was not the end of the story, however. On July 18, just two days after the withdrawal, General Herron requested a survey near the Mauna Loa trail “for road construction and erection of certain unspecified defense works.”⁴³ Although Wingate authorized a survey on July 20, 1940, nothing came of the proposal.⁴⁴ In September 1941, Wingate forwarded a collection of citizen complaints over military use of the park, suggesting further that the Army’s rumored acquisition of a possible bombing range at South Point precluded the need for additional parklands.⁴⁵

The success of the military in obtaining lands under NPS jurisdiction underlined the dilemma facing Wingate and other conservation-minded individuals both inside and outside the Park Service. As Westwood wrote, in view of the threat of conflict in Europe, the US Congress would agree to “anything that seems to have military significance . . . without consideration of the consequences. With all of the terrific destruction going on in the world today, the still small voice of conservation is going to have a more and more difficult time making itself heard.”⁴⁶

⁴⁰ Secretary of Interior to the Secretary of War, August 29, 1940, Record Group 79, Box 158, National Archives and Records Administration, San Bruno, CA (hereafter NARA San Bruno); and Jackson, “Bombs in a National Park,” 103.

⁴¹ Moniz Nakamura, “Up in Arms!” 9.

⁴² Superintendent’s Monthly Reports, December 1940.

⁴³ Edward Wingate to Director, NPS, memorandum, Hawaii National Park Report on Requests for “War Uses” of Land, Buildings, etc., February 24, 1943, Hawaii National Park Records, Army Use Kilauea Kau Bombing Range, 1942–1948, File 601-04.1, cited in Jackson, *Administrative History*, 91; and Moniz Nakamura, “Up in Arms!” n. 17.

⁴⁴ Moniz Nakamura, “Up in Arms!” 9.

⁴⁵ Wingate to Director, February 24, 1943, cited in Jackson, *Administrative History*, 91; and Moniz Nakamura, “Up in Arms!” n. 17. See also Superintendent’s Monthly Reports, September 1941.

⁴⁶ Hawaii National Park Records, Army Use Kilauea Kau Bombing Range, 1942–1948, File 601-04, clippings; cited in Jackson, “Bombs in a National Park,” 103.

While the organization's members were opposed to lands being removed from NPS authority, the president of the Izaak Walton League was perhaps more contrite: "we do not want to be in the position of opposing any needed national defense measures"⁴⁷—a sentiment no doubt shared by many.

Military Expansion on O'ahu

The proposed bombing range at Kīlauea was only a small part of a far greater expansion of the US military during this period. Although President Roosevelt was frustrated continually in his efforts to secure political backing for his broader aims to prepare the country for war—his several attempts to create a government-directed oversight board with powers over industry and production met with consistent opposition by American isolationists⁴⁸—he succeeded in expanding the size of the military and its armaments. Late in 1939, following the German invasion of Poland and on the basis of a national emergency, he pushed through an increase of 227,000 new troops in the regular Army and 235,000 additional in the National Guard.⁴⁹ In September 1940, Congress passed the Selective Service and Training Act (SSTA), a move that would increase troops to 1.5 million by the middle of the following year.⁵⁰

These steps had important impacts on Hawai'i. By the end of 1940, there were nearly 30,000 military personnel in the islands, compared to an overall population of just over

⁴⁷ Cited in Moniz Nakamura, "Up in Arms!" 8.

⁴⁸ Frank N. Schubert, *Mobilization: The U.S. Army in World War II* (Washington, DC: US Army Center of Military History, 1991), accessed September 12, 2011, <http://www.history.army.mil/documents/mobpam.htm>. On military preparedness and prewar mobilization, see Marvin A. Kreidberg and Merton G. Henry, *History of Military Mobilization in the United States Army, 1775–1945* (Washington, DC: Department of the Army, 1955); Byron Fairchild and Jonathan Grossman *The Army and Industrial Manpower*, US Army in World War II Series (Washington, DC: US Army Center of Military History, 1959); R. Elberton Smith, *The Army and Economic Mobilization*, US Army in World War II Series (Washington, DC: US Army Center of Military History, 1959); and Lenore Fine and Jesse A. Remington, *Construction in the United States*, US Army in World War II series (Washington, DC: US Army Center of Military History, 1972).

⁴⁹ Stetson Conn, *Highlights of Mobilization, World War II, 1938–1942*, Office of the Chief of Military History (Washington, DC: US Army Center of Military History), Historical Manuscripts Collection (HMC), File no. 2.3-7, AF.B, accessed October 12, 2011, <http://www.history.army.mil/documents/WWII/ww2mob.htm>.

422,000.⁵¹ In 1941, the number increased to 43,177.⁵² Using WPA funds, military engineers and architects continued expanding Schofield Barracks and created a new Hickam Field on the edge of Pearl Harbor.⁵³ Military parades at Hickam and Schofield Barracks were popular with local people, and soldiers and sailors were a continuing presence in downtown Honolulu. Although many expected a Japanese attack, possibly somewhere in the Pacific, few actually thought it would occur at Hawai‘i.

General Walter C. Short (1880–1949), who took command of the Hawaiian Department in February 1941, wanted especially to improve O‘ahu’s air strength. To this end, he began work on several dispersal runways and auxiliary airfields not only on O‘ahu but also on the islands of Hawai‘i, Maui, and Kaua‘i.⁵⁴ He further pressed for completion of the Army Air Corps Station at Bellows Field in Waimanalo and a landing strip in Haleiwa.⁵⁵ Other new developments included reassigning the Army’s Kuwaahoe Military Reservation, the site of the World War I-era Fort Ulupau (later Fort Hase), as a seaplane facility, known after 1941 as Naval Air Station, Kaneohe.⁵⁶ With expanded airstrips and support facilities, the Navy’s dirigible station at Barbers Point also received an upgrade to become the Marine Corps Air Station, Ewa.⁵⁷

The expansion of Hawai‘i’s defenses resulted in numerous administrative and organizational changes for the Hawaiian Department. Substituting a new “triangular” organization for the long-standing “square” division of World War I, General Walter Short

⁵⁰ Schubert, *Mobilization*, 16–17. See also Garry and Spencer, *First Peacetime Draft*; and Flynn, *The Draft*.

⁵¹ David Oakes Woodbury, *Builders for Battle: How the Pacific Naval War Bases Were Constructed* (New York: E. P. Dutton, 1946).

⁵² Conn, Engelman, and Fairchild, *Guarding the United States*, 170.

⁵³ Addleman, *History of the United States Army*; and Alvarez, *History of Schofield Barracks Military Reservation*.

⁵⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, 169. Short also pressed for the construction of concrete bunkers to protect antiaircraft guns. See Freeman, “Abandoned and Little-Known Airfields: Hawaii, Northern Oahu Island.”

⁵⁵ Dorrance, “The U.S. Army on Kaua‘i,” 162; Conn, Engelman, and Fairchild, *Guarding the United States*, 169; and Paul Freeman, “Kahuku Army Airfield/ Kuilima Air Park, Kahuku, HI, Abandoned and Little Known Airfields: Hawaii, Northern Oahu Island,” revised June 17, 2012, accessed October 18, 2012, http://www.airfields-freeman.com/HI/Airfields_HI_Oahu_N.htm.

⁵⁶ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6; and “MCB, Hawaii, Hawaii.”

reorganized the 19th and 25th Infantry Regiments as the 24th Infantry Division and the 27th and 35th Infantry Regiments as the 25th Infantry Division.⁵⁸ In October 1940, the Hawaii National Guard was “federalized,” with the 299th Infantry Regiment (totaling about 1,300 men and officers—half below expected strength) becoming the third regiment of the new 24th Infantry Division. The second National Guard unit, the 298th Infantry, supported the 25th Infantry Division on O‘ahu.⁵⁹

Under General Short’s leadership, training for all the regiments changed as well, with greater emphasis on air and amphibious attack preparation.⁶⁰ There were also new antiaircraft stations, one notably at Mount Ka‘ala overlooking Schofield Barracks, an installation still under construction at the time of the Pearl Harbor attack.⁶¹ Although fighter planes were in short supply—only 150 were stationed in the islands in 1941—Short took steps to build protective bunkers at Wheeler and other bases in the event of air attack.⁶²

⁵⁷ “Naval Air Museum Barber’s Point, History, Base Property History and Use,” accessed September 21, 2012, <http://www.nambarberspoint.org/history.htm>.

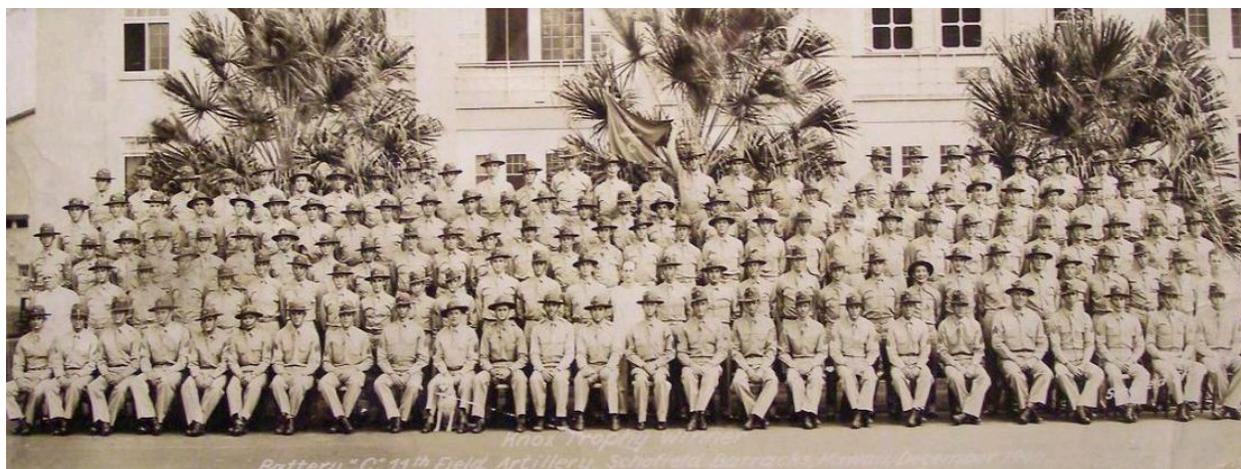
⁵⁸ Alvarez, *History of Schofield Barracks*, 60. On the reorganization of infantry brigades, see John B. Wilson, *Maneuver and Firepower: The Evolution of Divisions and Separate Brigades*, Army Lineage Series (Washington, DC: Center of Military History, US Army, 1998), 144–46; and John J. McGrath, *The Brigade: A History: Its Organization and Employment in the U.S. Army* (Fort Leavenworth, KS: Combat Studies Institute Press, 2004).

⁵⁹ Conn, Engelman, and Fairchild, *Guarding the United States*, 212.

⁶⁰ Conn, Engelman, and Fairchild, *Guarding the United States*, 162–64. See also Freeman, “Abandoned and Little-Known Airfields: Hawaii, Northern Oahu Island.”

⁶¹ Alvarez, *History of Schofield Barracks*, 59.

⁶² Freeman, “Abandoned and Little-Known Airfields: Hawaii, Northern Oahu Island.”



5. 8. Battery C, 11th Field Artillery, Schofield Barracks, December 1940. The Hawai'i garrison had grown significantly by the late 1930s and early 1940s to nearly twice its strength a decade before.

Navy forces experienced a similar level of development. In 1940, the Pacific-based Battle Fleet consisted of 3 aircraft carriers, 9 battleships, 12 heavy cruisers, 8 light cruisers, 50 destroyers, and 33 submarines along with scores of smaller vessels. Historically headquartered in San Francisco, the War Department decided in February 1941 to shift the operations center to Hawai'i, thereby making Pearl Harbor the home of the newly designated Pacific Fleet.⁶³ The fleet's chief commander was Admiral Husband E. Kimmel (1882–1968), a long-serving officer with a reputation for exacting discipline.⁶⁴ Both Kimmel and Short were confident in Hawai'i's defensive capabilities, as was the military's higher command. US Army chief of staff General George Marshall (1880–1959) expressed his confidence that Hawai'i faced “no landing threat so long as we have air superiority.”⁶⁵

As of spring 1941, the naval command in Hawai'i consisted still of the Minecraft Base,

⁶³ The new fleet included the Battle Force, a Scouting Force, and Amphibious Force and the Submarine Force, with Admiral Kimmel exercising direct authority over the 14th District. *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6.

⁶⁴ C. Peter Chen, “Husband Kimmel,” World War II Data Base, accessed December 12, 2012, http://ww2db.com/person_bio.php?person_id=93.

⁶⁵ Cited i

Fleet Airbase, Submarine Base, Naval District, and the separate Pearl Harbor Naval Shipyard.⁶⁶ The pace of construction of new base facilities had accelerated since 1939, with the first cost-plus-fixed-fee contract—a measure proposed by the Hepburn Board to speed project completion—signed in August 1939. Work included expanding the Ford Island air base and the new facility at Kaneohe, and additional work at Midway and Johnston islands.⁶⁷ Late in 1939, an additional contract called for construction of two additional docks at Pearl Harbor, with additional outlays and contracts beginning in 1940 to bring the total project to well over \$40 million prior to 1941.⁶⁸



5. 9. Aerial view of Fort Shafter, Honolulu, 1938.

A key site of new growth was the Navy Shipyard at Pearl Harbor. Administratively separate from the Naval District, the shipyard was a critical component in the Navy's strategic

n Conn, Engelman, and Fairchild, *Guarding the United States*, 163.

⁶⁶ Kennedy Hickman, "Pearl Harbor: The US Navy's Home in the Pacific," About.com, Military History, accessed December 12, 2012, <http://militaryhistory.about.com/od/shipprofiles/p/pearlharbor.htm>.

⁶⁷ "Pearl Harbor and the Outlying Islands: US Navy Construction in World War II," from *Building the Navy's Bases in World War II: History of the Bureau of Yards and Docks and the Civil Engineer Corps, 1940–1946*, Vol. 2, chap. 22, pp. 121–62, Navy Department Library, online, Naval History and Heritage Command, accessed December 12, 2012, <http://www.history.navy.mil/library/online/constructpearlww2.htm>

⁶⁸ Fry, "Pearl Harbor Naval Shipyard: The Interwar Years 1919–1941," 18. Estimates of total expenditures—both Army and Navy—in 1940 reached approximately \$60 million in 1940 and as much as \$200 million in 1941. See Allen, *Hawaii War Years*, 83–84.

planning for the Pacific, charged with repairing US ships located far from mainland bases. New projects begun between 1939 and 1941 included additional dredging of the harbor and entrance, construction of new barracks, warehouses, and administrative facilities, and the addition of a new dry dock to match the one completed after World War I.⁶⁹ The expansion of the shipyard and related facilities required a massive increase in labor, much of it supplied by a growing civilian workforce. From 3,300 employees in June 1940, the payroll jumped to 7,300 by the following year.⁷⁰ This matched the expansion of the civilian workforce on other mostly military-related projects in the territory, straining local housing and services.⁷¹



5. 10. Pearl Harbor, May 1940.

⁶⁹ *The U.S. Navy in Hawaii, 1826–1945: An Administrative History*, “Development of the Naval Establishment in Hawaii,” 6–9.

⁷⁰ Fry, “Pearl Harbor Naval Shipyard: The Interwar Years 1919–1941,” 18.

⁷¹ Shoemaker, *Labor in the Territory of Hawaii, 1939*, 226.

Military spending and civilian-led projects resulted in a boom in the islands' economy. With housing in short supply, local residents took in boarders or constructed additional dwellings on their properties.⁷² There were also new walk-up apartments, many near streetcar lines in downtown Honolulu and the resort area of Waikīkī. Laundries, barbershops, and hairdressers proliferated—as did bars, dancehalls, pool halls, tattoo parlors, and other venues aimed at a predominantly male workforce.⁷³ Although prostitution was by the 1930s illegal in the territory, military and civil authorities tacitly permitted brothels within designated areas, notably Chinatown along downtown Honolulu's western edge. Long a presence in the islands, these establishments gained new footing in the immediate prewar years as mainland migrants joined local women to work in the closely monitored sex industry.⁷⁴

While military authorities silently condoned the burgeoning sex trade, they vocally encouraged other forms of more visible recreation, such as base athletic teams, including baseball and softball, organized boxing and wrestling tournaments, and band concerts.⁷⁵ Local civilians invited officers to their homes and joined the military at dinners and dances in Waikīkī's luxury hotels.⁷⁶ Recreational officers encouraged soldiers and sailors to attend church services, concerts,

⁷² Louis Fung, Tonia Moy, Mayu Ohama, William Chapman, and Don Hibbard, *Hawai'i Modernism Context Study* (Honolulu and San Francisco: Historic Hawai'i Foundation and National Trust for Historic Preservation, Western Regional Office, 2011).

⁷³ Brown, *Hawaii Goes to War*, chap. 1, "Prelude."

⁷⁴ Beth Bailey and David Farber, "Prostitutes on Strike: The Women of Hotel Street during World War II," excerpted from "Hotel Street: Prostitution and the Politics of War," *Radical History Review* 52 (Winter 1992): 54–77; Bailey and Farber, *First Strange Place*; John McDermott, "Hawaii's Sex Trade Has a Long, Rich and Seedy History," *Pacific Business News*, April 26, 2009, *Pacific Business News Newsletter*, accessed December 10, 2012, www.bizjournals.com/pacific/stories/2009/04/07/newscolumn1.html; and Richard Greer, "Dousing Honolulu's Red Lights," *Journal of the Hawaiian Historical Society* 35 (2000): 185–202.

⁷⁵ Addleman, *History of the United States Army*, 66; and Alvarez, *History of Schofield Barracks*, 54.

⁷⁶ Chris Fleck, "Remembering World War II," *Waikiki Magazine*, December 4, 2012, accessed October 12, 2013, <http://www.waikikivisor.com/2012/ilove-waikiki/remembering-world-war-ii/>. The life of one prominent military resident, Beatrice Patton, writer and wife of General George S. Patton, provides a sense of genteel life in the islands as a military dependent. See Nancy J. Morris, "Beatrice Patton's Hawai'i," *Hawaiian Journal of History* 39 (2005): 75–90.

and enjoy other activities.⁷⁷ All ranks visited the beaches and scenic sites of the island, had their pictures taken with hula performers at the Kodak show in Kapiolani Park, and experienced Chinese or Japanese dining (often their first).⁷⁸ They also filled Honolulu's many movie theaters, located a short walk from the Honolulu train station and several in-town taxi stands.⁷⁹ Both soldiers and sailors participating in the annual fleet exercises had opportunities as well for organized excursions, including trips to other islands—notably Hawai'i's national park.



5. 11. Downtown Honolulu, ca. 1940-41. Wo Fat's restaurant was a favorite of visiting military personnel.

⁷⁷ Linn, *Guardians of Empire*, 115–17.

⁷⁸ Kai White and Jim Krause, *Waikiki, Hawai'i*, Images of America Series (Mount Pleasant, SC: Arcadia, 2007); and Hibbard and Franzen, *View from Diamond Head*. Promoter Fritz Herman founded the Kodak Hula Show in 1937. The first show featured five dancers, four musicians, and an audience of one hundred. The popular shows later expanded to twenty female and six male performers, fifteen musicians, two chanters, and audiences of three thousand each week. For many tourists, their only exposure to Hawaiian dance was the Kodak Hula Show. See "Hula and Tourism," HawaiiHistory.org, 2013, accessed October 12, 2013, <http://www.hawaiihistory.org/index.cfm?PageID=439>. Wo Fat's Chinese restaurant on Maunakea Street, completed just in 1938, was a popular venue with service personnel. See Chinatown, Honolulu, Culture and Arts District Exhibitions, "Wo Fat," [2012], accessed December 14, 2013, <http://chinatownhonolulu.org/50/maunakea-street-buildings>.

Military and Other Visitors in the Park

In January 1940, the park's superintendent noted an increase in Kīlauea visitors to 13,782 compared to 12,091 the previous year; Haleakalā's numbers increased during the same period to 3,170 from 2,655.⁸⁰ By March, he reported a jump in visitors at Kīlauea to 24,951 over 11,977 for the same period the previous year.⁸¹ These figures remained relatively constant throughout the two years leading up to the war, rising to 39,230 at Kīlauea in July 1940 and reaching a record of 40,910 in the peak summer month of August 1941.⁸² Although Haleakalā's visitor numbers were always modest in comparison, even this remote site experienced a rise from around 1,500 to 2,000 monthly visitors to fully 3,640 in the same month of Kīlauea's record.

Much of the increase was the result, as Acting Chief Ranger Arthur L. Jess recorded, of "the upward trend of military traffic."⁸³ Monthly reports record frequent excursions by sailors, especially. In January 1940, for example, the park hosted a tour of 1,500 men and officers in Hawai'i as part of the fleet exercise; in February, rangers assisted 170 sailors from the USS *Dobbin* and an additional group of 360 from the warships USS *Hull*, *Macdonough*, *Worden*, and *Dewey*.⁸⁴ The report for May 1940 mentioned 1,000 officers and men from the several ships anchored off of Lahaina visiting Haleakalā; other parties of 50 to 100—and sometimes up to 300—naval personnel at both parks were a frequent presence. These figures continued into 1941 with 275 officers and men visiting from the USS *Medusa* and *Vestal* in June 1941, an additional 208 naval personnel from the USS *Boreas* in July, and a total of 1,083 Navy sailors and officers listed the following month.⁸⁵

⁷⁹ Laura Ruby and Ross W. Stephenson, *Honolulu Town*, Images of America Series (Mount Pleasant, SC: Arcadia Publishing Company, 2012); and Lowell Angell, *Theatres of Hawai'i*, Images of America Series (Mount Pleasant, SC: Arcadia Publishing Company, 2011).

⁸⁰ Superintendent's Monthly Reports, January 1940.

⁸¹ Superintendent's Monthly Reports, March 1940.

⁸² Superintendent's Monthly Reports, August 1941.

⁸³ Superintendent's Monthly Reports, July 1941.

⁸⁴ Superintendent's Monthly Reports, June, July, and August 1941.

Most of the new visitors came by bus as part of organized tours. Ranger Gunder E. Olson, writing in February 1940, described the visit of sailors from the USS *Dobbin* as requiring eighteen buses. Other Navy personnel, often traveling from temporary anchorage in Hilo, came by car, typically traveling in a convoy.⁸⁶ The count of Army visitors to the park and to KMC remained steady as well during this period. With its commandant—Lieutenant Colonel Stockbridge Hilton in 1940 and Major H. F. Conroy beginning in January 1941⁸⁷—two assisting officers, medical officer, and a permanent staff of over 60, KMC continued to host approximately 500 visitors on any given day, with as many as 10,000 monthly.⁸⁸ Other military personnel traveled by private car or taxi, staying only a single day.



5. 12. Volcano House from NPS Headquarters Building. Superintendent Wingate was pleased to have seen the building repainted in NPS-approved brown and beige.

Ranger reports for 1940 and 1941 testify to the military presence at lectures—many presented at KMC’s theater—and at the park’s museum. Others participated in ranger-led

⁸⁵ Superintendent’s Monthly Reports, August 1941.

⁸⁶ Gunder E. Olsen, Report to the Superintendent, March 1, 1940, Superintendent’s Monthly Reports, February 1940.

⁸⁷ Superintendent’s Monthly Reports, January 1941.

⁸⁸ Tomanari-Tuggle and Bouthillier, *Integrated Cultural Resource Management Plan*, III-42, 47.

organized hikes. There were occasional problems, of course. In February 1940, NPS rangers relied on the help of the US Navy shore patrol to apprehend three intoxicated sailors who tried to purloin an NPS vehicle while visiting the park.⁸⁹ The same month, an Army truck from KMC collided with a civilian vehicle; later, an Army truck and CCC truck had a mishap. There was also an accidental fire involving a water tank in the KMC mess hall, the theft of money from a museum donation box sponsored by the civic-support group Hui o Pele (later retrieved), another mishap involving a CCC truck and an Army vehicle, and the detention of Major James E. Rees of the 35th Infantry, who had caused a disturbance at the old Volcano House annex while drinking with friends—a situation addressed by acting commandant Major Richard Wetherill and Major Newell from the Inspector General’s Office in Honolulu, who arrived the next day.⁹⁰

Throughout 1941, similar small incidents occurred. There was a case of “improper conduct” involving a soldier visiting the museum, a minor accident involving an Army truck from KMC and a civilian car, the apprehension of an enlisted man “found in an intoxicated condition along the Mamalahoa Highway,” the detention of a soldier caught defacing a public telephone box at the Thurston Lava Tube, and a prolonged search for two soldiers missing from their party—rangers later discovered that they had caught a ride around the island and “were each made to buy two defense Bonds each [*sic*] and were given extra work on the woodpile for the remainder of their stay.”⁹¹ At the more remote Haleakalā, a visitor from the Army and Navy (United Services) YMCA in Honolulu fell fifty feet while hiking on the Silversword Trail (he was only slightly injured) and three Marine Corps aviators were killed when their three planes each crashed into the slopes of Haleakalā at an elevation of 8,000 feet, just outside the park boundaries.⁹²

While both divisions of the park retained their usual appeal, in 1940 and 1941, visitors were treated to an unusually active volcano at Kīlauea and the burst of silversword blooms at

⁸⁹ Superintendent’s Monthly Reports, February 1940.

⁹⁰ Superintendent’s Monthly Reports, May, October 1940, May 1941.

⁹¹ Superintendent’s Monthly Reports, June, August, September and October 1941.

⁹² Superintendent’s Monthly Reports, June, September 1941.

Haleakalā. Though the Kīlauea Caldera had been inactive since 1934, nearby Mauna Loa issued a continuous flow of lava during the prewar period.⁹³ The first indication of increased activity came on April 7, 1940. Most of the activity was at the mountain's summit, though lava did extrude along the three-mile fissure on the southwest slope of the mountain.⁹⁴ Announced in the local press, the event brought additional visitors to the park “though [it created] less [interest] than usual due to the German invasion of Denmark and Norway which broke on the same night.”⁹⁵ By June, interest was at a high, a circumstance that required the posting of additional staff near the flow.⁹⁶

The bountiful display of silversword blooms may have been the outcome of a prolonged drought affecting both Kīlauea and Haleakalā. A threatened Hawaiian plant, the silversword (*Argyroxiphium sandwicense* subsp. *macrocephalum*, part of the daisy family Asteraceae) thrives on the island of Maui above around 7,000 feet. The silversword produces a stock of maroon flowers when it reaches senescence, at a diameter of two feet.⁹⁷ The year 1941 produced a bumper display, with the local newspapers giving a great deal of publicity to the flowering plant and a separate article appearing in the July issue of *Paradise of the Pacific*, a widely distributed tourism promotion periodical.⁹⁸ Ranger Frank A. Hjort reported that “traffic was well above normal . . . and was undoubtedly caused by the blooming of the silversword plants and the publicity they received.” Many of the visitors were “Navy men,” anchored off Lahaina during fleet exercises;

⁹³ Robert I. Tilling, Christina Heliker, and Donald A. Swanson, *Eruptions of Hawaiian Volcanoes—Present, Past, and Future*, rev. ed., General Information Product 117 (Washington, DC: US Geological Service, US Department of the Interior, 2010), 13.

⁹⁴ Report of the Seismologist, Volcano Observatory, May 10, 1940, Superintendent's Monthly Reports, April 1940.

⁹⁵ Superintendent's Monthly Reports, May 1940.

⁹⁶ Superintendent's Monthly Reports, June 1940. At the request of Hawaii's non-voting delegate to Congress, Samuel Wilder King (1886–1959), the Army considered blasting diversion channels for the lava outside of Hilo. The District Engineers Office countermanded the proposal on the grounds of cost. See Superintendent's Monthly Reports, April 1940.

⁹⁷ W. L. Wagner, D. R. Herbst, and S. H. Sohmer, *Manual of the Flowering Plants of Hawaii* (Honolulu: University of Hawai'i Press, 1990).

these and interested Honolulu visitors helped bring the total visitor count for June to 4,030, over three times as many as the same month the previous year.⁹⁹

Far from discouraging military visitors, Superintendent Wingate and the park rangers did all they could to make service personnel welcome. Wingate often met with visiting naval and military personal, welcoming them to the park.¹⁰⁰ He also dealt personally with individual officers involved in parkland surveys, such as the Mauna Loa truck road and the proposed bombing range along the Hilina Pali.¹⁰¹ In September 1940, he entertained retiring Hawaiian Department commander General Herron, speaking positively of their relationship despite disagreements over the withdrawal of lands from the park.¹⁰² In September 1940 and again in June 1941, the superintendent made special provisions for a contingent of Air Corps officers and men from Morse Field, recently established on the south end of the island.¹⁰³

Although the park had attained surprising popularity in the years just prior to the war, there had been one major setback. On February 6, 1940, a kitchen fire at Volcano House spread quickly to adjacent rooms and then the lobby area, quickly consuming the almost fifty-year-old building.¹⁰⁴ The loss of the park's single hostelry severely affected operations and visitor traffic. Travelers from O'ahu now generally had to stay in Hilo, and NPS officials had no place to receive distinguished visitors. Five associated cottages and the annex, which dated to 1877 and had been miraculously moved back from its original site twenty years before, survived and served as auxiliary accommodations.¹⁰⁵ Designated as the new museum, it would soon serve as a bar and clubhouse for military and other visitors.

⁹⁸ Newspapers and *Paradise of the Pacific*, Superintendent's Monthly Reports, June 1941.

⁹⁹ Superintendent's Monthly Reports, June 1941.

¹⁰⁰ Superintendent's Monthly Reports, June 1941.

¹⁰¹ Superintendent's Monthly Reports, July and December 1940.

¹⁰² Superintendent's Monthly Reports, September 1940.

¹⁰³ Superintendent's Monthly Reports, September 1940, June 1941.

¹⁰⁴ Part of the structure dated only to 1940; the entry area and lobby had been built in 1891. See Superintendent's Monthly Reports, February 1940.

¹⁰⁵ William Chapman, Jeffrey Tripp, Kepa Lyman, Jessica Way, and Lorraine Minatoishi-Palumbo, *1877 Volcano House*, Historic Structures Report (Kilauea, HI: For the Hawai'i Volcanoes National Park, 2009). ; and Olson, *Story of the Volcano House*.



5. 13. In February 1940, fire destroyed the famous Volcano House. Dating to 1905 and 1921, the venerable hostelry was the primary venue for Kīlauea's visitors and a longstanding concession within the park.



5. 14. Silversword in bloom, Haleakalā. One of "nature's wonders" the rare silversword plant attracted the attention of many visitors to the park. The plant would become a much-discouraged souvenir for military personnel.

Continuing Work of the CCC

Despite the many visitors and the evident pressure on the park's few staff members, Wingate and his assistants forged ahead with many important projects, much of it involving the CCC.

Important to the territory's economic well-being in the mid-1930s, the CCC program continued providing employment for young men, most of them recent high-school graduates, and served as a mainstay for the park's construction efforts both in Kīlauea and at Haleakalā.

By 1938, the approximately 200-man workforce moved from its original location at the old Kīlauea summer camp into new quarters near Kīlauea Iki. The camp included a recreational hall, mess hall, dormitory, latrines and bath facilities, warehouse, offices, and an infirmary and dispensary.¹⁰⁶ Similar though less extensive facilities were located on Maui. Because of the cold weather during Haleakalā's winter months, Haleakalā's CCC force moved down to the old rest station and later to the larger base camp, commuting back to the summit when conditions allowed.¹⁰⁷ By September 1938, two barracks were nearly complete at the camp and the mess hall was in operation.¹⁰⁸

The CCC enrollees continued with the roster of projects set out when the federal program began, including work on trails, walls, overlooks, and roads, as well as more permanent administrative and residential facilities within both sections of the park. They also removed fire hazards, cut trees, installed signs, and strung telephone wires. From a peak enrollment in 1935 of nearly 300 young men, the number of enrollees at Kīlauea decreased gradually to about 150 by 1940¹⁰⁹; Haleakalā's much smaller program operated with about 25 enrollees at any one time.¹¹⁰

Monthly reports filed by Project Superintendent G. W. Pope and later by various camp directors, including Joseph E. Christ and Frank C. Huston, provided detailed accounts of the

¹⁰⁶ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21.

¹⁰⁷ Jackson, *Administrative History*, 144–46.

¹⁰⁸ J. A. Peck, District Ranger, to Superintendent, memorandum, September 30, 1938, Superintendent's Monthly Reports, January 1938.

¹⁰⁹ Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21.

¹¹⁰ Superintendent's Monthly Reports, May 1940.

work.¹¹¹ In September 1938, the CCC transplanted trees and completed other landscaping at KMC; in December, CCC workers completed a second set of quarters for NPS staff; in April 1939, they completed trails from the Nāpau Crater and the boundary trail from ‘Ainahou Ranch to Halapē; and in the same month, workers planted 600 coconut palms at Halapē.¹¹² CCC workers also completed the parking area and new tennis court at Volcano House (a project completed shortly before the fire). In December 1939, CCC enrollees finished a second employee’s cottage at Kīlauea, were half finished with another, built two fire tool caches, completed a sewage disposal system, and initiated a new woodshed. They also completed 1.75 miles of the Hilina Pali Auto Trail, provided landscaping in the NPS headquarters area, and “removed exotics” in the Bird Park Area.¹¹³

At Haleakalā during the same period, the CCC built the new camp, with bunkhouses and an infirmary, provided new water tanks and pipes, and completed a first ranger’s residence near the summit.¹¹⁴ In spring 1940, the CCC brigade built a firebreak along the park boundary and completed additional road and trail maintenance.¹¹⁵

The two biggest projects of the immediate prewar period were construction of a new Volcano Observatory and Naturalist Building, a \$15,000 project located across the road from the park headquarters, and preparations for the new Volcano House. In summer 1940, work began on the Volcano Observatory and Naturalist Building, starting with the removal of the old Volcano House garage on the proposed site.¹¹⁶ Workers excavated the site, providing a concrete foundation for the principal combined interpretation center and research complex in the park. By November, while work continued on this project and on additional employee residences, including a new duplex unit, CCC workers completed the initial clearance and grading for the

¹¹¹ Many CCC administrators later became park employees, including Joseph Christ and Paul H. Baldwin, who served as “Senior Foreman (Naturalist)” for the CCC program in the late 1930s and early 1940s.

¹¹² Superintendent’s Monthly Reports, September and December 1938, April 1939.

¹¹³ Superintendent’s Monthly Reports, December 1939. See also Carey & Co., *Hawaii Volcanoes and Haleakala National Parks*, 21; and Jackson, *Administrative History*, 144–46.

¹¹⁴ Superintendent’s Monthly Reports, June 1939.

¹¹⁵ Superintendent’s Monthly Reports, March and May 1940.

¹¹⁶ Superintendent’s Monthly Reports, May and June 1940.

new hotel.¹¹⁷ Work on both larger projects continued well into the following year, with CCC workers assisting private contractors.



5.15 Experimental SCR-270 radar, location uncertain; one of a number of radar stations in place by late 1942 and early 1942.

That at Haleakalā was similar but may have had a more permanent tower. It was still not operable at the time of the war's beginning in

In June 1940, at the height of the CCC program, Superintendent Wingate wrote a lengthy memorandum to outgoing NPS director Arno Cammerer (1883–1941) summarizing the program's accomplishments up to that date. These included construction of a park boundary fence that stretched 54 miles; goat drives resulting in the eradication of 7,000 wild goats; the removal of exotic plants over some 6,500 acres; completion of eight employee residences and cottages; installation of a water system for Haleakalā; completion of several major foot and bridle trails at both Haleakalā and Kīlauea, among them the Kīlauea Iki Trail in Kīlauea and the Halemau'u Trail on Haleakalā; erection of museum structures and interpretive markers at the Footprint Area, Thurston Lava Tube, and Halema'uma'u; construction of 9.9 miles of the Mauna

¹¹⁷ Superintendent's Monthly Reports, November 1940.

Loa truck trail; the planting of 700 coconut palms and 500 *puhala* (screwpine, a species of pandanus, *Pandanus tectorius*) near the “old Hawaiian villages” once located along the south coast; and installation of 23 miles of overhead telephone lines and 4.5 miles of underground lines. In addition, the CCC workers completed numerous smaller park structures, benches, fences, and walls; removed sections of old road; added incinerators and sewage disposal systems; and built garages and other ancillary buildings.¹¹⁸

By mid-1940, the CCC program was feeling the effects of the new burst opportunities on O‘ahu because of the war buildup. The superintendent complained in September of the “serious shortage of enrollees.” In October, he noted that it “was necessary to discontinue work on some CCC projects because of enrollee shortage.” Although the park’s complement of workers improved somewhat in November due to the territorial government’s closure of its Waimea Camp and the transfer of 40 young men from that site, enrollment figures remained low.¹¹⁹ By February 1941, the Kīlauea contingent’s strength was down to 123 from an authorized 200-plus.¹²⁰ Haleakalā, with its smaller workforce, suffered less, although there was difficulty at the Maui park branch as well in keeping the enrollment up.¹²¹ By the end of March 1941, total enrollment was down to 143 spread over both camps.¹²² By November, only 74 enrollees were available for duty at the Kīlauea camp.¹²³

A Growing State of Alertness

Notwithstanding the seeming “normality” of the prewar years, both military and civil authorities were taking steps to prepare for possible conflict, steps that would have resultant effects in the

¹¹⁸ Edward G. Wingate to the Director, memorandum, June 13, 1940, Record Group 79, Box 158, National Park Service Collection, NARA San Bruno.

¹¹⁹ Superintendent’s Monthly Reports, November 1940.

¹²⁰ Superintendent’s Monthly Reports, February 1941.

¹²¹ Superintendent’s Monthly Reports, July, September, and November 1940.

¹²² Superintendent’s Monthly Reports, March 1941.

¹²³ Superintendent’s Monthly Reports, November 1941.

park as well. Navy fleet exercises as early as 1938 simulated attacks on US defensive positions. On March 29, 1938, Hilo was the object of an exercise mounted by joint Army and Navy operations.¹²⁴ On May 23, 1940, the territory of Hawaii conducted its first island-wide “blackout” requiring residences and business to shut off or shield their lights, cars to stay off the roads, and towns and cities to cut the power to streetlights. The territory conducted a second island-wide blackout on May 20, 1941, an event seized by the NPS as an opportunity to test the efficacy of their “mobilization plan.”¹²⁵ Yet another blackout exercise occurred on August 23, with the NPS at Kīlauea again playing its part.¹²⁶

Park Service personnel continued wartime preparations in other ways as well. The Red Cross training, conducted by the medical officer at KMC since February 1939, continued throughout 1940 and 1941. The training was available to all of the ranger force and CCC supervisors, as well as office personnel and mechanics.¹²⁷ Additional fire drills were held, and beginning in March 1941, the superintendent formed a committee to consider the means of supplying food to the park in case of an emergency.¹²⁸

In November 1940, the NPS assisted with the territorial government’s plan for an Emergency Police Guard to replace the earlier Home Defense Unit. Soon afterward, NPS personnel joined the Volcano region unit, composed of six, eight-man squads drawn from regular park employees, CCC supervisors, and local residents. Advised by Deputy Sheriff Peter Pakele of the Hawaii Police Department, the new guard was soon meeting monthly. The superintendent also provided for the provision of a rifle range at Kīlauea to assist in the training.¹²⁹

The new military draft and enlistments exacted a toll on the park’s personnel. Park Service employees serving as Reserve Officers, including Ranger Ernest Schutz and the

¹²⁴ Superintendent’s Monthly Reports, March 1938.

¹²⁵ Superintendent’s Monthly Reports, May 1941.

¹²⁶ Superintendent’s Monthly Reports, August 1941.

¹²⁷ Superintendent’s Monthly Reports, February, May, and June 1939.

¹²⁸ Superintendent’s Monthly Reports, May 1940, March 1941.

¹²⁹ Superintendent’s Monthly Reports, November 1940.

superintendent's assistant Benjamin F. Moomaw, reported for training.¹³⁰ Beginning in November 1940, Superintendent Wingate joined W. L. S. Williams, manager of the Ola'a Plantation, and rancher Herbert Shipman as a member of the Puna District Selective Service Board, soon afterward chairing the local district's weekly meetings. By December he was posing for a picture with seventeen inductees from the area—the first drawing for Hawai'i's Selective Service Lottery was on November 12—some of them former CCC employees.¹³¹

Beginning in 1941, the shift toward greater preparedness became more evident. In January 1941, Howard A. Powers, the ranger in charge at Haleakalā, received orders to report for duty as a second lieutenant in the Quartermaster Corps.¹³² Two months later, he left on a Navy plane from Hilo to begin duty on April 1. The same month, three of the park's CCC enrollees volunteered under Selective Service and Training Act, reporting for induction on March 24.¹³³

Throughout spring 1941, the Emergency Police Guard continued its training with help from the county sheriff. In March 1941, fourteen members of the guard completed the Red Cross certificate course at KMC.¹³⁴ There was also a test of blackout coverings in May, leading to the island-wide blackout on May 20 and the formation of a staff committee on "Food Production" in case of emergency. The park also considered ways to limit the number of aluminum and copper containers it purchased as part of its regular operations to assist in the national drive to conserve metals important in the event of war. Wives of employees also began knitting garments for the Hilo Red Cross Chapter.¹³⁵

In July, Hawaii Island's county government instigated a reorganization of all the local home guard units, initiating a uniform signal system. On November 29, 1941, Superintendent Wingate, with the concurrence of the county police, tested the preparedness of the unit with a

¹³⁰ Superintendent's Monthly Reports, May and June 1940.

¹³¹ Superintendent's Monthly Reports, December 1940.

¹³² Superintendent's Monthly Reports, January and March 1941.

¹³³ Superintendent's Monthly Reports, March 1941.

¹³⁴ Superintendent's Monthly Reports, March 1941.

¹³⁵ Superintendent's Monthly Reports, March and May 1941.

surprise “alert.” Pleased with the results, the local unit claimed 100-percent participation and a universal “spirit of enthusiasm and high morale” despite the cold weather.¹³⁶

In April 1941, the park’s CCC program opened a new program for fifty-two boys as part of national program to provide training in critical defense-related trades. These were to include twenty-four slots for training in welding and fourteen each in carpentry and mechanics. Park foreman H. J. Quick was the welding instructor; auto mechanic Stanley Nakamura was elevated to instructor in mechanics. A month later, Earl Russell took over the carpentry training. Visited in mid-April by the territory’s acting director for vocational training, the program was off to a strong start. By July, four of the enrollees had graduated, finding jobs as welders at Pearl Harbor. Others enrollees worked still on the Volcano Observatory and Naturalist Building and on Volcano House, both priority projects for the park in 1941.¹³⁷

The CCC training program helped the park in other ways as well. As the superintendent noted in his July report, the then ten young men on the mechanics class had been “very helpful in keeping our rolling stock in excellent repair.”¹³⁸ Although there was hope the program would continue until at least June 1942, funding ended in November, with the last boys leaving on November 29, the day of Superintendent Wingate’s park-wide simulated alert.¹³⁹

Airplanes, Balloons, and Radar

Throughout 1940 and early 1941, Superintendent Wingate and other park employees worked closely with military authorities on a number of projects. In July 1940, the Army provided new topographical maps for the Mauna Loa truck trail area; the Army Air Corps already had completed a set of aerial photographs recording the lava flow at Mauna Loa in April for use by

¹³⁶ Superintendent’s Monthly Reports, November 1941.

¹³⁷ Superintendent’s Monthly Reports, July and September 1941.

¹³⁸ Superintendent’s Monthly Reports, July 1941.

¹³⁹ Superintendent’s Monthly Reports, July and November 1941.

the park and the observatory.¹⁴⁰ Also in July 1940, the park offered to transfer “surplus laundry equipment,” to either the Army or Navy, receiving positive reply from the Naval District.¹⁴¹ A year later, US Army Corps engineers helped the park buy new water pipe on an Army contract “at a price considerably lower than it could have otherwise been obtained.”¹⁴²

To stay abreast of military developments, Superintendent Wingate met regularly with officials at Fort Shafter and in Washington, DC, during his annual end-of-year visits. He also maintained cordial relations with the commanders at KMC, notably Major H. F. Conroy and his temporary replacement during Conroy’s illness in January 1941, Major W. A. Robinson of the National Guard (299th Infantry Regiment) unit in Hilo.¹⁴³

September 1940 found Superintendent Wingate entertaining two Army Air Corps officers visiting Hawai‘i Island to identify “the possible location of future airport sites.” Wingate was especially concerned about the continuing use of the Army’s Boles Airfield, a replacement for the earlier landing strip constructed by the Army to serve KMC that was unusable after the 1924 explosive eruption of Kīlauea.¹⁴⁴ Located between Uwēkahuna Bluff and the recreation camp, southeast of Halema‘uma‘u, the field was too short—at 1,400 feet—for the newer aircraft coming into military use.¹⁴⁵ However, the field remained in use primarily as an emergency landing strip for civilian aircraft.¹⁴⁶ The military also continued to rely on the site for local operations.¹⁴⁷

¹⁴⁰ Superintendent’s Monthly Reports, July 1940.

¹⁴¹ Superintendent’s Monthly Reports, March 1940.

¹⁴² Superintendent’s Monthly Reports, August 1941.

¹⁴³ Superintendent’s Monthly Reports, January 1941.

¹⁴⁴ The earlier strip was called Spit Horst, and located just south of Halemaumau Crater. The first airstrip experienced a hail of boulders over its surface in the May 1924 eruptions of Halemaumau, causing its closure. See USGS, “Explosive Eruptions at Kilauea Volcano, Hawai‘i,” accessed October 19, 2012,

<http://pubs.usgs.gov/fs/fs132-98/>. The second strip was named after then superintendent Thomas R. Boles. See “‘Boles Field’ Name of New Volcano Airport,” *Hilo Tribune-Herald*, March 16, 1925.

¹⁴⁵ “Landing Field for Volcano Assured Soon,” *Honolulu Advertiser*, January 6, 1925; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-38-41.

¹⁴⁶ Superintendent’s Monthly Reports, September 1940, June and August 1941.

¹⁴⁷ Jackson, *Administrative History*, 87.

In September 1940, Wingate called for the removal of runway markers “if such landings are to be classed as a violation of park regulations.”¹⁴⁸ The Army’s resulting report of October 1940 suggested airfield sites at Keauhou, Puhimau Crater in the East Rift Zone, and the old Peter Lee corral area at Ohiakea, as well as several sites near Glenwood and Mountain View, the latter well outside park boundaries. In 1941, when Wingate wrote to the Civil Aviation Authority (CAA) to request removal of the landing strip from the territory’s list of airfields, the Army agreed that the caldera site was not suited for even emergency landings. Still, the Army noted that in the absence of any other suitable sites, the airfield should remain.¹⁴⁹

Wingate was also concerned about ongoing and proposed military developments at Haleakalā. In April 1940, he reported on an “official Weather Bureau ‘Airways Station’” at Pakaoao (White Hill) Observatory on Haleakalā. He noted further that “the US Navy is also doing some experimental work on weather observations in conjunction with the newly established station.”¹⁵⁰ Although the initial project was short-lived, by July, Admiral Howard W. Fitch, Patrol Wing Two, and Lieutenant Francis Black of the Aerological Office in Pearl Harbor inspected the site and reported favorable on the results of “balloon soundings taken to date.”¹⁵¹

By 1941, the new weather station was fully operable. In April, Navy aerologist Victor Aycock began a new series of soundings. Assisted by Ranger Hjort, one of his balloons reached an altitude of 73,000 feet above sea level, a new altitude record for the service. In May, with the last of the CCC workers sent to Kīlauea, the Aerological Office took over the charges for telephone service to the peak.¹⁵² By June, Lieutenant M. C. Burns was at the site, recording weather and wind conditions.¹⁵³

¹⁴⁸ Superintendent’s Monthly Reports, September 1940.

¹⁴⁹ Jackson, *Administrative History*, 87; and Hawaii National Park Records, File: Landing Fields, HAVO Archives.

¹⁵⁰ Superintendent’s Monthly Reports, April 1940. Pakao’ao is located near Red Hill and adjacent to the present Haleakala Observatory. See Will Kyselka and Ray E. Lanterman, *Maui, How It Came to Be* (Honolulu: University of Hawaii Press, 1980), 133–34.

¹⁵¹ Superintendent’s Monthly Reports, July 1940.

¹⁵² Superintendent’s Monthly Reports, May 1941.

¹⁵³ Superintendent’s Monthly Reports, June 1941.

In July 1940, Superintendent Wingate also began discussions with the Army about “unspecified defense installations” at both Mauna Loa and Haleakalā.¹⁵⁴ As is now well-known, the proposals were for Army-proposed radar technology. A subject of considerable discussion in the subsequent literature of World War II and the Pearl Harbor attack, the new early-warning devices were still very much in their beginning stages of development at the time of the war’s outbreak.¹⁵⁵ The Army’s Signal Corps first proposed a radar system for Hawai‘i in November 1939. The equipment included both fixed (SCR-271) and mobile (SCR-270) machines, with a range from 75 to 125 miles.¹⁵⁶



5. 15. The new Volcano House nearing completion in fall 1941.

¹⁵⁴ Jackson, “Military Use,” 129–30.

¹⁵⁵ Discussed in Harry Butowsky, “Early Warnings: The Mystery of Radar in Hawaii,” *CRM* online, accessed August 14, 2012, http://www.thestormunleashed.com/files/docs/harry_butowsky.pdf.

¹⁵⁶ Conn, Engelman, and Fairchild, *Guarding the United States*, 168.

During the early part of 1940, Signal Corps engineers, operating on behalf of the newly formed Aircraft Warning Service (AWS), surveyed the peaks of the islands' highest mountains in what the Army referred to as a "thorough" study. The Army's report insisted that the places chosen on Hawai'i Island were in fact "not only the most suitable but also the only acceptable sites."¹⁵⁷ Writing in September 1945 in response to later criticism in a *Time* magazine article, Superintendent Wingate explained that the NPS first discussed the proposal with the military authorities in July 1940.¹⁵⁸ At the time, the superintendent had recommended locating the Haleakalā device just outside the park boundaries on Kolekole Peak rather than on the Red Hill (Pu'u 'Ula'ula) position the Army had specified. Wingate further argued that Kolekole Peak was a better site, level and less obstructed, than the higher elevation Red Hill, which was at the time set aside as part of the park's water-collection system.¹⁵⁹

The NPS approved the Mauna Loa site for Army use in November 1940. Following further discussions, the Washington office also issued a special-use permit to the Army for the use of Haleakalā on April 29, 1941.¹⁶⁰ The permit covered a six-acre site and the use of the old CCC camp at 7,000 feet of elevation, soon to be vacant. In July 1941, Wingate visited Haleakalā, observing the Army's new camp then "rapidly taking shape" on the flat area above Pu'u Nianiaiu. Army personnel were also extending the Haleakalā Road toward Red Hill. "This work of necessity makes a conspicuous scrape on the landscape," he noted.¹⁶¹

By August, the road to Red Hill was complete, although unsurfaced. Three buildings at the Pu'u Nianiaiu Camp were also finished.¹⁶² Ranger Hjort reported in October that the 44-foot-tall tower for the new "detection station" was in place, as was a new reservoir at 7,500

¹⁵⁷ Cited in Jackson, "Military Use," 130.

¹⁵⁸ "Pearl Harbor Report: Who Was to Blame," *Time* 46, 11 (September 10, 1945).

¹⁵⁹ Jackson, "Military Use," 130.

¹⁶⁰ Superintendent's Monthly Reports, April 1941 ; Edward Wingate to Director, memorandum, September 14, 1945, Hawaii National Park Records, File 601-05.1; and Archives of Hawaii, Governor Quinn Records, Defense, Haleakala Radar Site.

¹⁶¹ Superintendent's Monthly Reports, July 1941.

¹⁶² Superintendent's Monthly Reports, August 1941.

feet.¹⁶³ Still not operational in December 1941, the Red Hill station would come to represent a significant setback to Wingate's efforts to minimize military impacts within the park. Although the Army would finally operate the station beginning in May 1942, the location was never optimum; the 360-degree clear line produced a confusing echo, or reflected signal, and the Army would eventually abandon the site.¹⁶⁴ However, this outcome could not be known in the months leading up to the war.

Superintendent Wingate and the Park

Superintendent Edward Wingate performed exemplary service for his country during the difficult years of World War II. His loyalty was both to his country and to the transcendent values of the National Park Service: to protect the special qualities of the natural environment for future generations and to amplify the service's aims through the continuing education of the parks visitors, both civilian and military. As a member of the Hawaii Island Blackout Committee and then as chief registrar and chair of the Puna District Selective Service Board he played an important part in Hawai'i's preparations for the coming war. His monthly reports show clearly that he brought a sense of humanity to his role, treating everyone fairly and fighting against prejudice wherever he saw it.

Wingate had first come to Hawai'i in his early twenties, working for the US Geological Survey (USGS). Prior to his appointment as superintendent of Hawaii National Park on November 16, 1933, he worked in the uplands of Kahuku, on the southeast side of Mauna Loa,

¹⁶³ Superintendent's Monthly Reports, October 1941.

¹⁶⁴ Jackson, "Military Use," 130–31. By September, the Army had put five mobile sets into operation, with a sixth—placed at Opana on Oahu's North-shore—added to the circuit in late November. Engineers were still constructing sites for three planned fixed stations in December. See again Butowsky, "Early Warnings."

at Kīlauea, and in the Kapa‘a area of Puna. He also traveled to Maui, working at Kaupo.¹⁶⁵ Originally from North Carolina, he came to appreciate the topography and plant and animal life of Hawai‘i.¹⁶⁶ He was attuned the impacts of humans on fragile environments and pressed for the removal of nonnative plants from the parks open areas and forests. He respected Hawai‘i’s human population, stressing the need to honor and protect traditional Native Hawaiian lifeways at Kalapana and elsewhere, and encouraged his staff to study the Hawaiian language and learn from remaining Hawaiians. He also made sure that Hawaiians were represented on his staff and had a presence in the park.

Wingate was fair to people of other backgrounds and cultures. In his monthly report of March 1938, he praised the efforts of local Japanese residents to take steps for statehood, noting that it was “pleasing that those of Japanese ancestry initiated the movement.”¹⁶⁷ He was encouraged two years later that the Japanese language schools on the island had begun saluting the American flag as part of their daily ritual.¹⁶⁸ Convinced of the loyalty of most local Japanese, he stamped out efforts to slander Japanese residents of the territory.¹⁶⁹ In August 1940, he took the initiative to visit the Japanese naval training ship IJHS *Taisu Maru*, later meeting the cadets and officers during their visit to Kīlauea. The same month he welcomed forty members of the baseball team from Keio University to the park.¹⁷⁰

¹⁶⁵ Moniz Nakamura, “Up in Arms!” 6. Wingate’s appointment had been due to the influence of his father-in-law Shelby L. Singleton, a prominent Chicago lawyer with strong political ties to Secretary of the Interior Harold Ickes (1874–1952). See Jackson, *Administrative History*, 265.

¹⁶⁶ “Administration,” *Nature Notes: The Publication of the Naturalist Division, Hawaii National Park and the Hawaii Natural History Association* 5, no. 2 (November 1953), accessed September 12, 2012, http://www.nps.gov/history/history/online_books/hawaii-notes/vol5-2j.htm.

¹⁶⁷ April 10, 1938, Superintendent’s Monthly Reports, March 1938.

¹⁶⁸ Superintendent’s Monthly Reports, October 1940.

¹⁶⁹ Russell Apple, Wingate interview, 1974, transcript, concerning the Kalapana Extension, July 19, 1974, Records of the Hawaii National Park, HAVO Library.

¹⁷⁰ Superintendent’s Monthly Reports, August 1940.

As war threatened, Wingate was watchful. He later admitted that he feared war would come soon, but probably not to Hawai'i.¹⁷¹ Maintaining vigilance and continuing to work closely with the county police and military authorities on O'ahu, he tried to keep the park on an even course. Throughout the months prior to the war, his principal concerns were the completion of the Volcano Observatory and Naturalist Building and the opening of the resurrected Volcano House.

On November 7 and 8, Superintendent Wingate presided over an island-wide celebration of the reopening of the venerable hostelry. Attendees included Governor Joseph Poindexter and his daughter; George Lycugus, the hotel's elderly proprietor; Thomas Jaggard, recently retired as head of the Volcano Observatory; representatives of the press; radio personalities; and a crowd of between 600 and 800 visitors. The hotel's newly furbished rooms were filled with flowers, including "most effective arrangements of native plants done by Mrs. Annabel Ruddle of Hilo." To mark the event, an Army bomber flew over Hilo dropping leaflets congratulating "Uncle George" on the hotel's reopening.¹⁷²

¹⁷¹ Wingate interview, transcript.

¹⁷² Superintendent's Monthly Reports, November 1941.



5. 16. Superintendent Edward Wingate, head of the Hawaii National Park from 1933 to 1946. Photograph taken in 1939. Wingate was a staunch defender of the NPS mission, often in opposition to military interests.

CHAPTER 6: WAR COMES TO THE PARK

The Pearl Harbor Attack

Just before 8:00 a.m. on December 7, 1941, Japanese airplanes carrying bombs and torpedoes attacked the Pearl Harbor Naval Station and Kaneohe Naval Air Station. The Japanese attack combined 6 aircraft carriers, 22 supporting vessels, 23 fleet submarines, 414 aircraft, and 5 midget submarines in a two-hour, multiple-wave offensive that took the lives of 2,403 American soldiers and sailors and left another 1,178 injured.¹ The Sunday morning assault also stunned the Hawai‘i-based defense force and shocked the American public, bringing the country swiftly into a long-threatened war in both Europe and the Pacific.²

The subject of thousands of books, magazine and journal articles, and theatrical and documentary films, the Japanese attack on Hawai‘i was a pivotal chapter in the history of a long global conflict and a key moment in the story of the United States.³ The “date which will live in infamy” still resonates in the collective psyche of Americans of all generations. It also marked a profound shift in the country’s relationship to the world and its future approach to global issues.⁴

¹ Michael Slackman, *Target: Pearl Harbor* (Honolulu: University of Hawai‘i Press, 1990), 234–35, and Appendix D. These are the most reliable and frequently cited figures. See, for example, Jones and Jones, *Hawaii Goes to War*, xvii. Other articles and books vary the numbers. See Allen, *Hawaii’s War Years*, 18; “5 Facts about Pearl Harbor and the USS Arizona,” A&E Television Network, History in the Headlines, accessed October 12, 2013, <http://www.history.com/news/5-facts-about-pearl-harbor-and-the-uss-arizona>; and “Pearl Harbor Facts,” About.com, 20th Century History, 2013, accessed December 3, 2013, <http://history1900s.about.com/od/Pearl-Harbor/a/Pearl-Harbor-Facts.htm>.

² Prange, *At Dawn We Slept*; and Conn, Engelman, and Fairchild, *Guarding the United States*. Popular accounts include Walter Lord, *Day of Infamy* (New York: Henry Holt, 1957); George Edward Morgenstern, *Pearl Harbor: The Story of the Secret War* (Fairfield, CT: Devin-Adair, 1947); and Larry Kimmitt and Margaret Regis, *The Attack on Pearl Harbor: An Illustrated History* (Bellingham, WA: Navy Publishing, 2004).

³ Facts on the attack are based on Gordon William Prange, Donald M. Goldstein, and Katherine V. Dillon, *December 7, 1941: The Day the Japanese Attacked Pearl Harbor* (New York: McGraw-Hill, 1997); Carl Smith, *Pearl Harbor 1941: The Day of Infamy*, Campaign Series No. 62 (Botley, Oxford: Osprey Publishing, 1999); and Mark E. Stille, *Tora! Tora! Tora! Pearl Harbor 1941*, Raid Series No. 26 (Botley, Oxford: Osprey Publishing, 2011). On the event’s place in films, see Ed Rampell and Luis I. Reyes, *Pearl Harbor in the Movies* (Honolulu: Mutual Publishing, 2001).



6. 1. Destruction of the USS Shaw, Pearl Harbor, December 7, 1941.

The attack, as Japanese Admiral Isoroku Yamamoto (1884–1943) purportedly said, had “awaken[ed] a sleeping giant.”⁵ The United States moved quickly into action, applying its industrial prowess and wealth of natural and human resources to reverse Japan’s expansion into Asia and the Pacific and end German domination in Europe. Hawai‘i, due to its forward location, would become a major outpost of the country’s war effort and an essential component of its Pacific strategy. The cities and towns, mountains, plains, and coasts of these once-remote islands would all change as a result.

Hoping to catch the entire fleet off guard—unknown to the Japanese, the US aircraft carriers were on maneuvers at sea—the Japanese concentrated on the seven battleships lining the quays along the eastern edge of Ford Island and the single ship in dry dock, the USS *Pennsylvania*. Unprepared for the assault, the ships took multiple rounds of torpedoes, bombs, and machine-

⁴ See John Toland, *Infamy: Pearl Harbor and Its Aftermath* (New York: Berkley Press, 1991); and Harry A. Gailey, *War in the Pacific: From Pearl Harbor to Tokyo Bay* (San Francisco: Presidio, 1997).

⁵ Admiral Yamamoto probably never said these exact words, which are from the script of the film *Tora! Tora! Tora!* See Hiroyuki Agawa, *The Reluctant Admiral: Yamamoto and the Imperial Navy*, ed. John Bester ([1969], New York:

gun fire. Hit by a bomb, the USS *Nevada* nonetheless attempted to get underway.⁶ Recognizing that it could block the entrance, its captain decided to beach the ship before reaching the harbor's mouth. The USS *Arizona*, struck multiple times, exploded when an armor-piercing bomb hit its forward magazine, destroying the ship and killing over 1,100 men and officers.⁷

Other ships suffered as well. The USS *Tennessee*, hit by two bombs, stayed afloat, as did the USS *Maryland*, despite damage from two armor-piercing bombs. The USS *West Virginia*, struck by as many as nine torpedoes, listed and turned upside down trapping many of her crew. The USS *California*, severely damaged by both torpedoes and a bomb, struggled to remain afloat, although it sunk a few days later.⁸ Unknown to many of those experiencing the onslaught, five Japanese midget submarines had also participated in the assault, none of them with any success; a US destroyer sank one vessel with depth charges before the attack; the four others either sank as a result of depth charges or were scuttled by their crews during the attack.⁹

To disable American air defenses, Japanese airplanes strafed Ford Island, Hickam and Wheeler Army Airfields, and other air facilities where US personnel had placed airplanes in tight rows, wingtip to wingtip, as a precaution against possible sabotage by local Japanese residents, a fear that proved to be entirely misplaced.¹⁰ Japanese airplanes attacked quarters, administrative buildings, and hangars, killing soldiers and sailors on the ground. Only a few American pilots got

Kodansha International, 1979), 285; and Lawrence H. Suid, "A Terrible Resolve," *U.S. Naval Institute Proceedings* 127, no. 12 (December 2001): 84.

⁶ Naval History & Heritage Command, "Pearl Harbor Raid, 7 December 1941: USS *Nevada* during the Pearl Harbor Attack," accessed December 6, 2013, <http://www.history.navy.mil/photos/events/wwii-pac/pearlhbr/ph-nv.htm>.

⁷ Joy Waldren Jasper, James P. Delgado, and Jim Adams, *The USS Arizona: The Ship, the Men, the Pearl Harbor Attack, and the Symbol that Aroused America* (New York: St. Martin's Press, 2003); and "USS *Arizona* History," Pearl Harbor.org, accessed December 1, 2013, <http://www.pearlharbor.org/center-ships-uss-arizona.asp>.

⁸ Naval History & Heritage Command, "Pearl Harbor Raid."

⁹ John Craddock, *First Shot: The Untold Story of the Japanese Minisubs that Attacked Pearl Harbor* (New York: International Marine Publishing, 2005); and Peggy Warner, Sadeo Seno, and Leo Cooper, *The Coffin Boats: Japanese Midget Submarine Operations in the Second World War* (n.p.: Leo Cooper in association with Secker & Warburg, 1986).

¹⁰ Conn, Engelman, and Fairchild, *Guarding the United States*, 195.

airborne.¹¹ Of a total force of 402 military aircraft in Hawai‘i, 188 were destroyed and 155 damaged. The seaplane units at Kaneohe and Pearl Harbor lost 24 of their 33 PBVs.¹²

By 9:45 a.m.—less than two hours after the attack began—the Japanese airplanes returned to their carriers to begin their voyage home. The Japanese had lost 29 aircraft and experienced 64 deaths, including the crews of the midget submarines. The United States, in contrast, lost four battleships, suffered damage to an additional four battleships, and lost two other ships as well as suffering damage to an additional nine vessels. With over 3,600 military casualties and as many as 100 civilian deaths and injuries, the attack represented the largest assault by an outside power on a US military position in the country’s history.¹³ The war had finally come to America’s door.



6. 2. First Hawaiian Bank, Hilo, barricaded for use as an air-raid shelter.

¹¹ Notably Lieutenants George S. Welch and Kenneth P. Taylor, whose P-40B fighters were located in Hale‘iwa, away from the principal Japanese targets. See John Martin Meek, *The Other Pearl Harbor: The Army Air Corps and Its Heroes on Dec. 7, 1941* (Mustang, OK: Tate Publishing and Enterprises, 2011).

¹² Naval Historical Center, “Pearl Harbor Attack: Patrol Wing (PBV) Two Action Report,” Washington, DC: Department of the Navy, Naval Historical Center, September 3, 2003, accessed October 12, 2012, <http://www.history.navy.mil/docs/wwii/pearl/ph11.htm>.

¹³ *Wikipedia* provides a useful list of earlier attacks: “List of Attacks on US Territory,” *Wikipedia*, modified July 2, 2013, accessed December 12, 2012, http://en.wikipedia.org/wiki/List_of_attacks_on_US_territory.

Aftermath

As US naval and military personnel began rescue and salvage operations, General Walter C. Short, overruling Territorial Governor Joseph B. Poindexter (1869–1951), declared martial law.¹⁴ Fearing a Japanese invasion, General Short ordered that troops occupy key coastal positions around the perimeter of O‘ahu. Troops placed barriers and barbed wire along beaches and excavated and reinforced defensive positions. General Short also mobilized the Hawaiian Territorial Guard and the recently established Emergency Police Guard and ordered the Reserve Officers’ Training Corps (ROTC) units at the university and local high schools to report for duty.¹⁵ The military command also took over government buildings, including the territory’s legislature, ‘Iolani Palace, barricading it with sandbags for protection.¹⁶

Working with a list compiled in September under the Alien Registration Act, the local police, with assistance from the Federal Bureau of Investigation (FBI) and Army Intelligence, immediately detained 482 “suspicious aliens”—most of them prominent figures in the Japanese community, but also a few German and Italian residents of the islands.¹⁷ The military also closed Japanese businesses, suspended the right of habeas corpus, and replaced civilian courts with military tribunals. Travel was limited and rules prohibited residents from holding more than \$200 in cash. The military also rationed gasoline and, for a time, prohibited the sale of alcohol.¹⁸

¹⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, chap. 8. For Poindexter’s role, see “Martial Law in Hawaii,” *Densho Encyclopedia*, updated June 12, 2013, accessed December 12, 2012, <http://encyclopedia.densho.org/Martial%20law%20in%20Hawaii/>. The classic study is J. Garner Anthony, *Hawaii under Army Rule* (Redwood City, CA: Stanford University Press, 1955). The key resource is Thomas H. Green, *Martial Law in Hawaii, December 7, 1941–April 4, 1943*, Judge Advocate General’s School (TJAGS), Library, [1947?], unpublished manuscript, accessed September 18, 2012, http://www.loc.gov/rr/frd/Military_Law/pdf/Martial-Law_Green.pdf.

¹⁵ Allen, *Hawaii’s War Years*, 35–39.

¹⁶ Jones and Jones, *Hawaii Goes to War*, 12; Brown, *Hawaii Goes to War*, 56–59; and Green, *Martial Law in Hawaii*, chap. 11.

¹⁷ Forty-three of those taken into custody were American citizens. See Conn, Engelman, and Fairchild, *Guarding the United States*, 199; citing CG Hawaiian Department to C of S, December 12, 1941, and other papers in AG 381 (December 12, 1941).

¹⁸ Specified in General Order Number 2. The military government soon afterward relented on alcohol sales. See Green, *Martial Law in Hawaii*, chap. 22.

Scenarios of beach assaults and Japanese troops parachuting into the mountains dominated military planning and the imaginations of civilians. Many local residents volunteered their help. Daniel Inouye (1924–2012), later to become a US senator and hero of the 442nd Regimental Combat Team, served as a first-aid volunteer, treating troops and civilians injured in the attack. His contemporary—who also later became a senator—Daniel Akaka, a senior at Kamehameha School for Boys, joined his ROTC classmates in guarding the escarpment behind their school.¹⁹



6. 3. Securing the grounds of Iolani Palace, early 1942. The palace and its grounds would serve as the headquarters for the military government of wartime Hawai'i.

¹⁹ “Survivors Recall Living in Fear after Pearl Harbor Attack,” Associated Press, Fox News.com, December 7, 2007, accessed December 12, 2012, <http://www.foxnews.com/story/2007/12/06/survivors-recall-living-in-fear-after-pearl-harbor-attack/>.

Fearful of shortages, many residents lined up at markets and drugstores where purchases were limited to “normal amounts” to prevent hoarding and preserve their stocks.²⁰ The shelling of Hawai‘i coastal sites by Japanese submarines, including on Maui on December 15 and Hilo on December 30, did not help allay the anxiety of residents.²¹ The sinking of the unarmed Matson ship *Lahaina* on December 12, about 700 miles northeast of Hawai‘i, also contributed to the uneasiness of Hawai‘i’s population.²²



6. 4. Troops along the Waianae Coast, O'ahu. Prior to June 1942, the threat of Japanese invasion remained a central concern of residents and military planners.

²⁰ Brown, *Hawaii Goes to War*, 47 and 88; and Green, “Martial Law in Hawaii,” chap. 11.

²¹ C. Peter Chen, “Attack on Pearl Harbor,” World War II Data Bases, Lava Development, LLC, accessed October 14, 2012, http://ww2db.com/battle_spec.php?battle_id=17.

²² “Sensuikan: Stories and Battle Histories of IJN’s Submarines, IJN Submarine I-9: Tabular Record of Movement,” October 1, 2013, accessed November 12, 2012, <http://www.combinedfleet.com/I-9.htm>.



6. 5. Field artillery placement in sugarcane field, ca. 1942

Nonetheless, as conditions stabilized, new routines became commonplace. Lei makers began to fabricate camouflage netting. Buildings were barricaded and, in some cases—notably the traditionally welcoming Aloha Tower—painted in camouflage.²³ Blamed for their lack of preparedness, both General Short and Admiral Kimmel received notice on December 17 that they were relieved of duty.²⁴ Admiral William S. Pye (1880–1959) temporarily assumed Kimmel’s place, soon (after December 31) to be relieved himself by Admiral Chester W. Nimitz (1885–1966). Short’s responsibilities transferred to Lieutenant General Delos C. Emmons (1889–1965), an Air Corps officer, who arrived on December 17 to take command.²⁵

A significant concern of the leadership was providing enough food for the resident population as well as for its own service personnel. An inventory compiled immediately after the

²³ Brown, *Hawaii Goes to War*, 60–61; Burl Burlingame, Honolulu, “Aloha Tower, Past and Present,” *Honolulu Star-Advertiser*, August 17, 2003, accessed October 13, 2012, <http://archives.starbulletin.com/2003/08/17/features/story1.html>.

²⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, 203–4.

²⁵ Conn, Engelman, and Fairchild, *Guarding the United States*, 204.

attack estimated that Hawai'i had only enough provisions to last 37 days.²⁶ There were significant shortages of rice, potatoes, and onions and insufficient local production to make up shortages of meat and vegetables. General Short requested an immediate supply of fertilizer, seed, insecticides, and farm implements and an emergency delivery of staples and canned goods.²⁷ Authorized by Congress, the food situation remained tenuous as fears over continued Japanese attack hampered delivery from the West Coast. This circumstances would not be relieved until mid-February, when normal communication and transportation resumed.

While the fate of Hawai'i's approximately 150,000 Japanese residents remained unsettled, the military command moved quickly to evacuate other nonessential personnel from the islands.²⁸ These included nonessential civilians, stranded tourists, and families of service personnel. As the year's end approached, the offices of Matson Steamship Lines were packed with men, women, and children securing places on the departing liners.²⁹ By mid-March, over 10,000—most from O'ahu—left the islands; by the end of the year, an additional 20,000 moved to the US mainland.³⁰ Hawai'i seemed for the time a very unsafe place.

December in the Park

On Sunday morning, December 7, Superintendent Wingate rose late, missing the morning news on the radio. At 8:15, listening to a broadcast of a church service, he heard the clergyman say something about an "Attack on Oahu." Waking his wife, Wingate overheard another voice

²⁶ Green, "Martial Law in Hawaii," chap. 11. Also, Allen *Hawaii's War Years*, 160–73.

²⁷ Conn, Engelman, and Fairchild, *Guarding the United States*, 202; and Green, *Martial Law in Hawaii*, chap. 14.

²⁸ Estimates are as high as 158,000 local Japanese residents, over 50 percent of the islands' civilian population. Many of these were citizens as well. See "The War," "At Home," "Civil Rights, The Japanese," WETA, Washington, DC, PBS, September 2007, American Lives Film Project, accessed December 14, 2012, http://www.pbs.org/thewar/at_home_civil_rights_japanese_american.htm. See also Green, *Martial Law in Hawaii*, chap. 17.

²⁹ Illustrated in Brown, *Hawaii Goes to War*, 51.

³⁰ Conn, Engelman, and Fairchild, *Guarding the United States*, 201; and Green, *Martial Law in Hawaii*, chap. 12. A good account is found in Sean Munger, "Expulsion from Paradise: The Civilian Evacuees from Hawaii after Pearl

telling Honolulu's residents to "stay off the streets." The announcer's final comment, "This is no fooling—It is the real McCoy," had the opposite effect on Wingate, who began to suspect it was a prank.³¹

Wingate contacted Ranger Charles Miller, who was manning the park's switchboard. Miller had yet to hear anything himself. Wingate then called the Hilo police, who confirmed that an attack was underway and that they were awaiting orders from O'ahu. Soon afterward, the Federal Communications Office telephoned Wingate with an update. Wingate, in turn, drove to KMC to confer with Colonel Bonham. Soon, he received instructions from the Hilo police to mobilize the Emergency Guard unit and require its members to report for duty. Still lacking identifying armbands, the "park women" hastily sewed bands for the guards. By noon, they reported to their predetermined stations.³²

Wingate met with a rush of visitors still in the park, seeking passes to return home before dark. The superintendent placed all park staff on twenty-four-hour duty, accepting volunteer help from wives and local residents.³³ His counterpart at KMC posted sentries outside the camp and established sandbag-reinforced machine-gun positions along the approaches. The Army also placed trucks and heavy equipment on the old landing strip south of Halema'uma'u Crater and along the still-active Boles Field and the military's golf course to prevent enemy use.³⁴ CCC workers from the park soon assisted in these operations, digging holes to render the landings strips unusable and building bomb shelters.³⁵ They also distributed boulders onto roads and across the old Volcano House parking lot.³⁶

Harbor," accessed December 12, 2012, <http://seanmunger.com/2013/12/07/expulsion-from-paradise-the-civilian-evacuees-from-hawaii-after-pearl-harbor/>; and Green, *Martial Law in Hawaii*, chap. 18.

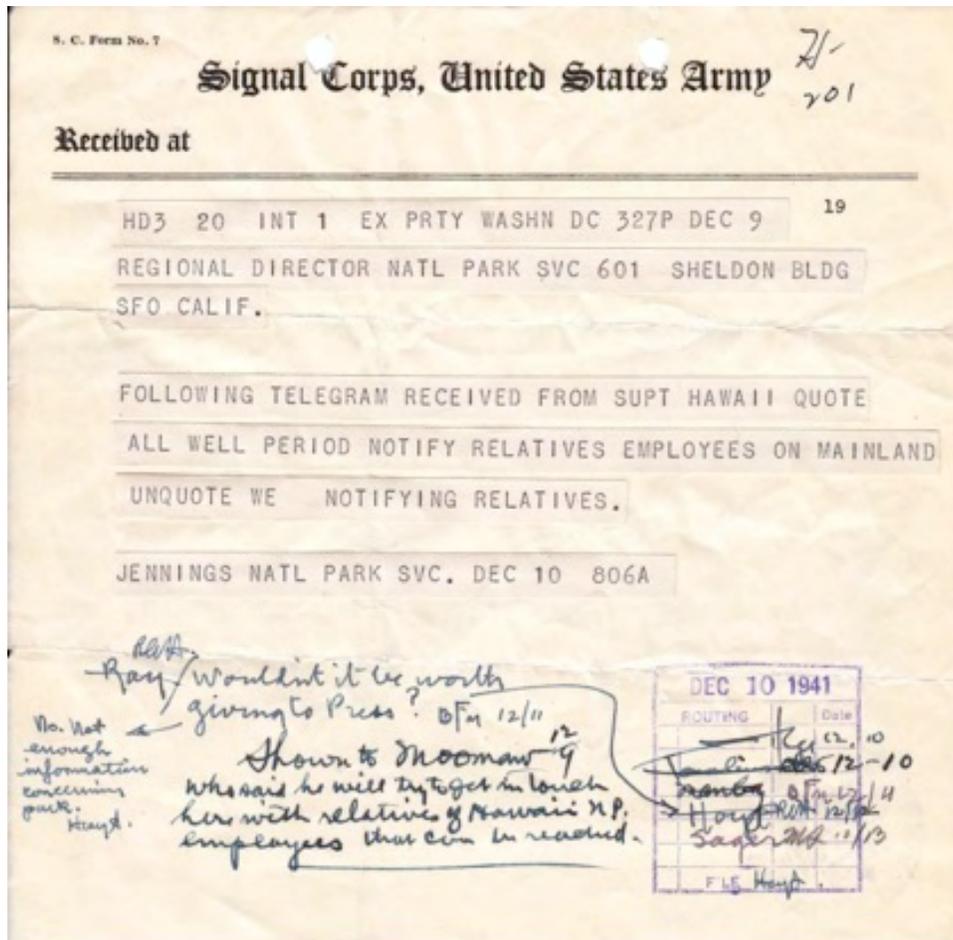
³¹ Superintendent's Monthly Reports, December 1941.

³² Superintendent's Monthly Reports, December 1941; Wingate interview, transcript, 11; and Moniz Nakamura, "Up in Arms!" 13.

³³ Superintendent's Monthly Reports, December 1941.

³⁴ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-47.

³⁵ Superintendent's Monthly Reports, December 1941.



6. 6. Superintendent, Hawaii National Park, to Regional Director, National Park Service, teletype, December 9, 1941.

The CCC enrollees, under the supervision of Ranger Arthur L. Jess, helped install 8 miles—6.5 miles to connect Makaopuhi to Pānau and 1.5 between ‘Āinahou Ranch and Poli o Keawe—of emergency telephone line.³⁷ Ranger Joseph Christ, in charge of the local unit of the Emergency Police Guard, sent the newly mobilized members on coast patrols and assigned

³⁶ Wingate interview, transcript, 14.

guards to three coastal lookout posts.³⁸ Ranger Miller, earlier at the switchboard, spent the rest of the day directing traffic. Two days later, he was at an observation post on the Hilina Pali with a plane table, alidade, maps, and a 40-power telescope.³⁹

The NPS quickly created a network of guard posts and observation stations. These included three primary observation posts at Hilina Pali and Pānau on the Kalapana Trail and at Poli o Keawe Pali. A further guard post was at the Uwekahuna Museum, and two others at the old Volcano House water tanks and the Transfer Station.⁴⁰ Park officials numbered the stations “OP1” through “OP6.”⁴¹ In addition to manning guard posts at both entrances, the eighty or so members of the Emergency Police Guard—composed of NPS personnel, CCC workers, hotel staff, and other local residents—conducted patrols (typically on horseback) over their designated district, extending from the Ka‘ū boundary to 29-Mile and Glenwood. Chief Ranger Christ quickly augmented earlier training with fresh drills on “the proper handling and shooting of firearms.”⁴²

In the days following the attack, Ranger Arthur Jess worked further on installing telephone lines and accompanied Captain L. O. Bryan from KMC on an inspection of guard posts.⁴³ Paul H. Baldwin, recently promoted from naturalist for the CCC program to park ranger, devoted full time from December 7 to the 31 “to home guard duties.”⁴⁴ Mechanic B. J. Loucks also served in the police guard, contributing further on the fabrication of a machine-gun

³⁷ Ranger Arthur L. Jess to Chief Ranger for the Superintendent, memorandum, January 6, 1942, Superintendent’s Monthly Reports, December 1941.

³⁸ Chief Ranger Joseph H. Christ to the Superintendent, memorandum, January 1942, Superintendent’s Monthly Reports, December 1941.

³⁹ Charles W. Miller to Chief Ranger for the Superintendent, memorandum, January 5, 1942, Superintendent’s Monthly Reports, December 1941.

⁴⁰ Wingate interview, transcript, 11; and Moniz Nakamura, “Up in Arms!” 15.

⁴¹ Arthur L. Jess to Superintendent, memorandum, January 6, 1941, Superintendent’s Monthly Reports, December 1941.

⁴² Chief Ranger Joseph H. Christ to Superintendent, memorandum, January 1942, Superintendent’s Monthly Reports, December 1941.

⁴³ Ranger Arthur L. Jess to Chief Ranger for the Superintendent, memorandum, January 6, 1942, Superintendent’s Monthly Reports, December 1941.

⁴⁴ Ranger Paul H. Baldwin to Chief Ranger for the Superintendent, memorandum, January 8, 1942, Superintendent’s Monthly Reports, December 1941.

mount for a KMC position and the manufacture of gun rods (cleaning rods) for Chief Ranger Christ.⁴⁵ Young Gunder E. Olsen, now an assistant park ranger, noted that he threw himself wholeheartedly into the effort of “preserving Hawaii National Park from becoming a possible Hawaii National Battlefield Park.”⁴⁶

Two park employees reported immediately for military duties: the superintendent’s assistant, Benjamin Moomaw, and P. E. [Ernest] Schultz from the Observatory, both Army Reserve officers.⁴⁷ To fill the gaps, Wingate relied on additional help from the wives of rangers and military dependents residing at KMC, a number reporting to the headquarters building to serve as typists. Filling in for Moomaw, the superintendent had the voluntary services of Randolph Crossley, president of the Hawaii Fruit Packers Association, in Kīlauea at the time of the attack. As Wingate wrote in his monthly report to the NPS director, “some changes had to be made, some sharp words spoken, and a head or two lopped off, but all cooperated, and I think you would have been fully satisfied.” “We are,” he explained, “carrying on.”⁴⁸

Probably the most unsettling occurrence at the outbreak of the war was the arrival in the park of an unspecified number of Japanese detainees in the late afternoon of December 7. Traveling under police custody in several cars, they passed the Hilo entrance and proceeded to KMC where they were held under military guard in the small camp stockade and in nearby barracks. Within a few days, others had joined this group, which eventually expanded to approximately 130 men.⁴⁹ The detainees included prominent Japanese residents from Hilo and outlying planation areas, many of them familiar to both military and NPS personnel. Many were teachers; others were prominent business or community figures. Wingate noted that any

⁴⁵ Volcanologist Ruy H. Finch to Superintendent, memorandum, January 10, 1942, Superintendent’s Monthly Reports, December 1941.

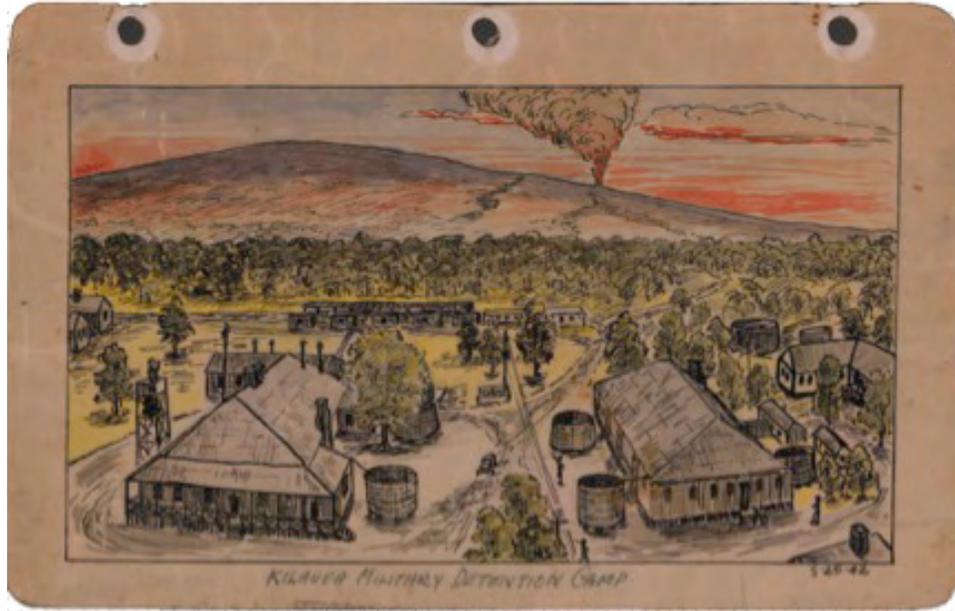
⁴⁶ Assistant Ranger Gunder E. Olson to Chief Ranger for the Superintendent, memorandum, January 1942, Superintendent’s Monthly Reports, December 1941.

⁴⁷ Wingate interview, transcript, 13.

⁴⁸ Superintendent’s Monthly Reports, December 1941.

⁴⁹ These included local artist George Hoshida (1907–1985), who recorded the camp’s features, “A Japanese American’s Journey: The Life and Work of George Hoshida,” Japanese National Museum, Los Angeles, accessed October 12, 2013, <http://www.janm.org/exhibits/hoshida/>.

Japanese elected to public office was included in the lockup.⁵⁰ Soldiers at the camp soon completed a perimeter fence and guard tower, located south of Building 34.⁵¹



6. 7. Illustration of Kilauea Military Camp during the period the facility functioned as an internment camp, December 1941 to April 1942. Pen and watercolor drawing by George Hoshida, August 25, 1942.

Superintendent Wingate was careful not to accuse the Japanese of disloyalty. Pending further word from Honolulu, he informed park employees of Japanese background that they were to report to work as usual. Those in the Emergency Police Guard were also still to serve and “were armed as all the others.”⁵² He later revealed, however, that he had been uncomfortable in the months before the war hearing several NPS employees speak of the “Japanese need[ing] room to expand.” He also noted that some in the local Japanese community seemed overly enthused about visiting Japanese training or other ships; and he noted that he was concerned, as

⁵⁰ Wingate interview, transcript, 14.

⁵¹ Warshauer, “History of Kilauea Military Camp,” chap. 14; Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-49; and Jeffrey F. Burton and Mary M. Farrell, *World War II Japanese American Internment Sites in Hawai‘i* (Tucson, Arizona, and Honolulu, Hawai‘i: Trans-Sierran Archaeological Research and Japanese Cultural Center of Hawai‘i, 2007), 11–20.

were officials in Honolulu, about “possible sabotage” and about Japanese residents “providing useful information” to the enemy.⁵³ Still, he was hesitant to seize “alien property,” as set out in military orders after December 7, partially out of a concern for later legal action.⁵⁴ Against military directives, he posted all military orders at the NPS headquarters building for all to see.

Others shared Superintendent Wingate’s concern for fairness and due process. Chief Ranger Christ reporting on the service of the Emergency Police spoke of fifteen truck farmers from 29-Mile, “who have shared faithfully without a murmur through the long days and nights of rain and cold, knowing that there is slight possibility for paying them for their faithful and diligent service.”⁵⁵ If there were prejudices, they did not show in the park’s records.

Despite the park’s position, military authorities eventually included two park-associated figures in their sweep. H. Yasunaka, Jaggar’s “general handyman and valet” over two years, was detained as a resident alien. Kenichi Maehara, the holder of the photography concession in the park for many years, was also the subject of a military investigation. Army intelligence officers discovered a significant amount of cash at his premises as well as a large number of pornographic pictures, which apparently he had sold regularly to visiting soldiers.⁵⁶ With the photography concession canceled on December 31, 1941, the chief clerk deposited the former concessioner’s cash; NPS employees removed his equipment to a vacant park residence, boarding up the concession building for the time being.⁵⁷ Authorities would eventually move both Yasunaka and Maehara to detention facilities in Honolulu.⁵⁸

Through the first hours of the war there had been no word from Haleakalā. The section’s ranger-in-charge Frank Hjort was accompanying six men from the Maui Naval Air Station on a weeklong stay at Paliku Cabin hike in the crater when the attack occurred. Leaving their child at

⁵² Wingate interview, transcript, 13.

⁵³ Wingate interview, transcript, 12.

⁵⁴ Wingate interview, transcript, 13.

⁵⁵ Joseph H. Christ to Superintendent, memorandum, January 18, 1942, Superintendent’s Monthly Reports, December 1941; and compare with Moniz Nakamura, “Up in Arms!” 20.

⁵⁶ Wingate, Report on Activities, July 1, 1941–June 30, 1942. See also Moniz Nakamura, “Up in Arms!” 20–21.

⁵⁷ Wingate complained that “the Gen’l Second in Command, 27th Division” purloined a samurai sword in Maehara’s possession. See Wingate interview, transcript, 16.

home, Hjort's wife made the hike into the crater to notify the men. Soon afterward, Hjort took up his station at Red Hill, guarding its Army installation. The park was "closed to the public" and placed under the supervision of Army officers.⁵⁹

Within a few days of the attack, the routine on both Maui and Hawai'i Island was set in order. Colonel V. S. Burton was the district commander for the island of Hawai'i; Colonel Charles B. Lyman took charge of Maui, organizing a volunteer guard there and on Moloka'i and Lana'i.⁶⁰ Colonel Peter Pakele, deputy sheriff for Hawai'i, served first as provost marshal and then as head of the Emergency Police Guard, which he had created. KMC's commandant Colonel Bonham left the park and was replaced by Captain Lorenzo D. Adams. A few days later, Adams assumed the post of provost marshal vacated by Colonel Pakele.⁶¹ Director of civilian affairs for the island was local businessman Robert Moir; under him were fellow prominent figures in the community, including H. K. Keller, as head of Food Administration, and Captain Luscomb, over petroleum.⁶² On December 10, the military government appointed territorial senator W. H. "Doc" Hill head of Civil Affairs for Hawai'i Island with Moir as his second-in-command.⁶³

As the days passed, new regulations went into effect. As in the rest of Hawai'i, authorities at first limited food purchases to 35 cents per person. Vehicles required passes, and everyone, outside of the military trucks and those otherwise officially permitted, were to stay off the road. There was also a curfew from 6:00 p.m. to 6:00 a.m. The park assisted the government in the collection of firearms and ammunition for local residents and helped enforce strict kerosene and gasoline limits. Responding to the imminent threat of further Japanese attacks, park wives

⁵⁸ Wingate, Report on Activities, July 1, 1941–June 30, 1942. See also Moniz Nakamura, "Up in Arms!" 20.

⁵⁹ Frank A. Hjort to Superintendent, memorandum, January 3, 1942, Superintendent's Monthly Reports, December 1941.

⁶⁰ "General Charles B. Lyman," obituary, *New York Times*, April 20, 1981, accessed October 12, 2012, <http://www.nytimes.com/1981/04/20/obituaries/gen-charles-b-lyman-pacific-war-commander.html>; Bob Dye, ed., *Hawaii Chronicles III: World War II in Hawaii from the pages of Paradise of the Pacific* (Honolulu: University of Hawai'i Press, 2000), 294.

⁶¹ Superintendent's Monthly Reports, December 1941.

⁶² Superintendent's Monthly Reports, December 1941.

⁶³ Wingate interview, transcript, 13; and Superintendent's Monthly Reports, December 1941.

provided bandages and continued to knit sweaters, scarves, and socks.⁶⁴ The NPS also set up first-aid stations following its earlier action plan. There was also a blood drive, with nearly all NPS personnel and CCC workers contributing.⁶⁵

By December 18, authorities lifted the food restriction and, although blackouts were still strictly enforced, notified the public that curfew would soon begin at 8:00 p.m. Schools remained closed until the following year. Bicycles suddenly became a prevalent form of transportation.⁶⁶ The superintendent worked nonstop, often sleeping on an office cot. There were Selective Service meetings to attend, discussions to be had with local police and military officials, and the overall responsibility of seeing that the park did its part. There were also human considerations. Although this year's celebration would not include outsiders, on December 25, the CCC enrollees had their annual Christmas celebration. Eighty-two enrollees fresh from chores—including patrol duty, “obliterating” potential airfields, and “crating Colonel Bonham's furniture”—filled the recreation hall, ate a bountiful turkey meal, and sang “God Bless America.”⁶⁷

Mobilization

The early months of 1942 constituted a national awakening for the United States. After several years of unsuccessful steps to effect government control over industry, President Roosevelt finally had the War Production Board to set the country on a new trajectory.⁶⁸ The new board had

⁶⁴ Moniz Nakamura, “Up in Arms!”

⁶⁵ Superintendent's Monthly Reports, December 1941.

⁶⁶ Superintendent's Monthly Reports, December 1941; and Moniz Nakamura, “Up in Arms!” 13.

⁶⁷ Herbert R. Rennie to Superintendent, memorandum, January 1942, Superintendent's Monthly Reports, December 1941.

⁶⁸ Schubert, *Mobilization*, 8, 15. The classic texts are Francis Walton, *Miracle of World War II: How American Industry Made Victory Possible* (New York: Macmillan, 1956); and Donald M. Nelsen, *Arsenal of Democracy: The Story of American War Production* (New York: Harcourt, Brace, 1946). More recent is Vatter, *U.S. Economy in World War II*. A useful overview is in Lester B. Brown, *Plan B 2.0 Rescuing a Planet under Stress and a Civilization in Trouble* (Washington, DC: Earth Policy Institute, n.d.), chap. 13, accessed October 12, 2013, http://www.earth-policy.org/books/pb2/pb2ch13_ss3; and the web resource from “Economic Conversion and Business in WW II—

powers over production and procurement across departments and industries and identified priorities for materials, set quotas, and determined military needs. At the same time, the War Department brought in civilian advisors for its own planning, with the Army commissioning manufacturing expert William Knudson (1879–1948) from General Motors as lieutenant general, giving him authority for production and allocation of resources.⁶⁹

By March 1942, a new command, called the Services of Supply, was in place. Under the leadership of Lieutenant General Brehon B. Somervell (1892–1955), the new division coordinated civilian production and military needs, creating a new level of cooperation between the government and the private sector.⁷⁰ Answering to Chief of Staff General George Marshall (1880–1959), Somervell provided a link between mobilization and production and soon oversaw a vast network of depots, agencies, production facilities, and supply chains. Within four months of the Pearl Harbor attack, the United States was well on its way to developing and funneling its industrial, materiel, and human resources toward a common aim of total victory in Asia and Europe.⁷¹

Setting aside political differences, the US Congress agreed to Roosevelt’s call for higher taxes, price and wage controls, and the rationing of goods considered critical for the war effort. Beginning with rubber and then gasoline, restrictions soon applied to silk, nylon, sugar, coffee, typewriters, meat, cheese, butter, lard, shoes, canned goods, and nearly everything familiar to the prewar American consumer.⁷² There were sales of war bonds, drives for aluminum, iron, and

Mobilization in the U.S.,” Boundless, accessed October 12, 2013, <https://www.boundless.com/u-s-history/from-isolation-to-world-war-ii-1930-1943/mobilization-in-the-u-s/economic-conversion-and-business-in-wwii>.

⁶⁹ Norman Beasley, *Knudsen: a Biography* (New York: Whittlesey House, 1947); and David A. Hounshell, *From the American System to Mass Production, 1800–1932: The Development of Manufacturing Technology in the United States* (Baltimore, MD: Johns Hopkins University Press, 1984), 261–65.

⁷⁰ Schubert, *Mobilization*, 18.

⁷¹ Vatter, *U.S. Economy in World War II*; and Koistinen, *Arsenal of World War II*. A useful overview is Robert G. Ferguson, “One Thousand Planes a Day: Ford, Grumman, General Motors, and the Arsenal of Democracy,” *History and Technology* 21, no. 2 (2005): 149–175.

⁷² A. A. Hoehling, *Home Front, U.S.A.* (New York: Thomas Y. Crowell, 1966); Winkler, *Home Front U.S.A.*; Polenber, *War and Society*; Kennedy, *Freedom from Fear*; Adams, *Best War Ever*; and Blum, *V Was for Victory*.

copper, and changes to labor laws to allow for teenage employment.⁷³ The military draft suddenly shifted into high gear. Roosevelt's call for 1.5 million inductees in 1941 suddenly shifted upward to a projected army of some 9 million men, from a pool of over 50 million registered under the Selective Service and Training Act of 1940.⁷⁴

In his State of the Union address on January 6, 1942, just a month after the Pearl Harbor attack, Roosevelt announced that the country would soon produce 45,000 tanks, 60,000 airplanes, 20,000 anti-aircraft guns, and 6 million tons of supplies to assist the country's allies.⁷⁵ Soon banning the production of private automobiles along with other consumer goods, Roosevelt quickly redirected the country's energies.⁷⁶ Many US firms converted to wartime production. Historian Doris Kearns Goodwin, for example, highlighted a spark-plug factory switching to the production of machine guns, a stove manufacturer producing lifeboats, a merry-go-round factory building gun mounts, a toy company producing compasses, and a corset manufacturer shifting its production to grenade belts.⁷⁷

Early in 1942, the Joint Chiefs of Staff emerged as a new command structure within the military. The Joint Chiefs oversaw a reorganization of the Army into three major commands: the Air Forces, Ground Forces, and Service Forces.⁷⁸ At the outbreak of the war, the US Army had 37 divisions, most still in training. War planners estimated the United States would need as many as 215 combat divisions.⁷⁹ While the Pacific Fleet attempted to recover from its losses, the United States sent its first advanced units to Great Britain.⁸⁰

⁷³ James B. Atleson, *Labor and the Wartime State: Labor Relations and Law during World War II* (Urbana: University of Illinois Press, 1998).

⁷⁴ Flynn, *The Draft*; and Garry and Spencer, *First Peacetime Draft*.

⁷⁵ Franklin Delano Roosevelt, State of the Union Address, January 6, 1942, accessed October 12, 2012, <https://archive.org/details/gov.fdr.283>.

⁷⁶ G. N. Georgano and Nicky Wright, *The American Automobile: A Centenary, 1893–1993* (New York: Smithmark, 1992).

⁷⁷ Doris Kearns Goodwin, *No Ordinary Time—Franklin and Eleanor Roosevelt: The Home Front in World War II* (New York: Simon & Schuster, 1994), 316n15.

⁷⁸ Richard D. Adamczyk and Morris J. MacGregor, eds., *United States Army in World War II: Readers Guide* (Washington, DC: US Army Center of Military History, 1992), 4–5.

⁷⁹ Adamczyk and MacGregor, *United States Army in World War II*, 21–23.

⁸⁰ The first American military set up a command post in Belfast, Northern Ireland, in January 1942; by June, the number of US service personnel in Great Britain had swelled to 55,000 and 135,000 by the end of the year. See

As training began for the many new draftees, the US Army continued the reconfiguration of forces into the lighter, more maneuverable units introduced in 1941, known as “triangular” as opposed to square units, with three instead of four infantry regiments each.⁸¹ Knowing it would have to retake US possessions in the Pacific—Japan had attacked the Philippines and Guam in December, and by April, both had fallen, Guam within days of the Pearl Harbor attack⁸²—and provide the bulk of the support for an invasion of Europe, there was new emphasis as well on amphibious warfare.⁸³ Simultaneously, there was a rush to reinforce the country’s own shore protection and reequip the Navy with new ships, submarines, and, especially, aircraft.⁸⁴



6. 8. Douglas SBD Dauntless manufacture, El Segundo Plant, California, 1942. The Corsair (Vought F4U) would soon replace the Dauntless as the US Navy's fighter plane of choice.

“History, World War II,” US Army Europe: The Official Homepage of the United States Army in Europe, accessed October 23, 2012, <http://www.eur.army.mil/organization/history.htm>.

⁸¹ John Sayen, *US Army Infantry Divisions, 1942–44*, Battle Orders Series (Bodley, Oxford: Osprey Publishing, 2006), 4–7.

⁸² Ward Rutherford, *Fall of the Philippines*, World War II Series (New York: Ballantine, 1971); Louis Morton, *The Fall of the Philippines* (Honolulu: University Press of the Pacific, 2004); and Gordon Rottman, *Guam 1941 and 1944: Loss and Re-conquest*, Campaign Series (Botley, Oxford: Osprey Publishing, 2004).

⁸³ Marshall O. Becker, *The Army Ground Forces: The Amphibious Training Center*, Study No. 22 (Washington, DC: Historical Section, Army Ground Forces, 1946), 1–5.

⁸⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, chap. 8.

One of Roosevelt's primary concerns was the fate of Japanese American citizens and residents, particularly those residing on the West Coast of the United States. Responding in part to growing public pressure and fears of the military that the Japanese represented a threat to national security, Roosevelt signed Executive Order 9066 on February 19, 1942, a step that authorized military commanders to designate "military areas" from which any person considered a threat to security could be "excluded."⁸⁵ Roosevelt's order quickly evolved into a national program of internment for those of Japanese heritage, as well as a much smaller number of Germans and Italians living in the United States.⁸⁶

In late February and early March, US police and military began to round up nearly all Japanese, both citizens and noncitizens, living in California, Washington, Oregon, and Arizona, transferring them to internment camps scattered throughout the western and a few southern states.⁸⁷ They also included Japanese from Central and South America as well as persons of Taiwanese and Korean background, since these were countries Japan occupied. This move would affect approximately 127,000 men, women, and children, many longtime residents with only the remotest connection to Japan.⁸⁸

⁸⁵ Maisie Conrat and Richard Conrat, *Executive Order 6066: The Internment of 110,000 Japanese Americans* (Los Angeles: UCLA Asian Studies Center, 1992).

⁸⁶ "Brief Overview of the World War II Enemy Alien Control Program," Washington, DC, US National Archives and Record Program, accessed October 12, 2012, <http://www.archives.gov/research/immigration/enemy-aliens-overview.html>.

⁸⁷ Robinson, *By Order of the President*, Greg Robinson, *A Tragedy of Democracy: Japanese Confinement in North America* (New York: Columbia University Press, 2009); and Weglyn, *Years of Infamy*.

⁸⁸ Included also were persons of Taiwanese background as well as Koreans, since Taiwan and Korea were occupied by Japan. See "Japanese American Internment," *Wikipedia*, accessed October 12, 2012, http://en.wikipedia.org/wiki/Japanese_American_internment. The total number of Japanese was about 110,000.



6. 9. Persons of Japanese ancestry arrive at the Santa Anita Assembly Center from San Pedro. Evacuees lived at this center at the former Santa Anita racetrack before being moved inland to relocation centers.

Steps on O‘ahu and the other Hawaiian islands mirrored, and in many ways amplified, the national story. Throughout late December and early January, troops, ammunition, and supplies arrived in Hawai‘i from the West Coast. Hawai‘i’s garrison strength jumped from 41,000 to 58,000 men and officers.⁸⁹ Although O‘ahu’s defensive position was relatively secure by late January, the military command had yet done little about protecting the other islands. General Short, the year before his relief, distributed the 299th Infantry Regiment—about half of whom were men of Japanese ancestry—to the “outer” islands: Maui (where they had been in training), Kaua‘I, and especially Hawai‘i. He also transferred equipment and additional weapons, although, arguably, retaining most for the protection of O‘ahu.⁹⁰ General Emmons, on assuming command, requested an additional 50,000 troops, including two older infantry

⁸⁹ Conn, Engelman, and Fairchild, *Guarding the United States*, 214.

⁹⁰ “Delos Emmons,” accessed December 1, 2013, *Densho Encyclopedia*, <http://encyclopedia.densho.org/Delos%20Emmons>; and Conn, Engelman, and Fairchild, *Guarding the United States*, 214.

“square” divisions, for the other islands and to increase the Hawaiian Air Force to 200 bombers and 325 pursuit planes.⁹¹

Fearful that the Japanese might attack the US West Coast or the vital artery of the Panama Canal, US military planners dickered over the role of Hawai‘i in the war. Soon accepting that the central Pacific island group was defensible and critical to the country’s wartime strategy, additional funds became available for new facilities and defensive works. To accommodate the new bombers and fighters, the military concentrated on improvements and expansion of airfields. Key bases, such as Luke Field and the Naval Air Station (NAS) at Pearl Harbor were repaired and reinforced. The Marines completed work on the Ewa Marine Corps Air Station; the Navy expanded Barbers Point NAS as a principal training site. There were also new or improved auxiliary fields at Hale‘iwa, Mokuleia, Kipapa, and Kahuku, as well as new stations on Maui and Kaua‘i.⁹² Assistant Secretary of War John L. McCloy noted the expanded airfields in his March visit, but cautioned, too, that there were still too few bombers stationed in Hawai‘i and that Pearl Harbor was still a “most vulnerable target.”⁹³

Hawai‘i’s home front responded equally to the challenge of war preparation. Schoolchildren dug trenches, shop owners taped display windows, and plantation workers extracted wartime debris from sugar fields.⁹⁴ Authorities required property owners to provide bomb shelters; there were also approximately 250 public shelters scattered throughout Honolulu, creating berms along the surfaces of public parks. The Army constructed barracks in remote areas of the island of O‘ahu as evacuation sites. The military also appropriated schools and both public and private buildings for administrative centers and housing; the private Punahou School became the home of the Army’s 8th Corps of Engineers (a division of the US Army Corps of

⁹¹ Conn, Engelman, and Fairchild, *Guarding the United States*, 214.

⁹² “Historic Military Airfields of Hawaii,” Hawaii Aviation Preservation Society, accessed September 12, 2012, <http://hiavps.com/Airfields%20of%20Hawaii.htm>.

⁹³ Conn, Engelman, and Fairchild, *Guarding the United States*, 218.

Engineers), which remained for the duration of the war. Parks suddenly became storage depots and both territorial and private lands served as housing and training areas.⁹⁵



6. 10. Local children in Hawai'i, following the Pearl Harbor attack.

Within a few months, the military controlled some 300,000 acres of land across the islands; over one third of O‘ahu was under military control.⁹⁶ In the meantime, civilians faced a nightly curfew, blackouts, rationing, and censorship. There were also “victory gardens” and war bond and salvage drives. Due to severe labor shortages, women took on work as welders and street cleaners as well as more the traditional female occupations such as telephone operators and

⁹⁴ Brown, *Hawaii Goes to War*, 46–57; and Simpson, *Hawaii Homefront*.

⁹⁵ Donald Fitzgerald, “Pearl Harbor, the Army Corps of Engineers, and Punahou’s Cereus Hedge,” *Hawaiian Journal of History* 25 (1991), 187–96; and Charlotte Peabody Dodge, *Punahou, the War Years, 1941–1945* (Honolulu: Punahou School, 1984).

⁹⁶ Brown, *Hawaii Goes to War*, 62–69. Eventually, that would increase to approximately 400,000 of a total acreage of 4 million.

secretaries.⁹⁷ As part of the civil defense effort, as many as one in eighteen O‘ahu residents served as air wardens, volunteer firefighters, or on blackout patrols. Throughout the territory, there were new wood barracks and tent cities to house service personnel.⁹⁸

The issue of Japanese residents and citizens of Japanese heritage loomed especially large in Hawai‘i. Unknown to the islands’ military government, Roosevelt’s Cabinet had determined that Hawai‘i’s over 150,000 Japanese were to be interned on islands other than O‘ahu—Moloka‘i was the most likely candidate—in order to separate them from sensitive military areas.⁹⁹ General Emmons, though unsure how the local Japanese might respond to an invasion—the attempted rescue of a Japanese flyer by two Japanese plantation workers on Ni‘ihau after December 7 had undermined the faith of some in Japanese loyalty to the United States¹⁰⁰—emphasized the impracticality of removing Japanese residents and also its impact on the islands’ available workforce.¹⁰¹

Although the War Plans Division continued to explore alternatives—including the possibility of a phased transfer of Japanese to the mainland—by March, both Washington and local authorities had accepted a more limited confinement of Japanese considered of questionable loyalty and the evacuation of approximately 1,550 of the most “dangerous” residents.¹⁰² In the meantime, interned Japanese remained at Sand Island on O‘ahu and at similar facilities on the outer islands.¹⁰³

⁹⁷ Allen, *Hawaii’s War Years*, chap. 18.

⁹⁸ Jones and Jones, *Hawaii Goes to War*, 82–113.

⁹⁹ Conn, Engelman, and Fairchild, *Guarding the United States*, 210.

¹⁰⁰ The incident has been a subject of considerable discussion in the literature of the Pearl Harbor attack and its impact on subsequent US policy. See Allan Beekman, *The Ni‘ihau Incident* (1982; repr., Honolulu: Heritage Press of Pacific, 1998); Edward R. Stepien, Appendix B, “The Battle of Ni‘ihau,” in Center for Pacific Islands Studies, *Ni‘ihau, A Brief History*, Vol. 2 (Honolulu: Center for Pacific Islands Studies, School of Hawaiian, Asian, & Pacific Studies, University of Hawaii, 1988); Richard B. Frank, “Zero Hour on Ni‘ihau,” *World War II* 24, no. 2 (July 2009): 54–61; and William Hallstead, “The Ni‘ihau Incident,” *World War II* 14, no. 5 (January 2000): 38–47.

¹⁰¹ Conn, Engelman, and Fairchild, *Guarding the United States*, 206.

¹⁰² Conn, Engelman, and Fairchild, *Guarding the United States*, 210. More recent figures suggest as many as 2,400 were affected.

The National Park in Early 1942

The first few months of the war were a period of high alert within the park. On February 10, a Japanese submarine sank the USAT *General Royal T. Frank*, a transport ship used for several years to supply the KMC.¹⁰⁴ Seventeen passengers died, including several recent inductees from Hawai‘i Island en route from Schofield Barracks to Hilo.¹⁰⁵ On March 4, a Japanese plane dropped bombs near Honolulu, and air-raid warnings sounded in Hilo on March 7.¹⁰⁶ “Almost everyone expected the Japanese to follow up on their Pearl Harbor successes by an invasion attempt which could easily have been effective,” Superintendent Wingate later noted.¹⁰⁷ One Japanese plan, in fact, had called for the Second Carrier Division of the Japanese Combined Fleet to attack Hawai‘i Island, subsequently employing it as a virtual aircraft carrier to support proposed Japanese units on Midway, Johnston, and Palmyra Islands—and eventually Japanese engagement with the West Coast of the United States.¹⁰⁸

¹⁰³ Bryan Niya, “History of the Internment in Hawai‘i,” Japanese Cultural Center of Hawaii online resource, June 4, 2010, accessed December 10, 2012, <http://www.hawaiiinternment.org/history-of-internment>.

¹⁰⁴ “USAT *General Royal T. Frank* (+1942),” Wreck Site, accessed November 30, 2013, <http://www.wrecksite.eu/wreck.aspx?180907>.

¹⁰⁵ 100th Infantry Battalion Veterans Education Center, “The Usat Royal T. Frank Torpedoed in Hawaiian Waters,” recorded June 1972, Honolulu, accessed November 12, 2013, <http://www.100thbattalion.org/archives/puka-puka-parades/wartime-hawaii/the-usat-royal-t-frank-torpedoed-in-hawaiian-waters/>.

¹⁰⁶ Known as Operation K. See Steve Horn, *The Second Attack on Pearl Harbor: Operation K and Other Japanese Attempts to Bomb America in World War II* (Annapolis, MD: Naval Institute Press, 2005).

¹⁰⁷ Wingate interview, transcript, 14.

¹⁰⁸ Moniz Nakamura, “Up in Arms!” 24.



6. 11. Hawaii Rifles, 1st Battalion, 2nd Regiment being sworn in, Major Bryan giving the oath. Kohala, Hawai'i Island, November 15, 1942.

As with other parts of Hawai‘i, the national park responded to these threats with vigilance. The CCC enrollees continued to help in the park, constructing bomb shelters and building sand containers in front of residences and other park buildings in the event of incendiary bombs.¹⁰⁹ One shelter, completed later that spring, was a large covered trench with benches for 75 personnel.¹¹⁰ Throughout the early part of 1942, rangers and other park personnel continued to patrol the coastal and outlying areas on foot and on horseback. They also participated in and provided further training to the Emergency Police Guard (EPG) of the Kīlauea area. Issued helmets in January—as Superintendent Wingate commented, “the well-dressed ranger in Hawaii National Park . . . now ‘sports’ an Army ‘tin hat’ and gasmask”¹¹¹—the guard maintained a twenty-four-hour watch, assisting troops at KMC on a regular basis.

¹⁰⁹ Moniz Nakamura, “Up in Arms!” 15.

¹¹⁰ Superintendent’s Monthly Reports, July 1942.

¹¹¹ Superintendent’s Monthly Reports, February 1942.



6. 12. Gas mask drill, O'ahu, early 1942.

To better shield facilities at Kīlauea from enemy view—or even possible occupation—NPS and CCC workers removed directional signs from all roads and most of the trails, undoing months of recent work.¹¹² Superintendent Wingate also gave permission to the military to cut “indigenous” coniferous trees for camouflage at KMC, a process requiring the use of a Caterpillar tractor and destruction of a large stand of trees.¹¹³ To accommodate the blackout, the park’s scenic roads received a white centerline to aid in night driving.¹¹⁴

In March, NPS rangers began to train an auxiliary volunteer defense force called the Hawaii Rifles after its earlier rendition.¹¹⁵ In addition, park personnel assisted in the distribution of 400 gas masks to residents of the Volcano, Glenwood, and 29-Mile areas.¹¹⁶ As a last resort in

¹¹² Superintendent’s Monthly Reports, March 1942. The CCC had just completed the new trail signs in October 1940. Road signs directing tourists to Haleakalā were only finished in June 1941.

¹¹³ Superintendent’s Monthly Reports, February 1942.

¹¹⁴ Superintendent’s Monthly Reports, January 1942.

¹¹⁵ Superintendent’s Monthly Reports, March 1942.

¹¹⁶ Superintendent’s Monthly Reports, January 1942.

the event of invasion, Wingate even assembled an irregular unit of “Filipino ‘cut throats’” from the EPG to operate as a guerilla unit. For a short time, supplies were stockpiled in lava tubes along the slope of Mauna Loa.¹¹⁷ Wingate also released some of the park’s CCC enrollees to assist on military projects at Hilo Airport and other facilities on the island.¹¹⁸

There were many voluntary contributions as well. CCC enrollees, ranger wives, local volunteers, and Volcano House staff members participated in the Hilo “blood plasma bank,” providing blood and registering for future donations.¹¹⁹ KMC medical officer Lieutenant Lyles continued to offer first-aid classes to anyone who wished to attend.¹²⁰ The Park Service also supplied emergency medical kits in all NPS vehicles. Later, park employees and dependents headed up a rubber drive, collecting old tires and even children’s toys.¹²¹ All did their best to adhere to territory-wide limits on coins; individuals could only hold \$5 worth of silver coins or pennies at a time. They also submitted to registration and fingerprinting and obeyed the curfew and blackout rules.¹²²

With nearly full occupancy at Volcano House and 27,068 other visitors in the month before the war the attack on Pearl Harbor, visitation to the park thereafter “declined to almost nothing.”¹²³ Ranger Olson reported in February 1942 that a single car carrying six sailors entered the park on the first of the month and another with four sailors on the third.¹²⁴ After the hotel’s December guests left, Volcano House was nearly empty. Although there was no prohibition on visitors to Kīlauea, few were in a position to travel due to the gasoline restrictions. Also, the Inter-Island Steamship Company ceased ferrying passengers from Honolulu, thereby cutting off the principal source of tourists to the volcano.¹²⁵

¹¹⁷ Wingate interview, transcript, 15.

¹¹⁸ Wingate interview, transcript, 14.

¹¹⁹ Superintendent’s Monthly Reports, January and March 1942.

¹²⁰ Superintendent’s Monthly Reports, February 1942.

¹²¹ Superintendent’s Monthly Reports, June 1942.

¹²² Superintendent’s Monthly Reports, April 1942.

¹²³ Superintendent’s Monthly Reports, December 1941; and Moniz Nakamura, “Up in Arms!” 23.

¹²⁴ Superintendent’s Monthly Reports, February 1942.

¹²⁵ Mifflin Thomas, *Schooner from Windward: Two Centuries of Hawaiian Interisland Shipping* (Honolulu: University of Hawaii Press, 1983).

The Haleakalā branch of the park was even quieter. There were virtually no nonmilitary visitors in January and the park remained closed to civilians until October 1940.¹²⁶ Ranger Hjort assisted soldiers stationed at Puu Nianiau and hosted occasional parties of military personnel and high-ranking officers, including the Hawaiian Department's commander Lieutenant General Emmons and Brigadier General H. F. Kennan, the chief military officer on Maui.¹²⁷ There were other gestures of cooperation. In March, Hjort supervised a work party from the US Army Corps of Engineers to sod and plant over the scars created the previous year when constructing the "detection station."¹²⁸

One of the principal challenges facing the Hawaii National Park was the gradual depletion of personnel. In February, Superintendent Wingate reported the loss of twenty-three CCC enrollees, three to the US Army Corps of Engineers as drivers, one to the regular Army and another to the National Guard, and the rest to other civil defense work. By early spring, he had lost Chief Ranger Christ, Ranger Jess, Ranger Olson, park foreman Quick, and chief clerk James A. Chaffee, most to the Corps of Engineers. The Navy claimed Rangers Miller and Hewitt; Hewitt's wife went to work as a secretary for the Army.¹²⁹

Others associated with the park evacuated, including Army wives at the KMC and the wives of mobilized Army Reserve officers Moomaw and Schultz.¹³⁰ Superintendent Wingate advised one of the park's few secretaries, "a local Japanese girl," to return to Honolulu to be with her family. In April, he met with Delegate Samuel W. King about the possibility of further evacuations of park families.¹³¹ As late as June, this was still a consideration.¹³²

¹²⁶ Superintendent's Monthly Reports, January 1941, October 1942.

¹²⁷ Superintendent's Monthly Reports, February and May 1942.

¹²⁸ Superintendent's Monthly Reports, March 1942.

¹²⁹ Superintendent's Monthly Reports, February, April, and August 1942; and Wingate interview, transcript, 16.

¹³⁰ Wingate interview, transcript, 15.

¹³¹ Superintendent's Monthly Reports, April 1942.

¹³² Superintendent's Monthly Reports, June 1942. In August, Wingate wrote on behalf of Gunder Olson's wife, asking that she might still be evacuated, despite having missed earlier opportunities. Wingate to Director, August 4, 1942, Record Group 79, Box 158, National Park Service, Hawaii National Park, NARA San Bruno.

Superintendent Wingate worked tirelessly during the early months of the war to keep the park on track, oversee its personnel, and assist the civil and military authorities in the defense of Hawai'i. Shortly after the Pearl Harbor attack, he met with General Short and offered his services to the Army. Short had replied that he could help most by performing his duties in the park.¹³³ When the 3rd Registration extended the age of potential draftees, he conscientiously offered to resign as chair of the local Puna District Selective Service Board, a request again denied by the military authorities.¹³⁴ By February, he was attending weekly meetings of the Puna District Board and making frequent trips to Hilo to meet with civil and military authorities there.¹³⁵ In the meantime, he accompanied rangers and volunteers on patrols to the Hilina Pali and Mauna Loa, meeting with his counterparts at KMC and keeping up the park's morale. As General Short had recognized, Wingate was indeed too important to lose.

The 27th Infantry Division Arrives

As Wingate and others in Hawai'i prepared for the worst, military planners in Washington were moving to reinforce the country's Pacific outpost. In January, General Marshall advocated the deployment of 100,000 troops for the islands, irrespective of other operations in the Pacific, and an additional 16,000 air force personnel.¹³⁶ In February the president and Joint Chiefs of Staff set the Hawaiian Department's garrison strength at 74,000 ground troops on O'ahu, 13,000 on the island of Hawai'i, and an additional 12,800 distributed among the other islands. In April, war planners raised the authorized strength to 106,000.¹³⁷

The first large unit to arrive was the 27th Infantry Division. Its advanced units having left San Francisco on February 27 and arriving in Hawai'i beginning March 10, the division's mandate was to provide for the defense of the Hawaiian Islands in the event of a Japanese

¹³³ Wingate interview, transcript, 12.

¹³⁴ Superintendent's Monthly Reports, January 1941.

¹³⁵ Superintendent's Monthly Reports, February, March and April 1942.

¹³⁶ Conn, Engelman, and Fairchild, *Guarding the United States*, 214.

invasion. Composed of two brigades, the 53rd and the 54th, comprising four infantry regiments—the 105th, 106th, 108th, and 165th—and supporting artillery, engineer, medical, and quartermaster units, the 27th Division was the first National Guard unit to go overseas after Pearl Harbor and the first full division to deploy.¹³⁸

Historically, the 27th Division was a New York unit, with many of its officers and enlisted men coming from the Albany and Troy area of upstate New York and others from Schenectady and New York City.¹³⁹ The 105th was known as the “apple-knockers”—reflective of the fact that many of its Civil War–era members had worked in orchards prior to enlistment. The 165th, which dated back to 1849 and had served with distinction in the Civil War as the 69th Infantry Regiment, was called the “Fighting Irish.”¹⁴⁰ The division as a whole later called themselves the “Galla Vanters” due to their frequent later deployments.¹⁴¹

¹³⁷ Conn, Engelman, and Fairchild, *Guarding the United States*, 217.

¹³⁸ Charles S. Kaune, “The National Guard in War: An Historical Analysis of the 27th Infantry Division (New York National Guard) in World War II” (master’s thesis, US Army Command and General Staff College, Fort Leavenworth, Kansas, 1990), 33.

¹³⁹ Francis A. O’Brie, “Battle of Saipan,” HistoryNet.com, accessed December 2, 2013, <http://www.historynet.com/battle-of-saipan>.

¹⁴⁰ Edmund G. Love, *The 27th Infantry Division in World War II* (Nashville, TN: The Battery Press, 1982).

¹⁴¹ E. J. Kahn, Jr., and Henry McLemore, “Fighting Divisions,” *Infantry Journal* (1945): 35.



6. 13. Soldiers leaving pier en route to Schofield Barracks. This appears to be either a unit of the 25th Division or the newly arrived 27th Infantry Division sometime after April 1942.

Activated in October 1940, the division trained first in Fort McClellan, Alabama, and then transferred to Fort Ord, California, for further training and shore patrol duty in December. With an authorized strength of about 1,000 officers and 21,000 enlisted men, the 27th had a roster of about 14,000 at the time of its initial move to Hawai‘i. Not yet issued the new M1 helmets but armed with the new M1 Garand rifles¹⁴², the unit shipped in three echelons, the first

¹⁴² On equipment, see Robert Rush, *US Infantryman in World War II (I) Pacific Area of Operations*, Vol. 1 (Botley, Oxford: Osprey Publishing, 2002), 12. On US infantry rifles, see Patrick Feng, “The M1903 Springfield Rifle,” *On Point, The Online Journal of Army History*, January 12, 2011, accessed December 2, 2013, <http://armyhistoryjournal.com/?p=604>. Some soldiers had been trained on the newer M1 rifle by this point in the war. Remington also produced an M1903A3 as an improved model after 1942. The Fixed Bale M1 helmet, developed in 1941, became common issue only in mid-1942, then mostly for soldiers in Europe. Most US troops still had the M1917 helmet. The military began introducing the M1 after July 1941. The military replaced this with the Schlueter M1, with its safer rear seam, in 1943. See Ken Hatfield, “The History of the Development of the M1 Helmet,” *Worthpoint* (blog), December 12, 2012, accessed December 2, 2013, <http://www.worthpoint.com/blog-entry/history-development-u-s-m1-helmet>. The 27th received new two-part “jungle” uniforms and helmets in late

group in British ships.¹⁴³ Their full deployment lasted into early May. As of April, in fact, 7,300 men were still counted as “en route.”¹⁴⁴

Arriving in Hilo, the 27th Infantry Division distributed to Hawai‘i, Kaua‘i, and Maui, joining the nearly 1,500 Hawaii National Guard troops of the 299th Infantry Regiment spread throughout the islands. These, together with a few coastal artillery units assigned to shore protection, served as the principal bulwark against possible attack. To this end, Hawai‘i Island had about 400 guard troops, as did Maui and Kaua‘i. The 105th and 106th, or the old 53rd Brigade, occupied Hawai‘i Island. Officially “triangulized” in late August, the division effectively broke up even earlier, with the 108th Infantry regiment transferring to the 40th Infantry Division, a California-based National Guard unit by then stationed on O‘ahu, and the 165th reinforcing other 40th Division troops at Barking Sands on Kaua‘i.¹⁴⁵ Most of the 108th was stationed at Maui, where a 102nd Medical Regiment corpsman attached to the unit remembered “constructing defensive positions . . . on property that had once been pineapple and sugar cane plantations.”¹⁴⁶

Establishing the division headquarters at Kīlauea where the Army already had facilities in the form of KMC, the 27th Division quickly spread over much of the island of Hawai‘i. Private

1942 before their departure from Hawai‘i. Some units, such as guards and MPs, retained the older M1917 helmets of the World War I era.

¹⁴³ *The US Army in World War II: Strategy and Command: The First Two Years*, Chapter 9, p. 206, “The War in the Pacific,” HyperWar, accessed October 12, 2013, <http://www.ibiblio.org/hyperwar/USA/USA-P-Strategy/Strategy-9.html>.

¹⁴⁴ All of the 27th’s regular units had arrived by late April. See “27th Infantry Division,” US Army Center of Military History, accessed October 13, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/027id.htm>; and “27th Division, World War II,” New York State Museum and Veterans Research Center, Unit History Project, last modified June 28, 2012, accessed October 12, 2012, <http://dmna.ny.gov/historic/reghist/wwii/infantry/27thInfDiv/27thInfDivMain.htm>. Compare with “27th Infantry Division (United States),” *Wikipedia*, accessed October 13, 2012, [http://en.wikipedia.org/wiki/27th_Infantry_Division_\(United_States\)](http://en.wikipedia.org/wiki/27th_Infantry_Division_(United_States)).

¹⁴⁵ Dorrance, “The U.S. Army on Kaua‘i,” 63; and John D. Bennett, “Barking Sands Army Air Base, World War II,” accessed October 23, 2013, <https://www.cnic.navy.mil/content/dam/cnic/cnrh/pdfs/PMRF/Bennett%20Barking%20Sands%20Air%20Base.2A.pdf>.

¹⁴⁶ Bruno Viani, “Recollections of Army Life— Before Pearl Harbor and Beyond,” Marshall Foundation, accessed December 2, 2013, marshallfoundation.org/Viani_Recollectuons_of_Army_Life, e-books.

(and later Sergeant and Lieutenant) James J. Coyle of the 106th Infantry Regiment recalled small units “scattered all around the island’s coast.” He was stationed in a solitary outpost “miles from Company Headquarters” with “only a signal corps field telephone for communication.”¹⁴⁷

As with other members of the 27th Division, Coyle was housed in a tent near his post. The division command assigned other troops—about 8,000 men and officers in all—to schools, hospitals, and other both private and public property.¹⁴⁸ Army medic Joe Castro from Austin Texas, assigned the 105th in April, stayed at a camp near Hilo.¹⁴⁹ Other small units were in Waimea, along the Hāmākua Coast, near Punalu‘u and South Point, near the existing Army Air Station, and along much of the Kona Coast.¹⁵⁰ One unit stayed at the Konawaena School at Kealakekua Bay, occupying vacated classrooms and in tents on the school’s grounds. Two companies were stationed in Kailua-Kona near the hospital.¹⁵¹

While much of the individual soldier’s time was devoted to shore patrols and routine drill, there was time dedicated to training. Using a range of public and private lands, infantry and support units practiced maneuvers, climbed bridges, and crossed stretches of barbed wire. Training included small arms fire, bayonet drills, and physical fitness. Castro recalled that “operations on Hawaii required adapting to extreme temperature differences, very hot at sea level, while at the same time it could be freezing on the mountain slopes.”¹⁵² To prepare for urban warfare, some units utilized the Holualoa Kona Mill Site off the Mamalahoa Highway south of Kailua-Kona. Others trained at Ho‘okena Beach, shooting at seabirds perched on the

¹⁴⁷ “Paratroopers of the 505th Parachute Infantry Regiment,” Regimental Album, 505th Regimental Combat Team, accessed December 1, 2013, http://www.505rct.org/album2/coyle_j.asp.

¹⁴⁸ Kahn and McLemore, “Fighting Divisions.”

¹⁴⁹ “Joe S. Castro, 1921–2009,” Military Order of the Purple Heart, Texas Capital Chapter 1919, Austin, Texas, accessed December 1, 2013, <http://www.purpleheartaustin.org/castroJ.htm>.

¹⁵⁰ Warren Nishimura, Oral History Interview with Makoto “Mac” Morihara, Kēōkea, South Kona, Hawai‘i, June 14, 2000, Tape Nos. 35-9-1-00 and 35-10-1-00, p. 283, accessed December 1, 2013. http://scholarspace.manoa.hawaii.edu/bitstream/handle/10125/23362/konaheritage_8_morihara.pdf?sequence=1.

¹⁵¹ Morihara interview.

¹⁵² “Joe S. Castro, 1921–2009.”

lava cliffs in their off hours.¹⁵³ There was also training for the newly formed Hawaii Rifles and assistance to the older Emergency Police Guard.¹⁵⁴

Despite regular drills and training, soldiers spent much time observing or patrolling. Rotation was set at six weeks on shore defense and three weeks in reserve.¹⁵⁵ When they had free time, both officers and enlisted men visited Kailua-Kona and Hilo.¹⁵⁶ Beer, allowed soon after the Pearl Harbor attack, was 10 cents a bottle, cigarettes 5 cents.¹⁵⁷ Even with the threat of invasion at its highest, soldiers still had time for photographs with hula girls and afternoons at the beach or at bars.¹⁵⁸ Private Marty Mestre, a recent Puerto Rican immigrant to Port Charlotte, Florida, and a member of G Company of the 105th Regiment recounts: “I was happy in the service. I was paid \$41 per month and most of my living expenses were taken care of.” He was able to clean his uniform for \$1.50 and send \$7 monthly to his mother.¹⁵⁹

A good number of the 27th Division’s men and officers housed at KMC, which served as the headquarters for both the 27th Infantry Division and the Hawaii District. Through the authority of the division’s commander (and district head), Brigadier General Ralph McT. Pennell (1882–1973)¹⁶⁰, the Army rented space in the old Volcano House area, including remaining

¹⁵³ “Hookena, Once a Vibrant Port,” *West Hawaii Today*, July 7, 2013, accessed December 1, 2013, <http://westhawaiiitoday.com/sections/news/local-features/hookena-once-vibrant-port.html>.

¹⁵⁴ A member of Company I of the 106th recalled training planation workers near his camp in marksmanship. See Kaune, “The National Guard in War,” 48.

¹⁵⁵ Kaune, “The National Guard in War,” 48.

¹⁵⁶ The Matson Steamship Company’s 1928 Kona Inn would be a popular watering hole for officers throughout the war. See “Kona Inn: a Kailua Landmark,” *West Hawaii Today*, November 4, 2012, accessed December 3, 2013, <http://westhawaiiitoday.com/sections/news/local-features/kona-inn-kailua-landmark.html>. See also Kona Historical Society, *A Guide to Old Kona* (Kailua-Kona: Kona Historical Society, 1998), 28.

¹⁵⁷ Winston Groom, *1942: The Year that Tried Men’s Souls* (New York: Grove Press, 2005), 55.

¹⁵⁸ See Bailey and Farber, *First Strange Place*, for an overview of fraternization practices and “hula girls.”

¹⁵⁹ “He Fought at Saipan and Okinawa—Private Marty Mestre was in the 27th Division,” *Don Moore’s War Tales*, Veterans History Project, accessed December 2, 2013, <http://donmooreswartales.com/2013/10/14/marcello-mestre/>.

¹⁶⁰ Several references refer to Pennell as a Brigadier General, the next lower rank. He actually was promoted to Major General only in November 1942 when he stepped down as commander of the 27th Division. He retired in 1946 as a Major General. “Pennell, Ralph McTyeire (1882–1973),” *Pacific War Online Encyclopedia*, 2008, accessed December 2, 2013, http://pwencycl.kgbudge.com/P/e/Pennell_Ralph_M.htm; and “27th Division, World II,” June

cabins and the original wood 1877 Volcano House, which became an officers' billet. The Army—both the district and the 27th Division—also utilized unused NPS structures, including several staff quarters, and took over the old photographic concession building vacated by Maehara in December.¹⁶¹ Relocating the CCC camp to the old quarters at Pōhakuloa, the Kīlauea Iki camp also became military housing. The Army also constructed additional barracks, known as the Crater Billet, near the end of Crater Road.¹⁶²

Fearing that the military would commandeer the hotel, Superintendent Wingate offered General Pennell the nearly finished Volcano Observatory and Naturalist Building, under construction since June 1940. Estimated at 59 percent complete in January, the 27th Division's arrival sped the project along. With little done on the building since January, between March 14 and 18, workers brought the building to a point that Wingate estimated as 90 percent complete. The project used a CCC crew of about twenty including three skilled park employees and sixteen men assigned to the project by the Corps of Engineers. CCC foreman Jannick supervised the project, with the help of foreman Quick. Ranger Jess inspected the work on behalf of the NPS.



6. 14. Volcano Observatory and Naturalist's Building, Hawaii National Park, Kīlauea, Hawaii. This building was under construction at the time of the Pearl Harbor attack and the park made it available to the 27th Division upon its arrival in April 1942. It remained the headquarters for the Hawaii Division until October 1942.

28, 2012, accessed December 3, 2013, <http://dmna.ny.gov/historic/reghist/wwii/infantry/27thInfDiv/27thInfDivMain.htm>.

¹⁶¹ Wingate interview, transcript, 16.

¹⁶² Superintendent's Monthly Reports, April and May 1942.

Superintendent Wingate and General Pennell had a very positive relationship. Wingate referred to him as “a true soldier and gentleman.”¹⁶³ Pennell attempted to minimally disrupt the ongoing work of park employees and acceded readily to Wingate’s proposal that the Volcano Observatory and Naturalist Building—Building 41 in the park’s inventory—serve as the Hawaii District Headquarters. Wingate presented Pennell with a detailed memorandum on the park and its mission.¹⁶⁴ He also highlighted the significance of parts of the Kīlauea section of the park, emphasizing the fragile character of places such as Kīpukapuaua and the fern forest areas. The general, on his part, asked the park’s cooperation in staffing guard and observation posts “without charge” to the district.¹⁶⁵

Once the 27th Division was in place and General Pennell had charge of the Hawaii District, the defensive role of the park’s employees shifted. Wingate arranged for space in the NPS headquarters building to serve as an office and training site for the newly organized Hawaii Rifles. In May 1942, Major J. J. Farley of the 27th Division took over supervision and training of the organization.¹⁶⁶ There were changes in command structure of defense as well. Lieutenant Colonel V. S. Burton, once with KMC, and later district commander stepped down to the position of head of the Hawaii Service Command. Major Maurice Fitzgerald became provost marshal, replacing Captain Lorenzo Adams.¹⁶⁷

With nearly every available building occupied and the construction of additional facilities at KMC and elsewhere in the park, the park had suddenly become a very lively place. Authorities lifted the ban on liquor sales in early February and bars were open daily from 10:00 a.m. to 5:00 p.m.—Sundays from 2:00 to 5:00, “beer only.”¹⁶⁸ In June, the authorities extended bar hours to 6:30.¹⁶⁹ Business at the nearly empty Volcano House improved greatly after the arrival of the 27th Division. In addition to long-term rentals by a few officers, there were also

¹⁶³ Wingate interview, transcript, 15.

¹⁶⁴ Superintendent’s Monthly Reports, March 1942; and Wingate interview, transcript, 16.

¹⁶⁵ Wingate interview, transcript, 16.

¹⁶⁶ Superintendent’s Monthly Reports, May 1942.

¹⁶⁷ Superintendent’s Monthly Reports, March 1942.

¹⁶⁸ Superintendent’s Monthly Reports, February 1942.

¹⁶⁹ Superintendent’s Monthly Reports, June 1942.

visiting military and civil authorities and other visitors adding the hotel's register. Wingate referred to an "empty Volcano House filled with day and night guests," adding enigmatically, "many females not all of which, by any means were from the south side of the tracks."¹⁷⁰

Officers frequented the "Club Room" and the lobby area. Volcano House bartender Robert Ida suffered a fine of \$50 for supplying liquor to servicemen.¹⁷¹ There were later reports as well of gambling tables broken up by NPS rangers.¹⁷² The officers' billet in the old 1877 hotel building was allegedly a site of late-night drinking and gambling parties, attended by young local women—apparently, in this case, from what Wingate called the "south side" of the tracks.¹⁷³

Throughout the time, the 27th Division was settling in another group of park occupants were in the process of transferring out. First imprisoned on December 7, the group of detainees of Japanese descent had been a subject of deliberation from the beginning of the war. By mid-February, the military government determined that under the Geneva Convention, interned aliens could not be held in a combat zone.¹⁷⁴ On February 15, authorities announced that immediate family members could visit. In anticipation of an imminent transfer to another facility, families were advised to bring warm clothes and that each internee could possess \$50. Noting that the internees were not prisoners of war, the authorities soon began the process of relocation to Sand Island or eventual transfer to the continental United States. The first group of 106 internees departed Kīlauea on March 6; the last group of 25 left on May 12.¹⁷⁵

Bombing Ranges and Radar Installations

On April 26, 1942, the summit crater Moku'āweoweo on Mauna Loa began to erupt, its flow soon spreading along the northeast rift. Medic Joe Castro, just one night into his stay on Hawai'i

¹⁷⁰ Wingate interview, transcript, 15.

¹⁷¹ Superintendent's Monthly Reports, June 1942.

¹⁷² Superintendent's Monthly Reports, September 1942.

¹⁷³ Chapman, et al. *1877 Volcano House: Historic Structure Report*, 89.

¹⁷⁴ "Can't be Held in a Combat Zone, Army Points Out," *Hilo Herald Tribune*, February 15, 1942. See Tomanari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-49; and Moniz Nakamura, "Up in Arms!" 20.

¹⁷⁵ Moniz Nakamura, "Up in Arms!" 20; and Superintendent's Monthly Reports, June 1942.

Island, noted: “the sky and everything lit up red everywhere, it was beautiful.”¹⁷⁶ Although “spectacular” in the superintendent’s opinion, he and others were uneasy about the threat the eruption posed to the island’s security.¹⁷⁷ Adding to the uneasiness, two days after the beginning of the eruption, the Japanese-based propagandist Tokyo Rose facetiously congratulated Hawai‘i on its dramatic display.¹⁷⁸

In addition to possibly directing Japanese planes and ships to Hawai‘i, the eruption further threatened to cut the water flume from Mauna Loa to the Army’s medical center at Mountain View. The Army feared also that it could affect ammunition depots in the Hilo area.¹⁷⁹ With Wingate’s approval, Hawaii District’s military governor Pennell agreed a few days later to try to stem the flow through targeted bombing. The Army had attempted this in 1935 as well, with limited success.¹⁸⁰



6. 15. Mauna Loa eruption, April 1942.

¹⁷⁶ “Joe S. Castro, 1921–2009.”

¹⁷⁷ Wingate interview, transcript, 17.

¹⁷⁸ Wingate, Report on Activities July 1, 1941—p June 30, 1942; and Moniz Nakamura, “Up in Arms!” 22.

¹⁷⁹ Wingate interview, transcript, 17.

¹⁸⁰ Moniz Nakamura, “Up in Arms!” 22.

On May 1, “Messrs. [seismologist R. H.] Finch and [park engineer Arthur L.] Jess [accompanied Army pilot G. L. Kelley on] observation flights over the flow, selecting 2 targets.”¹⁸¹ Hampered by cloud cover, the subsequent bombing run concentrated on the second target. The impact of the 600-pound bombs diverted the stream, although the new stream now simply joined with the main lava stream lower on the slope.¹⁸² Considered successful by Wingate in that it demonstrated how a “flow might be diverted by breaking through the confining walls of the main channel,” the exercise proved of limited impact. Although the flow in fact threatened still to cut off the Saddle Road—an outcome that would have seriously hindered the war effort—the eruption ended on May 10, as quickly as it had begun. At that point, the flow had reached within seven miles of Upper Waiākea-Uka, just southwest of Hilo.¹⁸³

The Army and the NPS cooperated as well on the completion of the “detection [radar] station” at Haleakalā. In January, Army engineers began laying telephone cable to the Red Hill (Pu‘u ‘Ula‘ula) facility. In April, Ranger Hjort reported that all the telephone and power lines were underground. The US Army Corps of Engineers also provided assistance in building a stone walkway. By May, the station was complete, although it never functioned as anticipated. A few soldiers continued to staff what became identified as the Aircraft Warning Service (AWS) station and resided at Pu‘u Nianiau. But the Army finally realized that Haleakalā—despite its great height—might not have been the best location for the new radar after all, just as Wingate had warned.¹⁸⁴

The effort at Haleakalā was only part of the Army’s early efforts to develop an early warning system. Following the system’s operational—though not technical—failure to alert Hawai‘i’s defense forces on December 7, the military moved quickly in the early part of 1942 to

¹⁸¹ Wingate interview, transcript, 16; and Superintendent’s Monthly Reports, April 1942.

¹⁸² Superintendent’s Monthly Reports, May 1942.

¹⁸³ Moniz Nakamura, “Up in Arms!” 22.

¹⁸⁴ Jackson, “Military Use,” 130–31.

create a network of early warning stations at critical places on the islands.¹⁸⁵ Although General Short was uninterested in radar and seemed not to understand its potential, the AWS worked diligently to establish mobile (SR-270) stations throughout O‘ahu in the months before the war. These included stations at Kawaila, Schofield Barracks, and Fort Shafer.¹⁸⁶ By July 1941, there were also newer SR-270B units on the peak of Mount Ka‘ala and at Hale‘iwa, Koko Head, and Opana Point.¹⁸⁷ The unit at Haleakalā, despite its elaborate infrastructure, was also an SR-270B.

The first of the new, more-permanent SR-271 fixed units was installed on O‘ahu in January 1942.¹⁸⁸ By spring, the Army was urging the creation of additional stations, one at Pahoa, on the southeast coast of the island of Hawai‘i, and a second at the south end of the island, on a site leased from the Parker Ranch. This was a property once owned by rancher Robert Brown, known as Kahuku Ranch (not to be confused with Kahuku on O‘ahu) and now a part of Hawai‘i Volcanoes National Park. The station was to include a “100-foot steel latticed tower, mounted on concrete piers,” its “equipment and emergency generators . . . housed in tunnels dug into the hillsides.”¹⁸⁹ Although the tower appears never to have matched these specifications, the Kahuku AWS station operated from July 1942 to late 1944, and was decommissioned in 1946.¹⁹⁰ A platoon-sized unit of about forty men and officers, housed at a cluster of buildings forming the base camp, operated the highly secret equipment.¹⁹¹

¹⁸⁵ Discussed in Butowsky, “Early Warnings.”

¹⁸⁶ Butowsky, “Early Warnings.”

¹⁸⁷ *Wikipedia*, “SCR-270 Radar,” accessed October 9, 2012, http://en.wikipedia.org/wiki/SCR-270_radar.

¹⁸⁸ J. D. Bennett, Signal Company, Aircraft warning, Hawaii Organizational History, accessed October 12, 2012, <http://www.radomes.org/museum/documents/SCAWHRADAR.pdf>, cited in Lorenzo Frey and Laura C. Schuster, “Kauku Base Camp,” National Register of Historic Places Registration Form, Hawaii Volcanoes National Park, November–December 2011.

¹⁸⁹ J. D. Bennett, “Signal Company, Aircraft Warning, Hawaii Organizational History,” revised May 2, 2004, accessed October 12, 2012, <http://www.radomes.org/museum/documents/SCAWHRADAR.pdf>.

¹⁹⁰ Frey and Schuster, “Kauku Base Camp.”



6. 16. Infantry training, 27th Division, Hawai'i Island, 1942. Troops had been issued the new M1 helmet by this period.

War's Further Impacts

The first months of the war had been a difficult time in Hawai'i—its inhabitants having suffered the first foreign attack on a US territory since the nearly forgotten German U-boat attack on Cape Cod in 1918.¹⁹² The early part of 1942 was a time of consolidation, as existing troops and sailors built up defenses and imposed harsh rules on the civilian population. Many residents of Hawai'i returned to the safety of the mainland. Those born or raised on the islands remained to face future attacks and possible invasion. Many local residents were subject to confinement as “dangerous aliens.” These included American citizens, whose crime, in most instances, was little more than being Japanese.

The events of 1941 and early 1942 would change Hawai'i in many ways. An increasing number of soldiers, and then marines, would begin to populate the many existing bases and create new ones. Hawai'i's lands would become places for practice assaults and maneuvers, its

¹⁹¹ K. Luscomb and C. Rygh. Donald E. Tolbert's Days at Kahuku, 1943–1944, Transcript, Oral History, January 12, 2005, cited in Frey and Schuster, “Kauku Base Camp.”

beaches sites of amphibious training for the war to come. Civilians would experience a new wave of national purpose and fresh opportunities for both work and engagement with new faces and new people. More than anything else, the war brought Hawai'i closer to the continent and made it more a part of the United States than ever.



6. 17. Field training, Hawai'i Island, 1942.

The war would reach as well into far corners of Hawai'i. Hansen's disease patients at the Kalihi Receiving Station between Honolulu and Pearl Harbor suddenly were at risk. On May 15, thirty-five of the fifty-five patients at Kalihi, including all the children, transferred to the settlement at Kalaupapa.¹⁹³ The Board of Leper Hospitals and Settlement soon had young patients to provide for and new demands for recreational activities for the group of nine- to eighteen-year-olds. Kalaupapa Boy Scout Troop No. 46 was one outcome; a new school, whose

¹⁹² Alex Larzelere, *Coast Guard in World War One* (Washington, DC: Naval Institute Press, 2003), 135; and R. H. Gibson and Maurice Prendergast, *The German Submarine War 1914–1918* (Penzance, Cornwall: Periscope Publishing, 2002).

¹⁹³ Linda W. Greene, *Exile in Paradise: The Isolation of Hawaii Leprosy Victims and the Development of Kalaupapa Settlement, 1865 to the Present* (Denver: National Park Service, Denver Service Center, 1985), 524. Two destroyers accompanied them. See Anwei Skinsnes-Law, *Kalaupapa: A Collective Memory* (Honolulu: University of Hawai'i Press, 2012).

doors opened on October 15, was another.¹⁹⁴ Many of the children had dreaded confinement on the island. “It was,” as patient Bernard Punikaia recalled, “a place without hope.” Some children had pleaded with the nurses at Kalihi that they not be transferred.¹⁹⁵ They feared the future and the further separation from their families.



6. 18. Hansen's disease settlement, Kalaupapa, Moloka'i, just prior to the war. Kalaupapa suffered from its isolation in the war's early months, but gradually became more self-sufficient. Photograph taken in 1931.

As on O‘ahu and other islands, a sense of dread filled the hearts of many. Ed Marques, assistant keeper at Kalaupapa Peninsula’s Moloka‘i Light Station, carried a .45-caliber pistol and a rifle and spent long hours patrolling the shore near his station.¹⁹⁶ After December 7, the US

¹⁹⁴ Territorial Board of Leper Hospitals and Settlement, *A Brief Summary of the Report for the Year Ended June 30, 1942* (Honolulu: Territorial Board of Leper Hospitals and Settlement, 1942), 4–6; and Greene, *Exile in Paradise*, 525, and 525 n.3.

¹⁹⁵ Ted Gugelyk and Milton Bloombaum, *Separating Sickness, Mai Ho'oka'awale: Interviews with Exiled Leprosy Patients at Kalaupapa*, 3rd ed. (Honolulu: Separating Sickness Foundation, 1996), 104.

¹⁹⁶ Interview, Fred Marques, November 12, 1988; cited in Love Dean, “The Kalaupapa Lighthouse,” *Hawaiian Journal of History* 23 (1989): 152 and 165 n58, and Love Dean, *The Lighthouses of Hawai‘i* (Honolulu: University of Hawai‘i Press, 1991), 104.

Coast Guard—responsible for the light stations after 1939¹⁹⁷—extinguished the light and used the tower as a spotting station for enemy ships and submarines.¹⁹⁸ Keeper Fred Robbins’s daughter Anna Mae recalled that her mother would prepare food and deliver it to her father on duty at the light. “I would watch them as they sat together and we would look out at that great ocean and the night sky”¹⁹⁹—a sky made even clearer by the absence of lights on O‘ahu.

Although the Board of Leper Hospitals and Settlement increased medical supplies and ordered more provisions than usual in the six months before the war, there remained anxieties over adequate food and other essential items. The board provided additional warehouse space to accommodate the new requirements.²⁰⁰ However, in the immediate weeks after the war, settlement deliveries were curtailed, and, in fact, no boat entered into Kalaupapa for nearly three months after the attack.²⁰¹ Construction on a 3,000-foot-long airstrip on the peninsula ended on December 7 as well. Shortly thereafter, the Health Department contracted with the privately owned Gambo Flying Service to provide emergency medical supplies.²⁰²

In a way similar to other communities in Hawai‘i, the settlement responded to need through self-reliance. Patients, who for years had depended on canned goods and other provisions shipped from Honolulu, soon planted “victory gardens.” They also increased poultry and hog production. Much like the national park—Superintendent Wingate reported a bounty of fruit and vegetables in his May report; Ranger Hjort noted a similar increase in produce, as well as fish and eggs in his August 1 memorandum²⁰³—Kalaupapa’s residents soon had more food

¹⁹⁷ Francis Ross Holland, Jr., *America’s Lighthouses: An Illustrated History* (New York: Dover Publications, 1988), 115.

¹⁹⁸ William Chapman, *Moloka‘i Light Station: Historic Resources Report* (National Park Service, Kalaupapa National Historical Park, 2001), 82.

¹⁹⁹ Interview, Anna Mae Kaanele, August 16 and 23, cited in Dean, “Kalaupapa Lighthouse,” 152, 165n59.

²⁰⁰ Greene, *Exile in Paradise*, 524, and 524 n.2.

²⁰¹ Territorial Board of Leper Hospitals and Settlement, *A Brief Summary*, 5–6.

²⁰² “Kalaupapa Airport,” Hawaii Aviation: An Archive of Historic Photos and Facts, State of Hawaii Department of Transportation, Airports Division, accessed October 12, 2012, <http://hawaii.gov/hawaiiaviation/%3E/hawaii-airfields-airports/molokai/kalaupapa-airport>.

²⁰³ Superintendent’s Monthly Reports, May 1942, HAVO Archives; and Frank A. Hjort to Superintendent, memorandum, August 1, 1942, Superintendent’s Monthly Reports, July 1942.

than they needed. Some patients even began selling their surplus to the board, providing them a cash income for the first time.²⁰⁴ As with all big events, the war had unanticipated consequences.

²⁰⁴ Greene, *Exile in Paradise*, 524n2.

CHAPTER 7: ALL-OUT WAR

Progress of the War

The first half of 1942 was an anxious time for the United States and its allies. Hong Kong had fallen two weeks after the Pearl Harbor attack, followed by US bases at Wake Island and Guam that also became early victims of Japanese advances.¹ By January, Japanese forces were in Burma, the Dutch East Indies (Indonesia), New Guinea, and the Solomon Islands.² Driven out of Malaya, British forces soon surrendered Singapore. On February 19, Japanese planes attacked Darwin on Australia's northern coast. At the Battle of the Java Sea, the Japanese Imperial Navy soundly defeated allied ships, paving the way for conquest of Java and Sumatra.³

In particular, the United States fared badly. With its island outposts overrun, US forces soon faced imminent defeat in the Philippines. With both US and Filipino troops resisting the Japanese after their initial invasion on December 8, 1941, it became apparent that the United States—lacking both air and naval support—could not hold out for long.⁴ Although General Douglas MacArthur escaped the stronghold of Corregidor on March 11 and arrived safely in Australia, less than a month later, the last American and Filipino defenders on Bataan surrendered and on May 6, those remaining at Corregidor laid down their arms.⁵ The Japanese

¹ Gregory J. W. Urwin, *Facing Fearful Odds: The Siege of Wake Island* (Lincoln: University of Nebraska Press, 1997); Bill Sloan, *Given Up for Dead: America's Heroic Stand at Wake Island* (New York: Bantam, 2003); and Rottman, *Guam 1941 and 1944*.

² Nicholas Tarling, *A Sudden Rampage: The Japanese Occupation of Southeast Asia* (Honolulu: University of Hawai'i Press, 2001); Jan A. Krancher, ed., *The Defining Years of the Dutch East Indies, 1942–1949: Survivors' Accounts of Japanese Invasion and Enslavement of Europeans and the Revolution that Created Free Indonesia* (Jefferson, North Carolina: McFarland & Company, 2003).

³ David A. Thomas, *The Battle of the Java Sea* (New York: Stein & Day, 1968); and F. C. van Oosten, *The Battle of the Java Sea* (Annapolis, MD: Naval Institute Press, 1976).

⁴ John Burton, *Fortnight of Infamy: The Collapse of Allied Airpower West of Pearl Harbor* (Annapolis, MD: Naval Institute Press, 2006); William H. Bartsch, *8 December 1941: MacArthur's Pearl Harbor* (College Station: Texas A&M University Press, 2003); and Richard Connaughton, *MacArthur and Defeat in the Philippines* (New York: Overlook, 2001).

⁵ John Gordon, *Fighting for MacArthur: The Navy and Marine Corps' Desperate Defense of the Philippines* (Annapolis, MD: Naval Institute Press, 2011); John W. Whitman, *Bataan: Our Last Ditch: The Bataan Campaign, 1942* (New York: Hippocrene Books, 1990); and Donald J. Young, *The Battle of Bataan: A History of the 90-Day Siege and Eventual Surrender of 75,000 Filipino and United States Troops to the Japanese in World War*. Jefferson, NC: McFarland & Company, 1992).

had possession of the United States' last bulwarks in the Pacific.⁶ Only Hawai'i and Midway held out.

A carrier-based raid on the Gilbert and Marshall Islands in January 1942 and the April 1942 "Doolittle Raid" over Japan, however, exacted a psychological victory for the United States. The first involved the newly created 7th Air Force, based in Hawai'i.⁷ The second was commanded by Lieutenant Colonel James "Jimmy" Doolittle and entailed a sixteen-plane B-25B bomber attack launched from the USS *Hornet* about 650 miles from Japan.⁸ Neither action caused significant damage to Japanese forces or the Japanese homeland, but the Doolittle Raid strongly demonstrated the island country's vulnerability.



7. 1. Naval fighter aircraft on the deck of the USS *Enterprise*, Battle of Midway, June 1942.

⁶ Eric Morris, *Corregidor: The American Alamo of World War II* (New York: Cooper Square Press, 2000).

⁷ John B. Ludstrom, *The First Team: Pacific Naval Air Combat from Pearl Harbor to Midway* (Annapolis, MD: Naval Institute Press, 2005).

⁸ Publicized in Ted W. Lawson and Robert Considine, eds., *Thirty Seconds over Tokyo* (New York: Random House, 1943). See also Clayton K. S. Chun, *The Doolittle Raid 1942: America's First Strike Back at Japan*, Campaign Series No. 16 (Botley, Oxford: Osprey, 2006).

In May, American fortunes began changing as well, first at the Battle of the Coral Sea and in June, at the Battle of Midway. At the Battle of the Coral Sea, American aircraft sank the Japanese carrier *Shōhō* and severely damaged a second carrier, thereby averting a Japanese attack on Port Moresby.⁹ On June 4, the Battle of Midway stopped the Japanese navy's occupation of the US's naval station on Midway Atoll, a base famous for the Pan American Airline "clippers" and a cable station for both civilian and military use.¹⁰

Involving seven aircraft carriers (four Japanese and three American), ten battleships and heavy cruisers, fifteen American destroyers, and over six hundred aircraft, the Battle of Midway was a resounding defeat for the Imperial Japanese Navy.¹¹ The United States sunk four Japanese carriers and one heavy cruiser, losing only one American carrier and one destroyer. Following the battle, the Japanese experienced a series of reversals, including a protracted and costly campaign in the Solomon Islands.¹² Japanese pilot training and ship manufacture also fell rapidly behind after Midway.¹³

⁹ Morison, *Coral Sea, Midway, and Submarine Actions*; and Henry, *Battle of the Coral Sea*.

¹⁰ History of Nations, "History of Midway Islands," 2005, accessed December 12, 2013, <http://www.historyofnations.net/oceania/midwayislands.html>.

¹¹ "Battle of Midway Facts," Reference.com, 2014, accessed January 12, 2014, <http://www.reference.com/motif/history/battle-of-midway-facts>; Mitsuo Fuchida; Masatake Okumiya, Clarke H. Kawakami, and Roger Pineau, *Midway: The Battle that Doomed Japan* (Annapolis, MD: Naval Institute Press, 1955); Pat Frank, Joseph D. Harrington, Frank Fletcher, and Yahachi Tanaube, *Rendezvous at Midway: U. S. S. Yorktown and the Japanese Carrier Fleet* (New York: John Day, 1967); Thaddeus Tuleka, *Climax at Midway* (New York: Jove Books, 1983); Thomas Wildenberg, *Destined for Glory: Dive Bombing, Midway, and the Evolution of Carrier Airpower* (Annapolis, MD: Naval Institute Press, 1998); Gordon W. Prange, Donald M. Goldstein, and Katherine V. Dillon, *Miracle at Midway* (New York: McGraw-Hill, 1982); and Jonathan Parshall and Anthony Tully, *Shattered Sword: The Untold Story of the Battle of Midway* (Dulles, VA: Potomac Books, 2005).

¹² C. W. Kilpatrick, *Naval Night Battles of the Solomons* (Smithtown, NY: Exposition Press, 1987); Eric M. Bergerud, *Touched with Fire: The Land War in the South Pacific* (London: Penguin, 1997); and Eric M. Bergerud, *Fire in the Sky: The Air War in the South Pacific*. Boulder, CO: Westview Press, 2000).

¹³ Andrieu D'Albas, *Death of a Navy: Japanese Naval Action in World War II* (Old Greenwich, CT: Devin-Adair Publishing, 1965).

Changes in Hawai‘i

By the second half of 1942, Hawai‘i settled into the new routine of war. Evacuations, reaching a high of about 20,000 in May, fell off dramatically after the Battle of Midway.¹⁴ Internal relocations ended as well, as the danger of invasion receded. By June, the matter of local Japanese was settled. Of the 1,450 initially confined, most remained at Sand Island.¹⁵ While General Emmons still anticipated the transfer of up to 15,000 Japanese to the continental United States—a figure reduced to 5,000 in October 1942—authorities transferred a first group of 107 to an internment camp in Arkansas in November 1942; a second group of about 800 left in the spring of the following year.¹⁶ The remainder stayed in Hawai‘i.

Life remained difficult for the many remaining Japanese residents of Hawai‘i. Local Americans of Japanese ancestry (AJAs) were prohibited from traveling by airplane and for a time couldn’t buy or sell alcohol, work in banks, or own shortwave radios. The Honolulu Chamber of Commerce and similar organizations on other islands initiated a “Speak American” campaign to encourage greater patriotism.¹⁷ Japanese signs came down and language schools closed.

Initially relieved of their rifles in the days just after the Pearl Harbor attack, AJA soldiers continued to serve in the 298th and 299th National Guard regiments throughout the early part of the year—the 298th attached to the 24th Infantry Division at Schofield Barracks; the 299th serving on shore patrol duty on the neighbor islands.¹⁸ On June 4, 1942, all Japanese Americans from

¹⁴ Munger, “Expulsion from Paradise”; and Brown, *Hawaii Goes to War*, 50–51.

¹⁵ Brian Niiya, “History of the Internment in Hawai‘i,” World War II Internment in Hawai‘i: An Online Resource for Students and Teachers, Honolulu: Japanese Cultural Center of Hawai‘i and Education through Cultural & Historical Organizations (ECHO), US Department of Education, Office of Innovation and Improvement, 2010, accessed December 1, 2013, <http://www.hawaiiinternment.org/history-of-internment>; and Green, *Martial Law in Hawaii*, chap. 17.

¹⁶ Allen, *Hawaii’s War Years*, 150; and Green, *Martial Law in Hawaii*, chap. 17.

¹⁷ Brian Niiya, ed., *Japanese American History: An A-to-Z Reference from 1868 to the Present* (Los Angeles: Japanese American National Museum, 1993), 132; and Okiihiro, *Cane Fires*, 234.

¹⁸ The 299th was known as the “Koa Regiment” after its foundation in 1923. See Military.com, “299th Infantry Regiment (Hawaiian National Guard),” Military.com, Unit Pages, accessed November 14, 2013, <http://www.military.com/HomePage/UnitPageFullText/0,13476,712442,00.html>. See also: Conn, Engelman, and Fairchild, *Guarding the United States*.

the National Guard units were pulled, cutting the strength of both regiments by half. As a result, the 299th was deactivated while the 298th, now absent its Japanese volunteers, remained part of the 24th Division.¹⁹

AJA high school cadets and members of the University of Hawai'i's ROTC unit, expelled from the newly revived Territorial Guard in February, joined the 34th Combat Engineers at Schofield Barracks.²⁰ Known as the Varsity Victory Volunteers, they provided labor for construction projects and performed other noncombatant tasks.²¹ In June, coterminous with the removal of Japanese from the National Guard, 1432 *nisei* (second generation) AJA shipped out to Oakland, California to form the 100th Infantry Battalion.²² Training at Fort McCoy, Wisconsin, the Hawai'i contingent eventually became part of the celebrated 442nd Regimental Combat Team.²³

¹⁹ "298th/ 299th Infantry," *Densho Encyclopedia*, accessed January 2, 2014, <http://encyclopedia.densho.org/298th/299th%20Infantry/>.

²⁰ Renita Menyher, *Remember Pearl Harbor* (Bloomington, IN: Xlibris Corporation, 2012), 8. The Territorial Guard formed on December 7 and included volunteer units on each of the islands. See Allen, *Hawaii's War Years*, 161–62.

²¹ Franklin Odo, *No Sword to Bury: Japanese Americans in Hawai'i during World War II* (Philadelphia: Temple University Press, 2004), 122.

²² "Battalion History," 100th Infantry Battalion Veterans, accessed October 12, 2012, <http://www.100thbattalion.org/history/battalion-history/>; and Ben Tamashiro, *Remembrances: 100th Infantry Battalion 50th Anniversary Celebration, 1942–1992* (Honolulu: Published and distributed by 100th Infantry Battalion Publication Committee, 1992), 51, 53.

²³ "442nd Regimental Combat Team," Go for Broke National Education Center, History, Historical Information, accessed October 14, 2012, http://www.goforbroke.org/history/history_historical_veterans_442nd.asp. See James M. McCaffrey, *Going for Broke: Japanese American Soldiers in the War against Nazi Germany* (Norman: University of Oklahoma Press, 2013). See also Robert Asahina, *Just Americans: How Japanese Americans Won a War at Home and Abroad*



7. 2. Nisei enlistees, grounds of 'Iolani Palace, March 28, 1943. The Honolulu Chamber of Commerce sponsored a farewell ceremony for Hawaii 442nd Regimental Combat Team (RCT) soldiers.

With tensions defused after Midway, authorities relaxed some restrictions. Blackout became a “dim-out” in July 1942,²⁴ which allowed for the use of low-voltage bulbs or bulbs painted to expose only an inch of bare glass. Curfew extended to 10:00 p.m. in May and after September, automobiles could stay on the road until 8:00, extended until 10:00 p.m. in

(New York: Gotham Books, 2007); and C. Douglas Sterner, *Go for Broke: The Nisei Warriors of World War II Who Conquered Germany, Japan, and American Bigotry* (Clearfield, UT: American Legacy Media, 2007).

²⁴ Norman Polmar and Thomas B. Allen, *World War II: The Encyclopedia of the War Years, 1941–1945* (New York: Courier Dover, 2012), 158; and Allen, *Hawaii's War Years*, 125–28.

December.²⁵ Work continued, nonetheless, on bomb shelters and by the end of the year, Honolulu had 159 designated shelters. Hawai'i Island had 99, Kaua'i 50, Maui 40, and even tiny Moloka'i had 9.²⁶



7. 3. Air-raid shelter, University of Hawai'i campus. While classes shifted to other facilities, students and other Hawai'i residents became inured to the threat of possible attack.

The military government continued to rely on the assistance of civilians for many necessary tasks. The Office of Civil Defense (OCD) provided training for air wardens that included firefighting and emergency medical services, and a women's unit of the OCD formed in May.²⁷ The OCD's medical branch established hospitals and emergency centers in public and private schools and in other facilities when needed; Ola'a plantation in Kea'au, below Kīlauea, provided a 150-bed hospital at the local school.²⁸ Hospitals throughout the islands continued to

²⁵ David White and Daniel P. Murphy, "Hawaii Under Martial Law," Netplaces, World War II, The United States Enters the War, accessed November 12, 2013, <http://www.netplaces.com/world-war-ii/the-united-states-enters-the-war/hawaii-under-martial-law.htm>; and Allen, *Hawaii's War Years*, 126–28.

²⁶ Allen, *Hawaii's War Years*, 129. See also "Hawaii War Records Depository Photographs: Jan–Jun 1942," Hawaii War Records Depository, 100–111, *Advertiser and Star Bulletin*, accessed October 12, 2013, http://libweb.hawaii.edu/digicoll/hwrdr/HWRD_html/HWRD42a.html.

²⁷ Allen, *Hawaii's War Years*, 129–38; and Green, *Martial Law in Hawaii*, chap. 26.

²⁸ Allen, *Hawaii's War Years*, 133.

collect plasma, with Queens Hospital in Honolulu serving as the principal blood bank.²⁹



**7. 4. Hickam Army Air Base, as expanded in the early war years.
The new hospital is visible at the rear of the housing area.**

Despite greater calm, security remained a central concern. Fingerprinting continued throughout the spring, and beginning in March 1942, registration and identity cards were issued throughout the islands. Authorities also routinely censored mail of civilians and military personnel.³⁰ In July there was a territory-wide test for Hawai‘i’s defense forces, and the following month, the civil defense and military practiced joint maneuvers.³¹ With limits on the amounts of cash in anyone’s possession in place since January, the military government required in July that everyone exchange their US money for special Hawai‘i-issue currency, a policy in effect until

²⁹ “Medical Supply in the War against Japan,” US Army Medical Department, Office of Medical History, chap. 12, part 3, accessed October 13, 2013, <http://history.amedd.army.mil/booksdocs/wwii/medicalsupply/chapter12.htm>; “Hawaii War Records Depository Photographs: Jan–Jun 1942,” 166–71; and Allen, *Hawaii’s War Years*, 134.

³⁰ “The U.S. Navy in Hawaii, 1826–1945: An Administrative History”; and Brown, *Hawaii Goes to War*, 84–85.

³¹ Allen, *Hawaii’s War Years*, 136–37.

October 1944.³²

By the summer months, the food supply was far more secure than at the beginning of the year. The Office of Food Control (OFC) established a practice of monthly inventories and, working closely with the Federal Surplus Commodities Corporation (FSCC), ensured adequate supplies of rice, canned milk, pork and beans, corned beef, salmon, sardines, peaches, peas, and tomato juice. They also established quotas for flour, prunes, raisins, and an adequate supply of potatoes and onions, all shipped from the West Coast.³³ Handled at first by local pineapple companies, the duty of unloading and storing food eventually became the responsibility of the Army. To fight inevitable pest problems, the OFC—following FSCC guidelines—instituted eradication programs, bringing experts from California to supervise the job.³⁴

Truck farms and “victory gardens” supplemented imported foods. Not surprisingly, Japanese ran many of the farms and became increasingly successful at supplying both military and civilian needs through the end of 1942.³⁵ In addition to individual garden plots, there were also communal gardens on school grounds and in parks throughout the territory.³⁶ Both dairy farming and fishing faced strict regulation, and after September 1942, all dairy workers had their jobs “frozen.”³⁷ With larger fishing boats commandeered by the military, local shops depended on smaller catches and canned fish. Commercial luaus were discontinued; pigs could only be killed for weddings and other special occasions, cutting severely into Hawaiian traditions. Hawai‘i’s staple *poi* was also in very limited supply.³⁸

This level of regulation required a new army of administrators. Although the territory remained under martial law, there was still a parallel civil administration. Headed by Governor

³² Rich Budnick, *Hawaii's Forgotten History: The Good . . . the Bad . . . the Embarrassing* (Honolulu: Aloha Press, 2005), 97; Simpson, *Hawaii Homefront*, inside cover; Brown, *Hawaii Goes to War*, 62; and Allen, *Hawaii's War Years*, 109. See also Jeremy Uota, *Hawaii Overprint Currency Catalog*, 2012 ed. ([Honolulu]: Stuffcyclopedia, 2012).

³³ Ann Rayson, *Modern History of Hawaii* (Honolulu: Bess Press, 2004), 161; and Allen, *Hawaii's War Years*, 166–67.

³⁴ Allen, *Hawaii's War Years*, 167; and Green, *Martial Law in Hawaii*, chap. 19.

³⁵ Wayne D. Rasmussen, *Taking the University to the People: Seventy-Five Years of Cooperative Extension* (West Lafayette, IN: Purdue University Press, 2002), 111.

³⁶ Brown, *Hawaii Goes to War*, 96–97.

³⁷ Allen, *Hawaii's War Years*, 180; and Green, *Martial Law in Hawaii*, chap. 19.

³⁸ Allen, *Hawaii's War Years*, 181; and Green, *Martial Law in Hawaii*, chap. 19.

Joseph Poindexter (1869–1951) at the war's beginning, the civil administration fell in August 1942 under the authority of President Roosevelt's appointee Ingram Stainbeck (1883–1961) who oversaw the county mayors and territorial government, sharing responsibility for many other functions with General Emmons and his large staff. The civil government controlled the Office of Civil Defense (OCD); the military was the Office of the Military Governor (OMG). Under these joint entities was a plethora of agencies and divisions, including civil defense, food control, labor oversight, materials and supplies, cargo and passenger control, and transportation.³⁹



7. 5. Tanks on Nuanu Avenue (near Smith Street), Honolulu, 1942. The M2 Medium Tank had been in production since 1939 and quickly replaced the M2 Light Tank employed at Guadalcanal. Troops trained on this model on O'ahu and on the national park. These appear to be M3 Stuart Tanks, the replacement for the M2.

³⁹ Allen shows the complexity of the administrative structure for the two sections of Hawaii government, the civil and military. See Allen, *Hawaii's War Years*, 186–87. For greater detail, see Green, *Martial Law in Hawaii*, chaps. 18 and 19.

Stainbeck and Emmons worked closely together with OCD and its staff of 3,013 persons, augmented by 14,000 volunteers, gradually gaining more control over governmental functions.⁴⁰ Nonetheless, the military controlled the judiciary, with nearly all cases falling to the provost courts. Although, for certain cases, the military allowed jury trial after September 1942, Honolulu's three provost courts disposed of nearly 19,000 cases during the first half of 1942. Trials were typically on the day of the offense, usually resulting in fines or short jail terms. A typical fine for drunkenness was \$100 for the first offense, with jail time for repeated offenses. After June 1942, blood donations could stand in lieu of other penalties—at a rate of one pint of blood for a \$30 fine or 15 days in jail.⁴¹

Changes in administration occurred against a backdrop of unprecedented population growth. By July 1942, there were 130,000 troops in the islands, well over three times the number present in December 1941.⁴² The 14th Naval District had also increased from 5,000 personnel to over 20,000 during the same period. Even the Coast Guard had witnessed an increase in personnel from 250 men and officers to over 3,200 during the first year of the war.⁴³ Civilian workers also increased from an already high number of 30,000 defense workers in December 1941 to over 82,000 by the end of 1942—the peak period of civilian employment.⁴⁴

The new workers required immediate housing and other facilities. Civilians occupied military barracks and vacated plantation houses and other buildings; soldiers slept in tent cities throughout the islands and in expanded quarters at Schofield Barracks, Fort Shafter, and other

⁴⁰ Allen, *Hawaii's War Years*, 191.

⁴¹ Green, *Martial Law in Hawaii*, chap. 16.

⁴² "US Army Divisions in World War II," History Shots, accessed October 12, 2013, <http://www.historyshots.com/usarmy/backstory.cfm>.

⁴³ "The U.S. Navy in Hawaii, 1826–1945: The World War II Years," Navy History and Heritage Command, accessed September 23, 2012, <http://www.history.navy.mil/docs/wwii/pearl/hawaii-4.htm>; and Dennis L. Noble, "Alaska and Hawaii: A Brief History of US Coast Guard Operations," US Coast Guard, US Department of Homeland Security, Historians Office, Coast Guard History, accessed December 12, 2013, http://www.uscg.mil/history/articles/h_alaska_and_hawaii.asp.

⁴⁴ Allen, *Hawaii's War Years*, 267, 282–83, 353–54. For further insights into the civilian workforce, see Center for Oral History, *World War II and Hawai'i's Civilian Community* (Honolulu: Center for Oral History, Social Science Research Institute, 1994), National Park Service, US Department of the Interior, Cooperative Agreement CA-8040-

existing bases. Eventually, O‘ahu would have fifty sizeable Marine, Army, and Army Air Forces bases and 26 Navy stations.⁴⁵ The military also expanded existing airports, installed additional auxiliary landing fields, constructed roads, and built bridges, culverts, and storage facilities. The prewar oil-storage plant at Red Hill grew into a \$42 million project, becoming the largest facility of its kind.⁴⁶

Training became, as well, one of Hawai‘i’s principal military functions. The Army expanded its property holdings, buying 62,058 acres of land and leasing an additional 210,000 acres.⁴⁷ The Navy acquired 118,000 acres in leases and expanded its facilities at Pearl Harbor and Honolulu.⁴⁸ Training spread throughout the islands, with jungle training at the Ranger Combat Training School at Schofield and amphibious-landing training at the Waianae Amphibious Training Center in the western part of O‘ahu.⁴⁹ Within a few months, there was also the Combat Demolition Training Station on Maui, where teams learned reconnaissance and demolition basics.⁵⁰ Swimming pools throughout the islands also served for military training; there were even training centers for dogs and for pack mules.⁵¹

The surge in the residential population and, increasingly, of in-transit military personnel,

2-0001, Submitted August 8, 1994, *An Era of Change: Oral Histories of Civilians in World War II Hawai‘i*, accessed December 12, 2013, http://www.nps.gov/history/history/online_books/usar/civilian_community.pdf.

⁴⁵ Allen, *Hawaii’s War Years*, 235; “The U.S. Navy in Hawaii, 1826–1945: The World War II Years,” Navy History and Heritage Command, accessed September 23, 2012, <http://www.history.navy.mil/docs/wwii/pearl/hawaii-4.htm>; Paul Freeman, “Abandoned and Little Known Airfields: Hawaii, revised April 23, 2013, accessed December 12, 2013, http://www.airfields-freeman.com/HI/Airfields_HI.htm; David Brooks, “Military Airfields in World War II, 1941–1945: Hawaii,” November 19, 2011, accessed December 12, 2012, <http://www.airfieldsdatabase.com/ww2/ww2.htm>; and Conn, Engelman, and Fairchild, *Guarding the United States*, 169–73.

⁴⁶ American Society of Civil Engineers (ASCE), “Red Hill Underground Fuel Storage Facility,” Landmarks, American Society of Civil Engineers (ASCE), 2014, accessed November 12, 2012, <http://www.asce.org/People-and-Projects/Projects/Landmarks/Red-Hill-Underground-Fuel-Storage-Facility/>.

⁴⁷ Green, *Martial Law in Hawaii*, chap. 14; and Allen, *Hawaii’s War Years*, 240–42.

⁴⁸ “The U.S. Navy in Hawaii, 1826–1945: The World War II Years” htm; and Allen, *Hawaii’s War Years*, 237–29.

⁴⁹ Allen, *Hawaii’s War Years*, 215. The training is described in Philip A. Crowl and Edmund G. Love, *Seizure of the Gilberts and Marshalls* (Washington, DC: GPO, 1955), 45.

⁵⁰ “On the Land: Maui and a Training Island,” Maui’s World War II History: The History of Maui during the War Years, National Marine Sanctuaries, National Oceanic and Atmospheric Administration (NOAA), revised February 2, 2012, accessed December 12, 2012, <http://sanctuaries.noaa.gov/maritime/expeditions/maui/history.html>.

⁵¹ Allen, *Hawaii’s War Years*, 216.

was a boon for Hawai'i's businesses. Revenues from licenses, beer and liquor sales, and property and income taxes soared. Hotel Street and other after-hours venues prospered despite strict military regulation. Similarly, the Senator, Bronx, Ritz, Bungalow, and other clubs dotted the special red-light district set aside by the military and civil authorities in Chinatown.⁵² There were tattoo parlors, photographers, souvenir shops, and bars throughout the islands catering to soldiers and sailors as well as to the many skilled and semiskilled workers in Hawai'i.⁵³ Military personnel and civilians also took advantage of YMCAs and public libraries.⁵⁴ The Honolulu Academy of Arts galleries also experienced a sudden spike in visitation, and musical performances at schools, parks, and hospitals occurred, featuring many service bands.⁵⁵ Likewise, the United Services Organization (USO) sponsored dances and other entertainments, and movies, allowed in the evenings after July 1942, became popular again, as were films distributed by the Army's Overseas Motion Picture Service—the latter available to troops beginning in May 1942.⁵⁶

Although there were certainly abuses, a strong sense of common purpose pervaded Hawai'i. Scrap drives continued in popularity and residents purchased war bonds from post offices, movie theaters, and sidewalk vendors.⁵⁷ War-related themes punctuated shop display windows and posters appeared cautioning workers to "Serve in Silence" and not be a "Blaboteur."⁵⁸ Some 32,197 Hawai'i residents were inducted into the military.⁵⁹ Many others joined voluntarily. Hawai'i was not only the initial site of the war but also one of country's most evident places of support.

⁵² Brown, *Hawaii Goes to War*, 134–35. See Green, *Martial Law in Hawaii*, chap. 27, on prostitution and the military's role. Jones's *From Here to Eternity* devotes a significant part to the nightlife of Honolulu. In the 1953 film version, the Senator Club became the Congress Club. For an overview of the period, see Simpson, *Hawaii Homefront*.

⁵³ Bailey and Farber, *First Strange Place*, chap. 3; and Margo DeMello, *Bodies of Inscription: A Cultural History of the Modern Tattoo Community* (Durham, NC: Duke University Press, 2000), 73.

⁵⁴ Allen, *Hawaii's War Years*, 282–85; and "Hawaii War Records Depository Photographs: Jan–Jun 1942," 679.

⁵⁵ Allen, *Hawaii's War Years*, 125–26; and Brown, *Hawaii Goes to War*, 145.

⁵⁶ Tod Bennett, *One World, Big Screen: Hollywood, the Allies and World War II* (Chapel Hill: University of North Carolina Press, 2012).

⁵⁷ Kimble, *Mobilizing the Home Front*.

⁵⁸ Brown, *Hawaii Goes to War*, 109.



7. 6. The Honolulu Recreation Center, downtown, Honolulu, ca. 1943. Located next to the military governor's offices at the palace at the end of Hotel Street, this and other amusement arcades attracted off-duty service personnel.



7. 7. Wartime Waikiki, ca. 1943.

⁵⁹ Allen, *Hawaii's War Years*, 290.



7. 8. USO Club in Hanapepe, Kaua'i, grand opening, 1943. USOs provided a wholesome alternative to other forms of entertainment available to service personnel.

The Park in Late 1942

In the second part of 1942, life in the Hawaii National Park mirrored the rest of the territory. As Superintendent Wingate phrased it, “The Tension of the last weeks of May was relieved when official reports of the Midway battle began to be released.” Recognizing that Hawai‘i was still vulnerable, Wingate and his much-diminished staff continued the wartime routines of the previous six months. “Heavy emphasis was placed on guard duty,” he reported.⁶⁰ Due to the departure of several rangers, Wingate secured the promotion of Laborer Thomas Kauhi and Park Warden Antone B. Medeiros to park ranger positions. He also officiated over the July scrap rubber drive—the park collected 5,980 pounds of rubber, or about 50 pounds per person, compared to the Hawai‘i Island average of 6 pounds—and supervised the construction of the park’s 75-person air-raid shelter.

⁶⁰ Superintendent’s Monthly Reports, June 1942

Wingate's other activities included overseeing the training of the Hawaii Rifles, undertaken by his ranger staff members, attending the Puna District Selective Service Board meetings, and remaining in communication with military and civil authorities over wartime needs. In July, he ordered the fire hydrants painted red and black to assist in identifying their locations; he also had additional sandbags set out in case of incendiary attack. By August he would report that "no events of particular importance occurred here"—although the park did host visits from General R. F. Kernan, head of the Maui District, Brigadier General A. E. Anderson, Kernan's equivalent on Kaua'i, and Territorial Judge Emil C. Peters from Honolulu. Demonstrating the territory's newfound confidence, Peters criticized the park for not keeping up its education programs. This, despite the fact that Wingate had lost three more employees—Ranger Charles Miller to the Navy, Chief Clerk James K. Higanhida to the government, and occasional volunteer Mrs. C. Hewitt, who joined her husband in Honolulu—just that month.⁶¹

One of the chief impediments to the park's work was the discontinuance of the CCC program. In operation since 1933, the CCC enrollees and their supervisors had done an enormous amount of work in the park, both at Kīlauea and at Haleakalā. By May 1942, the size of the local unit was diminished, with only five new enrollees and thirty-seven young men recently discharged. With its new headquarters in the Federal Building in Hilo, most of the enrollees transferred to a new camp at Pōhakuloa on the high plateau between Mauna Kea and Mauna Loa.⁶²

Still petitioning for the continuance of the program, Wingate remarked that "Park operations here will be severely handicapped until replacements are made for the trauma first-aid, litter-bearing, and fire-protection squads formed from the corps."⁶³ In July, the matter effectively died with the end of the CCC program. Remaining enrollees soon directly served the

⁶¹ Superintendent's Monthly Reports, August 1942.

⁶² Superintendent's Monthly Reports, May 1942.

US Army Corps of Engineers, including the small groups still at Kīlauea. In August, the superintendent approved the transfer of remaining CCC equipment.⁶⁴

In part to compensate for the loss of staff, the Honolulu authorities assigned a conscientious objector (CO) to the park in July 1942. A graduate of Michigan State University's forestry school, Arthur L. Mitchal received an assignment as the park's naturalist. By August, he was hard at work assisting in park activities, including the long-neglected task of eradicating invasive plants.⁶⁵ Soon afterward, a second CO joined him.

By September, the Kīlauea branch was beginning to experience an upturn in the number of visitors. The park sponsored several illustrated talks for both civilians and military personnel. Hiking and horseback riding were also popular, Wingate noted. In October, Wingate reported that there was a noticeable increase in the number of requests for assistance and "a considerable number of civilian visitors, whose presence had not been contemplated before 1943." The hotel, which had been nearly empty early in the year, had forty guests.⁶⁶

While visitation to the Kīlauea section picked up, Haleakalā remained quiet. Not open to civilians before October 1942, Haleakalā was the preserve of personnel from the warning Station Service Unit. Ranger-in-Charge Hjort worked closely with Captain Eon Lucas and after September Lieutenant Leo Skinner to maintain the park's resources and assist when needed. In July, he noted that Army engineers had run a new telephone line up to their installation. The Corps of Engineers also supplied materials for a new water catchment and connecting pipes, helping to alleviate a persistent water shortage.

The military kept Hjort and his small staff busy. In September, 500 soldiers arrived by automobile for tours. Working with an Army chaplain stationed in Wailuku, Hjort helped provide a regular series of hikes and other educational programs in the park. In October, he recorded 600 visitors and took a group of 75 soldiers on a hike into the crater. November

⁶³ Superintendent's Monthly Reports, June 1942.

⁶⁴ Superintendent's Monthly Reports, August 1942.

⁶⁵ Superintendent's Monthly Reports, July and August 1942.

⁶⁶ Superintendent's Monthly Reports, October 1942.

witnessed a similar level of visitation. In December, Hjort hosted three groups, totaling 100 men, on tours of the crater.

Law enforcement was also one of Hjort's primary duties. In July, he arrested serviceman Marcus S. Blodgett for speeding at Puu Nianiau⁶⁷ and cited an Army officer in October for illegal hunting, which resulted in a \$10 fine from the provost court the same day.⁶⁸ In November, another Army officer drove his jeep part way down Sliding Sands Trail and was unable to return to the road.⁶⁹ Hjort also had to monitor entrance to the park, including denying access to Japanese "even if they are citizens."⁷⁰ Despite changes, security was still very much an issue.

Uses of Parklands

Throughout the remainder of the year, Superintendent Wingate worked cooperatively with the military. Rangers continued to deal with infractions by soldiers and officers stationed in the Kīlauea section. In September, they twice broke up parties of gamblers in the hotel lobby.⁷¹ There was also a car theft—later resolved—and occasional speeders.⁷² Mostly, however, the relationship between the park employees and the military was positive. Park rangers gave lectures to soldiers at KMC. Mitchal also traveled to Hilo to give a lecture to 727 men at the USO.⁷³

Although the Emergency Police Guard was disbanded after the Battle of Midway, park rangers continued their work with the Hawaii Rifles, drilling each Sunday with assistance from instructors from the 27th Infantry.⁷⁴ The park's staff members coordinated with the local fire wardens, conducting a gas and air raid drill in September. Wingate also served as the chair of the

⁶⁷ Superintendent's Monthly Reports, July 1942.

⁶⁸ Superintendent's Monthly Reports, October 1942.

⁶⁹ Frank A. Hjort to Edward Wingate, Superintendent, memorandum, December 28, 1942, Superintendent's Monthly Reports, November 1942.

⁷⁰ Superintendent's Monthly Reports, October 1942.

⁷¹ Superintendent's Monthly Reports, September 1942.

⁷² Superintendent's Monthly Reports, September and December 1942.

⁷³ Superintendent's Monthly Reports, October 1942.

⁷⁴ Superintendent's Monthly Reports, August, September, and October 1942; and Wingate interview, transcript, 18–19.

Puna District Board, attending meetings both in Ola‘a and Hilo.⁷⁵ On December 8, he attended a luncheon sponsored by the American Legion Post in Hilo.⁷⁶

Wingate and his military counterpart, General Pennell, showed a clear spirit of cooperation. Pennell coordinated with Wingate on troop training activities as well as construction work within and outside the park. He also employed engineers to assist in improving the park’s water collection and storage system.⁷⁷ Wingate referred to a “spirit of genuine mutual helpfulness and understanding,” when describing his relationship with Hawai‘i’s military commander.⁷⁸ He was understandably sorry when Pennell stepped down in October, replaced by General Herbert D. Gibson (d. 1980) as head of the Hawaii District.⁷⁹ Unknown to Wingate, Pennell would also relinquish command of the 27th Infantry Division as it prepared for action in the Pacific.⁸⁰

After June 1942, the 27th Division’s units began active training for their eventual deployment in the Pacific, shifting from “defensive” to “offensive” exercises. These included both motorized and infantry maneuvers and live-fire practice. Although Wingate put Pennell on notice to protect the park’s resources, some damage was inevitable. Wingate recognized too the special authority conveyed by martial law and only hoped that Pennell would abide by agreements.⁸¹ His later remarks in the annual report of June 1943 confirmed that military personnel did not often follow agreements on areas to be used and/or avoided and the limits on which days training would occur.⁸²

For his part, Wingate continued to bide his time. In addition to KMC, the Army still occupied the Volcano Observatory and Naturalist Building, structures once part of the Volcano

⁷⁵ Superintendent’s Monthly Reports, September, October, November 1942.

⁷⁶ Superintendent’s Monthly Reports, December 1942.

⁷⁷ Superintendent’s Monthly Reports, October 1942.

⁷⁸ Superintendent’s Monthly Reports, March 1943.

⁷⁹ Superintendent’s Monthly Reports, October 1942. On Gibson, see Kent G. Budge, “Pennell, Ralph McTyeire (1872–1973),” *Pacific War Online Encyclopedia*, accessed December 12, 2013, http://pwencycl.kgbudge.com/P/e/Pennell_Ralph_M.htm; and US Army Field Artillery School, [Fort Sill, Oklahoma], “World War II,” US Army, US Department of Defense, accessed December 29, 2013, <http://sill-www.army.mil/USAFAS/history.html>.

⁸⁰ Budge, “Pennell, Ralph McTyeire (1882-1973)”; and “27th Division, World II.”

⁸¹ Jackson, *Administrative History*, 94.

House complex, including the original hotel, former CCC camp, and additional billets constructed near the end of Chain of Craters Road.⁸³ The Army had also received permission to clear a portion of the old Kilauea Landing Field for use of light aircraft for artillery observation and had allowed for the Army use of a temporary road into the Ka‘ū Desert south of the Keanakāko‘i Crater to set up a gun emplacement.⁸⁴ The Army also possessed the Sulfur (Sulphur) Banks area, Steaming Flats, Uwēkahuna, and lands adjacent to KMC—all of which the military denied entry to civilians.⁸⁵ With each step, the Army further entrenched at Kīlauea, a process that Wingate hoped to stop as soon as circumstances permitted.

In addition to the military, Wingate had to deal with opening up parkland for cattle grazing. An indirect outcome of the war, in spring 1940, C. Brewer & Co., one of Hawai‘i’s “Big Five” companies, approached the park and civil government with a proposal reclaiming the Kapapala Ranch lands, once owned by the company, for cattle production. The ranch—comprising 6,418 acres of land on the slopes of Mauna Loa—was vacated between July and October 1940, with the park demanding the removal of “all cattle and other livestock” prior to October 8 of that year.⁸⁶

Claiming wartime food requirements, the directors of C. Brewer had the support of Honolulu authorities. Wingate later confessed that he “realized this would have to be done since the Park would be very severely condemned if it did not grant the access.” Doubtful of the firm’s “patriotic motives,” as he put it, Wingate countered that the beef should be produced at cost—a proposal immediately turned down by C. Brewer’s officers.⁸⁷ Instead, C. Brewer offered to pay the old price of 11 cents per acre, about a quarter of existing lease rates.

Wingate continued to negotiate with C. Brewer & Co.’s executives, pointing to the irreparable damage caused to resurgent *koa* trees. He also identified another rancher that would

⁸² Jackson, *Administrative History*, 94; and Moniz Nakamura, “Up in Arms!”

⁸³ Warshauer, “History of Kilauea Military Camp,” chap. 15.

⁸⁴ Moniz Nakamura, “Up in Arms!” 25.

⁸⁵ Local Subsidiary Rules and Regulations, February 24, 1942, Edward G. Wingate, Record Group 79, Box 158, Box 25, NARA San Bruno.

⁸⁶ Superintendent’s Monthly Reports, July, September, and October 1940.

be willing to pay a higher price. In July, Park Naturalist Gunnar O. Fagerlund and Acting Chief Ranger Paul Baldwin submitted a monograph entitled “Effect of Cattle Grazing upon Koa Reproduction in Hawaii National Park,” submitted by Wingate to the NPS director’s office for review. Fearing further delays, the military government told C. Brewer & Co. to proceed despite NPS concerns and to work out the rental amount later.⁸⁸ To ameliorate the damage, the NPS requested that grazing be limited to “open lands” outside of the *koa* groves and *kipūka* (small pockets of vegetation).⁸⁹ C. Brewer & Co. was also required to erect a fence to protect the groves.⁹⁰

The disagreement over C. Brewer & Co.’s request was only one of several quarrels that Wingate had with Honolulu authorities. Over spring and summer 1942, he questioned the appearance of a new milk company, owned by “a close political associate of the Dir. Of Civil Defense.”⁹¹ Coming to the defense of “Mrs. Suzuki who operated a dairy at Glenwood,” he questioned the order of an Army Reserve officer that she stop delivery to her existing customers and send her milk to the new company’s distribution station in Hilo. Wingate took her testimony and, exercising his power as both park superintendent and a member of the Gasoline Rationing Board, told her to continue her deliveries as before.

Wingate also intervened in the case of several local Japanese operators over disputed bus service to the park. According to his petitioners, the Transportation Board had granted a new firm, the Transilux Co., rights to the Hilo-Kīlauea route. Wingate informed the board that Transilux’s application was fraudulent. When the company persisted in carrying passengers to the park, Wingate came to the aid of K. Hatayama, who held a “First Preference Permit Contract” with the park. Again, the Office of Civil Defense attempted to support the new

⁸⁷ Wingate interview, transcript, 17.

⁸⁸ On June 3, 1943, the company would finally get its lease at, a yearly cost of \$2,500. Wingate was pleased that the amount was approximately that first proposed by the NPS director and himself. The military ordered the opening of the Kapapala ranchlands on June 6, 1942; and Thomas H. Green, Brigadier General, to Edward G. Wingate, June 6, 1942, Record Group 79, Box 25, NARA San Bruno.

⁸⁹ Wingate, Resume of Activities for the FY 1943, cited in Moniz Nakamura, “Up in Arms!” 34n62.

⁹⁰ Moniz Nakamura, “Up in Arms!” 25.

⁹¹ Wingate interview, transcript, 18.

company, while Wingate continued to back Hatayama. Explaining in an appeal to Hilo's Judge Irwin that the Secretary of the Interior alone had the right to grant concessions in the park, Wingate eventually backed down. The other buses could still operate but preference went to Transilux until the war's end.⁹²

The Kau Desert Impact and Training Area

In October 1942, the new military commander for the Hawaii District, General Herbert D. Gibson, set up offices in Hilo. Gibson's arrival corresponded with the departure of the 27th Infantry Division, from Hawai'i Island to Schofield Barracks under its new commander Major General Ralph C. Smith (1893–1998); General Ralph Pennell, promoted to major general, stepped aside to become head of the War Department Dependency Board and later commandant of the Field Artillery School at Fort Sill, Oklahoma.⁹³ Although Pennell's unit left with a record of missing tools, broken glassware, and a damaged tractor-grader, Wingate was sorry to see the general go.⁹⁴

The park had its Volcano Observatory and Naturalist Building back and its other offices, housing, and facilities. For Wingate "a sort of void seemed to enter the Park."⁹⁵ Staff numbers fell to an all-time low, with few qualified rangers or specialists and only a few of the prewar staff remaining to police the park. Fire danger was still a principal concern, since the park no longer had its contingent of CCC workers. Patrolling roads and maintaining existing facilities, including the park's telephone system, absorbed much of the available staff time.⁹⁶

Wingate did not have a high regard for the Hawaii Rifles. He disliked that their command structure was composed of Regular Army officers, and he resented the fact of his own

⁹² Wingate interview, transcript, 18.

⁹³ "Pennell, Ralph McTyeire (1872–1973)"; and US Army Field Artillery School, [Fort Sill, Oklahoma], "World War II," US Army, US Department of Defense, accessed December 29, 2013, <http://sill-www.army.mil/USAFAS/history.html>.

⁹⁴ Jackson, *Administrative History*, 93–94.

⁹⁵ Wingate interview, transcript, 19.

staff having to devote time to training and drills. He was concerned too that the many Filipinos in the organization might have ill feelings toward Japanese residents, due to the reports of atrocities by Japanese soldiers against the civilian population in the Philippines.⁹⁷

Through his job as chair of the local draft board, Wingate also expressed concern over the reclassification of Japanese Americans as “unacceptable for military training,” an order issued by the Selective Service Division in Washington and quickly implemented by the territorial government.⁹⁸ Wingate was proud that the Puna board would be the only one in the country to not comply with the order.⁹⁹ Reiterated on January 5 by the Territorial Selective Service director, President Roosevelt overturned the ruling on February 5, 1943.¹⁰⁰ Afterward, Japanese Americans were inducted just as were those of other backgrounds.

Wingate attributed his growing disagreements with the military to the new military commander in Hawai‘i.¹⁰¹ A career soldier with a distinguished combat record—Gibson had received a Silver Star and a Distinguished Service Cross for gallantry in World War I¹⁰²—the Hawaii District’s new commander was a no-nonsense leader with a strong penchant for training. Wingate summarized his stance with the phrase, “Don’t you know there is a War On?”¹⁰³ General Pennell had sowed the seeds of discord in mid-1942 when he gradually expanded the scope and range of training beyond that originally discussed with Wingate. By November, under

⁹⁶ Superintendent’s Monthly Reports, 1942, 1943.

⁹⁷ Wingate interview, transcript, 19.

⁹⁸ See Tetsuden Kashima, *Judgment without Trial: Japanese American Imprisonment during World War II* (Tacoma: University of Washington Press, 2011). The decision originally had been made on June 17, 1942, but had been ignored in Hawai‘i. See Green, *Martial Law in Hawaii*, chap. 17.

⁹⁹ Wingate interview, transcript, 21.

¹⁰⁰ Most Japanese were originally classified as IV-C, Alien or Dual National. This changed in February 1943. See Kathryn Shenkle, “Patriots under Fire: Japanese Americans in World War II,” US Army, Center for Military History, updated November 19, 2010, accessed January 13, 2014, <http://www.history.army.mil/html/topics/apam/patriots.html>. The irony was that many witnessed their families interned. Some would resist. See Eric L. Muller, *Free to Die for Their Country: The Story of the Japanese American Draft Resisters in World War II*, Chicago Series in Law and Society (Chicago: University of Chicago Press, 2001).

¹⁰¹ Wingate interview, transcript, 19.

¹⁰² “Herbert D. Gibson,” *Military Times*, Hall of Valor, accessed December 12, 2013, <http://projects.militarytimes.com/citations-medals-awards/recipient.php?recipientid=12092>.

the new military command, park employees were complaining of chance encounters with exploding artillery shells and trip lines laid across hiking trails.¹⁰⁴

Meeting with Gibson and other officials in Hilo, Wingate extracted a promise that the Army would notify the park of future training exercises. “This agreement was rather often forgotten,” Wingate later recalled, “and damage to the Park, previously held to a minimum by Gen’l Pennell, became extensive.”¹⁰⁵ Itemized in his later year-end report (fiscal year 1943), Wingate listed shell fragments and craters west of Cone Peaks near Halema‘uma‘u, general damage to forests and desert terrain, and persistent wear on roads and trails.¹⁰⁶ There was evident damage at Sulfur Banks. In early January, rangers witnessed troops firing along Chain of Craters Road and discovered a damaged spatter cone at Mauna Iki. There were also instances of bombing at ‘Āpua Point and notice of soldiers setting up firing points at the base of Mauna Loa Road.¹⁰⁷



7. 9. Brigadier General Herbert D. Gibson presents Colonel Andrew T. Spalding with the loving cup awarded to the 1st Hawaii Rifles for first place in the Central Pacific Base Command's shooting matches for Regiments of the Territory's Organized Defense Volunteers. Gibson and Superintendent Wingate clashed over use of the parklands for training.

¹⁰³ Wingate interview, transcript, 19.

¹⁰⁴ Wingate interview, transcript, 19; and Moniz Nakamura, “Up in Arms!” 26.

¹⁰⁵ Wingate interview, transcript, 19.

¹⁰⁶ Moniz Nakamura, “Up in Arms!” 26n65.

¹⁰⁷ Moniz Nakamura, “Up in Arms!” 26; and Jackson, *Administrative History*, 94.

As early as February 1943, Wingate realized that he needed to establish some limits, despite what he perceived as a lack of cooperation up to that time. Asking that the Army leave the park entirely—ideally relocating still to “the waste lands west of Kalapana” or the equally barren area “between Mauna Kea and Mauna Loa”—Wingate agreed to a more well-defined area in the Ka‘ū Desert as a compromise site. Never formally endorsed by the Department of the Interior due to the wartime circumstances, Wingate nonetheless set out conditions that included: (1) that the Army would use the area only if completely necessary and that it would cease once conditions of war ended; (2) that the Army would continue to seek alternative training areas; (3) that the units would take measures to avoid damage to vegetation and natural features; and (4) that no access roads or trails or other kinds of construction would be introduced without the superintendent’s permission.¹⁰⁸

The Army, for its part, established standard operating procedures (SOPs) for the area: (1) weapons could only be outside the impact area if they were firing into it; (2) firing positions were to be limited to those already in use; (3) vegetation was not to be cut and *koa* groves were to be avoided; (4) latrines would have screens and their use would be policed; (5) guards would be placed on all roads and trails leading into the training area; (6) a request for live fire would be submitted to Army headquarters seventy-two hours prior to any planned exercise; and (7) the regular scheduled for training and firing would be Mondays and Wednesdays for the infantry and engineers, Thursdays and Fridays for tanks and tank destroyers.¹⁰⁹

As with many such agreements between the park and the Army, these were soon ignored. Rangers and visitors regularly noted units outside the impact and training area; one notice was of a training exercise over a mile from Uwēkahuna and south of Kīlauea Caldera. The Army placed warning signs outside the area. At times, the Chain of Craters Road was closed for unauthorized

¹⁰⁸ Edward Wingate to Colonel A. C. Huston, Executive Officer, Hawaii District, February 7, 1943, Hawaii National Park Records, HAVO Archives, Army Use Kilauea Kau Bombing Range, 1942–1948, File Code: 601-04.1, cited also in Moniz Nakamura, “Up in Arms!” 26, 35n70.

¹⁰⁹ Arthur C. Huston, Jr., Colonel Infantry Executive Officer, Training Memorandum #19 from HG Hawaii District, February 6, 1943, Hawaii National Park Records, HAVO Archives, Army Use Kilauea Kau Bombing

exercises. Vehicles frequently went out of the zone, plowing through vegetation. There were instances also of vegetation cut for camouflage, even though this, too, was prohibited.¹¹⁰

Outside of clear violations, there was also the cumulative damage not only to the Ka'ū Desert area but also to park roads, trails, and facilities more generally. At one time, Wingate estimated that the costs of repair would reach \$10,000. In January 1943, he placed his estimate for restoration of parklands and facilities at five times the earlier figure.¹¹¹ By April, the total for restoration of roads, trails, and vegetation rose in Wingate's estimate to \$100,000.¹¹²

Writing to Gibson again on April 1, Wingate explained that his recent inspections and those of his staff "have revealed that damage to the forest cover and to the land itself is far more extensive and serious than was anticipated." Wingate noted particularly the damage to the forest fringe, "where not only have the trees and underbrush as well as the ferns, and other low-lying ground cover been extensively uprooted, cut broken, pushed over and crushed, but the soil itself has been laid bare and in sizable places the humus layer has been entirely destroyed." Wingate continued, underlining the mission of the NPS—"to conserve the scenery and the natural and historic objects and the wildlife therein . . . in such manner and by such means as will leave them unimpaired for the enjoyment of future generations." In view of this mandate, he suggested that the Army cease its operations in the park. "As a practical solution," this "will save the taxpayers who support the government," as well.¹¹³

Wingate was not alone in his concern. Baldwin, by this point assistant to the superintendent, reported at length on the damage military training caused native avian

Range, 1942–1948, File Code: 601-04.1. See Moniz Nakamura, "Up in Arms!" 28; and Jackson, *Administrative History*, 94.

¹¹⁰ Wingate, Memorandum, May 21, 1943; and Edward Wingate to Brigadier General Herbert D. Gibson, Commanding, Hawaii District, June 24, 1943, Hawaii National Park Records, HAVO Archives, Army Use Kilauea Kau Bombing Range, 1942–1948, File Code: 601-04.1. See also Moniz Nakamura, "Up in Arms!" 28.

¹¹¹ Moniz Nakamura, "Up in Arms!" 26; and Jackson, *Administrative History*, 94.

¹¹² Wingate, Memorandum, April 1, 1943; Edward Wingate to Brigadier General Herbert D. Gibson, Commanding, Hawaii District, June 24, 1943, Hawaii National Park Records, HAVO Archives, Army Use Kilauea Kau Bombing Range, 1942–1948, File Code: 601-04.1; see also Record Group 79, Box 25, NARA San Bruno.

¹¹³ Edward Wingate to Brigadier General Herbert D. Gibson, Commanding, Hawaii District, April 1, 1943, Hawaii National Park Records, HAVO Archives, Army Use Kilauea Kau Bombing Range, 1942–1948, File Code: 601-04.1; see also Record Group 79, Box 25, NARA San Bruno.

populations. Emphasizing the special habitats of many Hawaiian birds, he pointed out that military exercises had greater impacts than might be expected. With the birds' restricted range, "even seemingly minor disturbances in forest, brush, and desert land" could have immeasurable consequences. He cited the *nēnē* (Hawaiian goose) as restricted to Hawai'i Island. Small forest birds such as the 'āpāpāne (honeycreeper, *Himatione sanguinea*), i'iwi (humming bird, *Vestiaria coccinea*), 'elepaio (monarch flycatcher of several species), and 'amakihi (a second type of honeycreeper, *Hemignathus virens*) had suffered severe declines in population. Human activity, including the recent training exercises, threatened the cliff-side nesting areas of *koa*e (white-tailed tropical bird). Similarly, the *kōlea* (Pacific golden plover) had used the desert scrub areas for nesting—areas now being trampled or driven over by troops. Added to the loss of habitat above the 4,000-foot level due to cattle grazing, species such as the *nēnē* faced a genuine threat to their existence. The "so-called 'desert,'" he concluded, "is by no means a wildlife 'desert' but rather is a habitat of singular importance to the seven species of Hawaiian birds living there."¹¹⁴

Fagerlund, an assistant park naturalist at that time, echoed Baldwin's concerns. "Military use of the forest, forest fringe, and desert land, adjacent to Kīlauea has caused damage which, if left for nature to heal unaided, will be unsightly for 15 to 25 years and possibly longer," he surmised. He pointed to impacts to the little-recognized "esthetic value" of the desert; also to changes to drainage patterns and the overall ecology of the area. There was also the problem of opening the desert to an influx of invasive plants because of changes to the relationships between the land and the vegetation.¹¹⁵ Similar conclusions came from volcanologist R. H. Finch.¹¹⁶

Wingate received his response on April 16. Gibson explained that he was aware of—and regretted—the damage being done both to native species of plants and animals and to the beauty of the area. He explained that he was taking steps to limit the range of field exercises and assured

¹¹⁴ Paul H. Baldwin to Superintendent Edward G. Wingate, memorandum, April 1, 1943, Record Group 79, Box 25, NARA San Bruno.

¹¹⁵ Gunnar O. Fagerlund to Superintendent Edward G. Wingate, memorandum, April 2, 1943, Record Group 79, Box 25, NARA San Bruno.

¹¹⁶ R. H. Finch to Superintendent Edward G. Wingate, memorandum, April 5, 1943, Record Group 79, Box 25, NARA San Bruno.

Wingate that as the war proceeded there would no doubt be a “progressive reduction in the use of the park for any military purpose.” For the immediate future, however, the training area remained important for training purposes, and the Army would continue in many ways as before. “In our common mission for service to our government we must cooperate for the common good.”¹¹⁷

Writing a few days later to the NPS director, Wingate pointed out that “some progress has been made.” Writing optimistically, he explained further: “The damage already done is extensive and deplorable but there is now reason to believe that it will not be increased at least until another change in the army command occurs.”¹¹⁸ Hopeful with Gibson’s response, he suggested this might establish a benchmark for cooperation that could be passed down to future commanders. Until martial law ended, however, there was little he could do.¹¹⁹

The Course of the Pacific War

Wingate’s efforts to protect the park took place against the greater backdrop of the expanded Pacific War. The 27th Division was on O’ahu after October. There, it relieved the 25th Infantry Division, which was to join US forces fighting at Guadalcanal.¹²⁰ On November 20, 1943, the 27th Infantry Division participated in its first combat mission: the capture of Makin Atoll. Within a year, troops from the 27th would occupy Majuro and soon after, attack Eniwetok.¹²¹

¹¹⁷ Herbert D. Gibson, Brigadier General, US Army, to Edward G. Wingate, April 16, 1943, Record Group 79, Box 25, NARA San Bruno.

¹¹⁸ Edward G. Wingate to Director, memorandum, April 19, 1943, Record Group 79, Box 158, NARA San Bruno.

¹¹⁹ National Park Service, US Department of the Interior, Circular for All Region Four Areas, April 21, 1943, Record Group 79, Box 158, NARA San Bruno.

¹²⁰ “A Brief History of the 25th Infantry Division,” 2013, 25th Infantry Division Association, accessed December 12, 2013, <http://www.25thida.org/division.html>.

¹²¹ “27th Division, World War II,” New York Military Museum and Veterans Research Center, NYS Division of Military and Naval Affairs, accessed December 12, 2013, <http://dmna.ny.gov/historic/reghist/wwii/infantry/27thInfDiv/27thInfDivMain.htm>; and “History of the 27th

The 25th Division and the 24th Division would follow a similar course of action. The 25th preceded the 27th at Guadalcanal, taking over from the Marines in early November 1942.¹²² In January 1943, units of the 25th Division participated in the seizure of Kokubona and in the reduction of the Mount Austen Pocket, some of the most bitter fighting of the Pacific campaign.¹²³ The 24th Division remained on O‘ahu until May 1943, when it began its deployment to Australia. By September 1943, it occupied Camp Caves near Rockhampton, Queensland, on the eastern coast of Australia, where its units trained for the upcoming Hollandia-Tanahmerah Campaign.¹²⁴

High-elevation training in the Ka‘ū Desert prepared these divisions for the long task of occupying Japanese-held territory in the Pacific. Other divisions stationed in Hawai‘i included the 40th Infantry, arriving in September 1942 to relieve the 25th Infantry at Schofield Barracks; the 33rd Infantry Division, reaching Hawai‘i in July 1943; and the 6th Infantry, which was stationed in the territory for training and defense beginning in August 1943.¹²⁵

Each division, with artillery and tank units, as well as combat engineers, medics, radio operators, forward observers, and logistics experts, had trained along the coastal and upland areas of Makua, on the North Shore near Haleiwa or at Schofield. Others had been at Waikoloa on the island of Hawai‘i or on Maui or Kaua‘i. Many, in fact, had trained at Kīlauea, rotating in as part of their preparation for Pacific combat.

The course of the Pacific War—known variously during the war as the Pacific Theater, the South West Pacific Theater, and the South-East Asian Theater—was a relentless slog across vast stretches of ocean to displace often well-entrenched combatants of the Imperial Japanese

Infantry Division, ‘Orion,’ The New York Division,” New York National Guard, accessed January 12, 2014, <http://ny.ng.mil/27bct/Pages/History.aspx>.

¹²² Samuel B. Griffin, *The Battle for Guadalcanal* (Urbana: University of Illinois Press, 2000), 182, 216, and 224.

¹²³ “Guadalcanal,” U.S. Army Campaigns of World War II, CHM Pub. 72-8, US Army Center of Military History, accessed December 1, 2013, <http://www.history.army.mil/brochures/72-8/72-8.htm>.

¹²⁴ “Camp Caves,” Queensland Government, Queensland and World War II Historic Places, State of Queensland, Department of Housing and Public Works, accessed January 1, 2014, <http://www.w2places.qld.gov.au/Pages/places.aspx?PlaceCode=QWWIIHP-1471>.

¹²⁵ “US Army Divisions of World War II: List of All Divisions,” History Shots, accessed January 1, 2014, <http://www.historyshots.com/usarmy/ListDivisions.cfm?t=3&d=All>.

Army and Navy. As of July 1942, Japanese forces were still advancing in the Solomon Islands, threatening the Australian coast.¹²⁶ Australian reserves fought a rear-guard action in New Guinea, as Japanese troops advanced along the Kokoda Trail toward Fort Moresby.¹²⁷

Regular Army soldiers returning from the Mediterranean Theater relieved these exhausted units in August.¹²⁸ However, in September, Japanese marines attacked the strategic Royal Australian Air Force base at Milne Bay, at the eastern tip of New Guinea. Successfully repelled, this was the first Allied defeat of Japanese forces in the field and marked a turning point in the Pacific campaign.¹²⁹

While the battles raged in New Guinea, the Allied effort shifted to a new Japanese air base on the island of Guadalcanal in the Solomon Islands, east of New Guinea. In August 1943, 16,000 infantry and other troops made an amphibious landing to capture the airfield—an effort that would drag on for another six months.¹³⁰ With fighting centered on the US base at Henderson field, Allied ground and naval forces struggled to gain control against well-entrenched Japanese troops.¹³¹ The Allied victory came finally in February 1943. Simultaneously, Allied forces in New Guinea defeated remaining Japanese troops strung along the Kokoda Trail at Buna-Gona, giving the Allies control of this strategic part of the southwest Pacific.¹³²

¹²⁶ See, especially, John Prados, *Islands of Destiny: The Solomons Campaign and the Eclipse of the Rising Sun* (New York: New American Library, 2012).

¹²⁷ Bruce Gamble, *Fortress Rabaul: The Battle for the Southwest Pacific, January 1942–April 1943* (Minneapolis, MN: Zenith Press, 2010); and Bergerud, *Touched with Fire*.

¹²⁸ David Saint Alban Dexter, *The New Guinea Offensives*, Vol. 6, *Australia in the War, 1939–1945*, Second World War Official Histories (Canberra: Australian War Memorial, 1961), online, accessed December 12, 2013, http://www.awm.gov.au/histories/second_world_war/AWMOHWW2/Army/Vol6/.

¹²⁹ “Milne Bay: The Japanese Invasion and Defeat at Milne Bay,” *The Kokoda Track*, Australians in World War II, The Pacific War, accessed January 14, 2014, <http://kokoda.commemoration.gov.au/milne-bay/japanese-defeat-at-milne-bay.php>; and Kennedy Hickman, “World War II: Battle of Milne Bay,” About.com, Military History, accessed January 4, 2014, <http://militaryhistory.about.com/od/worldwarii/p/World-War-Ii-Battle-Of-Milne-Bay.htm>. According to Eric Bergerud, Kokoda Trail is the more appropriate name (*Touched with Fire*, 135).

¹³⁰ Griffin, *Battle for Guadalcanal*.

¹³¹ Prados, *Islands of Destiny*; and William L. McGee, *The Solomons Campaigns, 1942–1943: From Guadalcanal to Bougainville—Pacific War Turning Point*, Vol. 2, *Amphibious Operations in the South Pacific in WWII* (Tiburon, CA: BMC Publications, 2002).

¹³² Dexter, *New Guinea Offensives*.

As American and Australian forces began the first steps of “Operation Cartwheel”¹³³—the long-term strategy of island hopping toward Japan—the British began a fresh campaign in Burma (present-day Myanmar). Contending with disorder in eastern India and a devastating famine in Bengal, British troops under Colonel Orde Wingate (1903–1944) began a protracted guerilla offensive—known as the Chindit Campaign—in the border territory of Arakan in early 1943.¹³⁴ Although of limited success, Wingate’s Chindits disrupted Japanese operations and would provoke a massive—and disastrous—Japanese offensive into western Burma the following year.

In August 1943, the Allies created the South East Asia Command, a multinational strategic grouping headed after October by Admiral Lord Louis Mountbatten (1900–1979).¹³⁵ Led by Lieutenant General William Slim (1891–1970) the war in Burma gained traction; Slim’s deputy, Joseph Stilwell (1883–1946) soon made additional inroads on the Chinese border, providing much-needed assistance to the Nationalist forces of Generalissimo Chiang Kai-shek (1887–1975).¹³⁶ In November, President Roosevelt, British prime minister Winston Churchill, and Chiang Kai-shek met in Cairo to agree on final strategy to defeat Japan.¹³⁷

Although in late 1943 Japan still occupied much of Asia and the Pacific, its supply train was increasingly under threat by Allied submarines and other naval forces. By the end of the year, the Allies commanded the skies, preventing effective counterattacks by embedded Japanese units. Unable to match the industrial output of the United States, the Japanese military

¹³³ McGee, *Solomons Campaigns*.

¹³⁴ Shelford Bidwell, *The Chindit War: The Campaigns in Burma, 1944* (London: Hodder & Stoughton, 1979); and Louis Allen, *Burma: The Longest War 1941–45* (London: J. M. Dent & Sons, 1984).

¹³⁵ Peter Dennis, *Troubled Days of Peace: Mountbatten and South East Asia Command, 1945–46* (Manchester: Manchester University Press, 1987); and Jon Latimer, *Burma: The Forgotten War* (London: John Murray, 2004).

¹³⁶ Charles F. Romanus and Riley Sunderland, Riley, *China-Burma-India Theater: Stilwell's Mission to China*, United States Army in World War II (1953; repr., Washington, DC: US Army Center of Military History, 1987). The “classic” popular account remains Barbara Tuchman, *Stilwell and the American Experience in China, 1911–45* (New York: Grove Press, 2001).

¹³⁷ “The Cairo Conference, 1943,” US Department of State, accessed October 12, 2012, <http://2001-2009.state.gov/r/pa/ho/time/wwii/107184.htm>.

command could not effectively replace equipment or personnel.¹³⁸ The Allies, by then moving north among the Japanese-occupied islands of the western Pacific, skirted some islands; others, such as Truk (modern Chuuk), Rabaul (in New Britain), and Formosa (Taiwan), were targets of neutralizing aerial attacks.¹³⁹

In November 1943, while the Allied leadership was hammering out the Cairo Declaration, US Marines invaded the island stronghold of Tarawa. Standing in the way of needed air bases in the Marshall and Northern Mariana Islands, Japanese forces had seized Tarawa, in the Gilbert Island group, early in the war. They had heavily fortified the atoll and constructed an air base at the western end on the island of Betio. Admiral Nimitz assigned the conquest of the island to the 2nd Marines, under the command of Lieutenant General Julian C. Smith (1885–1975).¹⁴⁰

Preceded by lengthy bombing and shelling from offshore battleships and cruisers, nearly 20,000 marines, reinforced by additional troops from the 27th Infantry Division, landed at Betio, breaking through the coral reef to slowly advance upon Japanese positions. After eight days of heavy fighting and mop-up, the United States occupied all of Tarawa Atoll.¹⁴¹ The number of casualties shocked the American public. Later criticized by General Holland M. “Howlin’ Mad” Smith (1882–1967), commander of the Marines V Amphibious Corps, as an unnecessary sacrifice, the Battle of Tarawa resulted in the loss of 894 Marine Corps men and officers, with another 2,188 suffering injuries.¹⁴² The 27th Infantry, which captured nearby Makin Atoll, lost an

¹³⁸ Meirion Harries and Susie Harries, *Soldiers of the Sun: The Rise and Fall of the Imperial Japanese Army* (New York: Random House, 1994).

¹³⁹ Hopkins, *Pacific War*; John Costello, *The Pacific War, 1941–1945* (New York: Harper Perennial, 2009); and Ronald H. Spector, *Eagle against the Sun: The American War with Japan* (New York: Vintage, 1985).

¹⁴⁰ Richard Johnston, *Follow Me: The Story of the Second Marine Division in World War II* (New York: Random House, 1948).

¹⁴¹ Eric Hammel and John E. Lane, *Bloody Tarawa* (Minneapolis, MN: Zenith Press, 1998); Joseph H. Alexander, *Utmost Savagery: The Three Days of Tarawa* (Annapolis, MD: Naval Institute Press, 1995); and Michael B. Graham, *Mantle of Heroism: Tarawa and the Struggle for the Gilberts, November 1943* (San Francisco: Presidio Press, 1998).

¹⁴² “Battle of Tarawa,” *Wikipedia*, accessed October 1, 2012, http://en.wikipedia.org/wiki/Battle_of_Tarawa.

additional 66 men and officers¹⁴³; nearly 700 more US personnel died when the support carrier USS *Liscome Bay* sank following a torpedo attack by a Japanese submarine.¹⁴⁴

Tarawa demonstrated the pugnacity of the Japanese and provided a sobering picture of what the Allies could expect during the rest of the war. The first effectively opposed US amphibious operation—the Japanese were unprepared for US Marines and soldiers at Guadalcanal and gave little initial resistance—Tarawa revealed the weaknesses in US tactics, demonstrated the difficulty of maintaining communications, and underlined the sheer human expense of attacking entrenched positions. Opening up the Central Pacific to Allied control, Tarawa was an important lesson for US troops and commanders and set the standards for future actions closer to Japan.¹⁴⁵

Soldiers and Other Visitors in the Park

While US soldiers, sailors, and marines worked their way across the Pacific, other troops remained in California, Alaska, and Hawai‘i awaiting reassignment.¹⁴⁶ The park at Kīlauea was still an important training area, as were numerous other sites on the islands. Haleakalā remained host to an early warning station, with Ranger-in-Chief Hjort working closely with Army personnel at Red Hill (Pu‘u ‘Ula‘ula).

¹⁴³ “The Capture of Makin Atoll, 20–24 November 1943,” *Historical Division, War Department, American Forces in Action Series*, 1946, CMH Pub 100-2 (Washington, DC, GPO, 1946), online edition, accessed August 4, 2012, <http://www.history.army.mil/books/wwii/makin/mak-fm.htm>.

¹⁴⁴ James L. Noles, Jr., *Twenty-Three Minutes to Eternity: The Final Voyage of the Escort Carrier USS Liscome Bay* (Tuscaloosa: University of Alabama Press, 2004).

¹⁴⁵ Graham, *Mantle of Heroism*.

¹⁴⁶ The defense of Alaska is a little publicized part of the war. See Brian Garfield, *Thousand-Mile War: World War II in Alaska and the Aleutians* (Anchorage: University of Alaska Press, 1995). The NPS has made a recent contribution with Dirk HR Spennemann, *The Cultural Landscape of World War II Battlefield of Kiska, Aleutian Islands: Findings of a Cultural Heritage Survey Carried Out in June 2009* (Albury, Australia, and Washington, DC: Institute for Land, Water, and Society, Charles Sturt University and the National Park Service, 2011).

At both parks, soldiers and civilians took advantage of recreational opportunities offered by the remote sites, with their wealth of scenery and unusual geology. Already burdened by unwanted military training, park officials now contended with increasing numbers of tourists.

From an administrative perspective, 1943 was one of the park's most difficult years. As Superintendent Wingate complained in February, with such a small staff it was difficult "keeping up with even the most pressing work and much maintenance and repair and office work is far behind schedule."¹⁴⁷ In June, he was further discouraged when he received word from the national office that the Hawaii National Park would receive only \$39,527 for fiscal year 1944, a sum \$13,258 short of estimated operating expenses. With only twelve permanent male employees and a single female clerk, Hawai'i's park was already short-staffed. The reduction would require cutting the park's naturalist.¹⁴⁸

Although he would lose the naturalist for a time, Wingate managed to secure a second unpaid conscientious objector, who would arrive in November.¹⁴⁹ In the meantime, the staff got on with repairs to park equipment and facilities, repair and replacement of trail signs, and feral animal control. The park's naturalist and other rangers also gave talks to visitors and special interest groups. In September, the naturalist gave a presentation on edible and medicinal plants for 400 soldiers at the KMC.¹⁵⁰

Throughout the year, visitor numbers approached new highs. Volcano House, which hosted a total of 1,354 guests in the last half of 1942—many staying three days or more—was full most nights.¹⁵¹ In April, Wingate commented that the hostelry "was now so crowded and there are so many requests for reservations that the operator [George Lycurgus] is having difficulty

¹⁴⁷ Superintendent's Monthly Reports, February 1943.

¹⁴⁸ Superintendent's Monthly Reports, June 1943.

¹⁴⁹ Superintendent's Monthly Reports, October 1943.

¹⁵⁰ Superintendent's Monthly Reports, September, October, and November 1943.

providing accommodation.”¹⁵² There was even consideration given to resurrecting the prewar plan of an additional twenty-room guest wing, a proposition tabled for the time being.¹⁵³

Actual visitor counts were indeed impressive. In February, the entry gate staff counted 16,078 civilian visitors and 13,334 military entries, compared to 4,500 civilian and 4,000 military guests the previous year.¹⁵⁴ By June, the numbers had increased to 18,433 civilian visitors and 22,215 military. August’s figures were 43,911 and 24,754 military visitors. August also featured a visit by Gene Tunney (1897–1978), former world heavyweight boxing champion, at the time a lieutenant commander in the US Navy.¹⁵⁵ In September, the visitor count jumped to 43,911 civilian entries and 30,465 military personnel.¹⁵⁶ Although the entry figures showed the usual seasonal decline late in the calendar year, there were still more visitors than ever. In December, there were still 26,505 military visitors, far more than any previous off-season.¹⁵⁷

Larger number of visitors led inevitably to additional work for the park’s law enforcement personnel. In January, a junior officer in the Army Air Forces was apprehended breaking into an employee’s quarters. There was also a third arrest of an employee at Volcano House for selling liquor to military residents. Volcano House reported a missing watch and wallet; there were break-ins by local “juveniles,” and numerous citations for speeding, the latter most frequently for military drivers.¹⁵⁸ In February, officials clocked Private David Makapuahi doing 55 miles per hour on the short stretch between the headquarters building and KMC, where he was billeted.¹⁵⁹ In April, park rangers reported an accident involving Sergeant J. Kilpatrick of the US Army.

¹⁵¹ Superintendent’s Monthly Reports, January 1943.

¹⁵² Superintendent’s Monthly Reports, April 1943.

¹⁵³ Superintendent’s Monthly Reports, April 1943. See also William Chapman, *Volcano House Annex (1953 Volcano House Addition)*, Historic Structure Report (Honolulu and Kilauea: For Hawai‘i Volcanoes National Park, 2013).

¹⁵⁴ Superintendent’s Monthly Reports, February 1943.

¹⁵⁵ Superintendent’s Monthly Reports, August 1943. See Joseph McCormick, “Tunney, James Joseph ‘Gene,’” Irish Cultural Society of the Garden City Area, 2007, accessed January 2, 2014, <http://www.irish-society.org/home/hedgemaster-archives-2/people/tunney-james-joseph-gene>.

¹⁵⁶ Superintendent’s Monthly Reports, September 1943.

¹⁵⁷ Superintendent’s Monthly Reports, December 1943.

¹⁵⁸ Superintendent’s Monthly Reports, January 1943.

¹⁵⁹ Superintendent’s Monthly Reports, February 1943.

Ranger Thomas Kauhi cautioned soldiers picking *‘ohelo* berries “in restricted areas” and also challenged several military visitors who had parked their cars carelessly outside the hotel.¹⁶⁰

Similar infractions continued through the rest of the year. In July, Assistant to the Superintendent Baldwin reported an Army private for speeding. Another soldier was seen “hanging around empty government cottages, but no additional damage was observed.”¹⁶¹ In August, a park telephone operator/clerk and her sister were both badly injured when an officer—“in disregard of any orders”—ran into the rear of a stalled Army bus following a party at KMC. “The two girls, the driver and two other officers were all severely and painfully injured,” Wingate commented. His employee would be unable to work before the end of October.¹⁶²

There were other problems as well: Ranger Kauhi’s wallet was stolen in October, and there was the continuing annoyance of graffiti on buildings and signs, “about half by soldiers” and half by civilians.¹⁶³ All of this paled, however, against the ongoing damage caused by continued use of the park for military training. In January, Wingate commented on the “continued and increased number of entries into the park by various military units on various missions without notification to this office.”¹⁶⁴ In March, he noted that damage to the park “through use by the army for training and other proposes is increasing beyond expectations and is not confined to the area specified in a tentative agreement reached locally.”¹⁶⁵

Even after his new agreement with General Gibson in April, there was room for complaint. In June, Wingate noted the ongoing damage caused by military vehicles within the park. In July, he commented that despite the “promised reduction in use of the park by the army,” there was still “inexcusable damage” being done to the forests and terrain. Lacking

¹⁶⁰ Superintendent’s Monthly Reports, April 1943.

¹⁶¹ Superintendent’s Monthly Reports, July 1943.

¹⁶² Superintendent’s Monthly Reports, August 1943.

¹⁶³ Superintendent’s Monthly Reports, October 1943.

¹⁶⁴ Superintendent’s Monthly Reports, January 1943.

¹⁶⁵ Superintendent’s Monthly Reports, March 1943.

proper supervision, both individual soldiers and small units were guilty of pervasive “carelessness.”¹⁶⁶

In early July, he met again with General Gibson insisting that the Army appoint a full-time range officer with jurisdiction over field exercises. Gibson complied, and by August, an officer was in place to coordinate the training and prevent the worst abuses. Wingate noticed improvements immediately. By the end of the month, training ceased in the fragile forest fringe area south of Keanakāko‘i Crater. The Army also closed some of the access roads created earlier. They also agreed to confine tank and antitank exercises to a limited area south and west of Keanakāko‘i Crater and to stop testing vehicles in the “flats” south of KMC.¹⁶⁷

Throughout this period, Wingate was careful still to document damage. In July, the Hawai‘i county engineer provided a survey of damage to the county’s roads, due largely to military use. The estimate for repairs stood at \$1,012,297. Although the park’s roads were not considered in the report, the engineer did give a cost of \$274,500 for repairs to the Hilo to Volcano highway. Wingate noted that “comparable damage is being done to certain sections of park roads not designed for the heavy traffic they are now subject to.”¹⁶⁸ He later cited the Māmalahoa Highway (now Route 11 through the park), Crater Rim Road, and Chain of Craters Road as particular victims of overuse by the Army’s thirty-two-ton trucks.¹⁶⁹

¹⁶⁶ Superintendent’s Monthly Reports, July 1943.

¹⁶⁷ Superintendent’s Monthly Reports, August 1943.

¹⁶⁸ Superintendent’s Monthly Reports, July 1943.

¹⁶⁹ Superintendent’s Monthly Reports, August 1943.



7. 10. "Two children marvel at the size of a light tank as it awaits instructions prior to movement in Honolulu," August 30, 1942. Note the half-track and M3 Stuart Light Tank. The M3 Light Tank came into US Army use after 1942, replacing the smaller M2. It remained the Army's chief tracked weapon. The US Marines employed the larger M4 Sherman Tank, an evolution of the M3 Medium Tank.

Although there were fresh infractions—in late August, an Army unit on the Hilina Pali caused a brush fire that destroyed an acre of grass land and in October, soldiers were observed cutting through a park boundary fence—relationships were improving. Assistant to the Superintendent Baldwin provided a new map to help the military identify trails and roads within the park.¹⁷⁰ Wingate noted in October “a noticeable lessening of the use of park roads and the training area by the army.”¹⁷¹ In December he remarked upon the departure of the last “anti-tank unit”—a possible “forerunner,” as he put it, “of a general decrease in military use of the park.”¹⁷²

¹⁷⁰ Superintendent's Monthly Reports, July 1943.

¹⁷¹ Superintendent's Monthly Reports, October 1943.

¹⁷² Superintendent's Monthly Reports, December 1943.

Haleakalā

Closed to civilians since the beginning of the war, the Haleakalā section reopened “under certain mild restrictions” on February 1, 1943.¹⁷³ Visitation never matched the more-accessible Kīlauea section, but numbers grew steadily throughout the year. January and February saw about 500 military visitors; in February, 125 civilians took advantage of the reopening.¹⁷⁴ By April, the figure had climbed to 300 civilians and 1,180 military personnel.¹⁷⁵ In May, the visitor count was 1,660, of which 1,310 were military.¹⁷⁶ July and August were steady at 1,550 and 1,450, respectively of which about 1,000 were soldiers, sailors, or airmen.¹⁷⁷

At Haleakalā, occasional problems arose for Ranger-in-Charge Hjort. In January 1943, officials apprehended Corporal J. H. Gross of the 745th Military Police for hunting in the park. He also vandalized government property by shooting at the park’s enameled signs. Private Charles Pentzer, in the same outfit, faced similar charges. The provost court fined Gross \$20 and Pentzer \$10. In July, two young soldiers from the Puu Nianiau camp overturned a vehicle, with, luckily, no injury to either the driver or passenger.

More typical, however, was evidence of cooperation. In January, the Navy arranged to give a load of *kiaawe* wood, cut at the new air station between Paia and Kahului, to the park. The Navy provided manpower and the truck; as Ranger-in-Charge Hjort reflected, the park provided only a “buzz saw.”¹⁷⁸ In February, engineers from the US Army Corps consulted with Hjort about a road from Red Hill (Pu‘u ‘Ula‘ula) to Kolekole. As he explained, “the only disturbance was the road.”¹⁷⁹ In May, Hjort assisted the Navy in setting up its revived weather station at the

¹⁷³ Superintendent’s Monthly Reports, January 1943.

¹⁷⁴ Superintendent’s Monthly Reports, January and February 1943.

¹⁷⁵ Superintendent’s Monthly Reports, April 1943.

¹⁷⁶ Superintendent’s Monthly Reports, May 1943.

¹⁷⁷ Superintendent’s Monthly Reports, July and August 1943.

¹⁷⁸ Superintendent’s Monthly Reports, January 1943.

summit.¹⁸⁰ In June, he and his small staff accepted a wire fence and posts donated by the Army. The park he noted, “only needed to supply the staples.”¹⁸¹

On May 4, Admiral Chester Nimitz, Commander-in-Chief of Pacific Ocean Areas, honored Haleakalā with a visit. Captain Murphy of the US Naval Air Corps accompanied the admiral on what was his first trip to the ancient volcano. Two months later, Brigadier General Donald J. Myers (1893–1958), recently appointed commander of the 33rd Infantry Division, visited. His guide was former Chief Ranger Howard A. Powers, then a captain in the Navy.¹⁸²

In October, the Army provided another service by relocating the Military Police (MP) guard station from the entrance to the Pu‘u Nianiau camp to the parking area. This helped greatly in preventing Army vehicles from entering the Sliding Sands Trail and nearby areas, which had also been a problem for park staff.¹⁸³

Throughout this time, Hjort provided guided tours of the summit and led excursions into the crater. In April, Hjort led two trips to the crater for service personnel, sixty-four from the Army and several from the Seabees (US Construction Battalion, or CB, hence “Seabees”). He also led a “combined pleasure and toughening up” overnight hike for sixty-five men from the Ambulance Corps.¹⁸⁴ July saw Hjort leading two trips to the crater and three other overnight excursions within the park, all for service personnel. In August, he led two trips to the crater; in September, three trips.¹⁸⁵ Even in the cold month of December, he greeted military and civilian visitors, noting that the availability of tires was no doubt contributing to the steady visitor numbers.¹⁸⁶

¹⁷⁹ Superintendent’s Monthly Reports, February 1943.

¹⁸⁰ Superintendent’s Monthly Reports, May 1943.

¹⁸¹ Superintendent’s Monthly Reports, June 1943.

¹⁸² Superintendent’s Monthly Reports, August 1943.

¹⁸³ Superintendent’s Monthly Reports, October 1943.

¹⁸⁴ Superintendent’s Monthly Reports, July 1943.

¹⁸⁵ Superintendent’s Monthly Reports, August and September 1943.

¹⁸⁶ Superintendent’s Monthly Reports, December 1943.

Signs of Improvement

The final months of 1943 were a new period of optimism for the park's administrators and employees and Hawai'i residents in general. In August, KMC reverted to its original status as a "rest and relaxation camp for the armed forces," with only a residual training mission.¹⁸⁷ In September, the Army asked the park for advice on landscape treatments for the camp; Assistant to the Superintendent Baldwin selected native shrubs and identified source areas for the plants.¹⁸⁸ In addition to these changes, by October and November there had been, in Wingate's appraisal, a "noticeable lessening of use of the park roads and the training area by the army."¹⁸⁹ While there was new cause for concern at Haleakalā—as of November, the Army was pressing ahead with a new communication station at Red Hill despite Wingate's objections¹⁹⁰—in other ways, the park seemed to be returning to the NPS's own hands.

In late 1943, the KMC commandant assigned three enlisted men to redecorate the camp facilities. Private Paul Smith, Private Edward Maronek, and Private First Class William Marsh redecorated cabins and common areas, providing murals and a "motif" or "theme" to each cabin, including the Hawai'i, Texas, Branches, Flagship, and Wagon Wheels units, each with their specially designed signatures.¹⁹¹ Representatives from Women's Army Corps (WACs) would be the primary audience for the theme rooms. However, the team also made improvements to the enlisted men's quarters and to the day and dining rooms. Private Maronek and another soldier, William Rice, soon afterward painted a five-section mural of focused on the "Legend of Pele" for the dining room.¹⁹²

¹⁸⁷ Superintendent's Monthly Reports, August 1943. See also Nina Bowman Wise, *A Pictorial Review of Kilauea Military Camp* (Honolulu: The Advertiser Publishing Co., 1945).

¹⁸⁸ Superintendent's Monthly Reports, September 1943.

¹⁸⁹ Superintendent's Monthly Reports, October 1943.

¹⁹⁰ Jackson, "Military Use," 131.

¹⁹¹ Warshauer, "History of Kilauea Military Camp," chap. 15; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-50.

¹⁹² "Soldiers Show Hawaiian Legends in Five Murals at Kilauea Military Camp," *Hilo Tribune-Herald*, April 15, 1944.

In addition to changes to KMC, the Army additionally signed a lease for the Volcano Golf Course, converting it to a military facility.¹⁹³ With priority given to returning combat troops, KMC took on a different character from that of the previous two years; it was once again part of the park.

By this point, Superintendent Wingate had several reasons for hopefulness. Back in February 1943, Representative Charles Silva from Hawai'i County had introduced a joint resolution to the territorial legislature to direct the Commissioner of Public Lands “to acquire or purchase by condemnation” some 10,511 acres of land at Kamoanoa, as authorized in June 1938. The Senate subsequently adopted the motion, setting \$15,000 aside to purchase the land.¹⁹⁴ Part of the once-anticipated Kalapana Extension, this step was the first move to reassert the NPS’s expansion plans since the beginning of the war. In April, the bill reached the governor’s desk for signature.¹⁹⁵ By September, the Board of Appraisers from the Committee on Public Lands had initiated the appraisal process prior to the parcel’s acquisition.¹⁹⁶



7. 11. Soldiers relaxing at Kilauea Military Camp, 1943.

¹⁹³ Army Garrison Force, Central Pacific Command, TS, US Army Museum, Fort DeRussy, Honolulu, HI, October 20, 1945, Ephemeral property no. 0186. See also Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-47.

¹⁹⁴ Superintendent’s Monthly Reports, February 1943.

¹⁹⁵ Superintendent’s Monthly Reports, April 1943; and Wingate interview, transcript, 18–19.

¹⁹⁶ Superintendent’s Monthly Reports, September 1943.

February 1943 also marked the date of a joint proclamation on the restoration of civilian power over eighteen types of civil functions within the territorial government.¹⁹⁷ On March 10, the authorities held a formal ceremony at ‘Iolani Palace to mark the rescission of older orders and the instatement of fourteen new orders restoring additional power to the civil authorities.¹⁹⁸ Not yet a cessation of martial law, it was an important first step.

Other aspects of life returned to normal as well. In April, the government allowed for the adjustment of blackout lights on cars and trucks. In June, authorities permitted the reinstatement of streetlights. July brought a relaxation of blackout rules along with a loosening of rationing and other restrictions. Finally, in December, residents could light their homes and businesses until 10:00 p.m. without stipulations on light size or strength.¹⁹⁹

A further sign of lessening tension was the reassessment by the territorial and US government of Japanese residents and citizens. In January 1943, the military asked for an additional 1,500 Hawai‘i volunteers for the US Army—many to serve in intelligence units as translators.²⁰⁰ Many more volunteered than the Army needed, which many in the territory of Hawaii interpreted as an additional sign of AJA loyalty. General Emmons met a proposal by Honolulu wireless entrepreneur John A. Balch (b. 1876) to remove Japanese from the territory with disdain. The idea was not only untenable, he asserted, but “undesirable.”²⁰¹

Superintendent Wingate reported favorably on this change of attitude toward the Japanese in the territory. In March, he had happily addressed a group of AJA inductees in the

¹⁹⁷ Superintendent’s Monthly Reports, February 1943.

¹⁹⁸ Superintendent’s Monthly Reports, February and March 1943; Jane L. Scheiber and Harry N. Scheiber, “Martial Law in Hawaii,” *Densho Encyclopedia*, updated June 12, 2013, accessed October 12, 2013, http://encyclopedia.densho.org/Martial%20law%20in%20Hawaii/#Partial_Restoration_of_Civilian_Government; and Green, *Martial Law in Hawaii*.

¹⁹⁹ Superintendent’s Monthly Reports, December 1943.

²⁰⁰ Superintendent’s Monthly Reports, January 1943; Odo, *No Sword to Bury*; James C. McNaughton, “Japanese Americans and the U.S. Army: A Historical Reconsideration,” *Army History* 59 (Summer–Fall 2003), 4–16, and James C. McNaughton, *Nisei Linguists: Japanese Americans in the Military Intelligence Service during World War II* (Washington, DC: US Army Center of Military History, 2006).

²⁰¹ The quote is from Edward Wingate, in Superintendent’s Monthly Reports, January 1943. Balch had written a 38-page pamphlet called *Shall the Japanese be Allowed to Dominate Hawaii?* that appeared in 1942. Balch had come to Hawaii in 1907 and had established the first wireless telephone and telegraph company. See George F. Nellist, ed., “John Adrian Balch,” *The Story of Hawaii and Its Builders* (Honolulu: Honolulu Star Bulletin, 1925).

Puna District.²⁰² He was proud to note that the Japanese community at Papaikou had sold the Japanese language school to provide funds for Army and Navy relief. In May, he noted that the Army had raised the quota for translators. He was even more proud to announce that 1,700 local residents of Japanese descent had presented the government with a \$10,340 check for use toward “bombs on Tokyo.”²⁰³ Indeed, the territory unified around the task of ending the war.

²⁰² Superintendent’s Monthly Reports, March 1943.

²⁰³ Superintendent’s Monthly Reports, June 1943.

CHAPTER 8: THE FINAL STRETCH

Changes in Hawai‘i

By the end of 1943, the people of Hawai‘i were accustomed to the war. Troops stationed throughout the islands filled the roads, streaming into Honolulu and former plantation towns on leave from their bases or on liberty from ships docked at Pearl Harbor. Honolulu merchants did a brisk business, as did those of Hilo, Kailua-Kona, and Wailuku. Hotel Street remained busy, as did more wholesome attractions, such as the drive-in stand at Kau Kau Korner at the entrance to Waikīkī and the Waikiki Skating Arena.¹ The USO clubs still flourished, as did the Army’s own recreation area at Fort DeRussy.²

By late 1943, an increasing number military personnel residing in Hawai‘i were there recuperating from battle. The Royal Hawaiian Hotel functioned as a naval rest-and-relaxation facility (with submarine personnel getting first dibs on beds), as did other former civilian venues. By early 1944, an increasing number of women joined the men in uniform, serving in the WACs, WAVES (Women Accepted for Voluntary Emergency Service, also known as the US Naval Reserve [Women’s Reserve]), “Marinettes” (US Marine Corps, Marine Reservists

[Women’s Reserve]),” and other military units.³ There was also an increase in the number of Army and Navy nurses, assigned to Hawai‘i to care for wounded soldiers, sailors, and marines.⁴

¹ Brown, *Hawaii Goes to War*, 120, 130–47. Kau Kau Korner—or Korners—was famous for its multidirectional sign, showing the distance to places around the world. It was a favorite meeting place for both military and civilians during the war. See Andrea Feeser and Gaye Chen, *Waikīkī: A History of Forgetting and Remembering* (Honolulu: University of Hawai‘i Press, 2006), 20.

² Mason Architects, Fort DeRussy Military Reservation, Maluhia Recreation Hall (Building No. 275), HABS No. HI-309-A, Photographs with Written Historical and Descriptive Data, San Francisco and Honolulu, Historic American Buildings Survey, National Park Service, US Department of the Interior, accessed January 12, 2014, <http://www.masonarch.com/research-library/Maluhia%20Hall%20HABS.pdf>; and Bailey and Farber, *First Strange Place*, 50.

³ Allen, *Hawaii’s War Years*, 232; Naval History and Heritage Command, “World War II Era Waves: Overview and Special Image Selection,” Naval History and Heritage Command, US Navy, accessed December 12, 2012, <http://www.history.navy.mil/photos/prs-tpic/females/wave-ww2.htm>; and Judith A. Bellafair, *The Women’s Army Corps: A Commemoration of World War II Service*, CMH Publication 72–15 (Washington, DC: Center for Military History, US Army, US Department of Defense, 2005). On the Marines, see Mary V. Stremlow, “Marine Corps



8. 1. The United Services YMCA became the principal USO club in the islands providing rooms, as well as dances and other events.

To deal with escalating casualties brought to Hawai'i from engagements in the Pacific, the Navy's hospital at Aiea quadrupled in size. Kamehameha Girls School vacated, allowing the establishment of a 750-bed Army hospital.⁵ St. Louis College's facilities became the 147th General Hospital with a capacity of 2,500 patients.⁶ There were other hospitals at Kaneohe and Waipio, on O'ahu, and at Pahala and Waimea, on the island of Hawai'i. Other facilities were

Women's Reserve," Women Military Service in America Memorial Foundation, Inc., History and Collections, accessed February 28, 2014, <http://chmm.gmu.edu/courses/rr/s01/cw/students/leeann/historyandcollections/history/lrnmrewwiimar.html>.

⁴ Allen, *Hawaii's War Years*, 232.

⁵ Brown, *Hawaii Goes to War*, 126.

⁶ St. Louis College Alumni Association, "History," St. Louis College Alumni Association, Honolulu, accessed November 12, 2012, <http://www.saintlouis-hawaii.org/alumni/about-slaa/history/>.

located at Makawao and Waikapu on Maui and Kekaha and Makaweli on Kaua'i, and fifteen new military cemeteries were established throughout the islands.⁷

By the beginning of 1944, over 200,000 soldiers were in Hawai'i, some convalescing but many more preparing to join the slow process of removing the Japanese from their recent Pacific conquests. The Navy had increased its strength on O'ahu to 63,000 by the end of the year. The Marines, with only 7,400 men in the islands in 1943, soon saw its numbers increase five-fold in the early months of 1944.⁸



8. 2. WC54 ambulances lining up on a pier to take wounded off USS *Intrepid*, Pearl Harbor, ca. 1944. By 1944, Hawai'i had become a significant rest-and-relaxation and recuperation area for American military personnel

⁷ Allen, *Hawaii's War Years*, 224–26.



8. 3. Aiea Hospital, all-hands formation, January 1, 1944. Hawai'i became a center for the treatment of war injured.

Although new military construction reached a peak at the end of 1942, there were still plenty of jobs on the islands. The US Army Corps of Engineers in Hawai'i employed a workforce of 20,000 as of December 1943. Total local wartime expenditures were \$400 million, most of it in salaries for local and imported labor.⁹ Many young Hawai'i residents moved to be closer to the new jobs—most on O'ahu—resulting in population losses in the neighboring islands. For the first time, the Hawaiian Islands experienced an influx of African American workers, adding a new dimension to the territory's already varied racial mix.¹⁰

Suspected as enemy aliens at the war's outbreak, by late 1943, AJAs held the majority of wartime jobs. They were clerks, longshoremen, welders, road builders, machine-tool operators,

⁸ Allen, *Hawaii's War Years*, 232; and Charles D. Melson, "Condition Red: Marine Defense Battalions in World War II," HyperWar Foundation, Washington, DC: Marine Corps Historical Center, 1996, accessed October 1, 2013, <http://www.ibiblio.org/hyperwar/USMC/USMC-C-Defense/>.

⁹ Allen, *Hawaii's War Years*, 251.

mechanics, sales personnel, and waitresses.¹¹ Japanese men and women became among the most enthusiastic contributors to the war effort, stringing barbed wire, guarding facilities, and rolling bandages for wounded soldiers and sailors.¹²

To further demonstrate their loyalty, local Japanese turned increasingly from traditional cultural practices. *Kimono* and *geta* disappeared from the streets, as did customs of bowing and other traditional forms of interaction. Younger Japanese stopped speaking Japanese and adopted more American lifestyles. There was a growing number of marriages between locals—Native Hawaiians, part-Hawaiians, Chinese, Filipinos—and mainlanders and a notable surge in *haole*-Japanese marriages as well.¹³ The war clearly brought both a reappraisal of past attitudes and new kinds of problems in its wake.

Honouliuli

One of the most profound changes for the Japanese population was the reconstitution of historic institutions. Shinto shrines, associated with the emperor, closed, as did the schools. Buddhist practice remained active, although many temples changed their services to reflect a more

¹⁰ Allen, *Hawaii's War Years*, 381. See Beth Bailey and David Farber, "The 'Double V' Campaign in World War II Hawaii: African Americans, Racial Ideology, and Federal Power," *Journal of Social History* 26, no. 4 (Summer 1993): 817–43.

¹¹ Gail Miyasaki, ed., and Hawaii Nikkei History Editorial Board, *Japanese Eyes, American Heart: Voices from the Home Front in World War II Hawaii* (Honolulu: Watermark Publishing, 2012); and "Japanese Americans in Military during World War II," *Densho Encyclopedia*, 2013, accessed November 13, 2013, <http://encyclopedia.densho.org/Japanese%20Americans%20in%20military%20during%20World%20War%20II/>.

¹² Allen, *Hawaii's War Years*, 383; and Miyasaki *Japanese Eyes*.

¹³ Eileen Tamura, *Americanization, Acculturation and Ethnic Identity: The Nisei Generation in Hawaii* (Urbana: University of Illinois Press, 1994), 72–84; Paul R. Spickard, *Mixed Blood: Intermarriage and Ethnic Identity in Twentieth Century America* (Madison: University of Wisconsin Press, 1989), 62–65; Allen, *Hawaii's War Years*, 385–86; and Bailey and Farber, *First Strange Place*.

American style. There was a shift in leadership as well, with many prewar priests, along with teachers and other community leaders, interned either on the mainland or in Hawai‘i.¹⁴

By the end of 1943, many AJAs were serving honorably in the military and, while the celebrated deeds of the 442nd Infantry Regimental Combat Team would not take place until spring 1944¹⁵, General Emmons and other members of Hawai‘i’s military establishment no longer considered Japanese Americans a threat to internal security.¹⁶ On the mainland, however, Japanese Americans fared far differently. Following the federal government’s initial steps in 1942, authorities quickly instructed Japanese Americans to leave their homes and businesses to relocate to one of ten “Relocation Centers” distributed from California to Arkansas.¹⁷ Unaccustomed to the cold weather of the North American interior, the internees—62 percent were also American citizens—also suffered the loss of their livelihoods, homes, and long-standing relationships.¹⁸

About 1,550 Japanese residents of Hawai‘i eventually transferred to the continental United States. Many others, however, were still in custody in Hawai‘i.¹⁹ Sand Island, off Honolulu’s harbor, remained the principal site for their incarceration. When spaces opened up in spring and summer 1942 following the removal of some of those confined to the mainland, those incarcerated at other sites—including KMC on the island of Hawai‘i—were moved to the Sand Island camp.²⁰

¹⁴ Allen, *Hawaii’s War Years*, 384; Brian Niiya, “History of the Internment in Hawaii,” World War II Internment in Hawaii, an online resource for students and instructors, Education through Cultural and Historical Organizations (ECHO), US Department of Education, Office of Innovation and Improvement, July 2010, accessed January 12, 2014, <http://www.hawaiiinternment.org/history-of-internment>.

¹⁵ Masayo Umezawa Duus, *Unlikely Liberators: The Men of the 100th and 442nd*, trans. Peter Duus (Honolulu: University of Hawai‘i Press, 2006); Sterner, *Go for Broke*.

¹⁶ Takaki, *A Different Mirror*, 379.

¹⁷ Ng, *Japanese American Internment during World War II*.

¹⁸ See Tetsuden Kashima, *Judgment without Trail: Japanese American Internment during World War II* (Tacoma: University of Washington Press, 2004); and Robinson, *Tragedy of Democracy*.

¹⁹ Japanese American Internment Camps, Basic Statistical Information, accessed February 22, 2013, <http://www.bookmice.net/darkchilde/japan/camp.html>; and Jeffery F. Burton and Mary M. Farrell, “Honouliuli Internment Camp,” National Register Nomination, 2007.

²⁰ Jeffery F. Burton and Mary M. Farrell, *World War II Japanese-American Internment Sites in Hawai‘i* (Tucson and Honolulu: Trans-Sierran Archaeological Research and the Japanese Cultural Center of Hawai‘i, 2007).

Guarded around-the-clock, residents spent their time at chores, policing the grounds, gardening, and various time-killing crafts.²¹ Constructed to hold no more than 500 prisoners, the camp's population stayed at about 450.²² In early 1943, however, the military authorities began construction of a new facility at Honouliuli in the hot Ewa Plain of O'ahu. Intended to hold as many as 3,000 prisoners, Honouliuli Internment Camp covered an area about 160 acres, lying in a deep gulch between sugarcane fields. Remaining Sand Island internees—totaling only 149 at that point—transferred to the new camp in March. This initial population eventually swelled to about 320.²³

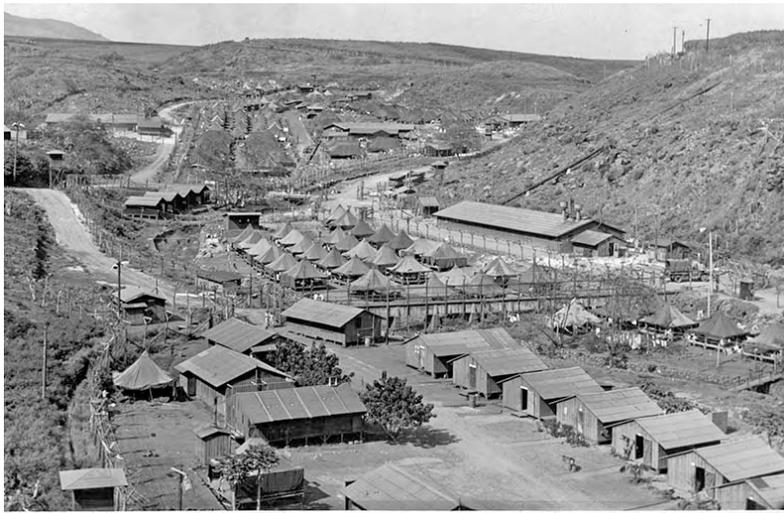
Most of the internees were onetime community leaders, including schoolteachers, editors, and Buddhist and Shinto priests. A number were noted politicians, including Thomas T. Sakaihara (1900–1989), a territorial representative, and Sanji Abe (1895–1982), a former territorial senator. Elected in 1940 to represent South Hilo, Abe had attended only a single session before his internment for possessing a Japanese flag eight months after the Pearl Harbor attack.²⁴

In time, Sand Island, Honouliuli, and other camps—including KMC—would serve as prisoner-of-war facilities.

²¹ Burton and Farrell, *World War II Japanese-American Internment Sites*.

²² "Sand Island (Detention Facility)," *Densho Encyclopedia*, 2011, accessed December 1, 2011, [http://encyclopedia.densho.org/Sand%20Island%20\(detention%20facility\)/](http://encyclopedia.densho.org/Sand%20Island%20(detention%20facility)/).

²³ Jeffrey F. Burton and Mary M. Farrell, *Jigoku Dani: An Archaeological Reconnaissance of Honouliuli Internment Camp, O'ahu, Hawai'i* (Tucson and Honolulu: Trans-Sierran Archaeological Research and the Japanese Cultural Center of Hawai'i, 2008); and Brian Niiya, "History of the Internment in Hawaii," World War II Internment in Hawaii, an online resource for students and instructors, Education through Cultural and Historical Organizations (ECHO), US Department of Education, Office of Innovation and Improvement, July 2010, accessed January 12, 2014, <http://www.hawaiiinternment.org/history-of-internment>.



8. 4. Honouliuli Internment Camp. Designed to hold as many as 3,000 prisoners, the facility eventually became home to approximately 320 internees, ca. June 1943.

Military Training Continues

Throughout late 1943 and early 1944, troops continued to rotate into and out of Hawai'i. The 40th Infantry Division, in Hawai'i since September 1942, was the principal defensive unit, returning to O'ahu from defending Kaua'i and Maui in July 1943, when it replaced the 24th Division. The 33rd Infantry Division, on O'ahu since July 1943, stayed until May 1944, when it deployed to New Guinea. The 6th Infantry Division, in Hawai'i since July 1943, moved on to New Guinea in January 1944. The 38th Division would replace the 33rd Division in early 1944. Troops of the 77th Infantry Division then arrived in Hawai'i in March 1944; the 98th Division came in April; and the 81st and 96th Divisions had arrived by July 1944.²⁵

Each of these divisions held different responsibilities and training priorities in the islands. The 40th Infantry Division, known as "Sunburst," was similar to the 27th Infantry Division, a

²⁴ Sakakihara's career is discussed in John S. Whitehead, *Completing the Union: Alaska, Hawai'i, and the Battle for Statehood*, American Histories of the Frontier Series (Albuquerque: University of New Mexico Press, 2004). On Abe, see "Sanj Abe," obituary, *New York Times*, December 3, 1982.

National Guard unit originally based in Nevada.²⁶ From July 1943, it was responsible for the defense of the Northern Sector of O‘ahu, relieving the 24th Division. Beginning in October, the unit underwent an intensive regimen of amphibious and jungle training, both at Makua and Waianae. The first units left for Guadalcanal in late December 1943; the remainder of the division completed the deployment by mid-January the following year.²⁷

The 33rd Infantry was also a National Guard division, originally from Illinois. Activated in March 1941, the division arrived in Hawai‘i in July 1943.²⁸ The 33rd Division also received jungle and amphibious training in Hawai‘i, transferring, in turn, to New Guinea in May 1944. The division would get additional training in New Guinea before joining the offensive at Maffin Bay in September 1944.²⁹

The 6th Infantry Division was a Regular Army unit, arriving in Hawai‘i in July and August 1943. Known popularly as the “Sight Seein’ Sixth,” and more officially as “Red Star,” the division completed the jungle-training program at Schofield Barracks and participated in landing exercises at Waianae.³⁰ The 6th Infantry Division remained in Hawai‘i until January 1944, when it transferred to Milne Bay in New Guinea, seeing its first combat in June at the Battle of Lone Tree Hill.³¹

²⁵ “US Army Divisions of World War II: List of All Divisions,” History Shots, accessed January 1, 2014, <http://www.historyshots.com/usarmy/ListDivisions.cfm?t=3&d=All>.

²⁶ Dan Sebby, “California’s Own: The History of the California’s 40th Infantry Division,” California State Military Department, The California State Military Museum, US Army Museum Activity, accessed February 1, 2014, <http://www.militarymuseum.org/division.html>.

²⁷ “40th Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed October 12, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/040id.htm>.

²⁸ 33rd Infantry Division, “The Prairie Division,” “History of the 33rd Infantry Division,” September 18, 2013, accessed December 1, 2013, http://www.33rdinfantrydivision.org/history_book.htm.

²⁹ 33rd Infantry Division, “The Prairie Division.” See also 33rd Infantry Division Historical Committee, *Golden Cross: A History of the 33rd Infantry Division in World War II*, 2nd ed. (1946; repr., Nashville, TN: The Battery Press, 2000).

³⁰ Thomas E. Price, “A Brief History of the US Army 6th Infantry Division, World War II Unit Histories and Officers,” accessed December 1, 2013, http://www.unithistories.com/units_index/default.asp?file=../units/documents_american.asp.

The 38th Division arrived in Hawai‘i in January 1944. Another National Guard unit—in this case from Indiana—the 38th Division assumed a defensive role, but also trained for redeployment in the Pacific. In July 1944, the 38th Division moved on to New Guinea, transferring to Leyte in the Philippines later in the year.³² The 77th Division landed in Hawai‘i in late March 1944, also completing courses in jungle warfare and amphibious attack.³³ In July 1944, the division departed for the invasion of Guam.³⁴ The 81st Infantry Division, another National Guard division, was in Hawai‘i as of July 1944 and by September, was engaged in combat in Peleliu.³⁵ Similarly, the 96th Infantry Division arrived in July 1944 and left for Leyte in October.³⁶

The 98th Infantry Division, an Organized Reserve unit with long-standing connections to the northeast United States, was in many ways the luckiest Hawai‘i-based division, since its members never saw combat. Trained at Camp Breckinridge, Kentucky, Camp Forest, Illinois and Camp Rucker, Alabama, after its activation in September 1942, the division arrived in Hawai‘i on April 19, 1944.³⁷ Units in the division trained throughout the islands, principally O‘ahu and Maui, and were slated to be part of Operation Olympic, one of two planned

³¹ Division Public Relations Section, *The 6th Infantry Division in World War II, 1939–1945*, Divisional Series No. 241 (1947; repr., Nashville, TN: Battery Press, 1983).

³² “38th Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed December 23, 2013, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/038id.htm>.

³³ “77th Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed December 12, 2013, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/077id.htm>.

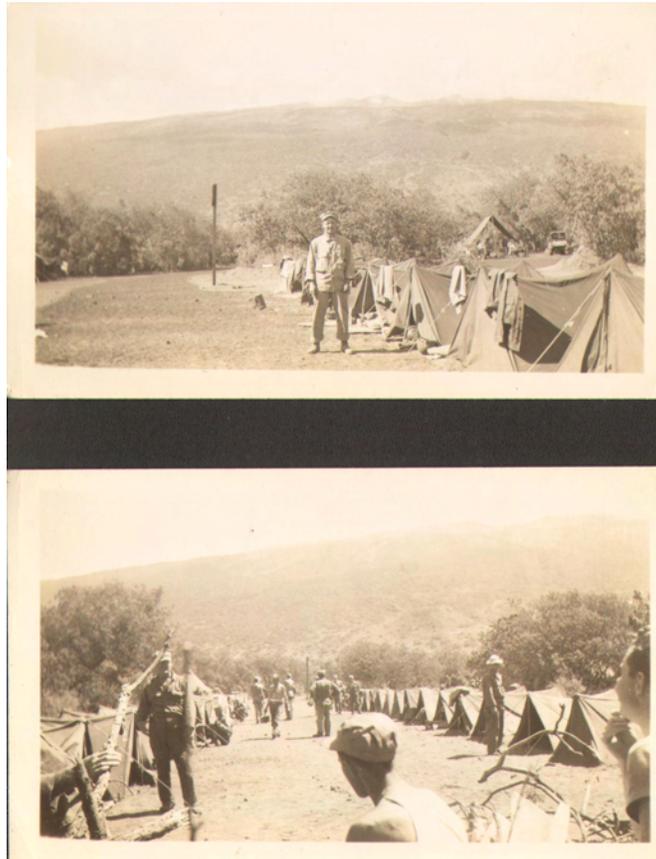
³⁴ Rottman, *Guam 1941 and 1944*.

³⁵ “81st Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed December 12, 2013, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/081id.htm>. See also Bobby C. Blair and John Peter DeCioccio, *Victory at Peleliu: The 81st Infantry Division’s Pacific Campaign*, Campaigns and Commanders Series (Norman: University of Oklahoma Press, 2011).

³⁶ “96th Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed December 12, 2013, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/096id.htm>. See also Don Decker, “Pacific Theater,” *The 96th Infantry Division, US Army, World War II*, March 20, 2010, accessed December 11, 2013, <http://www.96th-infantry-division.com>.

³⁷ “98th Infantry Division,” Washington, DC, Center of Military History, May 20, 2011, accessed December 12, 2013, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/098id.htm>.

invasions of Japan.³⁸ The division remained in the Hawaiian Islands until September 1945, after which time it served in Osaka, Japan, as part of the occupying force.³⁹



8. 5. The 98th Division at Pōhakuloa Training Area soon after their arrival in April 1944.

³⁸ “98th Infantry Division, Chronological History, Activity, and Movement—September 1942/ February 1946,” accessed November 12, 2013, <http://98div.com/11.html>. See also Jack Greene, *Strength in Reserve: The 98th Infantry Division in World War II* (n.p.: By the author, 2000).

³⁹ “98th Infantry Division,” Wartime Press, Infantry Divisions, 064, accessed October 12, 2013, <http://www.wartimepress.com/archives.asp?TID=064%2098th%20Infantry%20Division&MID=Infantry%20Divi>

The Hawaiian Islands provided an ideal training environment. Maui had forty-seven different training areas.⁴⁰ These included live-grenade courses, pistol and rifle ranges, a bazooka area, a mortar and artillery impact area, a seacoast artillery range, an antiaircraft firing area, and combat maneuver areas for tanks and half-tracks.⁴¹ There were also sites for training combat engineers.⁴²

There were similar training areas on other islands. Kauaʻi had the Infantry Assault School, Hawaiʻi Island the Waikoloa Maneuver Area and, of course, the Kau Desert Impact and Training Area.⁴³ By the end of 1943, most units devoted their time to training instead of defense.⁴⁴ Both Maui and Kauaʻi provided ideal facsimiles of the jungles of the south and central Pacific. Troops engaged concrete bunkers and pillboxes, infantry learned to “hip-fire” their rifles, and heavy machine-gun operators learned how to move along steep ravines and up vine-covered hills. “Mortarmen” learned the full capabilities of their light 60mm weapons.⁴⁵

sions&q=391&FID=89; and “98th Infantry Division,” US Militaria Forum, accessed October 23, 2013, <http://www.usmilitariaforum.com/forums/index.php?/topic/198-98th-infantry-division/>.

⁴⁰ “It Rained! How It Rained!” The Fighting Fourth of World War II, Division History, accessed October 14, 2013, <http://www.fightingfourth.com/Maui.htm>.

⁴¹ “The History of Maui during the War Years,” National Oceanic and Atmospheric Administration, National Marine Sanctuaries, Maui’s World War II Legacy, February 2, 2012, accessed December 12, 2013, <http://sanctuaries.noaa.gov/maritime/expeditions/maui/history.html>.

⁴² Ralph Pratt, telephone interview with William Chapman, August 24, 2013.

⁴³ Dorrance, “The U.S. Army on Kauaʻi”; and “Waikoloa History,” USA Environmental History, Inc., accessed October 12, 2013, <http://www.usaprojecthost.com/waikoloa/Waikoloa%20History.htm>.

⁴⁴ Conn, Engelman, and Fairchild, *Guarding the United States*, 222.

⁴⁵ *History Book*, 33rd Infantry Division, “The Prairie Division,” accessed June 12, 2014, http://www.33rdinfantrydivision.org/book_hawaii.htm.



8. 6. Training in Hawai'i.

Veteran combat engineer Ralph Pratt provided a vivid record of his Hawai'i experience. Arriving at Wailuku in April 1944, he traveled by 2½-ton cargo truck (the ubiquitous M35) to his campsite on the windward (north) side of Haleakalā in the Ha'ikū District. Part of over 1,600 acres rented by the Army in the area, his camp was a collection of tents spread over former pineapple and ranch land typical of this part of the island. Pratt described the site as "arid . . . cactus, sage, cattle similar to New Mexico."⁴⁶ His training consisted of demolition work at the Combat Demolition Training Station on the south side of the island, in Kama'ole, near Kīhei.⁴⁷

Pratt also participated in jungle training and amphibious landings at other sites on the island. Amphibious training, he reflected, was the most arduous. "During even moderately rough seas," he noted, "a man may have descended to the proper level to board the craft, then see the next wave raise the craft five or ten feet in relation to the mother ship."⁴⁸ If the landing craft

⁴⁶ Ralph Pratt, "Wartime Recollections," typescript in author's possession; and Pratt interview.

⁴⁷ John R. K. Clark, *The Beaches of Maui County* (Honolulu: University of Hawaii Press, 1989), 45.

⁴⁸ Pratt, "Wartime Recollections," 13.

operator misjudged, soldiers carrying “80 lbs. of gear” along with their rifle, boots, and helmet, could find themselves in eight feet of water.⁴⁹



8. 7. Landing training on the Wainae Coast, the principal amphibious training site for US Army units. Troops here are using LCP(L)s, which lack a forward (bow) landing ramp.

Pratt and his fellow engineers occasionally assisted in rigging charges for live-fire exercises for other units. He also attended took a two-week Army ranger course that included training in “Judo, Ju-jitsu and common old hand-to-hand combat.” Maui’s climate was a happy surprise. Temperatures, he explained, rarely dropped below 55 degrees or rose higher than 85 degrees.

⁴⁹ Pratt, “Wartime Recollections,”13.

Although drenched by showers—sometimes as many as five a day in the wetter parts of the island—soon afterward “the sun would often reappear and dry us off.”⁵⁰



8. 8. Beach assault practice at the Army's Amphibious Training Area, Waianae, after February 1943.

In addition to ground-combat training, the military also required air-support training. Navy and Marine pilots bombed and strafed remote sites as part of their overall training programs. Army Air Corps (later Army Air Forces) bases at Bellows, Haleiwa, Mokuleia (Dillingham Army Air Corps base), Wheeler, Hickam, Kahuku, Kīpapa, Waiele Gulch, and Kualoa; Navy Air Bases at Barbers Point, Honolulu (Ford Island and Pearl Harbor) and Kāneʻohe; and a Marine Air Base at Ewa all provided platforms for training.⁵¹

⁵⁰ Pratt, “Wartime Recollections,” 15.

⁵¹ Freeman, “Abandoned and Little-Known Airfields, Hawaii, Northern Oahu Island”; and Paul Freeman, “Abandoned and Little-Known Airfields, Hawaii, Southern Oahu Island,” revised September 27, 2013, accessed May 29, 2012, http://www.airfields-freeman.com/HI/Airfields_HI_Oahu_S.htm.



8. 9. Chance Vought F4U Corsairs in formation, January 1945. Hawai'i was one of the principal training areas for Navy and Army pilots in the Pacific.

There were similar bases on other islands. Kaua'i had stations at Mana and Barking Sands, Moloka'i at Homestead, and Hawai'i Island at Hilo and later Waimea.⁵² Maui, with naval air stations at Pu'unēnē and Kahului, was particularly devoted to air combat training.⁵³ Fully outfitted with bomb and ammunition magazines and with capacity for a full aircraft carrier group, Puunene Naval Air Station became known for advanced training and staging area for carrier-based fighter and torpedo-bomber pilots—one of the largest in the United States.⁵⁴

⁵² “World War II Military Airfields including Auxiliaries and Support Fields, Hawaii,” accessed May 23, 2012, <http://www.airfieldsdatabase.com/ww2/WW2%20R27b%20CO-HA.htm>.

⁵³ “World War II Military Airfields including Auxiliaries and Support Fields, Hawaii”; and “Naval Air Station Puunene (Historical),” Geoview.info, accessed February 1, 2014, http://us.geoview.info/naval_air_station_puunene_historical,5851417.



8. 10. Puunene Naval Air Station under construction, Maui, 1942.

Training also required aerial bombing practice. The most significant target site was Kaho‘olawe, the smallest of the principal eight Hawaiian Islands. Used as well for landing and live-fire exercises, the uninhabited island was an ideal location for Navy bombing training and as a range for bombardment from Navy ships.⁵⁵ By the end of the war, an inestimable number of bombs and other explosives had been expended on the island, permanently damaging ancient Hawaiian *heiau* and habitation sites as well as introducing a new level of stress to the already-threatened animal and plant life of the island.⁵⁶

⁵⁴ “The History of Maui during the War Years,” National Oceanic and Atmospheric Administration, National Marine Sanctuaries, Maui’s World War II Legacy, February 2, 2012, accessed December 12, 2013, <http://sanctuaries.noaa.gov/maritime/expeditions/maui/history.html>.

⁵⁵ Peter MacDonald, “Fixed in Time: A Brief History of Kahoolawe,” *Hawaiian Journal of History* 6 (1972): 69–90; and “Kaho‘olawe,” *Hawaiian Encyclopedia*, accessed May 2, 2012, <http://www.hawaiianencyclopedia.com/kahoolawe.asp>. Under fire as early as the 1920s, Kaho‘olawe’s sustained status as a bombing site dated to 1939, when the US Army leased a portion of the former cattle ranch, goat farm, and penal colony for use as an artillery range.

There were bombing sites on other islands too. The Elemakule Range on the east side of the island of Hawai'i—the subject of prewar negotiations with the NPS—remained an Army target area, although unused for most of the war.⁵⁷ There was also the Makanalua and the Punakua Bombing Ranges on Moloka'i, the Kahuku Point Navy Bombing range on O'ahu, Pakini Bombing Range and Mahini Maka Nui Bombing Target on Hawai'i, and the Opana Bombing Range and target areas of Kanouou Point and Kanehena Point on Maui.⁵⁸

The Hansen's disease settlement at Kalaupapa was just one of many places that felt the impact of pilot training in Hawai'i. A 937-acre site on the northwest side of the remote peninsula became a training site for US Navy bombing exercises from Homestead Field near Kaunakakai. Known as the Makanalua Bombing Range, this area remained in use from the time of the air base's construction between June and October 1940 and 1946. Located a safe distance from the residential area of Kalaupapa, the range was nonetheless a source for wartime souvenirs. One patient made a lamp made from a bomb fragment.⁵⁹

The 2nd Marine Division

Shortly after Thanksgiving Day 1943, units of the 2nd Marine Division arrived off O'ahu fresh from their recent engagement in the Gilbert Islands. Hoping initially to return to New Zealand, their post prior to their action at Tarawa (Betio Atoll), the marines remained confined for several days on their transport ships at Pearl Harbor during the removal of wounded and Japanese

⁵⁶ "Kaho'olawe," Global Security, Organizations, Military Facility, accessed December 12, 2013, http://www.denix.osd.mil/nr/crid/Coral_Reef_Iniative_Database/Kahoolawe_files/Kaho'olawe%20Cleanup%20Facts.pdf.

⁵⁷ Moniz Nakamura, "Up in Arms!" 29.

⁵⁸ William Cole, "Hawaii Still at Risk from Old Munitions," *Honolulu Advertiser* online, August 13, 2006, accessed January 23, 2014, <http://the.honoluluadvertiser.com/article/2006/Aug/13/In/FP608130343.html>.

prisoners.⁶⁰ To stave off boredom, officers ordered the men to fall out for several hours of drill on the pier.⁶¹

On December 2, following an overnight voyage from O‘ahu, the 2nd and 8th Regiments disembarked at Hilo for transport to the plantation town of Honoka‘a by narrow-gauge rail.⁶² Then, by trucks, they traveled to Waimea in the central part of the island of Hawai‘i. Navy Seabees, of the 3rd Battalion, 18th Marines (Engineers) preceded other units and erected a makeshift camp using tents the Army had left behind.⁶³ Two other Marine engineer battalions arrived soon afterward. It took the engineers a full month to complete the camp.⁶⁴



8. 11. Marines traveling by train to Waimea on the island of Hawai'i, late November 1943.

⁵⁹ “Kalaupapa Munitions Cleanup,” *Molokai Dispatch*, March 18, 2012, accessed May 24, 2012, <http://themolokaidispatch.com/kalaupapa-munitions-clean-up/>.

⁶⁰ Johnston, *Follow Me*; and “Battles,” Second Marine Division Association, accessed November 12, 2013, http://www.2dmardiv.com/Battle_History.html.

⁶¹ Paul J. Du Pre, Letter to the Editor, Camp Tarawa Newsletter, Kamuela, Hawai‘i, February 9, 2009, in Jim Browne, *Camp Tarawa, 1943–1945* (Waimea, HI: Camp Tarawa Detachment #1255, Marine Corps League, Big Island of Hawai‘i, n.d.), 35; and Johnston, *Follow Me*.

⁶² Du Pre, Letter to the Editor, 35.

⁶³ Browne, *Camp Tarawa*, 6.

⁶⁴ Browne, *Camp Tarawa*, 9; and Jim Browne, interview with William Chapman, Hapuna Bay, Hawai‘i, July 28, 2013.

Combat exhaustion affected most of the men, while others suffered from malaria contracted overseas. Over 1,000 Marines had died at Tarawa with another 2,101 wounded.⁶⁵ Although the 2nd Marines included Navy Medical Corps units, supplies were lacking with a shortage of sleeping bags, blankets, and replacement uniforms. Some, upon arrival in Hawai'i, relied on the local Red Cross for temporary clothes.⁶⁶ Others purchased warm clothing and blankets at local stores along the way; the Hayashi Store in Waimea sold nearly everything on its shelves the day after the 2nd Marines arrived.⁶⁷

Upon arrival, the Marines dispersed to three separate sites: a former Army installation at Pōhakuloa in the saddle between Mauna Loa and Mauna Kea; Camp Drewes near Hapuna Bay on the Kona Coast; and the largest—dubbed Camp Tarawa after 2nd Marine Division's recent Gilbert Islands engagement—in Waimea. Pōhakuloa Camp was for field artillery training; Camp Drewes was for mechanized landing craft units, with other sections of the site for infantry.⁶⁸ All types of units housed in the main camp at Waimea.⁶⁹

One of the first tasks for the Navy Seabees was to address the persistent water shortage. At Waimea, engineers dug an 866-foot-deep well, the first of its kind on the island. Construction crews also built an ice plant and an electric power plant and completed a reservoir spanning Waimea Creek. Supplementing the tent city, there were soon more permanent mess halls, kitchens, stockades, and bathing facilities.⁷⁰ In early January 1944, the 6th Regiment joined the two other 2nd Division regiments already at the base.⁷¹

⁶⁵ "Battle of Tarawa," HistoryNet.com, accessed January 12, 2014, <http://www.historynet.com/battle-of-tarawa>; John Wukovits, *One Square Mile of Hell: The Battle of Tarawa* (New York: NAL Trade, 2007); Robert Sherrod, *Tarawa: The Story of a Battle* (Fredericksburg, TX: Admiral Nimitz Foundation, 1993); and Alexander, *Utmost Savagery*.

⁶⁶ Browne, *Camp Tarawa*, 10.

⁶⁷ Gordon Bryson, "Waimea Remembers Camp Tarawa," *Waimea Gazette* online, March 1995, accessed July 2, 2012, http://www.waimeagazette.com/Mar95_WaimeaRemembersTarawa.htm.

⁶⁸ These were known variously as amphtracks, amtraks, and amracs. See Steven Zaloga, Terry Hadler, and Michael Badrocke, *Amtracs: US Amphibious Assault Vehicles*, New Vanguard Series (Botley, Oxford: Osprey Publishing, 1999).

⁶⁹ Technically, the entire 137,000-acre site was Camp Tarawa, though most people now refer to the largest housing site, located in Waimea, as Camp Tarawa.

⁷⁰ Browne, *Camp Tarawa*, 25.

Camp Tarawa would eventually house 20,000 marines, together with associated Navy personnel, including the Seabees, Marine engineers, and members of the Navy Medical Corps. Leased, as was the other property, from Richard Kaleioku Smart (1919–1932), owner of the Parker Ranch, the camp served as both convalescence center and training site. Photographs of the 441-acre complex depict rows of tents—a combination of wall, pyramid, and fly tents, mounted on wood platforms⁷²—radiating in neat rows from the common buildings at the center. Engineers used both wood-frame structures, much like plantation buildings, and corrugated-metal and plywood Quonset huts—two of which remain at the site.⁷³ Nearby Waimea School and the Waimea Hotel both served as hospital facilities.⁷⁴



8. 12. Camp Tarawa, Waimea, 1944.

⁷¹ Browne, *Camp Tarawa*, 6.

⁷² “Individual Tents,” [World War II Materiel,] accessed January 1, 2014, <http://users.skynet.be/jeeper/tentage.html>.

⁷³ Sarah Nichols, “A Tiny Town Transformed: Hawaii Big Island Remembered,” *Big Island Guru* online, June 13, 2013, accessed January 12, 2014, <http://www.bigislandguru.com/1/category/camp%20tarawa/1.html>.

⁷⁴ Cynthia Hoskins, “Big Island Goes to War, 1943–1946,” Clark Realty Corporation, Big Island Community News, accessed January 12, 2014, <http://www.clarkhawaii.com/blog/2010/11/the-big-island-goes-to-war-camp-tarawa-1943-1946/>.

In addition to building the camp, Navy Seabees and Marine engineer units installed pipes and telephone and electrical lines. Waimea, a small ranching town with a population under 450, had previously depended on kerosene for lighting, so the new utilities were a novelty.⁷⁵ Engineers also constructed Bordelon Field to provide better transportation in and out of the camp. This included a 3,000-foot-long graded and oiled runway and a makeshift field station appropriate to its classification as a “liaison field.”⁷⁶ Named after William J. Bordelon (1920–1943), a Marine killed during the Battle of Tarawa, the airfield handled small planes, including observation craft, and was used primarily for training exercises.⁷⁷

Many of Waimea’s residents were of Japanese ancestry, and some feared that the Marine veterans would treat them harshly.⁷⁸ In fact, the Marines got on well with townspeople, buying fresh food from Japanese truck farmers who traveled to Waimea from the Hamakua Coast and other parts of the island.⁷⁹ Marine cooks also prepared “tons” of ice cream for sale to local schoolchildren.⁸⁰ Marines—some fresh from paper routes themselves—helped young newspaper sellers distribute their papers. Children and their parents also watched outdoor movies from the hills near the base.⁸¹

As local residents grew accustomed to the new arrivals, relationships took hold. Local people invited marines to cookouts and luaus. There were also ball games between townspeople and marines.⁸² The USO set up operations at Barbara Hall (later Kahilu Hall), then part of

⁷⁵ Tad Sommers, “Camp Tarawa Helped Build Waimea,” *West Hawaii Today* online, accessed January 23, 2014, <http://westhawaii.com/sections/news/local-news/camp-tarawa-helped-build-waimea.html>.

⁷⁶ “Kamuuela Airport (Bordelon Field),” Hawaii Aviation: An Archive of Historic Photos and Facts, State of Hawaii Department of Transportation, Airports Division, accessed January 1, 2014, <http://hawaii.gov/hawaiiaviation/hawaii-airfields-airports/hawaii/waimea-kohala-airport>.

⁷⁷ Bordelon received a posthumous Medal of Honor for his courage under fire, the first US Marine from Texas to be so honored.

⁷⁸ Leonard Skinner, “Hawaii,” *One Man’s View*, chap. 8, accessed January 1, 2014, <http://members.peak.org/~skinnrcr/oneman/onemansview.html>.

⁷⁹ Browne, *Camp Tarawa*, 10.

⁸⁰ Hoskins, “Big Island Goes to War, 1943–1946.”

⁸¹ Browne, *Camp Tarawa*, 14.

⁸² Sommers, “Camp Tarawa Helped Build Waimea.”

Parker Ranch.⁸³ When on leave, Marines ventured to Honaka‘a, Kona, Hilo, and even tiny Hawi and Kohala. There they ate in local restaurants, sampled Hawaiian and Japanese food, and listened and jammed with—at least some, such as Dick Ferris and Ray Kehoe⁸⁴—local musicians. Men also barbequed on the beach and swam in the surf at Hapuna Bay. Some attempted to “surf-board” on rubber dinghies. For many, Hawai‘i was their first experience of “paradise.”



8. 13. Flag-raising, 2nd Marine Division, Camp Tarawa, early 1944.

Training in Waimea and on the Kona Coast

Camp Tarawa was not for rest and relaxation alone. Marine commanders wanted a cool site for marines still suffering the effects of posting in harsh tropical conditions.⁸⁵ Located at an altitude of 2,670 feet above sea level, Waimea provided, as well, an excellent training site for future

⁸³ Billy Bergin, *Loyal to the Land: The Legendary Parker Ranch, 1950–1970*, Vol. 2 (Honolulu: University of Hawai‘i Press, 2006), 47.

⁸⁴ Dick Ferris, Rosedale, California, Letter, in Browne, *Camp Tarawa*, 41–42.

⁸⁵ Browne, *Camp Tarawa*, 10.

engagements. Extending over 137,000 acres, the property included steep mountains, dry streambeds, and both rocky and sandy coasts. There were coral reefs offshore and cane fields on the eastern, Hāmākua side.

Camp Tarawa's acreage had been in the Parker family's hands since the early nineteenth century. Though he owned the ranch, Smart was, at the time, a thirty-year-old actor residing in Los Angeles. Leased for a token amount, the area was about a third of the ranch's total property, covering much of the central and northwest parts of the island (Upper Kona, including Waikalua and North Kohala).⁸⁶ The terrain matched that of Saipan and Guam and Yap and Ulithi in Palau—all scheduled as part of the island-hopping Pacific campaign. The expansive training area also included steep hills, both wet and dry terrain, and a wide swath of beachhead.

Each day, units spread out to field exercises in open areas, scaling the steep slopes of Buster Brown Hill (Hoku'ula) and Pu'u Ula'ula, both part of the range backing onto Anna's Ranch in Waimea.⁸⁷ Other marines marched down twelve miles of road to Kawaihae, following the historic route of Parker Ranch cattle drives. There they bivouacked at Camp Drewes, practicing landings at Hapuna beach, and conducted small unit exercises in the foothills behind.⁸⁸ Camp Drewes was also home of the 2nd and 5th Amtrac (LVT) Battalions of the 2nd Marine Division, which included men such as Stanford J. Slama from Cavalier County, North Dakota, a 1942 enlistee and Private First Class.⁸⁹ Slama's duty was to drive an amphibious

⁸⁶ "Modern History," Parker Ranch, accessed October 12, 2012, <http://parkerranch.com/legacy/history-of/modern-history/>. Also, Bergen, *Loyal to the Land*.

⁸⁷ "Hoku'ula: The 'Red Star' of Red Water Country," *Asynchronicity* (blog), June 13, 2011, accessed January 12, 2014, <http://asynch.wordpress.com/2011/06/13/hokuula-red-star-red-water-country/>.

⁸⁸ Melora Purell, "Remembering Camp Tarawa," *North Hawaii News*, June 13, 2013, accessed December 13, 2013, <http://northhawaii.news.com/sections/news/remembering-camp-tarawa.html>.

⁸⁹ "Slama, Stanford Joseph," Archives, Veterans History Project, Veterans Interviewed, Cavalier County, State Historical Society of North Dakota, 2013, accessed December 12, 2013, http://history.nd.gov/archives/veterans_cavalier.html.

landing craft across coral reefs and into surf swells delivering 140 marines onto the beach with each landing.⁹⁰

Hapuna Beach was also the practice site for the Marine scouts and snipers—the advance units for projected beach landings.⁹¹ These rugged units carried out night landing and daytime exercises in the surf, employing rubber dinghies. When other exercises were not underway, the Marines used the beach for swimming instruction. At one point, former Olympian Melvin K. Archer taught nonswimmers the basics of surviving a capsized landing craft.⁹² Others learned simply to stay afloat.

Inland areas saw use for other kinds of training, including artillery and armored vehicle exercises, often with air support. Throughout their training, marines experienced live-fire drills, hitting beaches, and crawling across the harsh surfaces of lava fields.⁹³ Marines also learned to work in small support units, employing mortars, field artillery, and backpack-type M2A1-7 and M2-2 flamethrowers, proven effective in previous engagements in clearing Japanese trench and bunker complexes.⁹⁴

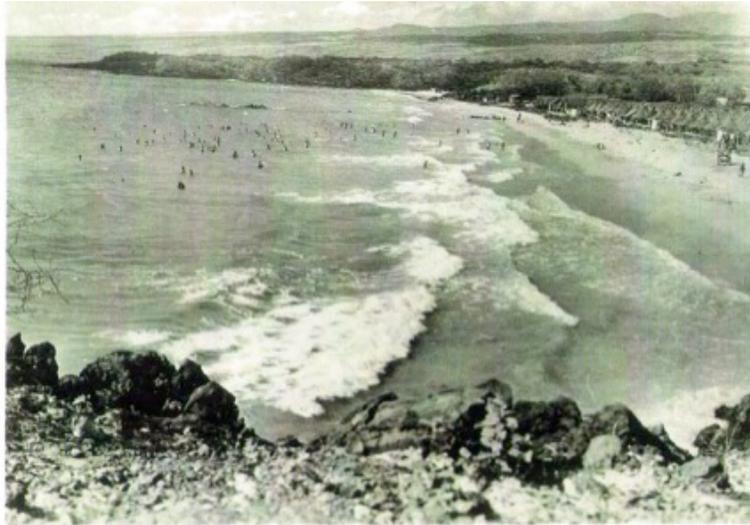
⁹⁰ “AmTracs of World War II and the Korean War, 1st generation LVT’s,” Amtrac.org, accessed December 12, 2013, <http://www.amtrac.org/2atmc/Tracs/gen1.asp>. LVT was Landing Vehicle Tracked, also known as an Am Trac, amphtrack, or amtrac, derived from amphibious tractor.

⁹¹ Gary Campbell to Jim Browne, May 29, 2009, in Browne, *Camp Tarawa*, 40.

⁹² Marion O. Milton, “Marines Demonstrate Rigid Combat Training,” *Marine Corps Chevron* 3, no. 7 (February 19, 1944), Princeton Library, scan, accessed December 12, 2013, <http://diglib4.princeton.edu/historic/cgi-bin/historic?a=d&d=MarineCorpsChevron19440219-01.2.2&e=-----en-20--1--txt-IN----->.

⁹³ Browne, *Camp Tarawa*, 9, 11, 13, 43.

⁹⁴ “M2 Flamethrower,” *Wikipedia*, accessed December 1, 2013, http://en.wikipedia.org/wiki/M2A1-7_flamethrower. The M2 flamethrower (M2-2) was an American man-portable backpack flamethrower used in World War II. The Marines adopted the weapon in 1943 as the successor to the M1 and M1A1 flamethrowers. Although its burn time was only around 7 seconds and the flame was only effective out to around 20–40 meters. Tank-mounted flamethrowers, notably the M4A3R3 Zippo, a modified Sherman tank, eventually replaced these.



8. 14. Fort Drewes, LVT (Amtrac) US Marine landing training area, Hapuna Bay, Hawai'i Island

American marines were little aware of the great historic value of their training area. Just north of Hapuna Bay was the late eighteenth-century Pu'ukoholā Heiau, a monumental religious complex associated with the rise of the great Kamehameha I. Dedicated in 1791 to mark Kamehameha's ascendancy over of his cousins Kiwala'o and Keoua, Pu'ukoholā was an impressive *luakini heiau* (sacrificial temple) dedicated to the war god Kūka'ilimoku. Covering an area of about 220 by 100 feet and rising 16 feet above the hillside, Pu'ukoholā was still recognizable at the time of the Marines training exercises. So too was a smaller Mailekini Heiau located below, 170 feet closer to the bay.



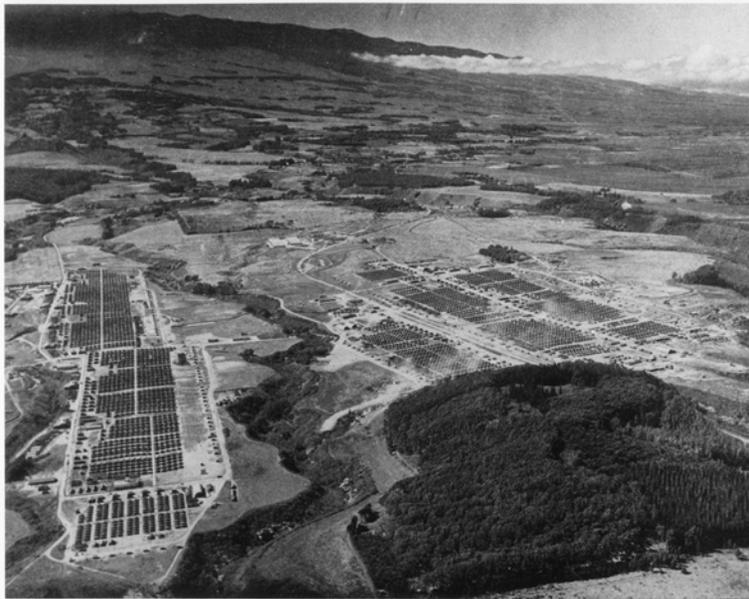
8. 15. Marines on maneuver, inland from Kawaihae, Hawai'i Island, 1944.

Whether they served, in fact, as props for landing exercises is unknown. In the 1980s, archaeologists discovered evidence of a machine-gun emplacement and telephone lines in the complex, but there still may be remnants of earlier outposts.⁹⁵ The remnants of a tank road running through the Pelekane area were clearly the result of the Marine training programs. Luckily, it did not damage these important sites.

⁹⁵ See Edmund J. Ladd, *Ruins Stabilization and Restoration Record, Pu'ukohola Heiau National Historic Site, Kawaihae, Hawaii* (Honolulu: National Park Service, 1986), 7–8, and Edmund J. Ladd, “Archaeological Field Survey Report: Cape Kumukahi and Kawaihae Lighthouses,” tDAR, Archaeological Digital Record, accessed June 1, 2012, <http://core.tdar.org/document/324752>.

The 4th Marine Division on Maui

The 2nd Marine Division was not the only Marine unit training and recuperating in the Hawaiian Islands. In February 1944, the 4th Marine Division arrived in Hawai'i directly from action in the Marshall Islands.⁹⁶ Veterans of the V Amphibious Corps assault on Roi and Namur Islands in Kwajalein in early February, the 4th Marines, were battle-tested and weary. Activated only on August 16, 1943, they had received most of their training at Camp Pendleton and its surrounding training area. Their rehearsal for Kwajalein had been at San Clemente Island, at Las Pulgas Canyon, and at sites selected on the Santa Margarita River, when night-combat training took place.⁹⁷



8. 16. Camp Maui, Haiku, Ha'ikū, home of the 4th Marine Division beginning February 1944. Aerial photograph by Joe Richard.

⁹⁶ John C. Chapin, *The 4th Marine Division in World War II* (1945; repr., Washington, DC: History and Museums Division, Headquarters, US Marine Corps, 1974), 13–17.

The Marine attack on Roi involved “mopping up” remaining Japanese sniper positions; Namur had proven much more difficult with well-entrenched enemy snipers, pillboxes, and machine-gun emplacements.⁹⁸ Following two days of naval bombardment, the Marine units landed on the beaches, attacking Japanese positions. Within two days, the island was secure, and Seabees were busily reconstructing the airfield.⁹⁹ The 25th Regiment remained on Namur as a garrison force, while the rest of the division loaded back onto LSTs (Landing Ship, Tank) and other troop carriers for the return trip to Hawai‘i.¹⁰⁰ Overall, the division had lost 190 men and endured a further 547 wounded, compared to total Japanese losses of 3,472 killed and 264 taken prisoner.¹⁰¹

Before seeing action in Kwajalein, the 4th Marine Division enjoyed a tantalizing view of the islands. In early January, following embarkation in San Diego, the 4th were at anchor off Maui while its commanders discussed the upcoming action with commanders in Honolulu. The speakers on the ships announced, “There will be no liberty.”¹⁰² The division would have to wait until February and early March, to finally land on the Hawaiian Islands.

As with Army divisions, there were three infantry or “rifle” regiments—the 23rd, 24th, and 25th Regiments—and one artillery regiment, the 14th Artillery¹⁰³ There were also separate battalions and companies of medics, engineers, Signal Corps, and tank units. With casualties, the diversion of the 25th to Namur, and a company from a tank battalion held in reserve for the assault of Eniwetok, the division was below strength. A rear echelon had also been held in

⁹⁷ Chapin, *4th Marine Division*, 2.

⁹⁸ Chapin, *4th Marine Division*, 8, and John C. Chapin, “Breaking the Outer Ring; Marine Landings in the Marshall Islands,” *Marines in World War II Commemorative Series*, accessed October 12, 2012, http://www.nps.gov/history/history/online_books/npswapa/extcontent/usmc/pcn-190-003124-00/sec3.htm.

⁹⁹ Chapin, *4th Marine Division*, 7–8; “Namur: Penetrating the Outer Ring,” *Division History of the Fighting Fourth*, accessed January 30, 2014, <http://www.fightingfourth.com/namur.htm>. For a broader perspective, see Frank M. Benis and Henry I. Shaw, Jr., *History of U.S. Marine Corps Operations in World War II*, Vol. 5, *Victory and Occupation* (New York: Penguin Books, 1990); and Edwin P. Hoyt, *Storm over the Gilberts: War in the Central Pacific 1943* (New York: Mason/Charter Publishers, 1978).

¹⁰⁰ Chapin, *4th Marine Division*, 7–8.

¹⁰¹ Chapin, *4th Marine Division*, 7.

¹⁰² Chapin, *4th Marine Division*, 13.

reserve; it moved onto Hawai'i, arriving on Maui on February 12 to prepare for the other units.¹⁰⁴

The Marines were assigned a site in Ha'ikū, on the windward side of the island, close to where combat engineer Ralph Pratt served with the 98th Infantry Division. Designated Camp Maui, the exhausted units slowly took possession of what had once been an Army facility.¹⁰⁵ As the division's historian later commented, "they [were] faced with a base that was not very highly developed or equipped."¹⁰⁶ At the time, the camp had no electric power and, as one officer remembered, "was ankle deep in mud from recent rains."¹⁰⁷



8. 17. Camp Maui, photograph by Ben Bradshaw, 1944.

¹⁰³ Chapin, *4th Marine Division*; and "4th Marine Division (United States)," *Wikipedia*, accessed October 12, 2013, [http://en.wikipedia.org/wiki/4th_Marine_Division_\(United_States\)#Subordinate_units](http://en.wikipedia.org/wiki/4th_Marine_Division_(United_States)#Subordinate_units).

¹⁰⁴ Chapin, *4th Marine Division*, 13.

¹⁰⁵ Chapin, *4th Marine Division*, chap. 3.

¹⁰⁶ Chapin, *4th Marine Division*, 13; and Peter T. Young, "Camp Maui—Fourth Marine Division - Ha'ikū," *Ho'okuleana* (blog), accessed November 12, 2013, <http://totakeresponsibility.blogspot.com/2012/05/camp-maui-fourth-marine-division-haiku.html>.

As did Army units before them, the 4th Marine Division disembarked at Kahului and traveled by truck to the site. Throughout late February and March, engineers and Seabees worked to improve the quarters.¹⁰⁸ Gaining electricity by the end of April—by which time new recruits had helped fill their ranks—the Marines soon had a couple baseball diamonds and Quonset hut mess halls and recreation buildings. The men also were treated to USO shows, featuring “Hawaiian hula girls,” Post Exchange (PX) beer and wine, and occasional liberties to Wailuku, Kahului, and even Lahaina at the other end of the island. Much of their time was devoted to writing letters (censored by officers), washing and mending clothes, cleaning weapons, and tidying their tents.¹⁰⁹

Recreation officers soon organized an active sports program, including individual sports as well as interbattalion and interregimental competitions. In addition to baseball diamonds, there were handball and volleyball courts and boxing rings. Local towns and schools provided existing gymnasiums for basketball and tennis courts. Maui residents also opened two golf courses for service use. Men swam at local beaches and hiked into the mountains; many would visit the park at Haleakalā. There was also a swimming pool at the Puunene Naval Air Station and football fields both at Ha‘ikū and Kahului.¹¹⁰

Again, as with the 2nd Marine Division on Hawai‘i, the men of the 4th Division were to combine “rest” with training while in the islands. Training included usual close-order drill and target practice. There was also intensive training at Maui’s jungle training area, a range observation course, and moving-target and street-fighting ranges. In addition, there were special schools for air observers, flamethrowers, and logistics. With the arrival of a VMO-4 (aerial

¹⁰⁷ Cited in Chapin, *4th Marine Division*, 13.

¹⁰⁸ Chapin, *4th Marine Division*, 13–14.

¹⁰⁹ Chapin, *4th Marine Division*, 15.

¹¹⁰ “The History of Maui during the War Years,” National Oceanic and Atmospheric Administration, National Marine Sanctuaries, Maui’s World War II Legacy, February 2, 2012, accessed December 12, 2013, <http://sanctuaries.noaa.gov/maritime/expeditions/maui/history.html>.

observation planes, known as “flying jeeps”) squad in late April, ground troops could conduct aerial observation exercises and practice infantry reconnaissance and photography.¹¹¹

Maui’s terrain and beaches provided, as had Hawai‘i Island, an excellent training site for the Marines. Engineers constructed an obstacle course on the slopes of Haleakalā; the men also established a thirteen-mile hiking trail through the crater. Six of the island’s many existing training areas were devoted to nontactical maneuvering. There was a live-grenade course near the camp, together with a pistol range and a 1,000-foot machine-gun range. The unit’s bazooka range was five miles east of the camp in a gulch opening onto the sea. Farther east toward Hana were combat firing ranges and an area for tanks and half-tracks. The division’s 100-target rifle range was at ‘Ōpana Point.¹¹²



8. 18. Maui marines, spring 1944, Mike Frihauf’s squad, 1st Battalion, 24th Marines.

¹¹¹ VMO-4 (Observation Squadron 4) was attached to the Division as an “aerial OP.” Henceforth, it would accompany the 4th on operations to fly tactical observation and artillery spotting missions. Little larger than a Piper Cub, the two-seater Stinsons were affectionately named *F4U-Pocket Edition*, *The Last Straw*, and *SB Doodle-bug*. Lieutenant Colonel William R. Wendt was the Division Air Officer.

¹¹² “It Rained! How It Rained!”

The Army's jungle training area featured concrete pillboxes and other emplacements concealed with bamboo and camouflage. In addition to the street-fighting range, there were cave-fighting and infiltration courses. Ma'alaea Bay provided an antitank moving-target range, a close-combat area, and an additional rifle range. Ma'alaea beach also had mock pillboxes similar to those marines had encountered at Tarawa. Tank maneuver areas were near the Puunene Naval Air Station, near the center of the island. There were also two artillery ranges inland from the coast.¹¹³

By mid-May, the 25th and 23rd Regiments were conducting amphibious exercises on the coast. Later that month, the division had its first Division Command Exercise. Soon afterward, the "Fighting Fourth" loaded again on LSTs to participate in joint exercises with the 2nd Marines, some at Ma'alaea Bay and others at Kaho'olawe, where they assaulted beaches and secured imaginary positions under cover of live fire from aircraft and offshore ships. May 20 found the division anchored at Pearl Harbor to enjoy two days of liberty and an award ceremony presided over by Admiral Nimitz.¹¹⁴ By May 25, they were at sea again, bound as was the 2nd Marines to Saipan in the Mariana Islands.

¹¹³ Young, "Camp Maui – Fourth Marine Division - Ha'ikū"; and "It Rained! How It Rained!"

¹¹⁴ Chapin, *4th Marine Division*, 15.



8. 19. Mid-May, 1944, marine training at Ma'alaea Bay, Maui.



8. 20. Joint exercises were held with the 2nd Marine Division on Maui and Kalo'olawe prior to the invasion of Saipan and Tinian



8. 21. West Loch Disaster, May 21, 1944. Marine units en route to the Mariana Islands reloaded at Pearl Harbor. Little publicized at the time, the explosion of ammunition and fuel caused destroyed six of twenty-nine LSTs, along with numerous small boats, LCTs, and nearby buildings. One hundred sixty-three men died and another nearly 400 were injured, many of them African American from the 29th Chemical Decontamination Unit assigned to Schofield Barracks

Saipan and Tinian

The Battles of Saipan and Tinian would unite three units that had trained in Hawai'i: the 4th and 2nd Marine Divisions and the Army's 27th Infantry Division. On June 15, 1944, 535 Allied ships began landing a force of 128,000 US soldiers and marines on the island of Saipan in the Mariana Island group, about 1,500 miles south of Japan. The aim was to eliminate the large Japanese garrison on the island and prepare the way for sustained bombing of the Japanese mainland.¹¹⁵

¹¹⁵ Gordon Rottman and Howard Gerrard, *Saipan and Tinian, 1944: Piercing the Japanese Empire*, Campaign Series (Botley, Oxford: Osprey Publishing, 2004); and Harold J. Goldberg, *D-Day in the Pacific: The Battle of Saipan* (Bloomington: Indiana University Press, 2007).

The campaigns of 1943 and the first half of 1944 had involved the capture of the Solomon, Gilbert, and Marshall Islands and the conquest of the Papuan Peninsula of New Guinea.¹¹⁶ As of June 1944, the Japanese still held the Philippines, Carolines, and Marianas. US military planners had planned to bypass the Carolines and the Micronesian island of Palau and go straight for the Marianas and Formosa (Taiwan).¹¹⁷

The Japanese expected Allied forces to attack the Caroline Islands, reinforcing its garrison there. To protect their supply lines, Japanese war planners prepared for a major carrier-based attack on US forces.¹¹⁸ These two trajectories—the American assault on the Marianas and the Japanese attack on the US fleet—would converge west of the island of Saipan in June.

Naval bombardment of Saipan began on June 1, 1944. Fifteen battleships took part in the pre-assault action, each delivering 16-inch shells from a distance of 10,000 yards offshore in order to avoid mines. Manned by inexperienced crews, naval commanders feared that the preliminary fire had been ineffective. The following day, nineteen additional ships continued to soften the beachhead and surrounding hills, although it was apparent that these, too, failed to completely weaken the enemy forces.¹¹⁹

Landings began in the early morning of June 15. More than 300 landing ships, supported by 11 fire-support ships, delivered 8,000 marines on the west coast of Saipan within two hours. The United States lost 20 amphibious tanks due to the accuracy of Japanese fire. By nightfall, the Marines of the 2nd and 4th Divisions secured a beachhead nearly six miles long and a half-mile deep.¹²⁰ The Japanese Imperial Army's 43rd Division, commanded by Lieutenant General Yoshitsugo Saito (1890–1944), counterattacked, however, a move resulting in a growing number of US casualties.

¹¹⁶ Costello, *Pacific War, 1941–1945*.

¹¹⁷ Spector, *Eagle against the Sun*.

¹¹⁸ Rottman and Gerrard, *Saipan and Tinian*.

¹¹⁹ Francis A. O'Brien, *Battling for Saipan* (New York: Ballantine, 2003), chap. 6.

¹²⁰ John C. Chapin, "Breaching the Marianas: The Battle for Saipan," Biblio.org, Hyperwar, accessed November 12, 2013, <http://ibiblio.org/hyperwar/USMC/USMC-C-Saipan/index.html>.

On June 16, men of the 27th Army Division reinforced the Marines. Two days of heavy fighting secured the airfield in the central part of the island. The Japanese troops regrouped at Mount Tapotcha just north of the air base, spreading their forces along the nearly impenetrable crevices and ridges comprising the formation. Nicknamed “Hell’s Pocket,” “Death Valley,” and “Purple Heart Ridge,” these features of the volcanic landscape required a costly advances by American troops, as individual units removed machine-gun positions and penetrated caves to neutralize resistance.¹²¹

Over the next few days, Marine and Army units continued to advance northward, pursuing the Japanese troops as they strategically withdrew from one position after another. The 27th Infantry took a devastating number of casualties due to the difficulty of the terrain; commander of the V Amphibious Corps, Marine General Holland “Howlin’ Mad” Smith relieved Army leader Major General Ralph C. Smith (1893–1998) of command due to his dissatisfaction with the division’s progress.¹²² Eventually, following a plan previously devised by the Army general, the 27th Division was able to flank the defenders.

On July 7th, the 1st and 2nd battalions of the 105th Infantry Regiment held off a last *banzai* charge of 3,000 Japanese soldiers and civilians.¹²³ For their role in holding the US lines, three men from the 105th later received the Congressional Medal of Honor.¹²⁴ Overall, the Japanese lost over 24,000 soldiers and an additional 5,000 civilians, many of whom leaped to their deaths from the cliffs at the north end of the island. Only 921 Japanese surrendered. General Saito and his subordinate commanders committed suicide in a cave.¹²⁵

Following Saipan, Marines of the 2nd and 4th Divisions invaded the nearby island of Tinian. As at Saipan, Japanese resistance was stubborn, but the Marines were able to better

¹²¹ Goldberg, *D-Day in the Pacific*, 157.

¹²² Spencer C. Tucker, ed., *U.S. Leadership in Wartime: Clashes, Controversy, and Compromise* (New York: ABC-CLIO, 2009), 656–57.

¹²³ “Battle of Saipan,” HistoryNet.com, accessed December 1, 2013, <http://www.historynet.com/battle-of-saipan>.

¹²⁴ Goldberg, *D-Day in the Pacific*, 190–94; and Chapin, “Breaching the Marianas: The Battle for Saipan.”

¹²⁵ D. Colt Denfeld, *Hold the Marianas: The Japanese Defense of the Mariana Islands* (Shippensburg, PA: White Mane Publishing, 1997); and Bruce M. Petty, *Saipan: Oral Histories of the Pacific War* (Jefferson, NC: McFarland and Company, 2001).

employ tanks and artillery on the much flatter island.¹²⁶ Again, as on Saipan, remaining Japanese launched a suicide attack near the end, demonstrating the resistance of both Japanese troops and the population to American conquest.¹²⁷ Tinian witnessed the first use of napalm, developed by US scientists to remove enemy cover and neutralize resilient positions.¹²⁸



8. 22. Marines at the Battle of Saipan, between June 15 and July 9, 1944.

Within nine days, the island was in US hands. Soon, Navy Seabees were constructing what would become for a time the largest air base in the world. Laid out in pattern suggestive of the island of Manhattan, Tinian's West and North Fields would be home to over 40,000 airmen and support crews.¹²⁹ Its six 8,000-foot-long runways launched thousands of B29s on missions

¹²⁶ Nathan Prefer, *The Battle for Tinian: Vital Stepping Stone in America's War against Japan* (Havertown, PA: Casemate Publishers, 2012).

¹²⁷ Rottman and Gerrard, *Saipan and Tinian*.

¹²⁸ Robert M. Neer, *Napalm: An American Biography* (Cambridge, MA: Harvard University Press, 2013).

¹²⁹ George A. Larson, *A Seabee's Story: Tinian and Okinawa, B-29's and the Air War against Japan* (Bennington, VT: Merriam Press, 2012); National Park Service, "Special Study North Field Historic District, Tinian, Commonwealth

over Japan, a yearlong campaign that would culminate in the dropping of atomic bombs on Hiroshima and Nagasaki in August 1945. Saipan and Tinian had demonstrated the tenacity of Japanese troops and people; the two battles had also alerted Allied commanders to the difficulty of a land attack on Japan.¹³⁰



8. 23. “Mopping up” on Tinian. The cane fields of this formerly Japanese-held island strongly recalled those of Maui a few weeks before.

The 5th Marine Division and the Return of the 4th Division

Around the same time that the 2nd and 4th Divisions were en route to combat, the 5th Marine Division replaced the 2nd Division at Waimea. Originated stationed at Camp Pendleton near San Diego in late 1943 (but not active officially until January 21, 1944), the 5th Marines were not an

of the Northern Mariana Islands,” September 2001, accessed October 1, 2012, <http://www.nps.gov/pwro/piso/Tinian/tiniandr.htm>.

¹³⁰ John C. Chapin, “Breaching the Marianas: The Battle for Saipan,” *Marines in World War II Commemorative Series*, accessed December 1, 2013,

http://www.nps.gov/history/history/online_books/npswapa/extContent/usmc/pcn-190-003123-00/sec9.htm.

entirely “green” division.¹³¹ Among its ranks were many combat veterans, some from the former 1st Marine Parachute Regiment, others from the Raiders Training Battalion, the Parachute Training School, West Coast, and the Parachute Replacement Company.¹³² Originally destined for overseas service as part of the Guam campaign, the first units were diverted to Hawai‘i for further training.¹³³ The remainder of the division arrived between August and November.

As with the 2nd Marine Division before it, the 5th Division balanced training and rest while on Hawai‘i Island. Known alternately as the “Fighting Fifth” and “The Spearhead,” the new division trained throughout the extensive Camp Tarawa area. This included landing maneuvers at Hapuna Bay, artillery practice in the former Waikaloa Maneuver Area, and live-fire training throughout the hills and valleys of Kohala, Waimea, and nearby areas.¹³⁴ As one veteran reflected, “Camp Tarawa was an ideal location for training. There were areas for field maneuvers, weapons ranges and excellent observation for artillery and heavy weapons. The camp had a ‘wet side’ and a ‘dry side’ and it was on the line that separated the rain-soaked part of Hawaii from the arid central regions.”¹³⁵

As with their predecessors, the members of the 5th Marine Division got on well with townspeople. Local residents played ball with service members. Children flocked to see Roscoe, the regimental pet lion of the 28th Marines.¹³⁶ Once again, after their time in Hawai‘i was finished, the “Fighting Fifth” moved on to the central Pacific. Unlike the 2nd Division, which had been rehearsing for the protracted conquest of Saipan and Tinian, their “Island X” was the small volcanic island of Iwo Jima, the site of one of the costliest battles of the entire war.

¹³¹ Gordon Rottman, *US Marine Corps Pacific Theater of Operations, 1944–45* (Bosley, Oxford: Osprey Publishing, 2004).

¹³² Howard M. Conner, *The Spearhead: World War 2 History of the 5th Marine Division* (Santa Rosa, CA: Infantry Journal Press, 1951); and Mark Flowers, “The 5th Marine Division ‘The Spearhead’” World War II Gyrene, 2004, accessed October 14, 2013, http://www.ww2gyrene.org/spotlight5_5thmardiv.htm.

¹³³ Bailey and Farber, *First Strange Place*, 62–70.

¹³⁴ Browne, *Camp Tarawa*.

¹³⁵ “Training at Camp Tarawa,” accessed January 23, 2014, <http://www.5thmarinedivision.com/camp-tarawa.html>.

¹³⁶ Pacific Island Ranger, “The Marines, a Lion and Waimea: Remembering Camp Tarawa,” *National Parks of the Pacific Islands* (blog), June 7, 2013, accessed December 1, 2013, <http://pacificislandparks.com/2013/06/07/the-marines-a-lion-and-waimea-remembering-camp-tarawa/>.

In August 1944, the 4th Marine Division returned to Maui. The division had lost 5,981 dead and wounded at Saipan and a further 1,906 on Tinian and the men were strongly in need of rest.¹³⁷ Loaded onto ships at Tinian beginning August 7, the unit took over three weeks to reassemble in Hawai'i. Even then, some medical, headquarters, and service personnel were still in the Marianas or en route.



8. 24. Roscoe, the regimental pet lion of the 28th Marines.

Upon arrival, the Marines faced the usual problems of resupply, reorganization, and retraining. Throughout September and October, new recruits filled in empty positions; other units were disbanded or transferred. Finally, there was new equipment with which to become familiar, including M4A3 tanks, which the division received in September.

On October 24, the division command received its secret orders for the division's next objective. Training exercises soon focused on landing practice at Ma'alaea Bay, where division-wide maneuvers took place in November. Marine recruits and veterans also received instruction in neutralization of minefields, attack of fortified positions, and use of supporting arms.¹³⁸

¹³⁷Chapin, *4th Marine Division*, 27, 36.

¹³⁸ Chapin, *4th Marine Division*, 39–40.

The 4th Marine Division was happy to be back on Maui. Both officers and men had pyramidal tents with plywood floors and took their meals in one of nineteen galleys, two designated for each regiment and the rest for other personnel. However, they still took showers fed by mountain springs in roofless facilities and the latrines consisted of “pit-type head buildings.” Office buildings employed locally procured Canex—a cane-fiber boarding material.¹³⁹

The camp still prided itself on its excellent recreational facilities and programs. Each regiment had its own outdoor movie theater and there were beer gardens, baseball diamonds, and boxing rings. As before, the marines relied on the use of gymnasiums in nearby Makawao and Paia. There was a football field at Ha‘ikū and a beach below Paia. “Liberty trucks and busses” left daily for Wailuku, Kahalui, and Makawao.¹⁴⁰

Maui residents once again welcomed the division. Sporting events were popular with both marines and local residents, with the division’s football team holding an undefeated record against local clubs.¹⁴¹ Local families opened their homes to marines and entertained them at the USOs. The 4th became known as “Maui’s own,” and the division modified the slogan “Maui No Ka Oi” to “Maui Marines No Ka Oi” (“Maui Marines are the best”).¹⁴²

¹³⁹ Chapin, *4th Marine Division*, 40.

¹⁴⁰ Chapin, *4th Marine Division*, 40.

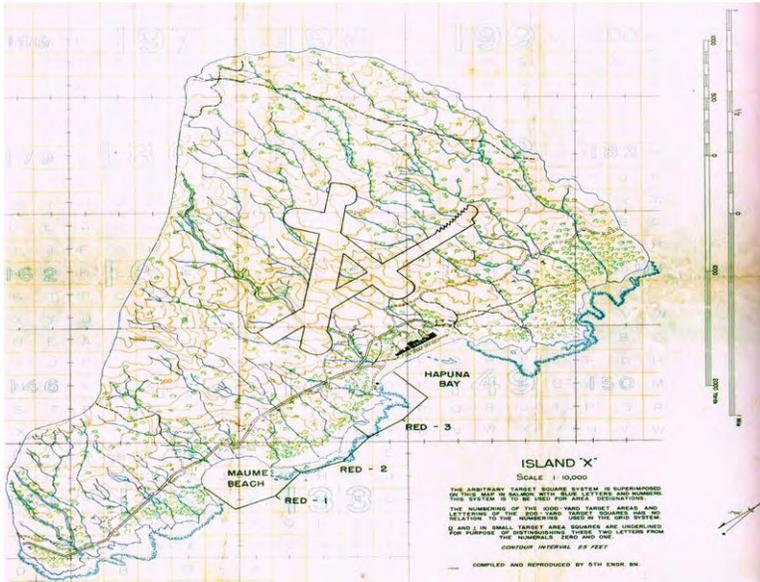
¹⁴¹ “It Rained! How It Rained!”

¹⁴² The “People of Maui” issued a flyer containing this phrase. It begins: “Aloha, Hi, you Marines! Welcome home!” Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940-61, Haleakalā National Park (HALE), Archives, Maui.

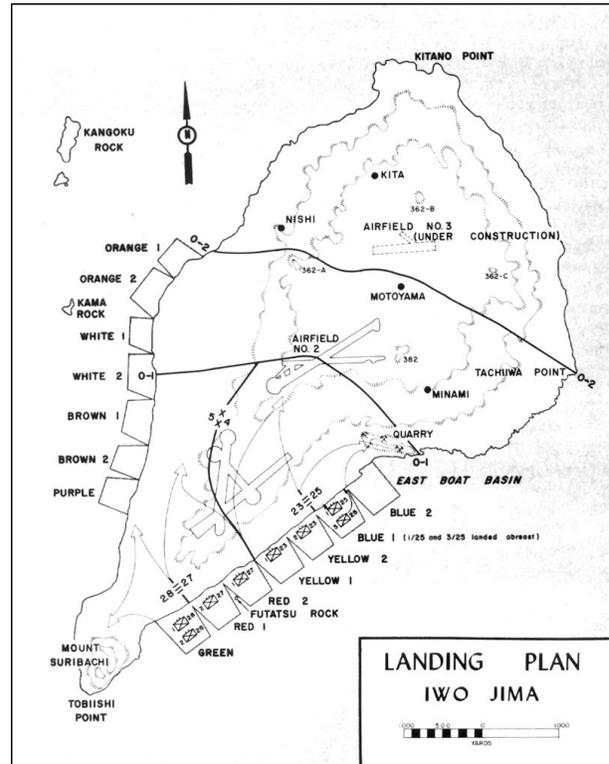


8. 25. Marines joining in Waimea Rodeo, 1944.

Following inoculations in November, the division conducted two unit-wide exercises in early December. On December 27, the division split into its combat task organization of three regimental combat units, the Division artillery, and a support group. In early January 1945, there were maneuvers again at Ma‘alaea Bay, including landing and live-fire with air-support practice. For a week, the division’s commanders granted the men two days each of liberty on a rotating schedule. They also received medals and commendations for Saipan and Tinian. On January 22 and January 27, the division loaded for transport back across the Pacific—its destination Iwo Jima.



8. 26. Island “X.” Planning for the invasion of Iwo Jima. Mau’umae, Kauna’oa, and Hapuna Bays substituted for the southeast coast of the Japanese held volcanic island.



8. 27. Landing plan for Iwo Jima.

New Visitors in the Park

Hawai‘i’s national park would feel the effects of the war just as did the rest of Hawai‘i. At Kīlauea, the Kau Desert Impact and Training Area still attracted Army units for specialized training. Historian and archaeologist Jadelyn Moniz Nakamura estimates that 25,000 troops used Kīlauea for training during the first half of 1944.¹⁴³ The military was still active as well at Haleakalā, where the US Navy operated a weather station and the Army maintained its radar facility.

Despite these conditions, the primary impact upon both sections of the park during this peak wartime year was the sheer number of visitors, both civilian and military. In January 1944, Kīlauea experienced 8,495 civilian entries and 12,929 military visitors, down slightly from the year before but still high when considering prewar visitor numbers. These numbers remained steady in succeeding months, with 13,494 civilians and 13,815 military in April and 16,241 civilians and 13,911 military in July. Although the number of military travelers spiked in May 1944 to 18,833—compared to 12,305 the same month the previous year—visitor numbers remained relatively steady for much of the year. By September, in fact, while civilian number remained steady, military entries fell by as much as 50 percent over 1943.¹⁴⁴

The story at Haleakalā was different. In January 1944, the remote mountain site had 1,460 visitors, of which 1,235 were military—compared to zero civilians (when the park was closed) and only 635 military visitors in January 1943. February saw an increase to 2,065 for the month, of which 1,750 were in the armed forces. In March, Ranger-in-Charge Hjort noted that the park had “the greatest number of people ever to camp in the crater.”¹⁴⁵ In April, due to the presence of the 4th Marine Division, the entry numbers jumped enormously to 9,097, of which 8,725 were members of the military. Figures dropped the following several months, although an average of about 3,500 members of the armed forces continued to visit the park on a monthly basis. In September, with the return of the 4th Marine Division (as Hjort noted), the entry numbers jumped again to 9,660, of which 9,060 were military.¹⁴⁶

Given the number of visitors, it is not surprising that both sections of the park would experience significantly more problems. In February, rangers at Kīlauea reported a party of missing sailors, later discovered leaving the Makaopuhi Crater. In June, there was a report of a

¹⁴³ Moniz Nakamura, “Up in Arms!” 25.

¹⁴⁴ Superintendent’s Monthly Reports, January, April, May, July, September 1944; and Monthly Travel Report, US Department of the Interior, National Park Service, June 1944, Kīlauea Section, Hawaii National Park, Historic Records, HAVO Archives.

¹⁴⁵ Superintendent’s Monthly Reports, January, February, April, September 1944.

car accident involving a civilian car and an Army vehicle. The same month, a Navy lieutenant fell into Kīlauea Crater from the lookout at Aloha Pali.¹⁴⁷

On June 26, park rangers received reports of gunfire “near Puu Ohale.” The officer in charge at the Hawaii District headquarters in Hilo admitted it must have been some of the district’s men and apologized. Two days earlier, a small party of Army officers forced open the gate to the rest house on Mauna Loa. In July, Ranger Kauhi reported on soldiers shooting at goats in the Hilina Pali area.¹⁴⁸ September’s monthly report included accounts of two cases of “indiscriminate shooting,” one at Kīlauea Iki that endangered a troop of girl scouts; the second involving Navy personnel at the Bird Park that “almost caused the injury of KMC guests.”¹⁴⁹

These types of reports continued through the rest of the year: vandalism of the Mahaopuhi benchmark and on the smooth lava surface of Keanakoi Crater; damage to the Halemaumau shrine; an Army truck clocked at 70 miles per hour; and another traffic accident involving an Army vehicle and civilian car at the entrance to Volcano House.¹⁵⁰ Otherwise, life at the park was relatively tranquil, particularly given the large number of visitors.

Haleakalā, on the other hand, faced a rash of problems—not surprising considering an increase in visitors of as much as 2,000 percent! In January, Ranger-in-Charge Hjort caught two Navy fliers hunting in the park. Their superior officer, “who was very courteous and helpful,” asked that the infraction not go to the provost court since both miscreants were due to leave on a carrier the next day. Shortly afterward, two soldiers, hunting for pigs or goats, were forgiven for having found a stray kid and adopted it as a pet. In July, Hjort discovered a Seabee lieutenant using the Kapalaoa Cabin without a permit. He had also “pulled up a number of pilo and

¹⁴⁶ Superintendent’s Monthly Reports, February 1944; and Monthly Travel Report, US Department of the Interior, National Park Service, June 1944, Haleakala Section, Hawaii National Park, Historic Records, HAVO Archives.

¹⁴⁷ Superintendent’s Monthly Reports, June 1944.

¹⁴⁸ Superintendent’s Monthly Reports, July 1944.

¹⁴⁹ Superintendent’s Monthly Reports, September 1944.

¹⁵⁰ Superintendent’s Monthly Reports, October 1944.

puukaewe bushes for no apparent reason.”¹⁵¹ In August, a lieutenant from the 39th Construction Battalion was reprimanded for unidentified “improper use of the park.”¹⁵²

With the return of the 4th Marine Division, problems multiplied. In October, Hjort stopped three Marine sergeants for illegal possession of guns and hunting in the park; their driver received a citation for speeding and their two female companions “were later released.” As Hjort recorded, “they had thrown away all their pheasants as they fled, but had a box with fresh blood and feathers in it and a .22 ca. rifle.” Soon after four soldiers were apprehended pheasant hunting.¹⁵³ Most were later fined; one got off with a reprimand.

Not all were in trouble for hunting. In November, Hjort turned five servicemen over to the shore patrol for hiking off the trail. In December, a group of marines reported the theft of their truck parked outside the observatory. The truck—a Marine reconnaissance vehicle—was discovered a quarter mile down the road with a broken axle and wheels. Hjort turned the case over to the Marine provost marshal, but the culprit was never found.¹⁵⁴

Despite occasional problems, there were numerous instances of cooperation as well. Park staff members continued to provide educational programs to military personnel at KMC and outside the park; the Mauna Loa eruption film, documenting the recent flow, was particularly in demand. The park arranged for the rebuilding of a bridge on the Fern Jungle Trail “for use by Kilauea Camp visitors on their daily crater tours and others who use this trail.”¹⁵⁵ In addition to twice-weekly lectures at KMC, rangers also gave special interpretive talks when asked.¹⁵⁶

At Haleakalā, Ranger-in-Charge Hjort maintained extremely productive relationships with military authorities. Reflective of this, in March, the Army transferred six surplus mules to

¹⁵¹ Superintendent’s Monthly Reports, July 1944.

¹⁵² Superintendent’s Monthly Reports, August 1944.

¹⁵³ Superintendent’s Monthly Reports, October 1944.

¹⁵⁴ Superintendent’s Monthly Reports, November 1944.

¹⁵⁵ Superintendent’s Monthly Reports, October 1944.

¹⁵⁶ Superintendent’s Monthly Reports, December 1944.

the Park Service for use at the park.¹⁵⁷ In April, Hjort coordinated with several Maui residents to facilitate visits by recuperating flyers—those injured or who had come completed thirty missions—to the summit and crater.¹⁵⁸ In September, Hjort struck an agreement with the Navy prohibiting firearms—including service revolvers—within the park. He and his small crew erected a sign at the entrance reading “No Guns Allowed in the Park.” He also made a special arrangement with officers from the 4th Marine Division for the use of the old rest station on the crater rim as an officers’ club. Men from the division contributed the materials and labor to make the unused cabin available.¹⁵⁹ Opening the following month for limited stays, the officers christened the cabin “The Silversword Club.”¹⁶⁰

The following month, during peak Marine visitation to the park, the Navy and Marines agreed to station military police at the summit each Sunday “to help keep the servicemen in line.”¹⁶¹ Hjort helped as well in November when a Navy reconnaissance plane went missing. While Navy personnel gave up after five days, Hjort made one last effort and hiked six hours to find the wreck. Both pilot and passenger were dead, their bodies burned beyond recognition. Navy personnel were later able to retrieve them. “I was glad to be able to do this for the Navy,” Hjort recorded, “since they have so often helped me in my work here.”¹⁶²

‘Elemākule and the Ka‘ū Desert Revisited

Superintendent Wingate was less pleased with the level of cooperation with the Army, at least at Kīlauea. Although he accepted the Army’s claim to the Elemakule Range and even ordered rangers to assist the Navy in painting bomb targets on the lava surface, he remained

¹⁵⁷ Superintendent’s Monthly Reports, March 1944.

¹⁵⁸ Superintendent’s Monthly Reports, April 1944.

¹⁵⁹ Superintendent’s Monthly Reports, September 1944.

¹⁶⁰ Superintendent’s Monthly Reports, October 1944.

¹⁶¹ Superintendent’s Monthly Reports, October 1944.

¹⁶² Superintendent’s Monthly Reports, November 1944.

uncomfortable about the Kau Desert Impact and Training Area.¹⁶³ Throughout the latter part of 1943, Wingate protested about the use of the area to both the commander of the Hawaii District and NPS regional director O. A. Tomlinson in San Francisco. Tomlinson, in turn, passed the superintendent's concerns onto the director, noting the Army was using NPS property more out of convenience than necessity.¹⁶⁴

On January 30, 1944, Acting Interior Secretary Abe Fortas wrote to the Department of War agreeing that use of the Kau Range (the Elemakule Range) was not in question but protesting the military's use of unauthorized lands within the park (the Kau Desert Impact and Training Area) and asking that the Army withdraw.¹⁶⁵ For the time being, the War Department simply shelved the request or relayed it to "appropriate channels," where the letter languished.

Wingate's protests at a local level continued. In March, he wrote that it had been "necessary to lodge a written complaint with the Army's district commander regarding certain heavy units using the 'Kau Desert Impact and Training Area' on days, when by military order, it was to be open to the public." He also complained of live-fire exercises performed without notification. With Gibson no longer in charge of the Hawaii District, he obliquely confessed his hope for greater cooperation: "Corrective action was taken by District Commander."¹⁶⁶

In June 1944, Regional Director Tomlinson, who held the rank of major in the Army Reserves, traveled by Navy transport ship to Hawai'i to assess the damage directly. In five days on the island of Hawai'i, he inspected roads, facilities, structures, and equipment, making trips to Mauna Loa, Chain of Craters Road, the Hilina Pali, Ainahou Ranch, the Black Sand Beach, and the proposed Kalapana extension. He also traveled by horseback over the "Army maneuver and impact area" in the Ka'u Desert.

¹⁶³ Superintendent's Monthly Reports, November 1944.

¹⁶⁴ Jackson, *Administrative History*, 95.

¹⁶⁵ Jackson, *Administrative History*, 95. Abe Fortes, Acting Secretary of the Interior, to War Department, January 30, 1944, Hawaii National Park, Historic Records, Army Use of Kilauea Kau Bombing Range, 1942-1948, File: 601-04.1.

¹⁶⁶ Superintendent's Monthly Reports, March 1944.

While noting that the superintendent and park staff had done an excellent job protecting the property of the NPS, “roads, trails, buildings, grounds, and other facilities show wear.” He further noted that “Army use of about 10 square miles of Kau Desert for training . . . has caused considerable damage to the natural appearance of the Desert and the Ohia Forest bordering the maneuver and impact areas.” He cited the failure of General Gibson in enforcing earlier agreements, but hoped for a higher level of cooperation from the present Hawaii District commander Colonel Hollis LeR. Muller (b. 1887).¹⁶⁷ Tomlinson’s report was explicit on the extent of damage: “The maneuver and impact areas are literally crisscrossed by tank and truck trails and are covered with numerous bomb craters from aerial bombing. Considerable restoration work will be needed after the war to obliterate tank roads, bomb craters, and to restore as much as possible the former natural appearance as possible.”¹⁶⁸

Later in June, the superintendent, along with Assistant Baldwin and Ranger Medeiros, inspected the boundary of the “Elemākule area, finding all in acceptable condition. “No sign of bombing outside the army bombing area below Hilina Pali were seen,” he recorded.¹⁶⁹ The Navy would continue to use the area intermittently into 1945. It would be nearly half a year, or January 1945, before the Army—following another written protest by the Department of the Interior in November 1944¹⁷⁰—would discontinue use of the Ka’ū Desert area.¹⁷¹

¹⁶⁷ O. A. Tomlinson to Director, NPS, memorandum, July 8, 1944, Record Group 79, Box 158, NARA San Bruno. Wingate saw the impending end of martial law as an opportunity for the NPS to reclaim the impact and training area: Edward G. Wingate to Regional Director, memorandum, September 27, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives. Muller was a well-known artillery officer, author of the standard volume *Mechanism of War* (Washington, DC: The Field Artillery Association, n.d.), and *Technique of Modern Arms* (Harrisburg, PA: Military Service Publishing Company, [1910]). He also wrote about military aviation. Muller would have been in his late fifties at the time of his appointment with the Hawaii District.

¹⁶⁸ O. A. Tomlinson to Director, NPS, memorandum, July 8, 1944, Record Group 79, Box 158, NARA San Bruno. Also, Superintendent’s Monthly Reports, June 1944.

¹⁶⁹ Superintendent’s Monthly Reports, June 1944.

¹⁷⁰ Jackson, *Administrative History*, 96. The correspondence train is as follows: Abe Fortas, Acting Secretary of the Interior, to Henry L. Stimson, Secretary of War, November 14, 1944. Stimson agreed in his reply as well to Fortas: Stimson to the Secretary of the Interior, November 27, 1944, both held at Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives.

¹⁷¹ Jackson, *Administrative History*, 96; and Moniz Nakamura, “Up in Arms!” 29.

New Construction at Red Hill

Of perhaps more long-standing concern was the state of military operations at Haleakalā. Operating on a conditional-use permit signed in April 29, 1941, the Army slowly brought its Aircraft Warning Service Station at Red Hill (Pu‘u ‘Ula‘ula) into use in May 1942.¹⁷² This permit included the occupation of the old CCC camp, a road extension up to the site, and the construction of a tower at the summit. By March 1943, the Army had more or less abandoned the project, leaving the installation in the charge of a few on-site guards.¹⁷³ In January 1944, the superintendent remarked hopefully that “the Air Warning Service is planning to move their equipment out of the park,” noting, however, that with the closures of the service’s offices in Wailuku it appeared that some Army personnel would still be housed at the Pu‘u Nianiau camp.¹⁷⁴

However, two months before, in November 1943, the military had initiated new plans, assuming that it could continue under the old permit—a notion Wingate quickly opposed. Once again, the superintendent’s protests fell on deaf ears, and by April, the Army had begun construction of a new communication center on the site of the former (unsuccessful) radar station. Warned by the superintendent that all unapproved work would be removed by the NPS after the war—at the military’s expense—Army engineers proceeded with their plan of erecting a new brick powerhouse and an operations building on the already-leveled summit of Pu‘u ‘Ula‘ula.¹⁷⁵

The superintendent’s monthly reports closely document the progress of the Army’s work. The first indication was “a spurt of building activity” just outside the park along the ridge toward

¹⁷² Jackson, “Military Use,” 130–31. It was titled “Special Use Permit Authorizing Use of Land in the Hawaii National Park, Territory of Hawaii, by the War Department for National Defense Purposes,” signed April 29, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives.

¹⁷³ Jackson, “Military Use,” 130.

¹⁷⁴ Superintendent’s Monthly Reports, January 1944.

¹⁷⁵ Jackson, “Military Use,” 131.

Ulapalakula, Ranger-in-Charge Hjort reported in March.¹⁷⁶ There was a rumor, Hjort noted further, that the work was to lead into the park and that a brick building was part of the scheme. Sharing the site of the Navy's far less obtrusive weather station—essentially a weather balloon launch area and precipitation-recording device—the Army soon made its intentions evident as the road pushed up to Red Hill and work began on the new installation.¹⁷⁷

Later that month, Assistant to the Superintendent Baldwin traveled to Haleakalā to inspect the site. Soon afterward, Wingate wrote of his having to “[run] around and [attend] conferences caused by the Army moving in and wanting to construct more buildings in the park.”¹⁷⁸ Exchanging communicates with Brigadier General Donald J. Meyers, commanding officer of the Maui District, Wingate reemphasized his concern over developments there.¹⁷⁹ In May, Hjort reported that the “USED”—an acronym designating US Engineer Division, also titled the US Army Corps of Engineers—had been ordered to cease all construction projects on Maui, but added that “the Army is going to complete the construction themselves.”¹⁸⁰ “All of the radio posts are in place at the base camp,” he further reported. “There are so many of them it would be fitting to call the area ‘Haleakala National Forest’.”¹⁸¹

In June, seven African American soldiers moved into the base camp to work on the project. The same month, Regional Director Tomlinson visited the site. Echoing a complaint

¹⁷⁶ Superintendent's Monthly Reports, March 1944.

¹⁷⁷ Superintendent's Monthly Reports, April 1944. He described the work further in memorandums to the superintendent: Frank A. Hjort to Superintendent, memorandum, April 11 and April 29, 1944. Hjort also wrote to the Area Engineer about his concerns: Hjort to Captain Greenwell, April 19, 1944, all held at Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940-61, HALE Archives.

¹⁷⁸ Superintendent's Monthly Reports, April 1944.

¹⁷⁹ Edward G. Wingate to Brigadier General Donald J. Meyers, Commanding Officer, Maui District, April 11, 1944; and Brigadier General Donald J. Meyers, Letter to Edward G. Wingate, April 15, 1944, both in Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940-61, HALE Archives.

¹⁸⁰ Superintendent's Monthly Reports, May 1944. Wingate wrote this month as well to the Army Corps of Engineers about his concerns: Wingate to the United States Engineer Office, April 10, 1944; and Carl E. Rantzow, Major, Corps of Engineers, May 10, 1944, all held at Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940-61, HALE Archives.

issued by Wingate to Assistant Chief of Engineers Brigadier General Wortham, Tomlinson questioned the Army's right to occupy either the weather station area or the former CCC camp and argued that the new installation was not within the bounds of what was accepted three years before. In Honolulu, he discussed the matter with two officers of the Signal Corps, who informed him that the peak of Haleakalā was the optimum site for a radio transmission tower. His conclusion was:

In view of the statement of Signal Corps officials that the Red Hill site is the only satisfactory location of the Island of Maui and that the installation is a vital military requirement, it does not seem that this Service can take any further action at this time. Unfortunately I doubt if it will be possible to have the installation removed after the war since it will continue to remain a "military necessity." However, I recommend that shortly before the original permit expires that the matter be taken up again to see if it would be possible for the Army to use another location outside the Park.¹⁸²

The NPS and the US Department of the Interior took Tomlinson's recommendations seriously. On October 10, Acting Secretary Fortas questioned the military's interest in Haleakalā, pointing to the abandonment of the earlier Aircraft Warning Service Station. Following Tomlinson's lead, he protested the ongoing construction, emphasizing that the permits held by the Army were temporary in nature. A new permit, he pointed out, would be necessary for further work.¹⁸³

¹⁸¹ Superintendent's Monthly Reports, May 1944.

¹⁸² O. A. Tomlinson to Director, NPS, memorandum, July 8, 1944, Record Group 79, Box 158, NARA San Bruno.

¹⁸³ Abe Fortas, Acting Secretary of the Interior, Letter to the Secretary of War, October 10, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940-61, HALE Archives.

On October 24, 1944, Secretary of War Henry L. Stimson (1867–1950) wrote the Secretary of the Interior asking for a new permit. He added, just as Tomlinson had predicted, that it was a “military necessity.”¹⁸⁴ Fortas, in a reply of November 14, noted that a six-month agreement was possible but cautioned that the principal concern was the relative permanency of the buildings at the station. If the Army wished to remain for a longer period, they would have to ask for removal of the Red Hill area from the park—a lengthy process involving congressional action.¹⁸⁵

Remarking on the site in his August, September, and December reports, and complaining of the permanence of the facility—the buildings were ultimately constructed of concrete not brick—Wingate reported to the NPS director that the station was visible from both inside and outside of the crater and “unnecessary in this particular spot.”¹⁸⁶

Notwithstanding Wingate’s objections, the NPS finally signed a new conditional-use permit on April 11, 1945. It was to last for six months but was extended again in 1950, long after the original six-month period had expired, and again through the late 1950s as different military saw the advantage of the site. Eventually, a radar and communication radio station would move to Mt. Ka‘ala on O‘ahu, and the Red Hill installation area would revert to the NPS.¹⁸⁷ Not until the 1960s would the park be free of military uses but even then, there was continuing use of the area near the park, just outside the boundaries at Kolekole peak.¹⁸⁸

¹⁸⁴ Henry L. Stimson, Secretary of War, Letter to the Secretary of the Interior, October 24, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives. Wingate had written to the director of October 16, 1944 outlining his objections. See Wingate to Director, NPS, memorandum, October 16, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives.

¹⁸⁵ Abe Fortas, Acting Secretary of the Interior, Letter to Henry L. Stimson, Secretary of War, November 14, 1944. Stimson agreed in his reply as well to Fortas: Stimson to the Secretary of the Interior, November 27, 1944, both in Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives.

¹⁸⁶ Jackson, “Military Use,” 132; and Edward G. Wingate to Director, NPS, memorandum, December 7, 1944, Hawaii National Park, Historic Records, A7019 National Defense, Area Use, Red Hill, 1940–61, HALE Archives.

¹⁸⁷ Jackson, “Military Use,” 140.



8. 28. US Army photograph, Haleakalā National Park, Accession #HALE-84; G-2; 64-9.

Prisoners of War and Expansion of KMC

Another bone of contention for the NPS was the continual expansion of KMC. The subject of considerable disagreement at the time of its 1936 lease renewal, Superintendent Wingate and other NPS officials never fully accepted KMC. Promises of the Army building a permanent installation between Mauna Kea and Mauna Loa in what would later be the Pōhakuloa Training Area—and even an alternative offered by rancher Herbert Shipman for land outside the park—had been seized upon by the NPS as an alternative to KMC.¹⁸⁹

¹⁸⁸ Jackson, “Military Use,” 134–40.

The war had put a stop to earlier plans. The facility had been subject to periodic expansion and improvement under the military during the war years. However, in September 1944, these began to take on a new dimension, as the Army began to plan yet more new buildings to accommodate the many servicemen and servicewomen on rest leave.¹⁹⁰ Wingate was unhappy with these plans, characterizing them as more in the nature of “artificial recreation” than part of a near wilderness getaway for troops.¹⁹¹ Again, he wrote to Tomlinson about his concerns, suggesting the time was ripe to push for a relocation of the camp altogether. He feared, especially, that a new campaign of building would only further cement the military’s claim to the site.¹⁹²

On October 2, 1944, Tomlinson responded to Wingate that the NPS director was willing to discuss the matter further with the War Department.¹⁹³ To strengthen his argument, he asked Wingate to provide an estimate of the value of property there; Wingate replied immediately with a figure of \$350,000, taking into account fair replacement cost.¹⁹⁴ On October 21, Secretary Fortas wrote to the Secretary of War Stimson requesting that the Army consider another site. He

¹⁸⁹ Jackson, *Administrative History*, 71.

¹⁹⁰ Superintendent’s Monthly Reports, September 1944.

¹⁹¹ Jackson, *Administrative History*, 73.

¹⁹² Jackson, *Administrative History*, 73. Edward G. Wingate to Regional Director, memorandum, September 21, 1944, NPS, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing Range, 1942–1948, File 601-04.1, HAVO Archives.

¹⁹³ O. A. Tomlinson, Director, Region IV, NPS, to Edward G. Wingate, Superintendent, Hawaii National Park, October 2, 1944, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing range, 1942–1948, File 601-04.1, HAVO Archives. See also Jackson, *Administrative History*, 73.

¹⁹⁴ Edward G. Wingate, to O. A. Tomlinson, October 6, 1944, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing range, 1942–1948, File 601-04.1, HAVO Archives. Jackson, *Administrative History*, 73.

emphasized as well that the Army facility was out of keeping with NPS policy and inappropriate for the park.¹⁹⁵

On November 1, 1944, Colonel Muller at the Hawaii District headquarters wrote to the NPS regional director asking for approval of the small number of improvements called for in the September plan. Tomlinson passed the buck to Washington, explaining that these were policy issues that could not be decided at the regional level.¹⁹⁶ At the same time, Wingate asked Muller for records of past projects and was told by the Army that these remained classified.¹⁹⁷

While the debate continued, the Army was in fact adding onto the facility. In late August 1945, fifty POWs arrived at the camp. Housed in temporary buildings at the southeast end of the recreation area's main buildings—the area now used by the motor pool¹⁹⁸—the prisoners were all Koreans, swept up as part of the Allies' slow conquest of the Pacific.¹⁹⁹ Military authorities assigned the KMC group to maintenance work around the camp.

In late spring the following year, additional prisoners, both Koreans and Okinawans, augmented this core group.²⁰⁰ It must have seemed to Wingate that the Army had no plans of leaving soon. Nonetheless, a change in the relationship between the military and the park was clearly on the horizon. Throughout the spring, there had been a gradual lessening of restrictions on the civilian population in Hawai'i: the end of the blackout rules on May 4; a loosening of tire rations, and, finally, on October 24, the official end to martial law.²⁰¹ This shift meant a

¹⁹⁵ Abe Fortas, Acting Secretary of the Interior, to Secretary of War, October 21, 1944, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing range, 1942–1948, File 601-04.1, HAVO Archives; and Jackson, *Administrative History*, 73.

¹⁹⁶ Colonel H. LeR. Muller to Regional Director, National Park Service, November 1, 1944, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing range, 1942–1948, File 601-04.1, HAVO Archives.

¹⁹⁷ Edward G. Wingate to Colonel H. LeR. Muller, Hawaii National Park, Historic Records, Army Use Kilauea Kau Bombing range, 1942–1948, File 601-04.1, HAVO Archives.

¹⁹⁸ A concrete shower floor from the POW facility remains at the site.

¹⁹⁹ Ch'oe Yong-ho, "Korean Prisoners-of-War in Hawaii during World War II and the Case of US Navy Abductions of Three Korean Fishermen, *Asia-Pacific Journal: Japan Focus*, August 24, 2009, accessed February 23, 2012, http://www.japanfocus.org/-Yong_ho-Ch_oe/3266.

²⁰⁰ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*, III-50.

²⁰¹ Green, *Martial Law in Hawaii*, chap. 10.

complete return of government and courts to civil authorities and the reassertion of prewar legal rights and agreements. For Wingate, this meant the park would no longer be subject to seemingly arbitrary decisions by generals and colonels and would be in a position to reassert its traditional and legal rights.

CHAPTER 9: THE WAR'S END

Final Offensives

The American public had reasons for optimism as 1945 came into view. The Empire of Japan was in retreat, abandoning former conquests in Asia and the Pacific, and leaving thousands of troops stranded with no hope of relief. In Europe, Germany was on the defensive, with Allied troops in France and Italy and pressing at the borders of Hitler's state.¹ Following the Battles of Stalingrad and Kursk, the Russians were also advancing upon Germany. By the end of 1944, the last of the minor Axis powers—Romania, Slovakia, Bulgaria, and Hungary—were under Russian control.²

Although the Allies would suffer setbacks in Europe, notably the protracted Battle of the Hürtgen Forest and the surprise counteroffensive known as the Battle of the Bulge, the end was apparent.³ US forces crossed the Rhine in March 1945, Italian leader Benito Mussolini died on April 28, and two days later, Adolph Hitler killed himself and his wife of one day in their Berlin bunker. Germany finally surrendered unconditionally on May 8, 1945.⁴

Japan, despite its many reversals, had demonstrated less willingness to end the war. The Battle of the Leyte Gulf in October 1944—considered the largest naval engagement in history—had decimated what remained of the Japanese Imperial Fleet and opened the door to the Allies' invasion of the Philippines and Formosa (Taiwan).⁵ In October 1944, US troops landed on the

¹ Ted Ballard, *The Rhineland, 15 September 1944–21 March 1945* (Washington, DC: US Army Center of Military History, [1990]); and Robin Neillands, *The Battle for the Rhine* (London: Weidenfeld and Nicolson, 2005).

² John Erickson, *The Road to Berlin: Stalin's War against Germany* (New York: Orion, 2007); and Max Hastings, *Armageddon: The Battle for Germany, 1944–1945* (New York: Vintage, 2005).

³ Patrick Delaforce, *The Battle of the Bulge: Hitler's Final Gamble* (Harlow, England: Pearson Higher Education, 2004); Danny S. Parker, *Battle of the Bulge: Hitler's Ardennes Offensive, 1944–1945* (Tonbridge, England: Combined Books, 1991); Charles Whiting, *The Battle of Hurtgen Forest* (New York: Orion, 1989); and Gerald Astor, *The Bloody Forest: Battle for Huertgen September 1944–January 1945* (San Francisco: Presidio Press, 2000).

⁴ Frank E. Manuel, *Scenes from the End: The Last Days of World War II in Europe* (Hanover, NH: Steerforth Press, 2000).

⁵ Milan N. Vego, *Battle for Leyte, 1944: Allied and Japanese Plans, Preparations, and Execution* (Annapolis, MD: Naval Institute Press, 2006); and William B. Breuer, *Retaking the Philippines: America's Return to Corregidor & Bataan, 1944–1945* (New York: St Martin's Press, 1986).

east coast of Leyte, north of Mindanao and soon advanced on entrenched Japanese troops, cutting them off from support.⁶

In December, the United States began an offensive at Mindoro. Three weeks later, the US Sixth Army landed on the western coast of Luzon, its force of some 175,000 soldiers quickly moving south to retake Clark Field only forty miles northwest of Manila. Two more landings, one at Bataan and a second a parachute drop south of the capital, quickly brought the Americans into the city. By the end of February, Manila and the fortress of Corregidor were in US hands. By mid-April, Mindanao, the last of the major Philippine islands, fell to US and Filipino partisan forces.⁷

Japanese losses were devastating. Of 250,000 Japanese troops in Luzon, over 80 percent died.⁸ Pockets of resistance continued for months. In fact, the last Japanese combatant would finally surrender in March 1974!⁹ As in Saipan, Tinian, and Guam in July 1944 and Peleliu and Angaur, later the previous year, Japanese soldiers had demonstrated an uncanny determination. US planners anticipated continued stiff resistance right to the end.

The Battle of Iwo Jima fulfilled all of the Allied war planners' fears. The very engagement for which the Marines of the 4th and 5th Divisions had been preparing in Hawai'i, Iwo Jima would be one of the costliest conflicts in the war to date. Of the over 70,000 US Marines, Navy corpsmen, and US Army Air Forces personnel participating in the nearly six-week long engagement, 6,821 died and another 19,217 were wounded. Japanese losses were 18,844 killed, 216 taken prisoner, and another 3,000 unaccounted for until many days after the battle.¹⁰

⁶ Robert Ross Smith, *Triumph in the Philippines: The War in the Pacific* (Honolulu: University Press of the Pacific, 2005).

⁷ Bernard Norling, *The Intrepid Guerrillas of North Luzon* (Louisville: University Press of Kentucky, 2005).

⁸ Lisa Brooks and Elizabeth Stanley, eds., *Creating Military Power: The Sources of Military Effectiveness* (Palo Alto, CA: Stanford University Press, 2007), 41.

⁹ David Powers, "Japan: No Surrender in World War II," BBC, History, February 17, 2011, accessed October 12, 2012, http://www.bbc.co.uk/history/worldwars/wwtwo/japan_no_surrender_01.shtml.

¹⁰ About 1000 eventually became prisoners of war. Many of the other remaining troops either died of their wounds or committed suicide. See Eric Hammel, *Iwo Jima: Portrait of a Battle: United States Marines at War in the Pacific* (St. Paul, MN: Zenith Press, 2006); Richard F. Newcomb and Harry Schmidt, *Iwo Jima* (1965; repr., New York: Owl Books, 2002); and Richard Wheeler, *Iwo* (1980; repr., Annapolis, MD: Naval Institute Press, 1994).

A proposed staging area for attacks against the Japanese homeland, Iwo Jima is a dry, volcanic island with steep peaks and harsh, sandy, and rocky coasts.¹¹ Its highest peak is Mount Suribachi, later famous as the site of the celebrated Marine post-assault flag raising.¹² It rises only to 528 feet (161 meters) but dominates the surrounding slopes of the exposed and stony landscape. Iwo Jima had been a minor prefect of Tokyo with only a small population before the war—about 1,000 people, most engaged in sulfur mining, fishing, and sugar production.¹³ The total area of the island is eight square miles. It hosted an airfield and small garrison, which the Japanese leaders only expanded just before the American attack.



9. 1 US Marines at Iwo Jima.

¹¹ John M. Patrick, "Iwo Jima—Sulphur Island," *US Naval Institute Proceedings*, 76, no. 9 (September 1950): 1028–29.

¹² James Brady and Ron Powers, *Flags of Our Fathers* (New York: Bantam, 2001); and Hal Buell, *Uncommon Valor, Common Virtue: Iwo Jima and the Photograph that Captured America* (New York: Penguin, 2006).

¹³ "Iwo Jima, Japan," *Encyclopedia Britannica* online, 2014, accessed February 12, 2014, <http://www.britannica.com/EBchecked/topic/298379/Iwo-Jima>.

Located only 750 miles (about 1,200 kilometers) from Tokyo, Iwo Jima should have been a perfect site for long-range bomb attacks. However, military logistics dictated that Tinian would become the more important base for air attacks and that Iwo Jima would serve only as an emergency site for bombers once they had completed their missions. A total of 2,400 B-29 landings took place there between March and August 1945.¹⁴ Plans for the Navy to use the island as a fleet base never actualized.

The Battle of Iwo Jima stood out for its savagery.¹⁵ It was the only battle where American casualties surpassed Japanese. Over one-fourth of all the Medals of Honor awarded to Marines in World War II were given in recognition of heroism at Iwo Jima.¹⁶ Every enemy position was a challenge; snipers harassed movements on the ground, and Japanese soldiers resisted until they could do no more. One veteran of the battle remembers another man jumping into his foxhole and exclaiming, “It wasn’t like this on Bougainville.”¹⁷ Iwo Jima demonstrated that the war was far from over.

Okinawa would prove hardly better for the Allied forces. Involving the 1st and 6th Marine Divisions—units that trained and periodically rested in Australia and the continental United States as well as numerous Pacific islands—and four US Army divisions (including the 27th Infantry that had come to Hawai‘i on March of 1942 as part of the defense of the islands), the American force totaled over 183,000 in the initial assault. Marine and Army divisions, including

¹⁴ Timothy Lundberg, “Remembering Iwo Jima and Its Importance to Strategic Airpower,” *Pacific Air Forces* online, US Air Force, the Official Website of PACAF, March 6, 2010, accessed October 12, 2013, <http://www.pacaf.af.mil/news/story.asp?id=123193146>.

¹⁵ Derrick Wright, *The Battle of Iwo Jima, 1945* (1999; repr., Stroud: Sutton Publishing, 2007).

¹⁶ Recounted in Gary W. Toyn, *The Quiet Hero: The Untold Medal of Honor Story of George E. Wahlen at the Battle for Iwo Jima* (Clearfield, UT: American Legacy Media, 2006); John K. Wells, *Give Me Fifty Marines Not Afraid to Die: Iwo Jima* (Abilene, TX: Quality Publications, 1965); Richard Wheeler, *The Bloody Battle for Suribachi* (Annapolis, MD: Naval Institute Press, 1965); and Chester Hearn, *Sorties into Hell: The Hidden War on Chichi Jima* (Westport, CT: Praeger Publishers, 2003).

¹⁷ C. Peter Chen, “Battle of Iwo Jima, 19 Feb 1945–26 Mar 1945,” World War II Data Base, accessed October 1, 2012, http://ww2db.com/battle_spec.php?battle_id=12.

the 2nd Marine Division, which was held in reserve, later joined these troops. British, Australian, New Zealand, and Canadian ships and personnel also supported the action.¹⁸

As at Iwo Jima, the Japanese defenders were tenacious. The engagement began on April 1 and lasted until nearly the end of June. US losses were 12,000 killed in action and another 38,000 wounded. (Allied deaths generally totaled more than 14,000.) Japanese defensive forces included 120,000 troops and 40,000 civilians pressed into service. Of these, nearly 80,000 soldiers died in action or committed suicide and somewhere between 42,000 and 150,000 civilians died. Only 7,000 Japanese military personnel surrendered.¹⁹

Involving both naval and air assaults, the Battle of Okinawa became famous for both *kamikaze* air attacks and water- and land-based suicide missions. Japanese defensive positions spread across the island and proved resistant to successive American assaults.²⁰ Using pillboxes, caves, elevated positions, and even ancient fortifications, Japanese defenders reinforced one another as dug-in units strategically abandoned old positions and established new fronts.²¹ Fighting in an urban environment, American soldiers and marines encountered civilian resistance, resulting in further loss of life. It was a conflict “straight out of hell,” one Okinawan survivor recalled. “There was no other way to describe it.”²²

Okinawa gave Allied planners a presentiment of the long-anticipated invasion of Japan. It was evident that both American and other combatants and the Japanese—both civilians and the military—were going to suffer many more casualties before the war's conclusion. The United

¹⁸ Roy Edgar Appleman, James M. Burns, Russel A. Gugeler, and John Stevens, *Okinawa: The Last Battle* (Washington, DC: US Army Center of Military History, 1948); and George Feifer, *The Battle of Okinawa: The Blood and the Bomb* (Guildford, CT: The Lyons Press, 2001).

¹⁹ Rudy R. Frame, Jr., “Okinawa: The Final Great Battle of World War II, An American Triumph through Bloodshed,” *Marine Corps Gazette* (online) 96, no. 11, accessed September 12, 2012, <http://www.mca-marines.org/gazette/article/okinawa-final-great-battle-world-war-ii>.

²⁰ James H. Hallas, *Killing Ground on Okinawa: The Battle for Sugar Loaf Hill* (Lincoln, NE: Potomac Books, 2006); Charles Sidney Nichols and Henry I. Shaw, Jr., *Okinawa: Victory in the Pacific* (Nashville, TN: Battery Press, 1989); and Gordon Rottman, *Okinawa 1945: The Last Battle* (Bodley, Oxford: Osprey Publishing, 2002).

²¹ Bill Sloan, *The Ultimate Battle: Okinawa 1945—The Last Epic Struggle of World War II* (New York: Simon & Schuster, 2007).

States' only apparent strategy was to build more ships, airplanes, and arms and provide the training and expertise necessary to complete the task ahead.

Entertaining the Troops

The final months of 1944 and the beginning of 1945 were the peak period of military buildup in the territory of Hawaii. With plans mounting for an offensive against the Japanese homeland, military construction remained at a high level of output, now undertaken by various service units in addition to the US Army Corps of Engineers. By June 1945, troop numbers would in fact reach an all-time high of 253,000 for O'ahu alone. As of December 1944, the Navy's personnel numbers reached 137,000, although this figure dropped by 25 percent in spring 1945 when Admiral Nimitz's headquarters shifted to Guam to be closer to the unfolding Pacific campaign.²³

Again, Camps Tarawa and Maui filled following the bloody Iwo Jima engagement and upon the return to Maui and Hawai'i of the 4th and 5th Marine Divisions. Down to a total of "only" 22,000 Marines in Hawai'i due to battle losses as of February 1945, by early April, Marine numbers grew to 62,000 as the two divisions and other units, including Marine Airmen, swelled with replacements. Many of the returning men remained, however, in poor condition and treated the return to the islands as a chance to rest. Nonetheless, by August 1945, the US Marine Corps was on the mend and the total number of marines would reach a high of 116,000.²⁴

The Marines were not alone. Both the Navy and Army continued growing their personnel numbers and increasing their land and property holdings throughout the last months

²² The survivor was seven-year-old Higo Tomiko. Her recollections are cited in John Prados, "Battle of Okinawa," History.com, A&E Television Networks, LLC, accessed July 12, 2012, <http://www.history.com/topics/battle-of-okinawa>.

²³ Allen, *Hawaii's War Years*, 231–32; Dave Lotz, "Profiles of Officers in Command: Admiral Chester W. Nimitz," *Liberation—Guam Remembers*, A Golden Salute for the 50th Anniversary of the Liberation of Guam, accessed December 1, 2013, http://www.nps.gov/history/history/online_books/npswapa/extContent/Lib/liberation22.htm.

²⁴ Allen, *Hawaii's War Years*, 232; and Caroline Tyson, *A Chronology of the United States Marine Corps, 1935–1946*, Vol. 2 (1965; Washington, DC, Department of the Navy, Headquarters, US Marine Corps, 1977), 103–7.

of 1944 and first part of 1945. However, some properties, including 878 public schools, reverted back to prewar use; only about a dozen—those used as hospitals, including Wahiawa, Farrington, Hulē'ia (on Kaua'i), Makawao (on Maui), and Mountain View and Waimea (on Hawai'i)—remained in military hands.²⁵ The US Army Corps of Engineers finally left Punahou, having paid rent in arrears, in June 1945.²⁶ Although price controls remained in place—the civil authorities would finally lift them in June 1946—most businesses in the territory were prospering. To prevent competition for space, the government set rental limits on commercial real estate.²⁷

The military continued adding to its facilities well into 1945. By the end of 1944, there were 50 sizable Army installations and 26 Navy facilities on O'ahu alone.²⁸ The Army Engineers had an additional 18 base yards. In autumn 1944, the Navy took over 1,189 acres at Iroquois Point near Pearl Harbor for additional wartime development. The military also acquired more property at Hālawa, Waiawa, Mānana, and 'Aiea. During the same period, the Navy expanded Pearl Harbor's capacity exponentially. By the end of 1944, there were an average of 450 ships in the harbor each month, many returning from engagements in the central Pacific; others there for repairs and refitting.²⁹

With the end of martial law in October 1944, some aspects of life returned to normal— notwithstanding the large number of service personnel still on the islands. The military began, for one, providing more activities for soldiers, sailors, and marines in Hawai'i. By early 1945, the

²⁵ Allen, *Hawaii's War Years*, 395. See Wahiawa Elementary School, "A Brief History of Wahiawa Elementary School," 2009, accessed December 1, 2013, <http://wes.k12.hi.us/WES%20Info/schoolinfo.html>; "Hawaii Territorial Guard," *Densho Encyclopedia*, September 8, 2013, accessed December 1, 2013, <http://encyclopedia.densho.org/Hawaii%20Territorial%20Guard>; Peter T. Young, "Mauna'olu Seminary—Makawao, Maui," *Ho'okuleana* (blog), July 7, 2012, accessed November 1, 2013, <http://totakeresponsibility.blogspot.com/2012/07/maunaolu-seminary-makawao-maui.html>; "Unit Histories," WW2 Military Hospitals, December 2, 2006, accessed December 12, 2012, http://med-dept.com/unit_histories/; and Bryson, "Waimea Remembers Camp Tarawa."

²⁶ Dodge, *Punahou*; and Allen, *Hawaii's War Years*, 253–54, 257, 441.

²⁷ Green, *Martial Law in Hawaii*, chap. 17; and Allen, *Hawaii's War Years*, 364. This was also lifted in 1946.

²⁸ Allen, *Hawaii's War Years*, 235; and Jones, *Hawai'i's World War II Military Sites*.

²⁹ Allen, *Hawaii's War Years*, 237. For more details, see Stanley Tochiki, "The Economic Impact of Pearl Harbor Naval Shipyard," in Vance, *Pearl Harbor Naval Shipyard*, 35–39.

Army's Library Service had created 500 portable libraries and 57 libraries on various bases.³⁰ The number of chaplains also increased, from 27 at the war's outbreak to 150 by the end of 1944.³¹ The USO expanded its work, creating larger and more-attractive locations throughout the islands; Kaua'i by 1945 had five clubs, one for nearly all its installations.³²

The private sector and church groups also provided entertainment: Waikiki's Kuhio Theatre, with its 950-seat capacity, finally opened in June 1945 after nearly four years of use as a storage facility.³³ Although legalized prostitution ended in October 1944, there were still plenty of bars, amusement arcades, and tattoo parlors to relieve soldiers and sailors of their paychecks.³⁴ Men and women on liberty or leave could also rent bicycles from the Hawaiian Mission and Seventh-Day Adventists.³⁵



9. 2. Waikiki Theatre. Designed by architect C. W. Dickey in 1934, the Waikiki was noteworthy for its atmospheric interior. Palm trees lined the auditorium and light effects mimicked the tropical sunset.

³⁰ Allen, *Hawaii's War Years*, 271.

³¹ Allen, *Hawaii's War Years*, 273. See "Combat Chaplains," Military Courses Online, United States History, accessed October 3, 2012, <http://www.u-s-history.com/pages/h1718.html>.

³² Allen, *Hawaii's War Years*, 276. See also Joseph Andrew Lee, "Hawaii USO Centers Forged Tradition of Lofting Troop Spirits during WWII," USO, online resource, December 7, 2011, accessed October 2, 2013, <http://www.uso.org/hawaiian-usos-world-war-ii-history/>.

³³ Angell, *Theatres of Hawai'i*, 117–25.

³⁴ Brown, *Hawaii Goes to War*. For a good personal account, see Alvin B. Kernan, *Crossing the Line: A Bluejacket's Odyssey in World War II* (New Haven, CT: Yale University Press, 2008), 46–47.

³⁵ Allen, *Hawaii's War Years*, 273.

The Hawaii National Park's two sections at Haleakalā and Kīlauea also continued attracting both civilian and military visitors. In January 1945, the Kīlauea section registered 12,167 civilian and 13,274 military visitors, compared to 8,495 and 12,927 respectively, for the same month the previous year.³⁶ Haleakalā witnessed a drop in numbers due, as Ranger-in-Charge Hjort explained, to the departure of the Marines.³⁷ With a decrease in the overall number of visitors in the spring, the number of entries shot up again by June to 22,700 at Kīlauea and 4,435 at Haleakalā.³⁸ Although low compared to the previous year—Ranger Hjort surmised that the Marines were short of transportation and many of the men were in poor condition³⁹—the park was clearly a popular venue and one many service personnel in particular valued.

Although suffering ongoing staffing shortages, the park's rangers continued to reach out to both military and nonmilitary audiences. In January 1945, Ranger Gunnar O. Fagerlund on an inspection tour of Haleakalā showed volcano films to 150 military patients at the Makawao Hospital. Ranger-in-Charge Hjort traveled to the Marine camp at Ha'ikū and to Puunene Naval Air Station for additional showings.⁴⁰ The following month included the usual twice-weekly talks at KMC and at the park lecture hall.⁴¹ Rangers also gave presentations to military and civilian visitors at the Volcano Observatory and Naturalist Building, which had returned to the park's possession. In March, park interpreters recorded 15 "auto caravan" trips, 9 hiking trips, 9 lectures at KMC, 12 at the museum, and 3 outside the park for a total of 2,100 persons. A total of 539 military visitors at KMC also benefited from informal talks.⁴²

³⁶ Superintendent's Monthly Reports, January 1945; and Monthly Travel Report, United States Department of the Interior, National Park Service, January 1945, Kilauea Section, Haleakala Section, Hawaii National Park, Historic Records, Record Group 79, Box 158, NARA San Bruno.

³⁷ Superintendent's Monthly Reports, January 1945.

³⁸ Superintendent's Monthly Reports, June 1945.

³⁹ Superintendent's Monthly Reports, April 1945; and Monthly Travel Report, United States Department of the Interior, National Park Service, April 1945, Kilauea Section, Haleakala Section, Hawaii National Park, Historic Records, Record Group 79, Box 158, NARA San Bruno.

⁴⁰ Superintendent's Monthly Reports, January 1945.

⁴¹ Superintendent's Monthly Reports, February 1945.

⁴² Superintendent's Monthly Reports, March 1945.



9. 3. Seventeen-year-old Ed McFadden and a friend on liberty in Honolulu, 1945. McFadden served on the USS *Colorado* during the Battle of Okinawa.

Superintendent Wingate recognized the burden on the park. In June 1945, he explained to the NPS director, “present use of both sections of the park is heavy and more intensive, due to the presence of scores of thousands of armed forces personnel, as at any time before the war.” With only sixteen employees, he continued, “we are failing miserably in what is a great opportunity to give these service visitors an even reasonable appreciation of this park, or derive full benefit of the opportunity afforded them by their brief rest periods in the islands.” KMC, he

noted sourly, had five times the budget and not nearly a fraction of the responsibility of that assumed by the park.⁴³



9. 4. While Hawai'i developed a reputation for bawdiness, emphasized increasingly in studies of the islands during the war, most military visitors were well-behaved. Sailors, soldiers, and marines all patronized the islands' libraries during their stays.

Continuing Disputes over Military Use

Accompanying the large numbers of military visitors was the inevitable list of problems and infractions. In January 1945, Ranger-in-Charge Hjort reported the arrest of five Navy men caught “shooting in the crater, walking off trails, and breaking into Kapaloa Cabin.”⁴⁴ In March, he apprehended another Navy man for “having a gun in the park.”⁴⁵ In May, there was the case of yet another Navy man found with “freshly picked silversword in his hand.”⁴⁶ Soon afterward,

⁴³ Superintendent's Monthly Reports, June 1945.

⁴⁴ Superintendent's Monthly Reports, January 1945.

⁴⁵ Superintendent's Monthly Reports, March 1945.

officials cited the driver of a Navy truck for forcing a park vehicle off the road.⁴⁷ The Navy shore patrol offered to help at the park in March. For the next several months there was a regular contingent of Navy police each Sunday—the busiest time—at the Haleakalā section.⁴⁸

There were more problems involving the use of training areas as well. In January, Superintendent Wingate complained to Admiral Nimitz about a new “practice bombing target” near ‘Āpua Point.⁴⁹ Ranger Baldwin and a Lieutenant Stamp from the Hawaii District headquarters investigated and found unexploded bombs.⁵⁰ The Navy, replying in February, sent a copy of the “Order of Withdrawal” of December 3, 1940, and denied that there had been any activity outside the designated area but also said that it would insist that its pilots and navigators be more careful in the future.⁵¹ That same month, Paul Baldwin, serving as acting superintendent in the absence of Wingate, reported on the discovery of ammunition and guns at a crashed plane site in the park. He also noted that there was a directive to NPS staff members to “refrain from touching duds and to report them.”⁵²

In late March, another incident occurred when a single Navy aircraft nearly killed a group of Hawaiian fishermen—Elia Hookaulana and his sons Paul and Samuel and their friend Joseph Kealoha—in their boat near ‘Āpua Point.⁵³ Stone fragments caused by the machine-gun fire injured both Elia and Samuel. Another Kalapana resident complained that the shoreline was the frequent target of both bombing and strafing; bags of sand and cylindrical metal objects still littered the coast.⁵⁴ Finally, Ranger Medeiros reported an airplane strafing near ‘Āpua Point on

⁴⁶ Superintendent's Monthly Reports, May 1945.

⁴⁷ Superintendent's Monthly Reports, June 1945.

⁴⁸ Superintendent's Monthly Reports, March 1945.

⁴⁹ Edward G. Wingate, Superintendent, to Admiral Chester W. Nimitz, January 11, 1945, Record Group 79, Box 158, NARA San Bruno.

⁵⁰ Superintendent's Monthly Reports, January 1945.

⁵¹ Commander Air Force, Pacific Fleet (F.W. McMahon, Chief of Staff), to Commander Carrier Aircraft Service, unit Thirty-One, memorandum, February 7, 1945, Record Group 79, Box 25, NARA San Bruno. Admiral Nimitz had also written to Wingate on January 21, 1945, saying that someone would look into the problem; Nimitz, to Wingate, January 21, 1945, Record Group 79, Box 25, NARA San Bruno.

⁵² Superintendent's Monthly Reports, February 1945.

⁵³ Superintendent's Monthly Reports, March 1945. See Moniz Nakamura, “Up in Arms!” 29.

⁵⁴ Superintendent's Monthly Reports, March and April 1945; and Jackson, “Bombs in a National Park,” 103.

March 25.⁵⁵ Wingate explained in a letter to Colonel Muller that the areas in question were within the park boundaries and that fishing rights were “reserved exclusively for the Hawaiian people.” Recognizing that this was not an Army plane, he nonetheless wanted the Hawaii District be aware of the problem and do what it could to help.⁵⁶

The problem was far from over, however. In April, then Chief Ranger Fagerlund reported that Navy planes from the Hilo Naval Air Station had strafed the park’s coastline.⁵⁷ In May, Fagerlund pointed out that the Navy had “inadvertently painted a bombing target on the flat near the shore in Kaaha, about a mile outside the bombing range.”⁵⁸ The Navy quickly took steps to remove the target, but the issue of Navy practice bombing remained a constant concern through the rest of the year.

As things were heating up with the Navy, Wingate chose to return to the problem of the Kau Desert Impact and Training Area. Withdrawn from Army use in January 1945, by which time Army units were down to a single day a month, Wingate was concerned especially with the cumulative destruction. He also wanted to know if the Army was going to pay for the damages. At no time, Wingate emphasized in a letter to the Hawaii District headquarters “was permission requested to make use of park land for these activities.” Even with the end of regular exercises, the Army continued, he complained, to post “Firing Notices” within the park.⁵⁹

The main period of use, Wingate explained, was from February 1943 through October 1944. Most of the training involved tanks, tank destroyers, and artillery. However, there was also “considerable small arms use.” The principal damage was to the wild goose (*nēnē*) nesting sites and cumulative damage to the park’s paved roads, which had not been built to withstand the

⁵⁵ Jackson, *Administrative History*, 91; and Moniz Nakamura, “Up in Arms!” 29.

⁵⁶ Edward G. Wingate, Superintendent, to Colonel H. LeR. Muller, Commanding, Hawaii District, April 3, 1945. See also Gunnar O. Fagerlund to Superintendent, memorandum, April 3, 1945, both in Record Group 79, Box 25, NARA San Bruno.

⁵⁷ Superintendent’s Monthly Reports, April 1945.

⁵⁸ Superintendent’s Monthly Reports, May 1945.

⁵⁹ Edward G. Wingate to Major L. W. Bryan, Headquarters, Hawaii District, April 7, 1945, Record Group 79, Box 158, NARA San Bruno.

level and weight of traffic introduced by the Army.⁶⁰ He complained of the desert area being “churned up by vehicles” and the overall assault on vegetation. He estimated that cleanup would require as many as 1,500 “man days” not including the time and money required to repair seven miles of surfaced roads.⁶¹ Wingate passed these estimates onto the NPS regional director in July, following a June request from O. L. Tomlinson for an approximation of repair costs. The superintendent’s assistant, Paul Baldwin, added repair and maintenance cost for trails as well.⁶²

The NPS also faced new challenges at Haleakalā. In March, Ranger-in-Charge Hjort reported that personnel from the Army’s “interisland radio telephone and teletype station” at Red Hill had installed a new system of clearance lights for aircraft. Mounted atop red-painted antenna poles, the new feature caused a stir within the Maui community, including an article in the *Maui News*.⁶³ Hjort complained that the poles “certainly do not add to the scenic value of the Park.” He further reported that “rumors are again on the loose that the base camp at Pu‘u Nianiau is to be enlarged to accommodate more technical personnel.” The Navy, he pointed out, was also sending men to the station.⁶⁴

In April, the superintendent received word from Hjort that he was looking further into the Army’s new efforts at Haleakalā.⁶⁵ In the meantime, Wingate allowed for the signing of a revised special-use permit for “the duration [of the war] and six months” for the new “communication station.”⁶⁶ Ranger-in-Charge Hjort’s report in June summarized the work to date. He explained that the Pukaoao Observatory, a building constructed by the Navy but for several years used by the Army, was clear of radio equipment. The Red Hill station, however,

⁶⁰ He also wrote in his end-of-year report of the need for succession studies and an investigation of invasive plant damage. See Superintendent’s Annual Report to the Director. NPS, for the Fiscal Year 1945, June 1945, HAVO Archives.

⁶¹ Wingate to Bryan, April 7, 1945.

⁶² Paul W. Baldwin, Assistant to the Superintendent, to Regional Director, memorandum, July 14, 1945, , Record Group 79, Box 25, NARA San Bruno.

⁶³ Frank J. Hjort to Superintendent, memorandum, March 6, 1945, Superintendent’s Monthly Reports, February 1945.

⁶⁴ Hjort to Superintendent, March 6, 1945.

⁶⁵ Superintendent’s Monthly Reports, April 1945.

⁶⁶ Jackson, “Military Uses,” 132.

was in full operation, as was a second station on Kolekole peak. Staff for both installations remained at the base camp at Pu'u Nianiau.

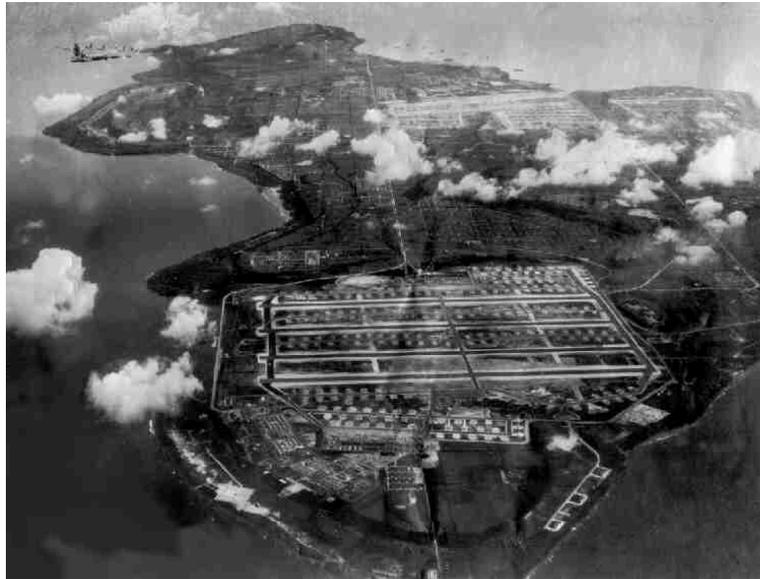
Hjort stated that Red Hill remained an integral part of the Haleakalā Crater and that future uses of the area for Army purposes would be unacceptable. Hjort suggested to his superior that the NPS might consider a trade of the Pu'u Nianiau camp area in exchange for the Army's withdrawal from Red Hill. His fear was that the Army would invest too much to ever leave the park and that, while the permit was of limited duration, the Army probably saw it otherwise.⁶⁷ Ultimately, he was not proven wrong.

Japan's Surrender

In the early morning of August 6, 1945, a single B-29 bomber departed North Field, Tinian, on a bombing mission aimed at Japan. The plane was the *Enola Gay*, which carried "Little Boy," the barely tested atomic bomb, under development for nearly six years as part of the highly secret Manhattan Project.⁶⁸ Joined by two other planes over Iwo Jima, the *Enola Gay*'s captain steered a course to the primary objective of Hiroshima. At 8:09 a.m., Captain Paul W. Tibbits, Jr. (1915–2007) handed control over to bombardier Major Thomas Ferebee (1918–2000), who released the 9,700-pound bomb at the prearranged time of 8:15 a.m.⁶⁹

⁶⁷ Frank J. Hjort, Ranger-in-Charge, to Superintendent, memorandum, June 19, 1945, Superintendent's Monthly Reports, June 1945. See also Jackson, "Military Uses," 132.

⁶⁸ Arthur Compton, *Atomic Quest* (New York: Oxford University Press, 1956); and Vincent Jones, *Manhattan: The Army and the Atomic Bomb* (Washington, DC: US Army Center of Military History, 1985).



9. 5. US Airfield, Tinian, 1945. Bombardment of mainland Japan was unrelenting after construction of North field, between August 1944 and May 1945.

Forty-three seconds later, the world's first nuclear weapon destroyed the previously little-damaged Japanese city of Hiroshima, ultimately killing an estimated 166,000 out of a population of 340,000.⁷⁰ Three days later, on August 9, the United States dropped a second bomb, known as "Fat Man," on the secondary target of Nagasaki. Officials later estimated deaths there at between 60,000 and 80,000.⁷¹

⁶⁹ The literature is extensive. Two good overviews are F. J. Bradley, *No Strategic Targets Left* (Paducah, KY: Turner Publishing, 1999); and Michael D. Gordin, *Five Days in August: How World War II Became a Nuclear War* (Princeton, NJ: Princeton University Press, 2007).

⁷⁰ Eisei Ishikawa and David L. Swain, *Hiroshima and Nagasaki: The Physical, Medical, and Social Effects of the Atomic Bombings* (1955; repr., New York: Basic Books, 1981); Andrew J. Rotter, *Hiroshima: The World's Bomb* (London: Oxford University Press, 2008); Andrew Langley, *Hiroshima and Nagasaki: The Bomb from the Sky*, Snapshots in History Series (Mankato, MN: Capstone Publishers, 2006); and Robert Jay Lifton, *Death in Life: Survivors of Hiroshima* (Chapel Hill: University of North Carolina Press, 1991).

⁷¹ The decision to use the bomb remains a topic of controversy. See Ronald Takaki, *Hiroshima: Why America Dropped the Atomic Bomb* (New York: Little Brown, 1995); Gar Alperovitz, *The Decision to Use the Atomic Bomb*, rev. ed. (New York: Vintage, 1996); and J. Samuel Walker, *Prompt and Utter Destruction: Truman and the Use of Atomic Bombs against Japan* (Chapel Hill: University of North Carolina Press, 1997).

During the course of the American bomb attacks, the Russians broke their nonaggression pact with Japan. On August 9, Soviet troops invaded Japanese-held Manchuria, quickly defeating the Japanese *Kantōgun* (Kwantung Army). The possibility of future bomb attacks and the threat of a Russian invasion of Japan's northernmost island Hokkaidō prompted the Japanese leadership to accept defeat. On August 15 (August 14 in the United States), the Japanese government surrendered unconditionally.⁷² A Japanese delegation led by minister Mamoru Shigemitsu (1887–1957) and military leader Yoshijiro Umezu (882–1949) signed the formal Instrument of Surrender on the deck of the battleship USS *Missouri* on September 2, 1945. General Douglas MacArthur, as Supreme Commander of the Allied Powers, presided.⁷³ Japan was officially occupied and the Pacific War was ended.

People in Hawai'i were jubilant. Unlike VE Day (Victory Europe Day), which Hawai'i's residents met with little excitement, VJ (Victory over Japan) Day was a time of open celebration.⁷⁴ Fireworks, blasting car horns, and the sounds of gas alarm gongs and sirens interrupted the afternoon, as soldiers, sailors, marines, and civilians streamed into the streets or ran to neighbors' houses. Some marked the occasion at churches, others poured into bars. Both businesses and government offices closed spontaneously.⁷⁵ A sense of festive relief continued through the month. The residents of Honolulu held a VJ Day parade on Labor Day, September 3, with over 130,000 in attendance.⁷⁶

⁷² The Japanese actually consider the day of surrender to be the day of their submission, or August 14, which is still the anniversary of the war's end in Japan. See Thomas Hamilton, *Japan's Longest Day* ([New York]: Kodansha America, 1981).

⁷³ This title changed to the Supreme Commander for Allied Powers (SCAP) shortly afterward as MacArthur took control of the occupation. See "Formal Surrender of Japan, 2 September 1945, Selected and Miscellaneous Views," Naval History and Heritage Command, Online Library of Selected Images: EVENTS, World War II in the Pacific, accessed July 12, 2012, <http://www.history.navy.mil/photos/events/wwii-pac/japansur/js-8.htm>.

⁷⁴ Superintendent Wingate discussed the lack of excitement on VE Day: "V.E. Day was observed quietly throughout the Territory though there were some informal celebrations" (Superintendent's Monthly Reports, May 1945).

⁷⁵ Brown, *Hawaii Goes to War*, 148.



9. 6. Surrender Ceremony on deck of the USS *Missouri*, September 2, 1945 (September 1 in Hawai'i).

Within days, service personnel shipped out either to Japan or the mainland. Remaining air-raid shelters—most long closed—were burned and bulldozed. By October, there were sales of Army and Navy surplus, including cars, Quonset huts, and barracks. O'ahu alone had over 400 sales, many to outside buyers.⁷⁷ The Office of the Censor closed, as did most other wartime offices and agencies. Civilians finally turned in their long-unused gas masks and greeted the end of rationing.⁷⁸

⁷⁶ "Hawai'i Timeline, Life in Hawai'i," HawaiiHistory.org, 2014, accessed February 1, 2014, <http://www.hawaiihistory.org/index.cfm?fuseaction=ig.page&year=1945>.

⁷⁷ Allen, *Hawaii's War Years*, 407.

⁷⁸ See for a personal account Virginia E. Cowart, *Gas Masks and Palm Trees: My Wartime Hawaii* (Bloomington, IN: Trafford Publishing, 2006).



9. 7. VJ Day in Honolulu, September 3, 1945.

Interned Japanese Americans began returning to the islands as early as January 1945. A few came back a little earlier, in late 1944.⁷⁹ By December, the military closed Honouliuli camp, which by mid-1945 had become a prisoner-of-war facility for Italians, Germans, and Koreans, the latter swept up in Gilbert and Marshall Islands Campaign.⁸⁰ Interned AJAs could finally return to their homes, as could repatriated prisoners of war.

Beginning in late 1945, the first of the Japanese American soldiers returned to Hawai'i. One group of the 442nd arrived in December, a second in January 1946.⁸¹ Their parade would wait until August 9, 1946, when Honolulu residents finally welcomed their own back.⁸²

⁷⁹ J. J. and P. P. "The Internment of Japanese-Americans during World War II," accessed February 12, 2014, <http://www.richeast.org/htwm/Japanese/Japanese.html>. The first internees were released on December 17, 1944. For the Hawai'i story see Yasutaro Soga, *Life behind Barbed Wire: The World War II Internment Memoirs of a Hawai'i Issei* (Honolulu: University of Hawai'i Press, 2007); and Gail Honda, ed. *Family Torn Apart: The Internment Story of the Otokichi Muin Ozaki Family* (Honolulu: University of Hawai'i Press, 2012).

⁸⁰ Stacey Hirose, "Honouliuli," in Niiya, ed., *Japanese American History: an A-to-Z Reference from 1868 to the Present*, 162–63; Gary Y. Okihiro, *Encyclopedia of Japanese American Internment* (New York: ABC-CLIO, 2013), 242–43; and Burton and Farrell, *Jigoku-Dani*, 13–15.

⁸¹ Chaplain Higuchi Wartime Correspondence, Japanese American Veterans Collection, Digital Resources, University of Hawai'i at Mānoa Library, Archives and Manuscripts, accessed February 1, 2014, <http://libweb.hawaii.edu/libdept/archives/mss/aja/higuchi/index.htm>; and Masayo Duus, *Unlikely Liberators: The Men of the 100th and 442nd* (Honolulu: University of Hawai'i Press, 1987).

⁸² Signal Corps Photographs, Homecoming, Japanese American Veterans Collection, Digital Resources, University of Hawai'i at Mānoa Library, Archives and Manuscripts, accessed February 1, 2014, <http://libweb.hawaii.edu/libdept/archives/mss/aja/signalcorps/homecoming.htm>.

As local men and women returned, outsiders began their exit. The first large exodus was in September, when the carrier USS *Saratoga* departed from Pearl Harbor with 3,712 military personnel.⁸³ WAVEs, WACs, and “Marinettes” departed within a few weeks.⁸⁴ Restless to demobilize, about 500 sailors from the Honolulu Air Station staged a riot in November, referred to as the “Damon Tract Riot,” but most military personnel waited patiently for their orders.⁸⁵ The convalescing 4th Marine Division began to pack up on Maui by October, leaving the following month.⁸⁶ The 5th, still at Camp Tarawa, left for Japan in August, occupying Kyushu Prefecture until November 1945, when they returned to San Diego and were deactivated in January 1946.⁸⁷

The heroic 2nd Marine Division—the “Follow Me” Division—moved on to Japan, occupying Nagasaki until returning to their home base of Fort Lejeune, North Carolina, in early 1946.⁸⁸ The division received Presidential Unit Citations for their actions at Guadalcanal and at Tarawa, as well as seven campaign stars for their many actions in the Pacific. Eight of their members won Congressional Medals of Honor, all but one awarded posthumously. A further 117 received Navy Crosses, again, many posthumously.⁸⁹ Out of fewer than 20,000 men—the division’s strength hovered between 18,000 and 19,000 for much of the war—2,420 men and officers were killed in action, an additional 375 died of the wounds and 9,600 suffered injury.⁹⁰ It was an extraordinary record for the unit that had made Hawai‘i its home for a few months in 1944.

⁸³ “USS *Saratoga* (CV-3),” *Wikipedia*, accessed October 12, 2013, [http://en.wikipedia.org/wiki/USS_Saratoga_\(CV-3\)#1945](http://en.wikipedia.org/wiki/USS_Saratoga_(CV-3)#1945); and Barbara Stahura, *U.S.S. Saratoga: CV-3 & CVA/CV-60*, rev. ed. (Paducah, KY: Turner Publishing, 2003).

⁸⁴ Allen, *Hawaii's War Years*, 203.

⁸⁵ “Sailors, Civilians Riot in Honolulu: 1 Dead, 50 Jailed,” *San Mateo Times*, November 13, 1945, accessed October 12, 2013, <http://www.newspapers.com/newspage/38874591>.

⁸⁶ Chapin, *4th Marine Division*, 83-F; and “It Rained, How It Rained.”

⁸⁷ Conner, *Spearhead*; “It Rained, How It Rained”; and Flowers, “5th Marine Division.”

⁸⁸ Johnston, *Follow Me*; US Marine Corps, 2nd Division, *Heritage Years: Second Marine Division, 1940–1999*, Vol. 2 (Paducah, KY: Turner Publishing Company, 1999), 13.

⁸⁹ Frank and Shaw, *Victory and Occupation*, 885.

⁹⁰ “Personal Awards, Decorations, and Casualties of the Second Marine Division,” World War II Gyrene, accessed February 2, 2014, http://www.ww2gyrene.org/2ndmardiv_personal_awards.htm.

To facilitate demobilization of other troops, the Army used its special center at Fort Kamehameha. The Navy established a new demobilization center on Moanaloa Ridge in September 1945.⁹¹ Only personnel with a spouse in Hawai'i or a job could stay.⁹² Although many may have become fond of the islands, very few decided to remain. Eventually, a few returned. Gwenfread Allen, the principal historian of Hawai'i's war years, estimates that somewhere between 3,000 and 7,000 did decide to make Hawai'i home in the immediate postwar years. Civilians may have helped swell Hawai'i's population further, but most of these left in 1945 once the war-related jobs dried up.⁹³

Hawai'i's many successive Army units quickly dissipated as well. The 27th Infantry Division—the unit that first came to Hawai'i in March 1942 to save the islands from imminent Japanese attack—was in Japan by September of 1945, staying there until their inactivation on December 31, 1945.⁹⁴ The 40th Infantry Division, the 27th's replacement, would end up in Korea, occupying former Japanese territory.⁹⁵ The 24th Division left the Philippines for Kyushu, staying there until 1950.⁹⁶ The 33rd, another National Guard unit, was also in Japan and

⁹¹ *Building the Navy's Bases in World War II*, "History of the Bureau of Yards and Docks and the Civil Engineer Corps," Navy Department Library, Vol. 2, Part 3, "The Advanced Bases," Naval History and Heritage Command, accessed February 12, 2014, <http://www.history.navy.mil/library/online/buildbaseswwii/bbwvii3.htm>.

⁹² Allen, *Hawaii's War Years*, 402.

⁹³ Allen, *Hawaii's War Years*, 403.

⁹⁴ "National Guard, 27th Infantry Division," HistoryShots, accessed February 12, 2014, <http://www.historyshots.com/usarmy/Division.cfm?did=27>; "27th Division, World War II," Unit History Project, New York State Military Museum and Veterans Research Center, accessed October 23, 2013, <http://dmna.ny.gov/historic/reghist/wwii/infantry/27thInfDiv/27thInfDivMain.htm>; US Army Center of Military History, *The Army Almanac: A Book of Facts Concerning the Army of the United States* (Washington, DC: US Army Center of Military History, 1950).

⁹⁵ "National Guard, 40th Infantry Division," HistoryShots, accessed February 12, 2014, <http://www.historyshots.com/usarmy/Division.cfm?did=40>; Sebby, "California's Own"; and US Army Center of Military History, *Army Almanac*.

⁹⁶ "Regular Army, 24th Infantry Division," HistoryShots, accessed February 12, 2014, <http://www.historyshots.com/usarmy/Division.cfm?did=24>; and Jan Valtin, *Children of Yesterday: The 24th Infantry Division in World War II*, Divisional Series (Nashville, TN: Battery Press, 1989).

remained until November 1946.⁹⁷ The 38th Division was inactivated in November 1945, shortly after its return from the Philippines.⁹⁸

Other units had similar stories. The 81st Infantry Division, in Hawai'i for four weeks in June and July 1944, was inactivated in Japan in January 1946.⁹⁹ The 96th, also in Hawai'i in 1944, returned directly to the United States following action in the Philippines and Okinawa.¹⁰⁰ The 6th Infantry Division, at one time assigned to the defense of O'ahu, was en route to Korea by August 1945, following combat in New Guinea and the Philippines.¹⁰¹ The 98th Division, which trained on Maui for many months, moved on to Japan in late September 1945, staying there until inactivation in February 1946.¹⁰²

Although troops and other service personnel for a time remained in Hawai'i, their overall numbers soon fell. By December 1945, the garrison at Schofield was well below its prewar strength. Hawai'i's own 24th and 25th Divisions were stationed in Japan, the 24th eventually reassigned to Germany after the Korean War and the 25th not returning home until 1954,

⁹⁷ "National Guard, 33rd Infantry Division," HistoryShots, accessed February 12, 2014, <http://www.historyshots.com/usarmy/Division.cfm?did=33>; and 33rd Infantry Division Historical Committee, *The Golden Cross*.

⁹⁸ "National Guard, 38th Infantry Division," HistoryShots, accessed February 12, 2014, <http://www.historyshots.com/usarmy/Division.cfm?did=38>; Leonard Webster, *A Military History of the Indiana National Guard 1816–1966* (Indianapolis: Military Department of Indiana, 1966); and US Army Center of Military History, *The Army Almanac*.

⁹⁹ "Organized Reserve, 81st Infantry Division," HistoryShots, accessed December 14, 2013, <http://www.historyshots.com/usarmy/Division.cfm?did=81>; US Army Center of Military History, *The Army Almanac*; and US Center of Military History, "81st Infantry Division," accessed October 12, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/081id.htm>.

¹⁰⁰ "Organized Reserve, 96th Infantry Division," HistoryShots, accessed December 12, 2013, <http://www.historyshots.com/usarmy/Division.cfm?did=96>; US Army Center of Military History, *The Army Almanac*; and US Center of Military History, "81st Infantry Division," accessed October 14, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/096id.htm>.

¹⁰¹ "Regular Army, 6th Infantry Division," HistoryShots, accessed December 13, 2013, <http://www.historyshots.com/usarmy/DisplayTheater.cfm?t=Pacific>; US Army Center of Military History, *The Army Almanac*; US Center of Military History, "81st Infantry Division," accessed October 2, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/006id.htm>.

¹⁰² "Organized Reserve, 98th Infantry Division," HistoryShots, accessed December 12, 2013, <http://www.historyshots.com/usarmy/Division.cfm?did=98>; US Army Center of Military History, *The Army*

following extensive combat in Korea.¹⁰³ By early 1946, the garrison reduced even further to an all-time low of 2,000 troops.¹⁰⁴ Only in the 1950s, with the return of the 25th Infantry Division, known as “Tropic Lightning” from its actions at Guadalcanal, would Schofield’s population return to its prewar size.

The NPS and the War’s End

Although the military presence in Hawai‘i was reduced late in 1945, its leadership continued to support expansion of facilities at Kīlauea. In June 1945, the Army installed a new \$250,000 water system for KMC. Army engineers also constructed a new guest hotel and a new set of rooms known as Crater Lodge. They also built a fire station, using a bell from one of Hilo’s units. The facility’s managers continued to renew and redecorate older rooms and cabins. Using monogrammed towels, ashtrays, and menus from mainland hotels, the military camp employed a new set of themes welcoming troops for short periods of rest and relaxation.¹⁰⁵

Prisoners of war remained a factor at the camp as well. By June 1945, there were over 100 prisoners housed at the site. These included remaining Korean captives as well as Okinawans sent to Hawaii after the spring offensive there.¹⁰⁶ The prisoners generally worked without supervision, mostly on landscape projects and other maintenance work. Most remained until nearly the end of 1946, when they were repatriated to their own countries. A group of fifty

Almanac; US Center of Military History, “98th Infantry Division,” October 2, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/098id.htm>.

¹⁰³ “Regular Army, 24th Infantry Division,” HistoryShots, accessed December 14, 2013, <http://www.historyshots.com/usarmy/Division.cfm?did=24>; US Army Center of Military History, *The Army Almanac*; US Center of Military History, “24th Infantry Division,” accessed October 1, 2012, <http://www.history.army.mil/html/forcestruc/cbtchron/cc/024id.htm>.

¹⁰⁴ *Schofield Barracks: A Historic Treasure*, <http://www.garrison.hawaii.army.mil/tlm/files/history.pdf>.

¹⁰⁵ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-50; and US Army, “Kilauea Military Camp,” MSS, US Army Museum, Fort DeRussy, October 1945, 2905.

¹⁰⁶ “Visits Permitted to Prisoners of War Here,” *Hilo Tribune-Herald*, December 5, 1945.

would finally leave on November 5, 1946, and the second contingent—all Okinawans—on December 5.¹⁰⁷



9. 8. Soldiers, Kilauea Military Camp, January 1946. KMC became headquarters for the Hawaii District for a short period at the beginning of 1946.

Superintendent Wingate remained uncomfortable with the military presence. In January 1945, near the war's end, he wrote that KMC's request "to establish a new picnic area near the camp was discouraged." As he explained, "there seemed no justification for further disturbing the environment there when satisfactory picnic areas are maintained slightly farther away."¹⁰⁸ There were also persistent complaints of infractions. In April 1945, Ranger Clifton J. Davies reported on time spent "breaking up the names and initials formed by rocks on the fault block at Uwēkahuna." Both he and conscientious objector Arthur Mitchal planned addition work at

¹⁰⁷ "All POW's Here Will Leave for Homes, Dec. 3," *Hilo Tribune-Herald*, November 25, 1946; and "Last PW's Leave for Home," *Hilo Tribune-Herald*, December 4, 1946.

¹⁰⁸ Superintendent's Monthly Reports, January 1945.

Keanakekoi and Kīlauea Iki. Mitchal also repainted the model of the volcano, covering over the many initials left by visiting service personnel.¹⁰⁹

Similar problems arose later in the year. A Navy jeep ran off the road at Haleakalā.¹¹⁰ Six marines were caught carrying silversword leaves. A camp employee narrowly escaped serious injury when his brakes “froze” and he overturned his vehicle near park headquarters.¹¹¹ Two Marine officers crashed their vehicle when attempting a U-turn at the entrance gate to Kīlauea.¹¹² Soldiers from KMC cut ferns at the Fern Forest area, using them as party decorations.¹¹³

Although the numbers of military visitors began to decrease by the end of 1945, many military personnel made last-minute trips, hoping to see the parks before their departure. Ranger-in-Charge Hjort commented this trend in September, stating that “several convoys of Marines desiring to see the park before being shipped home caused the military figures to be larger this month than last.”¹¹⁴ Within a month, military numbers shrank to prewar figures. As Hjort noted, “Puunene Naval Air Station is practically out of commission,” and that “the Air Warning Service here at Puu Nianiau has lost more than half its men.”¹¹⁵

With the end of gasoline rationing and improvements in interisland travel, visitors to Kīlauea jumped significantly in the last months of the year—in part the result of last-minute visitors and in part due to pent-up demand. In November, visitor figures were at 33,919, of which 11,774 were service personnel. Haleakalā for the same month had 1,344 visitors overall, of which only 642 were military.¹¹⁶ December saw a drop to 26,666 (of which 13,101 were in the

¹⁰⁹ Superintendent's Monthly Reports, April 1945.

¹¹⁰ Superintendent's Monthly Reports, August 1945.

¹¹¹ Superintendent's Monthly Reports, September 1945.

¹¹² Superintendent's Monthly Reports, October 1945.

¹¹³ Superintendent's Monthly Reports, November 1945.

¹¹⁴ Frank J. Hjort to Superintendent, memorandum, October 3, 1945, Superintendent's Monthly Reports, September 1945.

¹¹⁵ Superintendent's Monthly Reports, October 1945.

¹¹⁶ Superintendent's Monthly Reports, November 1945; and Monthly Travel Report, United States Department of the Interior, National Park Service, November 1945, Haleakala Section, Hawaii National Park, Historic Records, Record Group 79, Box 27, NARA San Bruno.

armed forces) at Kīlauea and a relatively steady visitor total of 1,833 (with 591 military) at Haleakalā.¹¹⁷

Throughout the year, Superintendent Wingate fought to stop further military expansion into the park. Writing to Tomlinson, Wingate was encouraged to hear that the regional office and director were both in agreement with the superintendent's opposition to further military developments at KMC.¹¹⁸ The Army, however, was not about to give up. On March 12, 1945, the Secretary of War wrote to Acting Secretary Fortas that the need for larger and better facilities at KMC was a military priority. He further argued that the Army had put too much money into the camp to consider relocating it outside the park. Fortas, in response, allowed that some temporary buildings might be constructed, but that they would need to be removed after the war's end.¹¹⁹

In November 1945, Superintendent Wingate discovered that Colonel Muller was considering a move of the Hawaii District Command from Hilo back to Kīlauea. Anticipating the worst, Wingate was relieved to hear that only the headquarters would be transferred, not the entire Hawai'i garrison as originally thought. Nonetheless, he remained concerned that the Army wished for the camp to become a permanent facility.¹²⁰ On January 7, 1946, the Interior Department—no doubt following Wingate's prompting—informed the Army that it was opposed to further improvements at KMC and that the NPS hoped in fact that the facility would be removed from the park entirely “not later than 1956.”¹²¹ In contradiction to this reminder, fifty

¹¹⁷ Superintendent's Monthly Reports, December 1945; and Monthly Travel Report, United States Department of the Interior, National Park Service, December 1945, Kilauea Section, Hawaii National Park, Historic Records, Record Group 79, Box 27, NARA San Bruno.

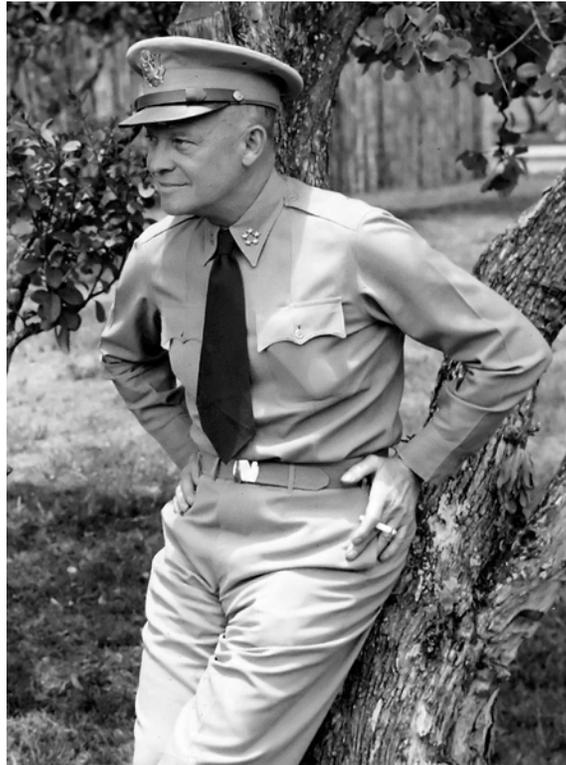
¹¹⁸ Jackson, *Administrative History*, 73.

¹¹⁹ Secretary of War [Henry L. Stimson] to Secretary of the Interior [Acting, Abe Fortas], March 12, 1945, Record Group 79, Box 158, NARA San Bruno, cited in Jackson *Administrative History*, 74.

¹²⁰ As it was it would be a short-lived development as the separate districts were disbanded in the next few months. See Superintendent's Monthly Reports, November 1945.

¹²¹ Secretary of Interior [Abe Fortas] to Secretary of War [Stimson], January 7, 1946, HAVO Archives, cited Jackson, *Administrative History*, 75.

men and officers set up the new headquarters at KMC.¹²² The Army, clearly, was not giving up its claim.



9. 9. General Dwight Eisenhower stayed at KMC in May 1946 as part of his tour of Hawai'i and the former Pacific Theater.

Park Cleanup and Developments

The issue of the Kau Desert Impact and Training Area and the bombing range at 'Elemākule also remained unresolved. In December 1945, the Army formally relinquished two acres at 'Āpua Point but the Elemakule Range remained unresolved.¹²³ Sometime in October 1945, demolition crews began the work of "locating and destroying unexploded shells and bombs" in

¹²² Jackson, *Administrative History*, 75.

¹²³ Jackson, "Military Use," 103

the former Kau Desert Impact and Training Area. In December, they announced the cleanup work nearly complete, despite the superintendent's obvious reservations.¹²⁴ A report in January 1946, suggests additional compliance, with Wingate noting that "dragging [a] rail" had proved an effective method for leveling roads cut by tanks and other heavy equipment.¹²⁵

Beginning that autumn, the Army began a few repairs to roads and bridges; engineers attached to the Hawaii District promised, for example, to repair the bridge at the Thurston Lava Tube (Nāhuku) in August, though work was slow.¹²⁶ There were unanticipated benefits as well. As the superintendent explained in October, a number of "unsightly buildings [had been] removed from the park as a direct or indirect result of the war." The purchaser had taken four cottages just east of the headquarters building, leaving the area free for removal of "the remaining exotics" and return to its "natural state."¹²⁷

Wingate and other NPS officials also wanted to clear up things with the Army and Navy over the Elemakule Range. In February 1946, Paul H. Baldwin, writing to the regional director as the assistant to the superintendent, noted that the Army was taking steps to transfer the jurisdiction of the Hilina Pali area to the Navy. Recognizing that the Army, in fact, never used the range, he conjectured that the motivation was to relieve the Army of any responsibility for cleanup. Baldwin suggested that neither the Army nor the Navy required the range and that the NPS would look into ways to return the property to the NPS. Since the land in question was scheduled to become part of the park as part of the Kalapana Extension, Wingate—Baldwin explained—believed no formal agreement or act was required. If the Navy agreed, the property once again would revert to the NPS.¹²⁸

For much of February 1946, Wingate was ill and relied on Baldwin to carry out many of the administrative tasks. He said he had caught a chill, but was laid up for over three weeks

¹²⁴ Superintendent's Monthly Reports, December 1945.

¹²⁵ Superintendent's Monthly Reports, January 1946.

¹²⁶ Superintendent's Monthly Reports, August 1945.

¹²⁷ Superintendent's Monthly Reports, October 1945.

¹²⁸ Paul H. Baldwin to Regional Director, Region Four, memorandum, February 19, 1946, Record Group 79, Box 25, NARA San Bruno.

beginning February, some of the time in the Hilo Hospital.¹²⁹ In his later recollections, Wingate admitted conferring with the former CCC doctor, Dr. Clyde Phillips, who told him he needed time and rest, in large part because of his extended hours as a result of the war. Advised to avoid visitors and to change his diet, Wingate considered checking into the territorial mental hospital in Honolulu, but promised the doctor he would lighten his workload.¹³⁰

NPS regional director O. A. Tomlinson visited Hawai'i beginning March 12 and stayed over two weeks (from March 12 to April 3).¹³¹ He also made a trip to Haleakalā. Wingate accompanied him on a trip to the saddle area between Mauna Loa and Mauna Kea and to the Kona coast.¹³² Baldwin showed Tomlinson the Hilina Pali area and Navy bombing sites at 'Elemākule.¹³³ Tomlinson also examined ongoing work in the former Kau Desert Impact and Training Area, conferring as well with officers representing the Hawaii District and government officials in Honolulu.

Tomlinson was clearly unhappy with conditions in the park. Some of the problems he blamed on Wingate. There were personal issues as well. Wingate's wife Elizabeth moved to Honolulu in September 1943, ostensibly due to the war but more directly as a result of marital problems. Wingate subsequently obtained a divorce; and in January 1945, he had married a Hawaiian woman from Kalapana named Eleanor Waianuheia Tam Sing—a step unpopular with many in the territory.¹³⁴ Tomlinson spoke to Wingate and wrote privately to the director on March 25 that, “as a result of my investigation I was convinced that Superintendent Wingate was no longer a useful and effective official of the National Park Service and so informed him.”¹³⁵ In

¹²⁹ Superintendent's Monthly Reports, March 1946

¹³⁰ Wingate interview, transcript, 21.

¹³¹ O. A. Tomlinson to Lieutenant Commander E. W. Bode, April 23, 1946, Record Group 79, Box 158, NARA San Bruno.

¹³² Superintendent's Monthly Reports, March and April 1946.

¹³³ Baldwin to Regional Director, February 19, 1946.

¹³⁴ On . See Jackson, *Administrative History*, 266. The *Hilo Tribune-Herald* announced his resignation on March 26, 1946.

¹³⁵ O. A. Tomlinson to Director, memorandum, March 25, 1946, HAVO Archives, cited in Jackson, *Administrative History*, 266.

mid-March, following his conversation with Tomlinson, Wingate announced his retirement, effective March 31.

Writing more officially on April 19, 1946, Tomlinson stated to the NPS director that he had “found general conditions [at Kīlauea] rather unsatisfactory due to the failure of Superintendent Wingate to give close attention to details and coordinating the work of his employees.” Recognizing that the park had been short-staffed for several years, he nonetheless believed that “a number of detail matters could have been attended to.” He granted that “most important services were being provided” and that the park employees were doing an excellent job.¹³⁶

Tomlinson faced not only Wingate’s resignation but that of his assistant Baldwin as well. With the war’s end, Baldwin hoped to pursue a PhD at the University of California at Berkeley but accepted a position as curator with the Bernice Pauahi Bishop Museum in Honolulu. Serving as acting superintendent for less than a week, Baldwin left the park soon after Wingate. Tomlinson appointed Ranger Fagerlund to replace Baldwin in a temporary capacity as superintendent. He felt his discussions with the Hawaii District—then housed at KMC—were fruitful and he was impressed with the progress of the Army in cleaning up the former training area within the park. He was also pleased with the park concessioners, especially Volcano House.¹³⁷

In April 1946, the Army finally committed to cleaning up areas outside of the training area, but still within the park. The military also facilitated the park’s acquisition of surplus materials, including trucks and building materials. The commander of KMC, Colonel P. H. Wollaston, expressed disappointment at the Department of Interior’s opposition to new buildings at the camp. The military, seemingly in retaliation, closed its theater to civilians, breaking a long

¹³⁶ O. A. Tomlinson to Director, memorandum, April 19, 1946, Record Group 79, Box 151, NARA San Bruno. Staff discontent is evident in Frank Hjort’s comments in his March 1946 report: the “announcement of Superintendent Edward G. Wingate caused no comment in Maui. Mr. Wingate visited this island so seldom that few associated him with this section of the park. The announcement was not even covered in the Maui News.” See Superintendent’s Monthly Reports, March 1946.

¹³⁷ Superintendent’s Monthly Reports, March 1946.

tradition of shared facilities.¹³⁸ Still, the park and the military seemed to be coexisting, notwithstanding Wingate's repeated pleas to have the facility relocated.

Haleakalā represented a more intransigent problem. Writing to Major John T. Moir in Wailuku about military use of the park, Wingate complained of persistent vandalism from 1944 through 1945 caused by military visitors. Malefactions included "indiscriminate starting of fires, destruction and theft of silversword plants, defacement of the landscape, strewing the roadside with bottles and other trash, and damage to and defacement of public buildings."¹³⁹ The park was forced, Wingate explained, to carefully monitor the comings and goings of all visitors, military users especially.



9. 10. Abandoned Haleakala base camp, late 1940s.

A greater problem, of course, was the continued use of the Red Hill Air Warning Service Station. In September the previous year, Wingate offered a cautionary note in his reports when he mentioned Signal Corps Brigadier General Powell's intention of keeping the facility "as it was

¹³⁸ Superintendent's Monthly Reports, February 1946.

¹³⁹ Edward G. Wingate to John T. Moir, January 10, 1946, Record Group 79, Box 25, NARA San Bruno.

useful and installed at great expense.”¹⁴⁰ Ranger-in-Charge Hjort reported that the Red Hill facility was still in operation as of October, although he also noted that the base camp at Pu‘u Nianiau was down to half its previous strength.¹⁴¹ There were signs of hope by December, however, when the Army removed the telephone lines between Red Hill and the Navy’s Observation Station.¹⁴² In March, Hjort’s new assistant, Ranger Clifton J. Davis, reported the Army’s removal of the stone pillars at the entrance.¹⁴³

While the Army kept its plans secret from the NPS, Regional Director Tomlinson attempted to gain more clarity during his March and April trip of 1946. Tomlinson had visited the site two years before at the time the Army was removing the radar station and beginning its new radio relay station. Surprised by the Signal Corps’ sudden openness, he noted that neither sentry challenged their entry into the area. He also commented on the “substantial” base camp at the 7,000-foot level, which included ten main buildings, ranging from barracks through mess halls, a concrete air-warning center and associated steel structure, and generating plant. All were scheduled for transfer to the NPS as the special-use permit had just expired—a move he saw as entirely positive.¹⁴⁴

This move would drag on for several more years. The base camp reverted to NPS use in 1947; the Red Hill facility would not officially come back into the park until 1962.¹⁴⁵

¹⁴⁰ Superintendent’s Monthly Reports, September 1945.

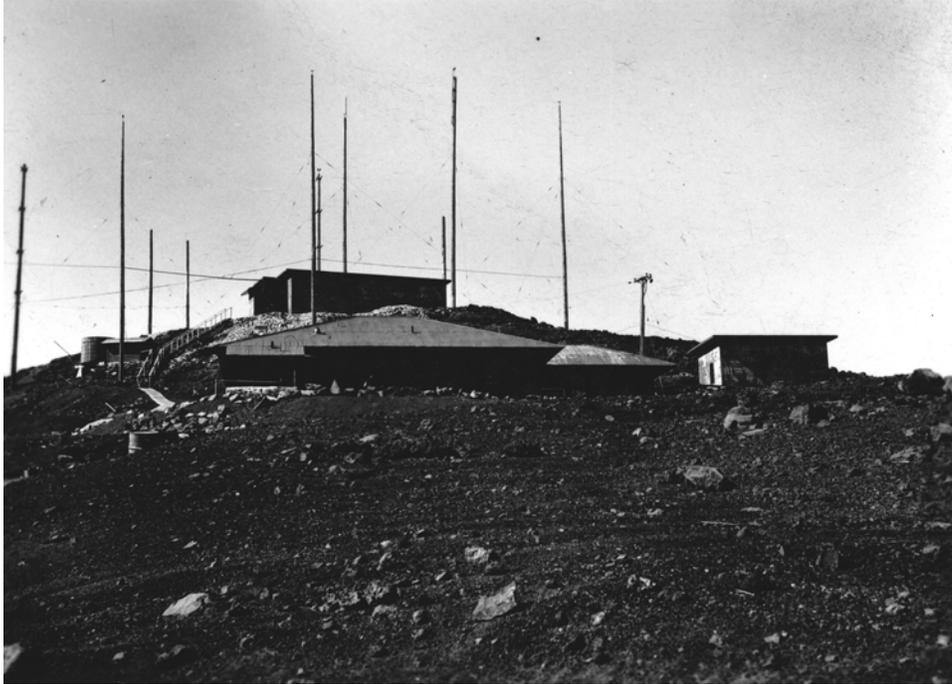
¹⁴¹ Superintendent’s Monthly Reports, October 1945.

¹⁴² Superintendent’s Monthly Reports, December 1945.

¹⁴³ Superintendent’s Monthly Reports, March 1946.

¹⁴⁴ O. A. Tomlinson to Director, memorandum, April 19, 1946, Record Group 79, Box 151, NARA San Bruno.

¹⁴⁵ Jackson, “Military Use,” 138.



9. 11. Red Hill, Haleakalā prior to dismantlement of the Army facility.

CHAPTER 10: THE WAR'S LONG-TERM EFFECTS

Postwar America

World War II was a profoundly transformative event for the United States, leading to changes in the country's workforce and shifts in the distribution of its people. The war introduced new methods and scales of production, new kinds of materials and equipment, and a revolutionary melding of the country's diverse population to a common end. It also introduced Americans to the breadth of their own land and exposed many residents to parts of the world they had never before envisioned. Over a period of fewer than four years, the country had gone from a one of several Western powers to the world's superpower. The realignment of the country's cities, dockyards, roads, railways, and factories reflected this change. The war also altered farmlands, forests, and wilderness areas, tying these diverse places into a new national construct.

The period immediately after the war was a time of national adjustment to peacetime conditions. Shadowed by the emerging Cold War and related regional conflicts, notably the Korean War in 1951–53, America's veterans returned to a different world from the one they left behind. With factory production slowing from its wartime high, many found it difficult to find work. Women, who had made gains in the workplace, found themselves displaced by men. Traditional roles of “breadwinner” and “housekeeper” reemerged as a national pattern—although not without some resistance. Bound together by a new sense of purpose and cohesiveness, most Americans settled down to work and family, putting the sacrifices of the war years behind them but retaining many of the values engendered by common service.¹

¹ James Gilbert, *Another Chance: Postwar America, 1945–1985*, 2nd ed. (Chicago: The Dorsey Press, 1986); Edward J. K. Gitre's unpublished work on the post-World War II generation, “The Sound of Silence, 1939–1973: War, Boredom, and Adjustment in Mid-Century America” is summarized in “Edward J. K. Gitre,” Institute for Advanced Studies in Culture, University of Virginia, accessed December 10, 2013, http://www.iasc-culture.org/people_fellow.php?ID=85. Other important books include: Howard Zinn, *Postwar America, 1945–1971*, 2nd e. (Chicago: Haymarket Books, 2012); William H. Chafe, Harvard Sitkof, and Beth Bailey, eds., *A History of Our Times: Readings in Postwar America*, 8th ed. (New York: Oxford University Press, 2011); Paul S. Boyer, *Promises to Keep*:

Among the most significant changes was to the country's residential patterns. Suburbs sprouted to accommodate the expectations of a soon-booming population.² The System of Interstate Highway and Defense Highways, inaugurated in 1956, transformed the countryside as well as linking new communities. Inspired in part by Germany's successful "autobahn," the new highway system further underwrote the automobile industry in the postwar period.³ America's towns and cities were soon well on their way to becoming the kinds of dispersed settlements we know today, while older urban centers soon experienced the jolt of economic divestment. Within a few years, strip development and shopping malls replaced older downtowns as new suburbs reached farther into what had once been countryside.⁴

Compact houses, filled with time-saving appliances, soon came to characterize American life. American men sacrificed convenience for long commutes; women gave up possible careers to be homemakers. New schools and other institutions sprouted in the new suburban environments. Within a few years of the war's end, new communities such as New York's Levittown could boast an inventory of 4,000 houses; in July 1948, for example, war veteran Bill Levitt and his architect

The United States since World War II, 3rd ed. (Independence, KY: Cengage Learning, 2004); and William H. Chafe, *The Unfinished Journey: America since World War II*, 7th ed. (New York: Oxford University Press, 2010).

² Kenneth T. Jackson, *Crabgrass Frontier: The Suburbanization of the United States* (New York: Oxford University Press, 1989); and G. Scott Thomas, *The United States of Suburbia: How the Suburbs Took Control of America and What They Plan to Do with It* (Amherst, NY: Prometheus Books, 1998).

³ The Pennsylvania Turnpike started in 1940. See John D. Murphy, *The Eisenhower Interstate System, Build America, Then and Now Series* (New York: Chelsea House, 2009); Tom Lewis, *Divided Highways: Building the Interstate Highways, Transforming American Life*, updated ed. (Ithaca, NY: Cornell University Press, 2013).

brother Alfred were turning out thirty houses a day in what was once a Long Island potato field.⁵ Similar developments in other parts of the country repeated this pattern, creating the expansive suburban landscape that still dominates American life.⁶



10. 1. The Interstate Highway system was a direct outcome of the war, transforming residential patterns and leisure. Published by the *Texas Highways Magazine*, November 1963.

The Depression and war had inured the American public to the idea of greater government intervention into their lives. The Public Works Administration (PWA) and Works Projects Administration, previously the Works Progress Administration (WPA) projects, such as

⁴ Richard Longstreth, *City Center to Regional Mall: Architecture, the Automobile, and Retailing in Los Angeles, 1920–1950* (Cambridge, MA: MIT Press, 1998); and Lisa Scharoun, *America at the Mall: The Cultural Role of a Retail Utopia* (Jefferson, NC: McFarland, 2012).

⁵ Barbara M. Kelly, *Expanding the American Dream: Building and Rebuilding Levittown*, SUNY Series in the New Cultural History (New York: SUNY Press, 1993); and Margaret Lundgrigan Ferrer, *Levittown: The First 50 Years*, Images of America (Charleston, SC: Arcadia Publishing, 1997).

⁶ Jackson, *Crabgrass Frontier*; Becky Nicolaides and Andrew Wiese, eds., *The Suburb Reader* (Garden City, NJ: Routledge, 2006); and Dolores Hayden, *Building Suburbia: Green Fields and Urban Growth, 1820–2000* (New York: Vintage, 2004).

the Hoover Dam and numerous highway and parks projects, gave the public an appreciation for what government programs could do.⁷ In the postwar period, the Federal Housing Authority (FHA) through the Fannie Mae loan program, and the Veterans Administration (VA) homeowners' loans for veterans significantly changed the pattern of home ownership.⁸ For the first time, encouraged by the federal government's example and a new system of guarantees, banks and other institutions began to make mortgages accessible to working- and middle-class home seekers.⁹

There were also fresh opportunities for education and advancement. The G.I. Bill provided funding for an estimated 8 million veterans—half the total who served—many of them attending universities and colleges in order to improve their skills and marketability.¹⁰ Sciences, math, and engineering came to dominate university curricula, as Americans increasingly accepted the importance of technology for the nation's future.¹¹ The overall emphasis was on practicality. Inured to the curtailment of civil liberties and suspicious of “troublemakers” and those who refused to fit in, most 1940s and 1950s Americans embraced conformity.¹² Recognition of the

⁷ Taylor, *American-Made*.

⁸ Grant Moon, “The History behind the VA Guaranteed Home Loans,” *Veterans Today* online, 2013, accessed December 29, 2013, <http://www.veteranstoday.com/2012/05/18/the-history-behind-va-guaranteed-home-loans/>.

⁹ Andrea Ryan, Gunnar Trumbull, and Peter Tufano, “A Brief Postwar History of Consumer Finance,” Working paper 11-258 (Cambridge, MA: Harvard Business School, 2010), accessed December 12, 2013, <http://www.hbs.edu/faculty/Publication%20Files/11-058.pdf>.

¹⁰ “Servicemens' Readjustment Act (1944),” [ourdocuments.gov](http://www.ourdocuments.gov), accessed November 12, 2013, <http://www.ourdocuments.gov/doc.php?flash=true&doc=76>; and Glen Altschuler and Stuart Blumin, *The GI Bill: The New Deal for Veterans* (New York: Oxford University Press, 2009).

¹¹ Kim Nesta Archung, *School: The Story of American Public Education* (Washington, DC: Public Broadcasting Service and Office of Education Research and Improvement, US Department of Education, n.d.), accessed November 12, 2013, <https://www.pbs.org/kcet/publicschool/pdf/aacte.pdf>; and John D. Pullman and James J. Van Patten, *History of Education in America*, 9th ed. (New York: Pearson, 2006).

¹² Gitre, “Sound of Silence.”

unjust treatment of Japanese and other US “alien” residents and the inequalities perpetuated by the country’s long tradition of racial segregation was still years in the future.¹³ However, the much-celebrated performance of Japanese American soldiers in Europe and the Pacific and the many wartime contributions of African Americans begged for a reassessment of racial attitudes—a reappraisal that would finally take root in the Civil Rights Movement of the 1960s.¹⁴

A radical shift in demography was another outcome of the war. Americans became used to moving and were increasingly willing to try new places. Men and women broke long-standing tradition and married outside their own towns and regions. Many postwar factory and office workers also preferred to stay where they were at war’s end, and others joined them in the regions in which industries had grown during and remained after the war; California, for example, experienced an enormous boom in population, as did the new “Sunbelt” of Texas, Florida, and Arizona.¹⁵ Washington, DC, due to the enormous managerial requirements of the war, became a significant locus for employment as the government grew to handle the new requirements of the Cold War era.¹⁶

¹³ Herbert Aptheker, *Anti-Racism in U.S. History: The First Two Hundred Years*, Contributions in American History Series (Westport, CT: Praeger, 1993); Anthony Q. Hazard, *Postwar Anti-racism: The United States, UNESCO, and “Race,” 1945–1968*, Contemporary Black History (Palgrave Macmillan, 2012).

¹⁴ Sterner, *Go for Broke*; Asahina, *Just Americans*; and “African-Americans in World War II: Fighting for a Double Victory,” National World War II Museum, New Orleans, accessed October 12, 2013, <http://www.nationalww2museum.org/assets/pdfs/african-americans-in-world.pdf>.

¹⁵ Edward L. Glaeser and Kristina Tobio, *The Rise of the Sunbelt*, Taubman Center Policy Briefs, Harvard University and Kennedy School of Government, May 2007, accessed October 1, 2012, http://www.hks.harvard.edu/var/ezp_site/storage/fckeditor/file/pdfs/centers-programs/centers/taubman/sunbelt.pdf.

¹⁶ US Census Bureau, “Anniversary of Washington, DC as Nation’s Capital,” US Census Bureau, *Newsroom*, August 9, 2007, accessed October 1, 2012, http://web.archive.org/web/20080207171308/http://www.census.gov/Press-Release/www/releases/archives/facts_for_features_special_editions/001574.html.



10. 2. Levittown, near Philadelphia, Pennsylvania, one of several large subdivisions developed by the Levitt & Sons, Inc., 1953.

There were similar shifts in population elsewhere. The African American migration of the early part of the century continued to channel onetime agricultural workers into the manufacturing cities of the north.¹⁷ There was also an influx of Hispanic workers from Mexico and the islands of the Caribbean. Filipinos—many having served in the US armed forces—became a growing presence in California and other areas.¹⁸ At the same time, the mountains of

¹⁷ James R. Grossman, *Land of Hope: Chicago, Black Southerners, and the Great Migration* (Chicago: University of Chicago Press, 1991); James N. Gregory, *The Southern Diaspora: How the Great Migrations of Black and White Southerners Transformed America* (Chapel Hill: University of North Carolina Press, 2007).

¹⁸ In 1954, “Operation Wetback” attempted to reverse this trend. Postwar immigration by Mexicans rose by 6,000 percent between 1945 and 1954. See Ronald L. Mize and Alicia C. Swords, *Consuming Mexican Labor: From the Bracero Program to NAFTA* (Toronto: University of Toronto Press, 2010); and Avi Astor, “Unauthorized Immigration, Securitization, and the Making of Operation Wetback,” *Latino Studies* 7 (2009): 5–29. On the wave of Puerto Rican immigrants or emigrants, see “Puerto Rican Emigration: Why the 1950s,” Lehman College, City University of New York, accessed December 13, 2013, <http://lcw.lehman.edu/lehman/depts/latinampuertorican/latinoweb/PuertoRico/1950s.htm>. On Filipinos, see Rick Baldoz, *The Third Asiatic Invasion: Migration and Empire in Filipino America, 1898–1946* (New York: NYU Press, 2011); and Sunshine Lichauco de Leon, “Filipino War Veterans Celebrate U.S. Compensation,” *Time*, World, online edition, May 31, 2010, accessed October 12, 2012, <http://content.time.com/time/world/article/0,8599,1992972,00.html/>

Appalachia and many other rural areas experienced a population decrease, as residents sought new opportunities in urban centers.¹⁹

An overriding key to the country's development was the enormous growth of the automobile industry. With the restoration of private-car production after the war, the great American automotive giants of General Motors and Ford returned dramatically to their business.²⁰ Necessary for the more-dispersed suburban lives of American consumers, the automobile became a symbol of the country's postwar prosperity. One of the few rationed items that Americans flaunted during the war, gasoline was now abundant and cheap.²¹ The automobile opened up new horizons for Americans and significantly altered the patterns of work, living, and recreation. More than any single item, the car represented the perfect fusion of public and private interest. As Charles E. Wilson (1880–1961), the wartime president of General Motors, phrased it, “What was good for our country was good for General Motors, and vice versa.”²²

Environmental Consequences

The war's impacts on the American environment were both direct and indirect. Direct effects included the results of bombing and training in an enormous range of places and landscapes.

¹⁹ Kevin M. Pollard, *Population Growth and Distribution in Appalachia: New Realities* (Washington, DC Population Reference Bureau, 2004), 10, accessed October 12, 2012, <http://www.prb.org/pdf05/popgrowthappalachia.pdf>.

²⁰ In the years following World War II, auto ownership in the United States soared from 27.5 million registered vehicles in 1940 to 61.5 million in 1960. See Alex Sandoval, “The American Automobile Industry: the Post-War Boom,” October 2, 2012, http://web.bryant.edu/~ehu/h364proj/fall_97/sandoval/index.htm; and Frank Coffey and Joseph Layden, *America on Wheels: the First 100 Years, 1896–1996*, companion volume to PBS series (New York: General Publishing Group, 1998).

²¹ “World War II Rationing,” United States History, accessed September 2, 2012, <http://www.u-s-history.com/pages/h1674.html>.

²² Typically, this phrase is misquoted as “What's good for General Motors is good for the country,” a phrase so often repeated that Wilson stopped trying to correct the record. Wilson was also President Eisenhower's Secretary of Defense, beginning in 1957. See Justin Hyde, “GM's ‘Engine Charlie’ Wilson Learned to Live with a Misquote,” *Detroit Free Press* online, September 14, 2008, accessed October 1, 2012, <http://www.freep.com/article/20080914/BUSINESS01/809140308/GM-s-Engine-Charlie-Wilson-learned-live-misquote>.

Coastal areas, mountain refuges, and the vast plains of the Midwest all became targets of repeated practice and training exercises. Southern California beaches staged landing drills; the East Coast shoreline became target areas for coastal artillery.²³ In some places, the damage was persistent. Vieques near Puerto Rico became a bombing range for Navy pilots from nearby Roosevelt Roads Naval Air Station and a site for amphibious training. Beginning in 1941 and extending for another thirty years, bombardment and landing exercises made much of the island unsafe for human habitation.²⁴ The same was true for other target areas and training sites, many still off-limits after more than fifty years.



10. 3. Vieques from the air. Photograph taken in 2009. Similar in size to Kaho‘olawe, Vieques served for many years as both a bombing site and landing training area for the US military. The Navy finally ceased operations there in 2003 due to public protests.

The principal actions of the war were outside of US territory. Guam, Saipan, Tinian, Midway, the Marshall Islands—and, of course, Hawai‘i—were the exceptions. So too was the

²³ Mark J. Denger, “Historic California Posts: A Brief History of the U.S. Marine Corps in San Diego,” California State Military Museum, accessed October 3, 2012, <http://www.militarymuseum.org/SDMarines.html>; and McGovern and Smith, *American Coastal Defences, 1885–1950*.

²⁴ Lisa Mullenneaux, *Ni Una Bomba Más! Vieques vs. U.S. Navy* (New York: Penington Press, 2000).

United States' longtime "protectorate," the Philippines. Allied aircraft dropped an estimated 3.4 million tons of explosives on Germany, Italy, and Japan and on sites in the Philippines, Guam, and other US island possessions.²⁵ During several months prior to the war's end, American B-29 "Superfortresses" transferred to Tinian from the China-India-Burma Theater conducted thousands of sorties over Japan. Planes—each carrying up to 20,000 pounds of bombs or 12,000 pounds of half-ton and one-ton mines²⁶—launched from Tinian's 8,500-foot-long runway on a twenty-four-hour schedule. During the peak of the bombing campaign, a plane left every minute.²⁷ The effects of the raids were so great that by August 1945, the US Army Air Forces had virtually run out of targets.²⁸ Japanese-occupied islands such as Okinawa and Iwo Jima also suffered days of bombardment and weeks of unrelenting battle.



10. 4. The evident debris of war; Iwo Jima following the US attack, March 1945.

²⁵ "Percentages/Numbers/Financials/Rankings, World War II Statistics," Statistic Brain, accessed December 13, 2013, <http://www.statisticbrain.com/world-war-ii-statistics/>; Tom McGowen, *Air Raid! The Bombing Campaign* (Brookfield, CT: Twenty-First Century Books, 2001); and Anthony Verrier, *The Bomber Offensive* (New York: Pan, 1974).

²⁶ "Tinian History, Tinian in World War II – Teamwork and Effort," accessed December 16, 2013, http://www.112thseabees.org/history/tin_hist.htm. See also Curtis E. Lemay and Bill Yenne, *Superfortress: The Story of the B-29 and American Air Power* (New York: McGraw-Hill, 1988).

²⁷ Wesley Frank Craven and James Lea Crate, eds., *The Army Air Forces in World War II*, Vol. 5, *The Pacific: Matterhorn to Nagasaki, June 1944 to August 1945*, Section 4, "Strategic Bombing from Pacific Bases," 516, accessed December 13, 2013, <http://www.ibiblio.org/hyperwar/AAF/V/AAF-V-17.html>.

²⁸ Craig L. Symonds, *The Historical Atlas of the U.S. Navy* (Washington, DC: Naval Institute Press, 1995), 188.

Bomb craters, much-eroded beaches and mountains, savagely cut vegetation, contaminated water, and a still-unknown amount of unexploded ordnance were the inevitable consequences of these actions.²⁹ Although the bomb damage of World War II would not equal that of many of the country's later wars—the United States dropped more bombs on Laos during the spillover from the Vietnam War than did the Allied Powers over the entire course of World War II³⁰—the war expanded the role of aerial combat to a new, unknown level. It was indeed the beginning of modern warfare and airborne terror.

The atomic bomb attacks at Hiroshima and Nagasaki are typically accepted as the ultimate examples of environmental catastrophe. Two cities, with populations of approximately 340,000 and 265,000, respectively, were virtually destroyed by single weapons, leaving over a total of 105,000 dead and many thousands more injured or sickened by radiation.³¹ But the environmental consequences of these two attacks, however severe, paled beside the impacts of postwar testing. Between 1945 and 1957, the United States and newly established nuclear powers conducted 423 surface tests with horrific environmental results.³² The residents of Bikini Atoll in the Marshall Islands had to abandon their homes to allow for tests by the Americans conducted between 1946 and 1958.³³ Other peoples, from the Pacific Islands through the seemingly empty

²⁹ Steve Dutch, "Military Impacts on the Environment," University of Wisconsin-Green Bay, accessed December 12, 2013, <http://www.uwgb.edu/dutchs/EnvirGeolNotes/Military.HTM>.

³⁰ Santi Suthinithet, "Land of a Million Bombs: Laotian Americans Reach Out to Aid War-Torn Lao," *Hyphen* 21 (2010), accessed December 12, 2013, <http://www.hyphenmagazine.com/magazine/issue-21-new-legacy/land-million-bombs>.

³¹ Atomic Archive, "The Atomic Bombings of Hiroshima and Nagasaki, Total Casualties," [atomicarchive.com](http://www.atomicarchive.com/Docs/MED/med_chp10.shtml), accessed December 12, 2013, http://www.atomicarchive.com/Docs/MED/med_chp10.shtml; and UCLA, Children of the Atomic Bomb Project, "Hiroshima and Nagasaki Death Toll," UCLA and UCLA Asian Studies Center, accessed December 12, 2013, <http://www.aasc.ucla.edu/cab/200712090008.html>.

³² Between 1957 and 1989, there were another estimated 1,400 underground tests with also still unknown effects on the environment and peoples' health. See William Robert Johnston, "Chronological Listing of Above Ground Nuclear Detonations, Explanation and Summary," Johnston Archive, accessed December 12, 2013, <http://www.johnstonsarchive.net/nuclear/atest00.html>. See also Stephen Schwartz, *Atomic Audit: The Costs and Consequences of U.S. Nuclear Weapons* (Washington, DC: Brookings Institution Press, 1998).

³³ "The United States' Nuclear Testing Program," Preparatory Commission for the Comprehensive Nuclear-Test-Ban Treaty Organization, accessed December 13, 2013, <http://www.ctbto.org/nuclear-testing/the-effects-of-nuclear-testing/the-united-states-nuclear-testing-programme>.

deserts of the American West are still living with the consequences of these programs and their later effects.

In addition to bombings and artillery, the war left enormous damage in its wake. Scientists have yet to calibrate the impacts of bombardments, naval actions, and amphibious landings on coral reefs and aquatic species.³⁴ Both bombing and dredging were common procedures, leaving enormous holes in Pacific Island coral beds. There was also wartime damage to plants and terrestrial animals and subsequent impacts on local ecologies. The inadvertent introduction of rats by US troops at Laysan Island resulted in the loss of the Laysan finch and the Laysan rail, as well as the destruction of native grasses upon which local birds fed.³⁵ Similar patterns repeated in other environmental contexts as well. Although the US Fish and Wildlife Service managed to save the habitats of migratory ducks in parts of the mainland US, for example, they did this at the expense of gulls and other fish-eating species.³⁶ The introduction of DDT to improve nesting grounds also killed other birds and species, irreparably changing the ecology of many sites.³⁷

Industrial pollution was another wartime outcome. Oil, asbestos, debris from the mining of copper, sphalerite (for zinc), and bauxite (for aluminum), and the distribution of untold hazardous wastes were inevitable by-products of both war and military training and production.

³⁴ National Oceanic and Atmospheric Agency (NOAA), NOAA Coral Reef Ecosystem Research Plan (Washington, DC: NOAA, US Pacific and Insular Affairs, n.d.), accessed December 12, 2013, http://www.coris.noaa.gov/activities/coral_research_plan/pdfs/us_priars.pdf; and Clive Wilkinson, "Global and Local Threats to Coral Reef Functioning and Existence: Review and Predictions," *Marine and Freshwater Research* 50, no. 8 (1999): 867–78.

³⁵ Marc Lallanilla, "Bombed: The Effects of War on the Environment," About.com, Green Living, accessed December 12, 2013, <http://greenliving.about.com/od/greenprograms/a/Effects-Of-War-And-The-Environment.htm>.

³⁶ Audubon, "Important Contributions to Waterbird Conservation in the 20th Century," Audubon, accessed June 17, 2014, http://web4.audubon.org/bird/waterbirds/20th_century.html.

³⁷ Charles Closmann and Cristof Mauch, "War and the Environment: Contexts and Consequences of Military Destruction in the Modern Age," *GHI Bulletin* 35 (Fall 2004): 170. DDT (**d**ichloro**d**iphenyl**t**richloroethane) was first discovered to have insect fighting properties in 1939. It was used extensively throughout the wartime period. David Kinkela, *DDT and the American Century: Global Health, Environmental Politics, and the Pesticide that Changed the World* (Chapel Hill: University of North Carolina Press, 2011).

An estimated 1,080 shipwrecks still lie on the Pacific Ocean's bottom.³⁸ In July 2001—fifty-nine years after it sank—a typhoon caused a spill from the wreck of the USS *Mississinewa*, resulting in damage to nearby fishing grounds.³⁹ The National Oceanic and Atmospheric Administration (NOAA) estimates that the wrecked sites in the Pacific Ocean alone hold between 757 million and 6 billion gallons of fuel oil, amounts increasing subject to leakage as the aging hulls corrode.⁴⁰ Even the USS *Arizona* still contains approximately 600,000 gallons of oil, discharging up to two gallons of oil each day—though NPS officials classify the leakage as “stabilized.”⁴¹

Chemical weapons and nuclear waste are other continuing sources of pollution. The Soviet Union dumped at least 160,000 tons of chemical weapons (CWs) in Russian waters at the war's end. German and British reserves, estimated at 302,857 tons, also ended up on the seabed.⁴² Between 1918 and 1970, the US military recorded 74 substantial disposals of CWs, much of it in the form of artillery shells and bombs. However, in some instances, the military loaded unneeded chemical stockpiles into ships, sinking the cargoes intact.⁴³ Radioactive residue from the manufacture of plutonium also increased exponentially during the period immediately

³⁸ “Environmental Impacts of Conflicts and War,” Institute for Environmental Security, *EnviroSecurity Action Guide*, accessed December 13, 2013,

<http://www.envirosecurity.org/actionguide/view.php?r=18&m=webresources>; and “Environmental Impacts,” April 1, 2003, Environmental Literacy Council, accessed December 13, 2013,

<http://www.envirosecurity.org/actionguide/view.php?r=18&m=webresources>.

³⁹ “World War II's Time Bomb,” National Geographic Society, Resources, *National Geographic Magazine*, October 2003, Environment, accessed December 12, 2013,

http://ngm.nationalgeographic.com/ngm/0310/resources_geo.html.

⁴⁰ Jacqueline Michel, Trevor Gilbert, Dagmar Schmidt Etkin, and Robert Urban, “Potentially Polluting Wrecks in Marine Waters,” an issue paper prepared for the 2005 International Conference on Oil Spills, Washington, DC, p. 8, accessed December 12, 2013, http://www.environmental-research.com/erc_papers/ERC_paper_31.pdf. See also Jessica Marshall, “World War II Shipwrecks Pose Oil Spill Threat,” *Discovery News* online, November 27, 2012, accessed December 12, 2013, <http://news.discovery.com/earth/weather-extreme-events/shipwreck-oil-spill-uss-arizona-110722.htm>.

⁴¹ Amanda M. Graham, “An Environmental Study of USS Arizona Bunker C Fuel Oil,” in *Long-Term Management Strategies for USS Arizona, A Submerged Cultural Resource in Pearl Harbor*, ed. Larry E. Murphy and Matthew A. Russell (Washington, DC: Department of Defense, Legacy Resources Management Program and the National Park Service, Submerged Resources Center, Santé Fe, New Mexico, US Department of the Interior, 2008), chap. 8, 295–386.

⁴² Caroline Ong, Tamara Chapman, Raymond Zillinkas, Benjamin Brodsky, and Joshua Newman, “Chemical Weapon Munitions Dumped at Sea: An Interactive Map,” CNS, James Martin Center for Nonproliferation Studies, online publication, accessed December 12, 2013, http://cns.miis.edu/stories/090806_cw_dumping.htm.

⁴³ Ong, Chapman, Zillinkas, Brodsky, and Newman, “Chemical Weapon Munitions Dumped at Sea.”

after the war. With 114 facilities at the peak of the Cold War, well over 52,000 tons of dangerously radioactive spent fuel, 91 million gallons of high-level waste from plutonium processing, and 500,000 tons of depleted uranium still require disposal.⁴⁴ “War,” as historian Jurgen Brauer observed, “is not good for the environment.”⁴⁵

Most scholars agree, however, that the effects of industrialism unleashed by World War II had a greater impact on the environment than weapons and combat.⁴⁶ The massive mobilization of natural and human resources and advances in technology altered the world entirely in ways we still experience. American industry achieved unheard of levels of production. Advances in drilling and transporting oil; new materials, such as synthetic rubber; and new methods used to manufacture of plastic, fiberglass, polyester, and plywood transformed both domestic and commercial products.⁴⁷

Innovations in food preparation and preservation, new ways of manufacturing vitamins, and countless new products from plastic wrap to aluminum foil were additional indirect results of the war.⁴⁸ The development of radar and new forms of telecommunications, advances in packaging, and revolutionary improvements in airplane manufacture and technology combined to give fresh impetus to US industry and set the course for an increasingly globalized economy.⁴⁹ The aeronautical powerhouses of Boeing, Lockheed, and Northrup-Grumman were all the result

⁴⁴ Harold Felveson, Zia Mian, M.V. Ramana, and Frank von Hippel, *Managing Spent Fuel from Nuclear Power Reactors: Experience and Lessons from around the World* (Princeton, NJ: International Panel on Fissile Materials (IPFM), 2011), 4–8, accessed December 12, 2013, <http://www.princeton.edu/sgs/publications/ipfm/Managing-Spent-Fuel-Sept-2011.pdf>.

⁴⁵ Lallanilla, “Bombed.” See Jurgen Brauer, *War and Nature: The Environmental Consequences of War in a Globalized World*, Globalization and the Environment Series (New York: AltaMira Press, 2011).

⁴⁶ For example, see “War and the Environment: War Can Wreck Landscapes as well as People,” World Watch Institute, 2013, accessed December 12, 2013, <http://www.worldwatch.org/node/5520>; Jacob Darwin Hamblin, “World War II and the Environment,” *Minds in a Groove* (blog), accessed December 12, 2013, <http://jacobdarwinhamblin.com/2013/01/18/world-war-ii-and-the-environment/>; Jacob Darwin Hamblin, *Arming Mother Nature: The Birth of Catastrophic Environmentalism* (New York: Oxford University Press, 2013); and Richard P. Tucker, “War and the Environment,” World History Connected, Forum, Champaign-Urbana, University of Illinois, 2011, accessed December 12, 2013, http://worldhistoryconnected.press.illinois.edu/8.2/forum_tucker.html.

⁴⁷ Carroll Purcell, *Technology in Postwar America: A History* (New York: Columbia University Press, 2007).

⁴⁸ Josephine G. Hendon, *Concise Companion to Postwar American Literature and Culture* (London: Wiley, 2004), 62–65.

⁴⁹ Excellently summarized in Ben Judy, “Five Innovations from World War II,” *Big Design*, September 24, 2011, accessed December 2, 2013, <http://bigdesignevents.com/2011/09/innovations-from-world-war-ii/>.

of wartime investment, as was the growth of the famous airplane manufacturing centers of Seattle, Washington, and Burbank, California.⁵⁰

Positive outcomes had negative aspects, however. The conversion of farmland for the commercial production of wheat, cotton, and other crops and the introduction of a growing arsenal of synthetic fertilizers and poisons, notably DDT, would have cumulative negative impacts on the environment.⁵¹ Timber production—facilitated by the US Forest Service during the war—reached epic proportions and instituted forest management practices still affecting the industry today.⁵² Mines tailings, contamination, erosion, and the disruption of fish and wildlife habitats all diminished the quality of the North American environment. Small impacts sometimes led to cumulative destruction. In the Pacific island of Chuuk (then called Truk), native fishermen employed remnant explosives for “blast fishing,” a practice that destroyed both reefs and fish populations.⁵³ Other Pacific Island peoples abandoned traditional foods for American canned goods, forever altering their societies, their relationship to the environment, and in some cases, their health.

The war also profoundly disrupted the lives of both soldiers and civilians and the health of survivors. Although American losses pale in comparison to the overall number worldwide

⁵⁰ Carol L. Cook, “The Aerospace Industry: Its History and How It Affects the U.S. Economy,” Yale-New Haven Teachers Institute (New Haven, CT: Yale-New Haven Teachers Institute, 2013), chap. 11, accessed October 12, 2012, <http://www.yale.edu/ynhti/curriculum/units/1990/7/90.07.06.x.html>; and Glenn E. Bugos, “The History of the Aerospace Industry,” EH.net, Economic History Association, October 18, 2013, accessed December 12, 2013, <http://eh.net/encyclopedia/the-history-of-the-aerospace-industry/>.

⁵¹ Kinkela, *DDT and the American Century*. The literature on the impact of pesticides on the environment is enormous. Rachel Carson’s *Silent Spring* (Houghton Mifflin, 1962), the clarion call for the environmental movement of the 1960s, discusses fertilizers and pesticides at length. On fertilizers, see William L. Hall and Wayne P. Robarge, eds., *Environmental Impact of Fertilizer on Soil and Water*, ACS Symposium Series (Washington, DC: American Chemical Society, 2004).

⁵² For insights into the government’s role, see Lincoln Bramwell, *Forest Management for All: State and Private Forestry in the U.S. Forest Service* (Durham, NC: Forest History Society, 2013); James G. Lewis, *The Forest Service and the Greatest Good: A Centennial History* (Durham, NC: Forest History Society, 2006); and Harold K. Steen, *The U.S. Forest Service: A History* (Durham, NC: Forest History Society, 2004).

⁵³ John Naughton, “Blast Fishing in the Pacific,” *SPC Fisheries Newsletter* 33 (June 1985): 16–20; J. D. Bell, B. D. Ratner, I. Stobutzki, and J. Oliver, “Addressing the Coral Reef Crisis in Developing Countries,” *Ocean and Coastal Management* 49, no. 12 (2006): 976–85.

killed in the war—a conservative estimate of the war's total fatalities is 72 million⁵⁴—many families lost fathers, sons, husbands, wives, daughters, and mothers. World War II caused more deaths than any war since the Civil War: 291,557. Another 671,846 veterans returned from combat wounded or disabled.⁵⁵ American veterans, as the beneficiaries of new advances in medical technology—significant improvements in sulfa drugs and the introduction of penicillin, as well as new surgical procedures, saved many injured soldiers and sailors—still suffered long-term impacts from the war.

Other than wartime injuries and stress-related illnesses, US service personnel also faced diminished life expectancies as a result of chemical exposure and—perhaps most notably—nicotine addiction. By 1986, lung cancer deaths in the United States had increased by 900 percent, much of this attributable to the prevalence of wartime smoking⁵⁶; the Army K-ration, the high-energy and high-calorie staple of combat troops, included ten-packs of cigarettes, setting many young soldiers on the course of addiction.⁵⁷ Nuclear testing also had long-term consequences. Over 25,000 US, British, French, and Australian servicemen served as guinea pigs

⁵⁴ “Percentages/Numbers/Financials/Rankings, World War II Statistics,” <http://www.statisticbrain.com/world-war-ii-statistics/>. See also “World War 2 Casualty Statistics,” Second World War History, World War 2 History by Nation, Event, and Date, accessed December 13, 2013, <http://www.secondworldwarhistory.com/world-war-2-statistics.asp>; and “By the Numbers: World-Wide Deaths,” The National World War II Museum New Orleans, accessed December 12, 2013, <http://www.nationalww2museum.org/learn/education/for-students/ww2-history/ww2-by-the-numbers/world-wide-deaths.html>.

⁵⁵ Anne Leland and Mary-Jana “M-J” Oboroceanu, American War and Military Operations Casualties: Lists and Statistics,” Congressional Research Service, February 26, 2010, 2–5, accessed December 13, 2013, <http://www.fas.org/sgp/crs/natsec/RL32492.pdf>.

⁵⁶ Kelly Bedard and Olivier Deschênes, “The Long-Term Impact of Military Service on Health: Evidence from World War II and Korean War Veterans.” *American Economic Review*, 96, no. 1 (2006): 176–94; and “Lung Cancer as it Affects Veterans and Military,” Lung Cancer Alliance, accessed December 13, 2013, <http://www.lungcanceralliance.org/special-features/special-focus-on-veterans-and-lung-cancer/lung-cancer-and-wartime-exposure.html>.

⁵⁷ US Army Quartermaster Foundation, Fort Lee, Virginia, Rations: Conference Notes, prepared for the Quartermaster School, for the Quartermaster General, January 1949, “History of Rations,” accessed December 12, 2013, http://qmfound.com/history_of_rations.htm; Todd Tucker, *The Great Starvation Experiment: The Heroic Men Who Starved So That Millions Could Live* (New York: Simon & Schuster, 2006), 30–31; and Mark R. Henry and Mike Chappell, *The US Army in World War II*, Vol. 1., *The Pacific* (Bodley, Oxford: Osprey Publishing, 2000), 20–21.

in the nuclear tests of the postwar period, many of them suffering outbreaks of leukemia and other forms of cancer years later.⁵⁸ The war, indeed, had its consequences.

Aftermath

World War II had residual impact on the park and on NPS operations in Hawai'i well into the next two decades. Once uses were permitted, military planners were reluctant to give up these rights. This was as true for Kīlauea as it was for Haleakalā. The same was evident, as well, for areas outside the park as the military established permanent training area and facilities at sites such as Makua on O'ahu and Barking Sands on Kaua'i.

Elemakule Range

Never used by the Army, the Elemakule Range reverted to Navy use in the final months of the war. Following the incident of the aerial strafing of fishermen in March 1945, the Army pressed the Navy to cease its own noncompliant activities there. In December 1945, the Army formally relinquished its two acres at Āpua Point. In the early part of 1946, Paul Baldwin, writing on behalf of the superintendent, asked that the Navy relinquish its claims and allow the land to transfer to the park as part of the originally proposed Kalapana Extension.⁵⁹

It would take another two years before the Army finally expressed a willingness to have the Elemakule Range removed from its list of training sites. The Navy did not concur. As late as September 1948, it was still using the range occasionally for missions.⁶⁰ Strongly condemned by the NPS, the Navy's use led eventually to a reconsideration of the status of the range. In a memorandum dated October 5, 1948, General Robert Travis (1904–1950), Commanding

⁵⁸ Peter Walker, "Nuclear Test Veterans Victims of 'Cavalier Attitude,' High Court Told," *The Guardian* online, January 21, 2009, accessed December 31, 2013, <http://www.theguardian.com/uk/2009/jan/21/south-pacific-nuclear-veterans-sue>.

⁵⁹ Paul H. Baldwin to Regional Director, Region Four, memorandum, February 19, 1946, Record Group 79, Box 151, NARA San Bruno; and Jackson, *Administrative History*, 91.

⁶⁰ Moniz Nakamura, "Up in Arms!" 30; and Jackson, *Administrative History*, 93.

General of the Pacific Air Command, headquartered at Hickam Air Force Base, put an end to the range.⁶¹ Soon after, the Army began removing unexploded ordnance at the site.

In May 1950, the secretaries of war and interior finally revoked the order of withdrawal and the land in question could be returned to the parcel designated for acquisition by the NPS.⁶² This finally went into effect on June 14, 1950. During the Cold War, the Navy submitted a new request to use the site—including over 30,000 acres—for training.⁶³ Considerable public opposition met the proposal as well as formal protests from Interior and NPS; in 1957, permission was denied.⁶⁴

Kau Desert Impact and Training Area

The Kau Desert Impact and Training Area, sometimes referred to as the Kau Desert Maneuver Area, was never officially ceded to the Army. It came into being because of martial law and the exigencies of war. A constant thorn in Superintendent Wingate's side, the Army finally relinquished the area in early 1945. In April the following year, military demolitions experts removed unexploded ordnance and depleted shells from the area. They also “flattened” tank and other heavy equipment tracks and attempted to restore some of the original character of the fragile, arid surface.⁶⁵

In spring 1949, at the Park Service's urging, military specialists returned to the site, examining trails and road for remaining possible projectiles.⁶⁶ The NPS rejected this approach and between June and November 1949, and again in 1950, explosives specialists from Schofield Barracks completed a more thorough removal program.⁶⁷ Among materials removed were

⁶¹ General Robert Travis to Secretary of the Interior [Julius A. Krug], October 5, 1948, Record Group 79, Box 151, NARA San Bruno, cited in Jackson, *Administrative History*, 93. See Moniz Nakamura, “Up in Arms!” 30.

⁶² Jackson, *Administrative History*, 93.

⁶³ Jackson, *Administrative History*, 98.

⁶⁴ Moniz Nakamura, “Up in Arms!” 30; and Jackson, *Administrative History*, 98.

⁶⁵ Superintendent's Monthly Reports, January and April 1946.

⁶⁶ Jackson, *Administrative History*, 97; and Superintendent's Monthly Reports April 1949.

⁶⁷ Superintendent's Monthly Reports June and November 1949, February 1950.

several 500-pound bombs as well as many smaller projectiles. The work, no doubt, could never be called complete. In 1955, Superintendent John Wosky complained of dud bombs or shells still being discovered in the K'au Desert area.⁶⁸ Damage to the surface, successional plants, and habitats will never be fully calibrated.

Kilauea Airfield

The Army created an airfield at Kilauea as early as 1924.⁶⁹ This was destroyed by the May 1924 eruption of Kilauea and was replaced by a new field located between Uwēkahuna and Kilauea Military Camp, named Boles Field. This remained in use for fifteen years primarily for recreational purposes. As part of its war planning, the military surveyed several sites on Hawai'i as possible airfields and emergency landing strips. The optimum site was Keauhou, though cost ultimately prevented its development. Other fields, notably Morse Field at the south end of the island and Hilo, became the primary airfields for the military in Hawai'i. A field at Waimea served Camp Tarawa after 1944.

The military and NPS approved the existing airfield at Kilauea for emergency use, but the Civil Aviation Authority (CAA) cautioned that it was unsafe for military aircraft.⁷⁰ In 1941, following the Pearl Harbor attack, CCC workers assisted the military in plowing and obstructing the single field to render it unusable by the enemy. Nearly two years later, in December 1943, the Army leveled the field again to use as a training site for spotter planes employed in exercises at the Kau Desert Training and Impact Area.⁷¹ This field was on the same site as the early

⁶⁸ Jackson, "Bombs in a National Park," 106; Superintendent's Monthly Reports January and February 1950 and January 1955; and Moniz Nakamura, "Up in Arms!" 31.

⁶⁹ "Boles Field' Name of New Volcano Airport," *Hilo Tribune-Herald*, March 16, 1925; "Landing Field for Volcano assured Soon," *Honolulu Advertiser*, January 6, 1925; Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-38-41; and "The Beginning of Aviation on the Big Island," Hawaii Aviation: An Archive of Historic Photos and Facts, accessed October 12, 2012, <http://hawaii.gov/hawaiiaviation/hawaii-airfields-airports/hawaii/the-beginning-of-aviation-on-the-big-island/>.

⁷⁰ Jackson, *Administrative History*, 88.

⁷¹ Memorandum to the Superintendent, Herbert R. Rennie, January 1942, Superintendent's Monthly Reports, December 1941, HAVO Archives.

airfield—a sandy stretch of land southeast of Halema‘uma‘u Crater. Park Service director Newton B. Drury (1889–1978) indicated in August 1945 that airfield were incompatible with NPS policy, although suggesting too that he was open to revising the rules for Kīlauea and some other parks. However, in 1946, the CAA concluded there was no need for an airfield in the park, a policy later reinforced by legislation.⁷²

Kilauea Military Camp

The Kilauea Military Camp is the most lasting reminder of the military in the park. A product of the pre–World War I era, KMC gained an even stronger foothold during the war, serving successively as the headquarters for the Hawaii District, as a temporary confinement camp for Japanese Americans and as a prisoner-of-war facility beginning in 1945. At the end of the war, the recreation facility resumed its role as a headquarters for Hawai‘i’s military district.

Throughout the war, KMC housed soldiers and officers and, as the war progressed, a growing number of convalescing troops. Throughout his thirteen-year tenure as superintendent of Hawaii National Park, Edward Wingate pressed for the eventual removal of the camp. He believed that the war’s end provided the NPS an opportunity to reclaim the site and hoped the Army would build another facility in its new Puhakuloa Training Area in the island’s saddle north of Mauna Loa, where the CCC had maintained a camp.

Regional Director O. A. Tomlinson agreed with Wingate’s aim and by October 1944, prompted an exchange at the department level between Abe Fortas, acting Secretary of the Interior and Secretary Henry L. Stimson of the War Department.⁷³ Throughout 1945, the Army continued to press for new additions to the facility despite continuing resistance from Wingate and other park officials. This battle continued into 1946, with the Interior Department again

⁷² Jackson, *Administrative History*, 88.

informing the Army that it should consider moving and the military replying that there was too much money invested in the camp for the military to consider such a step.⁷⁴

Tomlinson reported in April 1946 that the military camp was indeed becoming permanent.⁷⁵ (General Dwight Eisenhower's weeklong visit in May 1946 lent even further prestige to the camp.⁷⁶) and commented on the Hawaii District headquarters and the existing prisoner-of-war camp located within the facility. Meeting as well with the military's real estate officer, Tomlinson also pressed for the removal of the camp, now even more tangibly established because of wartime use. In the next few months, the Navy approached Superintendent Francis (Frank) Oberhansley (1896–1967) about reestablishing a Navy rest camp at Kīlauea, a step that would further enhance the facility's presence.⁷⁷

On October 16, 1946, Interior Secretary Julius Albert Krug (1907–1970) wrote to the Secretary of War, by then Robert P. Patterson (1891–1952), outlining the department's position.⁷⁸ The Army would be allowed to continue at the camp until April 8, 1956, but after that date, would move to another location. The War Department asked first for a five-month extension from the proposed closing date. The Interior Department, surprisingly, then equivocated on the ending date and allowed for the possibility that the “permit continue indefinitely.”⁷⁹

The Army prepared a new master plan and, over the next few years, continued adding to its facilities. Although military use fell off in 1949 as a result of the decreased military presence in

⁷³ Secretary of the Interior [Fortas] to the Secretary of War [Stimson], October 21, 1944, Record Group 79, Box 158, NARA San Bruno.

⁷⁴ Jackson, *Administrative History*, 73–76.

⁷⁵ O. A. Tomlinson to Director, memorandum, April 19, 1946, Record Group 79, Boxes 25 and 151, NARA San Bruno.

⁷⁶ “Camp Commander's Wife's Retrospective on Eisenhower's Visit,” *Hilo Tribune-Herald*, December 14, 1986; and “Preserving the Past,” *Hawaii Army Weekly* online, April 29, 2011, accessed December 12, 2013, <http://www.hawaiiarmyweekly.com/2011/04/29/preserving-the-past/>.

⁷⁷ Frank Oberhansley to Major O. A. Tomlinson, Regional Director, August 12, 1946, Record Group 79, Boxes 25 and 158, NARA San Bruno.

⁷⁸ Secretary of the Interior Julius Albert Krug to Secretary of War [Patterson], October 16, 1946, Record Group 79, Box 151, NARA San Bruno.

⁷⁹ Cited in Jackson, *Administrative History*, 78.

the islands, Superintendent Oberhansley advocated on behalf of the military, suggesting that if the NPS were to take over the facility it could still be primarily for military use.⁸⁰ However, in 1951 with the advent of the Korean War, the camp gained a new lease on life. After May 1951, the Army invested new resources in the camp as it received a growing number of visitors.⁸¹

While the NPS approved new additions and modifications to the camp, it was not clear its existence would extend beyond the 1956 end to the lease agreement. Asked for his opinion, Superintendent Wosky recommended a lease extension. Although the Interior Department considered a ten-year lease, the Army eventually secured a permit for an additional twenty years.⁸² Facing occasional problems in management and disagreements over fees and costs, KMC's existence has perpetuated through additional agreements and currently serves as a Joint Services Recreation Center within the park.⁸³

Red Hill (Pu'u 'Ula'ula)

The Army's Red Hill radio relay station was still in place at the time of the war's end. The Department of the Interior issued a revised special-use permit on April 11, 1945, allowing the site's use as a communications station "for a period not to exceed 6 months after the war."⁸⁴ In March 1946, its six-month lease expiring, the Army vacated the base camp at Pu'u Nianiau, an undertaking documented in Ranger-in-Charge Hjort's monthly report.⁸⁵

In September 1946, Wingate's successor Oberhansley wrote to the General Edwin Bowman Lyon (1892–1971), commanding general of the US Army Forces, Middle Pacific

⁸⁰ Frank Oberhansley to Director, memorandum, October 11, 1949, Record Group 79, Box 151, NARA San Bruno, cited Jackson, *Administrative History*, 79.

⁸¹ Jackson, *Administrative History*, 80; and Tomonari-Tuggle and Bouthillier, *Integrated Cultural Management Plan*, III-55-58.

⁸² Jackson, *Administrative History*, 80–84.

⁸³ "Kilauea Military Camp," Mountain Cottages and Resort, Joint Services Recreation Center, accessed December 2, 2013, <https://www.kmc-volcano.com>.

⁸⁴ Jackson, "Military Use," 132.

⁸⁵ Superintendent's Monthly Reports, March 1946.

(MIDPAC), about the Army's continued presence at Red Hill. He suggested the military might consider transferring the plant at Pu'u Nianiau in exchange for relief from cleaning up the Red Hill site. He further emphasized that the Army needed also to remove remaining equipment at the former communications station.⁸⁶ In April 1947, the US Army Corps of Engineers agreed to return the base camp to NPS use but ignored the question of Red Hill.⁸⁷

On March 15, 1948, Oberhansley wrote to the NPS regional director, explaining that the Red Hill station was inoperative and even lacked power. Oberhansley recommended that the NPS take immediate steps to exercise its right of ownership and expel the military from the site. He also wanted the Army held accountable for restoration.⁸⁸ A little over two weeks later, the Army Corps of Engineers reported that it was indeed vacating the site, now needed by the Air Force for new "highly classified" purposes. Oberhansley's further inquiry met with a claim that the Air Force had a "definite need" for the site, in addition to that in place at Kolekole nearby.⁸⁹

In May 1948, Oberhansley visited the site, noting that the Army, Air Force, and Mutual Telephone Company all had plans for Red Hill.⁹⁰ He noted the new telephone line to the Kolekole station erected outside the park but reflected that the Army was not ready to relinquish claims on Red Hill.⁹¹ Two years later, in June 1950, he reported that the billets at Red Hill were demolished and the unsightly telephone poles—the "Haleakala National Forest" that Ranger Hjort had long before complained about—removed.⁹²

With the American action in Korea, the Army's stance solidified. On October 24, 1950, the Secretary of the Interior granted an extension of the April 11, 1945 special-use permit for a period up to six months after the end of hostilities.⁹³ Finally, on October 22, 1953, the Air Force

⁸⁶ Frank Oberhansley to Commanding General, MIDPAC, September 14, 1946, Hawaii National Park Historic Records, Red Hill, File Code 601-05.1.

⁸⁷ Jackson, "Military Use," 133; and Jackson, *Administrative History*, HALE, 54.

⁸⁸ Frank Oberhansley to Director, memorandum, March 15, 1948, Hawaii National Park Historic Records, Red Hill, File Code 601-05.1.

⁸⁹ Jackson, "Military Use," 133; and Jackson, *Administrative History*, HALE-54.

⁹⁰ Superintendent's Monthly Reports, May 1948.

⁹¹ Superintendent's Monthly Reports, May 1948.

⁹² Superintendent's Monthly Reports, June 1948.

⁹³ Jackson, *Administrative History*, HALE-55.

agreed to declare the property “excess” but resisted the NPS request that the site be restored to its previous condition.⁹⁴

In 1955, the University of Hawaii asked to use the Air Force’s buildings on Red Hill as a “geophysical observatory.”⁹⁵ In a letter dated January 14, 1955, the director of Region Four of the NPS cautioned the director that this would not be advisable. He thought it likely that, were the university to establish a presence on the site, it would be unlikely to leave in the future.⁹⁶ The university’s plans, however, were soon overturned by the Air Force, which expressed a new interest in the site.⁹⁷ By December, the Navy was making use of the facilities, to be joined by the Air Force in January 1956.⁹⁸ The Air Force remained a presence, in turn, until August the same year, after which time they removed most of the existing buildings.⁹⁹

In February 1958, the Air Force again requested use of the station, first for two months and then again for an additional two months. Granted the request, they used the existing buildings and temporary trailers. Although their stay was short, a year later, in May 1959, a delegation of officers from the Hawaii Air National Guard (HANG) examined the site for future use.¹⁰⁰ Public Law 86-149 of August 10, 1959, authorized the construction of two radar stations for the islands’ defense. The law did not specifically mention the Red Hill site, but it was evident to the NPS that the proposed twin towers just outside the park boundaries seemed dependent on plans for reuse of the facilities at Red Hill.¹⁰¹ The Interior Department immediately informed

⁹⁴ Jackson, *Administrative History*, HALE-55-56.

⁹⁵ Jackson, “Military Use,” 134.

⁹⁶ Director, National Park Service, Region Four, to Director, memorandum, January 14, 1955, Hawaii National Park Historic Records, Red Hill, File Code 601-05.1.

⁹⁷ Jackson, “Military Use,” 134.

⁹⁸ Jackson, “Military Use,” 134; and Jackson, *Administrative History*, HALE-56.

⁹⁹ Jackson, *Administrative History*, HALE-56.

¹⁰⁰ Jackson, “Military Use,” 134.

¹⁰¹ “An Act to Authorize Certain Construction at Military Installations, and for Other Purposes,” Public Law 86-149, August 10, 1959, US Congress, Statutes, accessed October 12, 2013, <http://www.gpo.gov/fdsys/pkg/STATUTE-73/pdf/STATUTE-73-Pg302-2.pdf>.

Secretary of the Air Force Dudley C. Sharp (1905–1987) that it found the towers intrusive and that the Interior Department wished to review any plans.¹⁰²

While the Air Force put pressure on the William F. Quinn (1919–2006)—the last appointed and first elected governor of Hawai‘i—the NPS gained the support of the University of Hawai‘i’s director of research, Robert W. Hiatt.¹⁰³ Hiatt questioned the effect of a radar station on the university’s own research program at Kolekole, pointing out that, in the case of other observatories, no low-powered radio transmitters were allowed within fifty miles.¹⁰⁴ The Hawaiian Astronomical Society put their opposition on record as well.¹⁰⁵

The Air Force prevaricated, suggesting a station at Kolekole itself or at White Hill (Pa Ka‘oao), also within the park.¹⁰⁶ This possibility provoked even more opposition from both the park and the university scientists.¹⁰⁷ However, by November 1960, the university retreated from its earlier position and stated that they would not object to the radar station at Red Hill as long as it did not affect their own programs at Kolekole.¹⁰⁸ Matters lingered for another two years, by which time Governor Quinn began to question the project.¹⁰⁹ By January 1962, the Air Force had finally shifted its position and opted for joint use of a site employed by the Federal Aviation Authority at Mount Ka‘ala on O‘ahu.¹¹⁰

¹⁰² Secretary, Department of the Interior, to Secretary of the Air Force [Dudley C. Sharp], December 30, 1959, Hawaii National Park Historic Records, Red Hill, File Code 601-05.1; and Jackson, “Military Use,” 135.

¹⁰³ Robert W. Hiatt, Dean and Director of Research, to General Valentine Sieferman, May 12, 1960, Hawaii State Archives, Haleakala Radar Station, Governor William F. Quinn files; and Jackson, “Military Use,” 135, 141n.4.

¹⁰⁴ Hiatt to Sieferman, May 12, 1960; and Jackson, “Military Use,” 135, 141n.4.

¹⁰⁵ Jackson, *Administrative History*, HALE-58.

¹⁰⁶ Jackson, *Administrative History*, HALE-58-59.

¹⁰⁷ Jackson, *Administrative History*, HALE-59.

¹⁰⁸ Robert W. Hiatt, Dean and Director of Research, to Governor William F. Quinn through Senator Hiram Fong, April 27, 1960, Hawaii State Archives, Haleakala Radar Station, Governor William F. Quinn files; and Jackson, “Military Uses,” 136.

¹⁰⁹ Jackson, “Military Uses,” 136–37.

¹¹⁰ Jackson, *Administrative History*, HALE-62-63.

In subsequent years, the Red Hill radar station has been the site of a temporary tracking station and other experimental uses.¹¹¹ The University of Hawai‘i and other agencies, including the US Air Force and the National Air and Space Administration, continue to occupy the now-extensive facility at the peak of Kolekole, known as “Science City.”¹¹² In 1962, the park removed the old CCC and other buildings at Pu‘u Nianiau, fearing that other agencies would continue to seek their use.¹¹³ The NPS later turned down additional requests to place facilities there. With the exception of permits for cable and power lines, the park at Haleakalā no longer supports nonpark activities. What the Army started in 1941 finally became part of history.

Other War Impacts

World War II was a dramatic time for Hawai‘i. The military population at times reached into the hundreds of thousands. There were camps—some housing as many as 20,000 soldiers or Marines—warehouses, specialized facilities (such as radar stations), wharves, and other marine facilities, training areas, and internment and prisoner-of-war installations. The war had indirect consequences in Hawai‘i as well, including the use of civil and commercial buildings and of the specially recognized properties of the National Park Service.

The Hawaii National Park, with its two sections at Haleakalā and Kīlauea, was very much a part of this story. Both sections felt the effects of thousands of military and civilian visitors. They also provided sites and facilities for military uses, from the headquarters for the Hawaii District in 1942 and again in 1946 at Kīlauea, through training areas and bombing sites, to the much-contended radar station at Red Hill on Haleakalā. Kīlauea was clearly the most affected section of the park, with its many military uses and through less direct activities,

¹¹¹ Jackson, “Military Uses,” 138–39; and Jackson, *Administrative History*, HALE-63-64.

¹¹² “Haleakala Observatories,” Institute of Astronomy, University of Hawai‘i, accessed December 1, 2012, <http://www.ifa.hawaii.edu/haleakalanew/observatories.shtml>.

¹¹³ Jackson, “Military Uses,” 140.

including the opening in June 1942 of over 6,000 acres of former pasture for the Kapapala Ranch for grazing under the pretext of wartime need.

Many of the war's impacts were subtle. Others, including the effects of over three years of unit training and maneuvers in the K'au Desert, had consequences less visible to the untutored eye but still of profound importance to the existing and future ecology of the areas affected. Later military activities, such as the US Army Corps of Engineers' harbor dredging project at Kawaihae, introduced new features to the landscape and caused incalculable damage to the coastal environment.¹¹⁴

Still, the visible remains of the war are, in fact, few. At Kahuku Ranch, now a part of Hawai'i Volcanoes National Park, are the ruins of a fixed radar station built in 1942 and vacated by the end of the war. At Pu'ukoholā Heiau National Historic Site, visitors can view evidence of a tank and Amtrac (LVT) road cutting below the site's impressive *heiau*. Occasional shell fragments, casings, and even unexploded ordnance are all legacies of the war, as are peoples' memories of Hawai'i's war years. The impacts on culture and the environment were profound, but now, surprisingly, they are difficult to see on the ground. The most important consequences were at a larger scale.

Expansion of the National Park Service Mission

One of the most positive developments of the postwar period was the burst of new recreational choices for many Americans. The car added mobility. The growth of the commercial aviation industry—itself a by-product of wartime technology and production—made long-distance travel possible and affordable. Prewar attractions, such as Colonial Williamsburg, gained a new audience, as did traditional amusement parks throughout the country.¹¹⁵ Targeting the many

¹¹⁴ Francis E. Sargent, Dennis G. Markle, and Peter J. Grace, Coastal Engineering Research Center, *Case Histories of Corps Breakwater and Jetty Structures*, Report 4, Pacific Ocean Division (Vicksburg, MS: Corps of Engineers, US Army, 1988), accessed May 6, 2012, <http://www.dtic.mil/dtic/tr/fulltext/u2/a199879.pdf>.

¹¹⁵ Susan G. Davis, "Time Out: Leisure and Tourism," in *A Companion to Post-1945 America*, chap. 4, ed. Jean-Christophe Agnew and Roy Rosenzweig (Oxford: Blackwell, 2006), *Blackwell Reference Online*, accessed December 31, 2013, http://www.blackwellreference.com/public/tocnode?id=g9781405149846_chunk_g97814051498466.

new residents of Southern California, entrepreneur Walt Disney opened his new park in the orange groves of rural Anaheim in July 1955, ushering in a new era of family-oriented entertainment.¹¹⁶

The dramatic expansion of the national park system was also a product of the country's newfound wanderlust. With many parks neglected during the war, the National Park Service embarked on a campaign of repairs and improvements at existing parks and a fresh strategy for new facilities and sites. From 137 national parks in 1933, there were 239 by 1964. Eleven of the new parks embraced traditional "natural" areas. Seventy-five of the new parks focused on "Historic Areas;" and sixteen fit the relatively new category of "Recreation Areas."¹¹⁷

The period between the war's end and 1960 witnessed the addition of such famous places as Grand Teton National Park, in 1950; Virgin Islands National Park, in 1956; and Petrified Forest National Park, in 1958. Other additions included the development of the Jefferson National Expansion Memorial in St. Louis, beginning in 1947, and Independence National Park in Philadelphia in 1948, both innovative—though in retrospect, perhaps misguided—exercises in city planning and urban renewal.¹¹⁸ There were also new, more dispersed urban parks, such as the Minute Man National Historical Park in Boston, which incorporated a range of buildings and sites significant during the Revolutionary War period, and the unlinked sites of Federal Hall,

¹¹⁶ Randy Bright, *Disneyland: Inside Story* (New York: Harry L. Abrams, 1987). See also Lawrence Culver, *The Frontier of Leisure: Southern California and the Shaping of Modern America* (Oxford: Oxford University Press, 2010).

¹¹⁷ Harper's Ferry Center [Janet McDonnell, ed.], *The National Parks: Shaping the System*, rev. ed. of Barry Mackintosh, *The National Parks* (1985; Washington, DC: National Park Service, US Department of the Interior, 1991), 46–79, accessed December 12, 2013, http://www.nps.gov/history/history/online_books/shaping/contents.pdf. See also Horace M. Albright, Russell E. Dickenson, Jr., and Mary Lu Moore, *National Park Service: The Story behind the Scenery* (Wickenburg, AZ: KC Publications, 1987); and Alfred Runte, *National Parks: The American Experience*, 4th ed. (New York: Taylor Trade Publishing, 2010), 187–205.

¹¹⁸ "History and Culture," National Park Service, Jefferson National Expansion Memorial, Missouri, accessed December 10, 2012, <http://www.nps.gov/jeff/historyculture/index.htm>; and Charles Mires, "Independence

Hamilton Grange, Grant Memorial, Theodore Roosevelt Birthplace, and Sagamore Hill, Roosevelt's Long Island estate, in New York.¹¹⁹

One of the great new developments was the expansion of the national seashores. Joining with Cape Hatteras National Seashore, which entered the national park system in 1937, there were new seashore parks at Cape Cod, Massachusetts (1961), Point Reyes, California (1962), Padre Island, Texas (1962), and Assateague Island, straddling Maryland and Virginia (1965). There were also new reservoir-related parks at Coulee Dam, Washington (1946), Shadow Mountain, Colorado (1952), and Glen Canyon, Arizona (1958).¹²⁰

In 1956, NPS director Conrad L. Wirth (1889–1993) inaugurated a new ten-year program to improve the parks and their facilities and make them more accessible to the US public. With an emphasis on recreation and education, the “Mission 66” program called for visitor centers, new exhibitions, audio-visual aids, and more campgrounds and picnic areas.¹²¹ By 1960, fifty-six visitor centers were under construction, with many more to follow.¹²² Conceived as a contribution to the Park Service's fiftieth anniversary, Mission 66 broke with long-standing “rustic” design traditions and brought modern architecture and planning to many NPS sites. In 1964, following up on recommendations first broached in 1941, the NPS added another dimension to its plan for change with the report, *Parks for America, A Survey of Parks and Related Resources in the Fifty States and a Preliminary Plan*. This report called for a radical reappraisal of the service's mission and a fresh commitment to protecting the country's historic and natural resources.¹²³

National Historical Park, *The Encyclopedia of Greater Philadelphia* online, accessed October 12, 2011, <http://philadelphiaencyclopedia.org/archive/independence-national-historical-park>.

¹¹⁹ National Parks of New York Harbor, National Park Service, US Department of the Interior, accessed December 12, 2013, <http://www.nps.gov/npnh/index.htm>.

¹²⁰ Harper's Ferry Center, *National Parks*.

¹²¹ Ethan Carr, *Mission 66: Modernism and the National Park Dilemma* (Amherst: University of Massachusetts Press, 2007).

¹²² Carr, *Mission 66*.

A second report, by a committee headed by noted naturalist A. Starker Leopold (1913–1983), issued in 1963, further defined the Park Service's approach to management.¹²⁴ Drawing on a new understanding among scientists about the relationships among animal and plant forms—now known as ecology—Leopold set out a new set of recommendations for wildlife and ecosystem management.¹²⁵ For Leopold and other advisors to the NPS, the aim was to protect the character of natural parks and to re-create as closely as possible “the conditions that prevailed when the area [under the parks' control] was first visited by white men.”¹²⁶ Questionable today given present knowledge of the profound role humans—both “white” and other—have had in shaping the environment, Leopold's advice set in place policies that would govern the NPS's approach to management for several decades. Nature would be celebrated unconditionally; human interventions, other than by native peoples, became, for NPS planners, essentially intrusive.¹²⁷

¹²³ US Department of the Interior, *Parks for America, A Survey of Parks and Related Resources in the Fifty States and a Preliminary Plan* (Washington, DC: US Department of the Interior, 1964).

¹²⁴ Kiki Leigh Rydell, “A Public Face for Science: A Starker Leopold and the Leopold Report,” *George Wright Forum*, Historical Perspectives on Science and Management in Yellowstone Park, 15, no. 4 (1998): 50–62, accessed October 12, 2012, <http://www.georgewright.org/154rydell.pdf>; and Runte, *National Parks*, 177–83.

¹²⁵ For the original report, see A. S. Leopold, S. A. Cain, C. M. Cottam, I. N. Gabrielson, and T. L. Kimball, “Wildlife Management in the National Parks,” *Transactions of the North American Wildlife and Natural Resources Conference* 28 (1963): 28–45.

¹²⁶ Cited in David M. Graber, “Rationalizing Management of Natural Areas in National Parks,” *George Wright Forum* (Autumn 1983): 47–56. See Leopold, Cain, Cottam, Gabrielson, and Kimball, “Wildlife Management in the National Parks,” 32.



10. 5. Clingman's Dome Observation Tower, Great Smokey National Park, 1959. This project is typical of many of the Mission 66 projects, which began after 1956

During the 1960s, the NPS system continued to grow. Wirth's successor in 1964, George B. Hartzog, Jr. (1920–2008), expanded on Wirth's vision of preserving natural areas and intensifying recreation and education. He also gave additional emphasis to interpretation and history. Presiding over passage of the National Historic Preservation Act of 1966, Hartzog oversaw the creation in 1964 of Ozark National Scenic Riverways in Missouri, Pictured Rocks and Indiana Dunes National Lakeshores, established in 1966, and the passage of the National Trails System Act in 1968, a law that placed the Appalachian National Scenic Trail under NPS authority. In 1972, the Gateway National Recreation Area in New York and the Golden Gate National Recreation Area in San Francisco also became part of the system.

¹²⁷ See Richard West Sellars, *Preserving Nature in the National Parks: A History* (New Haven, CT: Yale University Press, 1999); and Philip Burnham, *Indian Country, God's Country: Native Americans and the National Parks* (Washington, DC: Island Press, 2000).

The NPS, through its education programs, stewardship, and example was a significant contributor to the environmental movement as it emerged in the 1960s. Rachel Carson's epochal *Silent Spring* of 1962 and the cautionary publications of Paul R. Ehrlich and others helped fuel a new surge of environmental activism. Rising public interest, in turn, led to passage of significant laws and institutions ranging from the Clean Air Act of 1963 to the creation of the Environmental Protection Agency in 1970.¹²⁸

Despite its trail of destruction, World War II arguably laid the foundations for the late twentieth-century's commitment to environmental protection. The effects of nuclear testing, damage from oil spills, and the widely publicized hazards engendered by different kinds of waste were all clear evidence of not only the cataclysmic effects of war but also the continuing impacts of the industrial production and the apparent despoliation of natural resources. The war demonstrated the power of the United States and its capacity to produce and build. But it also alerted many Americans to the consequences of human actions and set a new tone of caution for the future.

Postwar Hawai'i

Hawai'i's people shared the rest of the country's anxieties but also looked hopefully to the future. Brought into the heart of the conflict, the resident population understood the devastation wrought by war. They had experienced it firsthand at Pearl Harbor and had lived for over six months with the fear of imminent enemy invasion and for four more years on a war footing. Many Asian Americans living in the islands, in particular, had also endured suspicion, prejudice, and internment. Others had seen their property appropriated for military purposes or witnessed soldiers and marines running roughshod over hills, roads, trails, and beaches. Native Hawaiians saw their traditional fishing and gathering sites vandalized, demolished, or simply closed to them.

¹²⁸ Richard J. Lazarus, *The Making of Environmental Law* (Cambridge: Cambridge University Press, 2004).

Most also left unrecorded their response to the onslaught of thousands of new occupants of their sacred lands.



10. 6. Honolulu Harbor, 1950. The city still retained much of its 1930s character, with the exception of the harbor road known as Nimitz Highway, constructed during the war to facilitate the movement of personnel and equipment.

Many in Hawai‘i, however, saw the war as the beginning of a new relationship with the US mainland. The large Japanese population felt vindicated by the exemplary performance of Japanese American soldiers, notably the highly decorated 442nd Infantry Combat Team. Hawai‘i’s wartime residents also experienced a new sense of inclusiveness, worked beside *haole* soldiers, sailors, and shipyard employees, and witnessed a crack in the traditional hierarchy-bound society that had dominated Hawai‘i at least since the early territorial period.¹²⁹ Hawai‘i’s many plantation workers also saw a new world of opportunity beyond what they had known before the war.

¹²⁹ See Jean King, “Reworking Race: The Making of Hawaii’s Interracial Labor Movement,” *Journal of Asian American Studies* 10, no. 3 (October 2007): 324–28.

Hawai'i's diverse people witnessed, as well, significant shifts in labor, residential, and population patterns. Areas once exclusively occupied by upper- and middle-class Caucasians were now open to Japanese, Chinese, Filipinos, and others. The war had introduced new kinds of work, and while employment at Pearl Harbor and other military-related facilities declined in the immediate postwar period, other opportunities emerged in the late 1940s and 1950s.¹³⁰ The territory's population also jumped—from 450,000 residents in 1945 to nearly 500,000 five years later, mostly as a result of increased immigration from both Asia and the mainland US.¹³¹

Labor strikes, beginning in 1946, would bring more workers into the labor movement. There was a sugar-workers strike in 1946; a pineapple-workers strike in 1947; a transit-workers strike in 1948; and a dockworkers strike in 1949.¹³² The 1950s brought new unions into play, including the International Brotherhood of Electrical Workers and Teamsters.¹³³ With the long-standing International Longshore and Warehouse Union continuing its efforts, labor soon gained the upper hand over management. The famous “Aloha Strike” of 1958, an action that involved over 13,000 workers from twenty-six sugar plantations, demonstrated labor's growing power.¹³⁴

By the early 1960s, Hawai'i's unions had helped bring agricultural wages into line with those paid in other industries. The rise in income had spawned other industries and businesses,

¹³⁰ “World War II to Statehood (1941–1959),” HawaiiHistory.org, A Community Learning Center, accessed October 1, 2010, <http://www.hawaiihistory.org/index.cfm?fuseaction=ig.page&PageID=361>; and “History of Hawaii/World War II and Statehood,” *Wiki Books*, accessed October 1, 2010, http://en.wikibooks.org/wiki/History_of_Hawaii/World_War_II_and_Statehood; and La Croix, “Economic History of Hawaii,” 11–14.

¹³¹ Campbell Gibson and Kay Jung, “Historical Census Statistics on Population by Race, 1790 to 1990, and by Hispanic Origin, 1970 to 1990, for the United States, Regions, Divisions, States, US Census Bureau,” Working Paper Series No. 56 (Washington, DC: US Census Bureau, 2002), accessed October 12, 2012, <http://www.census.gov/population/www/documentation/twps0056/twps0056.html>

¹³² American Postal Workers Union (APWU), “Labor Organizing Changed the Hawaiian Islands Forever,” *American Postal Worker* (May/June 2003), APWU online newsletter, Labor History Articles, accessed August 10, 2010, http://www.apwu.org/laborhistory/03-3_hawaiilabor/03-3_hawaiilabor.htm. For an overview, see Horne, *Fighting in Paradise*.

¹³³ “Labor Unions in Hawaii,” *Honolulu Civil Beat*, accessed December 31, 2013, <http://www.civilbeat.com/topics/labor-unions-in-hawaii/>.

¹³⁴ Craig Howe and Jon Osorio, eds., *The Value of Hawaii: Knowing the Past, Shaping the Future* (Honolulu: University of Hawai'i Press, 2010), 64–65; “Hawai'i Time Line, 1958,” HawaiiHistory.org, A Community Learning Center, accessed October 12, 2010, <http://www.hawaiihistory.org/index.cfm?fuseaction=ig.page&year=1958>.

moving many among the working class into middle-class lifestyles. Even plantation conditions had improved, with better housing, schools, and recreational opportunities. Although Hawai'i's labor movement would invite the scrutiny of the communist-baiting US House Committee on Un-American Activities, rising sugar and pineapple profits in the late 1940s and early 1950s helped allay the fears of many US political and industrial leaders.¹³⁵ Hawai'i might be a "different" kind of place, many reasoned, but it had shown itself to be American.

As in other parts of the United States, Hawai'i's people put a fresh emphasis on education in the postwar period. The spike in population led to a boom in school construction, evident especially in the early to mid-1960s.¹³⁶ The territory's land-grant university, the University of Hawai'i also experienced a surge in enrollment. With their educations supported by the G.I. bill, returning veterans brought the university's student population up to 3,000 in 1946 and 5,000 two years later.¹³⁷ Sons and grandsons of plantation laborers were now studying biology, political science, and sociology. Their daughters and granddaughters studied to become teachers and nurses. Many, especially among the Japanese population, would go on to earn higher degrees on the mainland, returning as university educators, doctors, dentists, and lawyers.

The shift toward labor and the rise of a new middle class led not surprisingly to a change in the political structure of Hawai'i. The old Democratic Party—an amalgam of "Home Rule" advocates and disaffected royalists—reinvented itself as a party of the working and middle classes. Led by former police officer John A. Burns (1909–1975), the resuscitated Democrats reached out to organized labor, and the recently empowered Japanese to begin to win seats in the territorial legislature. Tapping out several celebrated Japanese American veterans, notably Daniel Inouye (b. 1924), George Ariyoshi (b. 1926), and Spark Matsunaga (1916–1990), the party gained the support of the powerful ILWU and other unions. By the mid-1950s, the

¹³⁵ Daws, *Shoal of Time*.

¹³⁶ Fung, Moy, Ohama, Chapman, and Hibbard, *Hawaii Modernism*, B-12-16.

¹³⁷ Robert M. Kamins and Robert E. Potter, *Mālamalama: A History of the University of Hawai'i* (Honolulu: University of Hawai'i Press, 1998).

Democrats had won control of both houses of the legislature, and in 1956, Burns became Hawai'i's nonvoting delegate to Washington.¹³⁸



10. 7. Expansion of the University of Hawai'i campus at Mānoa, ca. 1955. Educational opportunities were a hallmark of the postwar era in the islands.

Debated during the 1930s, the prospect of statehood for Hawai'i became increasingly a reality after the war. J. Gardner Anthony, Hawai'i's attorney general during the war, had told a congressional hearing that opponents to a change in the territory's status would have to be "bigoted or ignorant." Against the continuing opposition of the Republican "old guard," including figures such as Lorrin Thurston and Walter F. Dillingham (1875–1963), and outspoken Hawaiians, notably Alice Kamokila Campbell (1884–1971), the tide shifted in favor of statehood.¹³⁹ Eighty-five percent of those attending a constitutional convention in 1950 voted for

¹³⁸ Dan Boylan and Michael T. Holmes, *John A. Burns: The Man and His Times* (Honolulu: University of Hawai'i Press, 2000). For an overview of the rise of the Democratic Party, see Tom Coffman, *The Island at the Edge of America: A Political History of Hawai'i* (Honolulu: University of Hawai'i Press, 2003).

¹³⁹ John S. Whitehead, "The Anti-Statehood Movement and the Legacy of Alice Kamokila Campbell," *Hawaiian Journal of History* 27 (1993): 42–63.

a change of Hawai'i's status. Nine years later, Hawai'i's residents voted overwhelmingly in favor of statehood, although many have argued since that Native Hawaiians were not fully represented in the plebiscite to approve the measure.¹⁴⁰ Nonetheless, after over half a century as a territory, the ancient Kingdom of Hawai'i was now a state.

Hawai'i's entry into the union coincided with a profound change in the islands' economy. Hawai'i's new status ensured the safety of outside investment and underwrote a surge in new money. Industrialist Henry J. Kaiser (1882–1967), whose fortune derived from wartime shipbuilding, created the new Honolulu suburb of Hawai Kai, as well as investing in both health and the tourism industry. Other mainland and foreign investors followed—paradoxically, the Japanese by the 1970s. At the same time, other countries began to serve the world's sugar and pineapple needs, with a resultant decline in Hawai'i's longtime agricultural industry. Despite larger and larger crops—Hawai'i's peak sugar production year was in 1966—labor and shipping costs, coupled with the rising value of land, combined to end the old plantation system. By the late 1960s, former agricultural lands were well on the way to conversion to housing and businesses.

Although many both family and charitable entities, such as the Bishop Estate, retained ownership of substantial tracks of land, the future of Hawai'i lay in other kinds of enterprises, most significantly tourism. Reinforced by profound changes in transportation, including regular service by jet aircraft beginning in 1960, Hawai'i's tourism industry expanded exponentially. With visitor arrivals of 171,367 in 1958, by 1960, Hawai'i recorded 296,249 new visitors. In 1970, that number had grown exponentially to 1,745,904.¹⁴¹

¹⁴⁰ See "The Statehood Plebiscite," Statehood Relaunch, May 12, 2009, accessed May 28, 2014, <http://statehoodhawaii.org/2009/05/12/the-statehood-plebiscite/>.



10. 8. Dodie Bacon with newspaper, 1959.

Waikīkī, especially, exploded with new both low- and high-rise hotels. There was also a new Honolulu International Airport after 1960 and improved passenger service to Kaua‘i, Maui, and Hawai‘i Island. By the mid-1960s, Hawai‘i’s had its own version of an interstate highway, the H-1. As in other parts of the United States, drive-in movie theaters, fast-food stores, and countless service stations grew in numbers to serve a population that reached 632,772 in 1960.¹⁴² Although forward-looking statutes prohibiting outdoor advertising still governed highways roads and highways, the new state was rapidly becoming an exemplar of the “American way.”

The military continued as well to underwrite much of this new development. A training area for US troops during the Korean Conflict and Vietnam War, Hawai‘i also retained a substantial garrison, housed at Schofield Barracks, and numerous other personnel at Fort Shafter

¹⁴¹ “Population and Visitor Statistics, Hawaiian Kingdom, Republic, Territory and State of Hawai‘i,” *Hawaiian Encyclopedia* online, accessed December 31, 2013, <http://www.hawaiianencyclopedia.com/population-and-visitor-statist.asp>.

¹⁴² Gibson and Jung, “Historical Census Statistics on Population by Race, 1790 to 1990, and by Hispanic Origin, 1970 to 1990, for the United States, Regions, Divisions, States,” 2002.

and other bases. In 1948, the Army opened Tripler Hospital, the primary treatment center for the military and military dependents in the Pacific region.

Throughout this time, Barbers Point and Hickam Field continued as important military air bases; Pearl Harbor remained the home of the Pacific Fleet and Pearl Harbor Naval Shipyard. The wartime Makua Military Reservation on O‘ahu and the postwar Pōhakuloa Training Area on Hawai‘i Island also served as sites of maneuvers, artillery, and tank training, and other exercises—as they do today. Military visitors still frequent the islands and active military personnel are an enduring presence. Many both active-duty personnel and veterans also visit Kilauea Military Camp, now a “Joint Services Recreation Center,” together with the Hale Koa Hotel, or the Armed Forces Recreation Center, in Waikīki. The military had indeed come to Hawai‘i to stay.

Hawai‘i’s New Parks

In 1960, the original Hawaii National Park divided into the separate Haleakalā National Park and Hawaii Volcanoes National Park. This change reflected the growing size and responsibilities of both units and the new demands of Hawai‘i’s fast-growing tourism industry. As in other parts of the country, Hawai‘i would experience a significant expansion of its parks in the postwar period. Not surprisingly, one of the first would be a memorial to the war’s beginning and to the many sailors, soldiers, and civilians that lost their lives on December 7, 1941. Initiated by a civic organization known as the Pacific War Memorial Commission, the effort soon involved both the Navy and the National Park Service. The site of the sunken USS *Arizona* stood out as the appropriate focus of the commemorative effort. The Navy, under its fleet commander Admiral Arthur W. Radford (1896–1973), inaugurated a tradition of raising a flag over the site in 1950.

Although plans to salvage the ship for scrap were still a consideration, the practicality of removing the ship and properly honoring the many crewmembers trapped during the attack changed the Navy's long-term approach.¹⁴³

In 1958, President Dwight D. Eisenhower gave his approval for a memorial. With contributions by the federal and state government and from private individuals—including a much-publicized fundraising concert by Elvis Presley—the USS *Arizona* Memorial opened on May 30, 1962.¹⁴⁴ Alfred Preiss (1911–1993), a Honolulu-based architect—detained, in fact, for a short time after the attack due to his Austrian background—designed the dramatic concrete structure that spans the USS *Arizona* site. A visitor center, containing a theater, museum, and shops, followed in 1972.¹⁴⁵

A second new park was located on the southwest coast of the island of Hawai'i. The site of an ancient temple complex and a ritual place of refuge, or *pu'uhonua*—a place for wrongdoers in Hawaiian tradition—the City of Refuge National Historical Park came into being in 1961 after several years of preliminary study. A site of interest to the Park Service as early as 1926, when NPS director Horace Albright visited the coastal ruins, the ancient *heiau* had been the focus of an early restoration effort by archaeologists from the Beatrice F. Bishop Museum early in the century.

In 1947, Delegate Joseph R. Farrington suggested to Hawaii National Park superintendent Oberhansley that the site be placed under federal protection. The NPS, in turn, sent historian Aubrey Neasham and landscape architect Thomas C. Vint to make an appraisal.¹⁴⁶ Acquisition of land for the site was authorized in July 1955.¹⁴⁷ Eventually, the site

¹⁴³ World War II Valor in the Pacific National Monument, "History and Culture," accessed December 12, 2013, <http://www.nps.gov/valr/historyculture/index.htm>.

¹⁴⁴ "USS *Arizona* (BB-39) Memorial at Pearl Harbor, Hawaii," Naval History and Heritage Command, accessed May 27, 2012, <http://www.history.navy.mil/photos/sh-usn/usnsh-a/bb39-v.htm>.

¹⁴⁵ "Timeline," Pacific Historic Parks, Creating a Memorial – USS *Arizona* Restoration, accessed May 23, 2012, <http://restore.arizonamemorial.org/creating-a-memorial.html>.

¹⁴⁶ John Isne, *Our National Park Policy: A Critical History* (Baltimore, MD: Johns Hopkins University Press, 1961), 524–25.

expanded to over 420 acres from the initial 180 acquired by the territory of Hawaii. The site's official name changed in 1978 to Pu'uhonua O Hōnaunau National Historical Park in accordance with local traditions encouraging the use of Hawaiian language names as set out in the State Constitution Convention of that year.¹⁴⁸

Pu'ukoholā Heiau became a National Historic Site and another part of the NPS system in 1972. Designated a National Historic Landmark (NHL) in 1962, the site contains the two monumental *heiau*, including a large state temple constructed in 1791 by Kamehameha I to commemorate his political ascendancy.¹⁴⁹ The impressive property had been long venerated by Hawaiian groups, including the local branch of the Sons of Kamehameha, which had partially restored the site in the second decade of the twentieth century. The territory of Hawaii had officially recognized it as a "Historical Landmark" in 1928, but had done little to protect it; the site was occupied as a military outpost early in the war and had been in the middle of the Marines training area at nearby Hāpuna Bay. Pu'ukoholā would be the second site associated with Native Hawaiian history and traditions and reflected the NPS shift toward visitor education. It also honored native traditions in accordance with new NPS policy.

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¹⁴⁷ Senate Report, 107-71, 107th Congress, 1st Session, Calendar No. 173, October 1, 2001, Pu'uhonua o Honaunau National Historical Park Addition Act of 2002, accessed December 12, 2013, <http://www.gpo.gov/fdsys/pkg/CRPT-107srpt71/pdf/CRPT-107srpt71.pdf>.

¹⁴⁸ Senate Report 107-272, 107th Congress, 2nd Session, Calendar No. 589, Pu'uhonua o Honaunau National Historical Park Addition Act of 2002, September 11, 2002, accessed December 12, 2013, <http://www.gpo.gov/fdsys/pkg/CRPT-107srpt272/html/CRPT-107srpt272.htm>. Honolulu passed a statute in 1954, requiring the use of Hawaiian names for streets. Governor Walter F. Frear was chair of the Advisory Committee on Hawaiian Geographical Names as early as 1911. In 1978, the State of Hawai'i recognized Hawaiian language as one of the islands' two official languages. See "Hawaiian Topographical Survey and Associated Matters," Ulukau: The Hawaiian Electronic Library, chap. 4, part 2, 209–13, and "Advisory Committee on Geographic Names," chap. 7, part 2, 240–41, accessed December 12, 2013, <http://www.ulukau.org/elib/cgi-bin/library?e=d-0gazetteer-000Sec--11en-50-20-frameset-book--1-010escapewin&p=frameset&toc=0&d=D0.6>.

¹⁴⁹ Diane Lee Rhodes and Linda Wedel Greene, *Pu'ukohola Heiau NHS, Kāloko-Honokohau NHP, Pu'uhonua o Honaunau NHP, A Cultural History of Three Traditional Hawaiian Sites on the West Side of the Island of Hawaii* (Denver: Denver Service Center, NPS, 1993), chap. 7.



10. 9. Pu'uhonua O Hōnaunau National Historical Park (PUHO), Hawai'i, designated 1961.

Eventually, the Park Service would add the Kaloko-Honōkohau National Historical Park and Ala Kahakai National Historic Trail. Noted for its wetland complexes and anchialine pools, the Kaloko-Honōkohau National Historical Park also preserved examples of house platforms (*kahua*), petroglyphs (*ki'i phhaku*), the remnants of a stone slide (*holua*), two ancient fishponds (*loko i'a*), and possibly several *heiau*. An NHL from 1962, the site came officially under NPS control in 1978.¹⁵⁰ Ala Kahakai National Historic Trail came much later, in 2000.¹⁵¹

Although local interests, mostly those of territorial and then state officials, played some part of the creation of the new parks, the expansion of NPS efforts in Hawai'i was foremost an outcome of the agency's national program of enhanced educational and recreational goals in the

¹⁵⁰ "History and Culture," Kaloko-Honokohau National Historical Park, accessed December 12, 2013, <http://www.nps.gov/kaho/historyculture/index.htm>.

post–World War II era. Some Native Hawaiians in fact expressed skepticism about the National Park Service’s control over traditional sites. The NPS took pains to involve local residents and Native Hawaiians in decision making and ongoing preservation efforts.



10. 10. Pu'ukoholā Heiau National Historic Site (PUHE), Hawai'i, established 1972.

For many Native Hawaiians, the Kona sites now serve as powerful reminders of their rich culture and traditions. Certainly the largest audience, however, has been the many postwar tourists to Hawai'i—representatives of a force unleashed by the technologies of war and the country’s newfound acquaintance with the Pacific. Hawai'i was no longer a strange and distant place but a destination within reach of nearly everyone.

¹⁵¹ “Connecting Hawai'i,” Ala Kahakai National Historic Trail, accessed December 12, 2013, <http://www.nps.gov/alka/index.htm>.

CONCLUSIONS

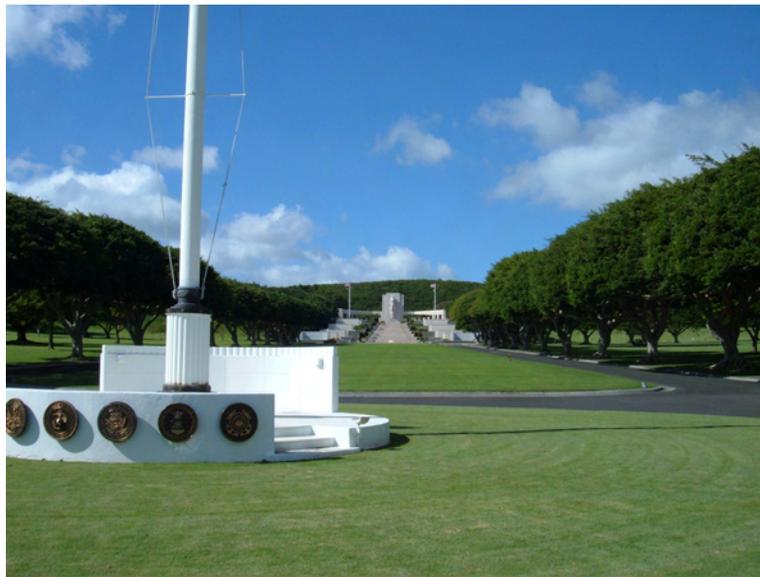
Hawai‘i and the War

Hawai‘i stands out in the world’s imagination for countless things: beaches, mountains, its tropical climate, and its native people. For many, it is also the home of pineapple, hula dancers, luaus, of majestic palms, high surf, and dramatic waterfalls. For tourists today, it is also high-rise hotels in Waikīkī, luxury resorts on Hawai‘i Island’s Kona Coast and at Ka‘anapali on Maui, and discount shopping at O‘ahu’s Waialeale outlet malls. One of the world’s most famous visitor destinations, Hawai‘i remains the archetypical tropical getaway. It is a place both familiar and exotic—part of the United States but in many ways a distinct locale, with a rich history of its own.

World War II has a perpetual presence in the islands. The USS *Arizona* Memorial and associated sites at Pearl Harbor—now a key part of the World War II Valor in the Pacific National Monument—is still the top attraction in the state, with approximately 1.6 million visitors a year. Hawai‘i holds a special place in the heart of the war’s veterans, many of whom make annual pilgrimages to the memorial and to Punch Bowl Cemetery (National Memorial Cemetery of the Pacific) in Honolulu. Others, including permanent residents, take an avid interest in the history of the conflict. Hawai‘i inevitably features in television specials, films, and books about the war years. The image of Pearl Harbor under attack remains one of the most vivid moments in American history. Scenes of troops arriving at Honolulu Harbor or training on the islands’ beaches and mountains stud the national memory, just as do views of barbed wire on Waikīkī and service personnel enjoying the beach or populating the onetime territory’s bars and restaurants.

Hawai‘i’s prominent role in the war was an accident of its location. The only place in the Pacific capable of supporting large numbers of troops and other military personnel—and the key site for the United States’ naval operations—Hawai‘i played a critical part in country’s entry into the war in 1941, serving as a training and staging area for operations in the Pacific Theater

throughout the four-plus years of the conflict. Hawai‘i is synonymous in many peoples’ minds with the Pacific War, the scene of so much that happened in World War II, and the site of many of the war’s significant events. Hawai‘i also represents the beginnings of the country’s new engagement with the Pacific and Asia and the expansion of the country’s borders beyond the continent.



11. 1. National Memorial Cemetery of the Pacific, ca. 2010. Dedicated on September 2, 1949, the memorial contains the graves of over 53,000 service personnel from World War I, World War II, the Korean War, and the Vietnam War.

The effects of the war are still apparent on the landscape of Hawai‘i (although given the central role of Hawai‘i in the war, the actual number of visible sites is surprisingly low).¹ The memorialized wreck of the USS *Arizona*, the airplanes on display at the Pacific Aviation Museum, and the USS *Bowfin* submarine, permanently docked near the Pearl Harbor Visitor Center, are the most evident traces. The USS *Missouri*—the deck of which was the site of the ceremony marking the war’s end—is now berthed near the *Arizona*, providing a sense of closure to the

¹ DeSoto Brown, “The Preservation of World War II Sites in Hawai‘i,” lecture, February 6, 2014, Experts at the Palace Series, Old Archives Building, Honolulu.

event. There is also evidence of World War II at Fort DeRussy and at now disbanded Fort Ruger. Kaneohe Marine Corps Base (formerly the Naval Air Station), and Barber's Point (also a former naval air station) give further testament to the war, as do the still-active Wheeler Army Air Field (once Wheeler Air Force Base), Fort Shafter, and Schofield Barracks.

The war shows its presence too in the remnants of dispersal airfields at Kahuku and Hale'iwa on O'ahu, at Morris Field on Hawai'i, at Barking Sands and Wailua on Kaua'i, and in the bunkers and observation posts dotting the hillsides of several islands. Active military training centers at Pōhakuloa (earlier called the Waikaloa Maneuver Area) on Hawai'i Island and in Makua Valley on O'ahu (the Makua Training Area) are also vivid reminders of the war, as are the former target area of Kaho'olawe and the former alien internment camps at Sand Island and Honouliuli. Permanent military facilities, notably the Air Force Maui Space Surveillance Complex (MSSC) at the top of Haleakalā and the Kilauea Military Camp (KMC, also titled the Hawai'i Island Morale, Welfare, and Recreation and Center, or MWR) are further reminders of the war—the first a direct product of wartime use, the second a continuing site of military use since its beginnings in the early twentieth century.

All of these sites are important places in the national record, testifying to the United States' role in World War II and the war's impact on peoples of Hawai'i and elsewhere in the region. They also stand as reminders of the war's devastation and its repercussions on both people and place. Some have been subjects of preservation and interpretive efforts; others neglected and ignored; still others still serve as active military sites. A few, such as Kaho'olawe—the site of a protracted effort by Native Hawaiians and others to reclaim a damaged landscape—have been places of renewal and resurgence. Together, they form a significant glimpse into the history a place and its environment.

The Role of the National Park

Hawai'i's then-single national park was an important witness to these events. The 10,000-foot peak of Haleakalā, then a section of Hawaii National Park, was a site of a series of meteorological

experiments and the location of a mobile radar station beginning in 1941. The park at Kīlauea, since 1916, the site of the KMC, became first a training area and then an expanded rest-and-relaxation facility for military personnel stationed in the Hawaiian Islands. Long popular with service personnel, the park was also host to the aerial bombing range, known as the Elemakule Range, in the Hilina Pali area of the park. In early 1943, the park also opened up the Kau Desert Impact and Training Area, a several thousand-acre tract in the southeast section of the Kīlauea Section.

The enhanced use of Kīlauea and Haleakalā resulted also in cumulative damage from increased traffic, heavier military trucks and equipment, and continuing impacts on open lands and forests. Soldiers also vandalized sites, picked rare and endangered plants, and placed increased pressure on NPS personnel trying to manage the sites under their control. Some of this damage was temporary; other impacts were long lasting.



**11. 2. Quonset hut, Camp Tarawa, Waimea, Hawai'i Island, 2013.
All that remains visible of Camp Tarawa today.**

Superintendent Wingate and the other park staff members did their best to contribute to the war effort. Wingate officiated as the chair of the local Selective Service Board, attending its meetings sometimes on a weekly basis. Park rangers and other personnel served directly in the

military and in the short-lived Emergency Police Guard and later the auxiliary Hawaii Rifles. Ranger wives knitted scarves and made armbands and bandages. All took military and Red Cross training courses in first aid. At the beginning of the war, park personnel manned military outposts and observation sites, helping train and accompanying military officers and enlisted personnel on patrols.

The park and its personnel additionally assisted the Army in an experimental bombing of the 1942 lava flow from Mauna Loa. They also worked cooperatively with both civil and military police in arresting or detaining soldiers or sailors who had committed crimes or infractions. The park approved additional facilities at KMC.

As the war proceeded, Superintendent Wingate faced increasing pressure from the military authorities to grant even greater military use of parklands. Always reluctant to risk irreplaceable assets, Wingate came increasingly to resist further military exploitation of park resources. By 1943, he clearly wanted the military to cease its park training and other operations. Arguing with military authorities, he pressed for the use of lands “west of Kalapana” and the area between Mauna Loa and Mauna Kea—eventually the site of the Pōhakuoloa Training Area—as better suited to the military’s needs. He also argued for removal of the Elemakule Range and closure, cleanup, and restoration of the Kau Desert Impact and Training Area site.

Wingate’s stance no doubt made him enemies. Extensive coverage of the park by *Time* magazine in September 1945 portrayed Wingate and other park officials as obstructionist. The implication of the article was that had the National Park Service (NPS) been more helpful Hawai‘i might have been forewarned of the attack on Pearl Harbor.² Wingate dismissed the accusation out of hand, but it is likely that others were not so certain that the park had not played a significant role in the country’s failure to detect Japanese planes with the new radar technology—a technology in fact not yet in place at the time of the attack, as Wingate himself pointed out.

² “Pearl Harbor Report: Who Was to Blame,” *Time* 46, no. 11 (September 10, 1945).

Hawaii National Park was unusual in the degree to which it was subject to wartime use. Possibly more than any other park or NPS unit in the country, Hawaii National Park provided housing, training areas, and assistance to the military at an unprecedented level. Although a few parks—notably Joshua Tree National Monument in California and Mount Rainier National Park in Washington—also functioned as training areas, Hawaii National Park was unusual in the extent and range of its commitment to wartime assistance. Only the Catoctin Recreational Demonstration Area in Maryland matched Hawai‘i’s national park in the intensity of its use. (The Catoctin Mountain National Park, successor to the Catoctin Recreational Demonstration Area, is still home to the famous presidential retreat, Camp David.)

Hawai‘i’s national park came under particular pressure for three reasons. One was its proximity to the war. The second was the fact of martial law imposed beginning in December 1942 and lasting through much of the war. The third reason was the long-standing relationship between the National Park Service and the military in Hawai‘i, a connection dating back to the park’s founding years. Hawai‘i was a major staging area for the war. An estimated 2 million soldiers, sailors, and other military personnel passed through the territory to or from campaigns in the Pacific. With approximately 100,000 personnel stationed in the islands after 1942 and as many as 380,000 by war’s end—compared to a civilian population of a little over 400,000—Hawai‘i experienced an intensity of military use unmatched by any other American state or territory. This presence had a corresponding impact on Hawai‘i’s park divisions, particularly, due both to greater recreational use and as a result of training.

The national park’s close relationship to the military was perhaps an even more significant factor in its openness to wartime uses. US soldiers had constructed some of the park’s earliest trails—in 1915, before the park began. The origins of KMC stretched back to 1911, when a visiting military officer noted Kīlauea’s potential as a military recreation area for troops stationed on the “hot plains” of O‘ahu. The first soldiers camped near the present site of KMC in 1913. Encouraged by local boosters, including John Giles and Lorrin Thurston, KMC became a mainstay of the volcano park for the next three decades. Both the Navy and Army held leases on the recreation camp and considered the park an extension of their other involvements in the

territory. This sense of proprietorship set the tone for the military's dealings with the park during the war, putting park officials at a distinct disadvantage in negotiations concerning use.

Superintendent Wingate weathered these constraints and helped reassert the NPS's own interests despite military pressure. His was both a conciliatory and a defensive role. Wingate, through his dealings with military officials on O'ahu and Hawai'i, gradually redefined the park's relationship to the Army and Navy. Over time, he came to better articulate the park's special mission: to protect nature and provide a place of inspiration and respite. He also took time to recognize the rights of all people, including Hawai'i's first inhabitants, to visit, use, and experience special places such as Kīlauea and Haleakalā.

The War and the Environment

In a devastating manner, World War II helped underscore the relationship of humans to their environment. It caused the loss of human and other animal life, damaged earth's surfaces, destroyed cities, and contaminated watersheds, mountains, rivers, streams, and even the subsurface of the planet. The surge in the extraction of ores and oil and the massive growth of industrial production spawned by the war created their own kinds of environmental injury. The nuclear attacks on Hiroshima and Nagasaki, in turn, set in place a new order of environmental consequences; further testing, both above- and belowground, resulted in additional threats to man and nature alike.

Hawai'i was an exemplar of the war's environmental effects. A unique and, in numerous ways, fragile chain of islands, Hawai'i was particularly subject to the impacts of war. From the explosion-filled morning of December 7 to the military's postwar cleanup efforts at Kīlauea, wartime activities left scars on the landscape, damaging unique geological formations while allowing soldiers and sailors to run slipshod over irreplaceable cultural sites. Developments accompanying the war, notably, increased park visitation and military training, also harmed threatened species of plants and set back efforts in the park to reestablish historic environments and reaffirm ecological relationships.

The war also subtly affected Hawai‘i’s environment. The filling of ponds and streams, the construction of roads, the very movement of troops and civilians to, from, and within the territory had incalculable effects on plants, animals, soils, and their relationships. Rare and unique plants, such as Haleakalā’s famous silversword, faced constant threats by visitors who cut and collected the flowering plants or simply trampled on them. There was doubtless transportation of species from one place to another, the introduction of plants and animals from other places, and continual degradation of barely understood ecosystems. Even traditional Hawaiian practices of fishing and hunting were interrupted because of the wartime restrictions. Fishing was a prohibited activity in the early months of the war; American soldiers with their own legacy of hunting and fishing infringed upon local practices, destroying sea birds and nesting sites and competing with the park’s own animal control programs through the hunting of pigs and goats.



11. 3. Haleakalā, View from Red Hill, 2010.

The war would also have lasting impacts through the continued presence of the military in Hawai‘i. World War II reaffirmed the US presence in the Pacific. The Air Force installation

on Haleakalā, just outside the park's limits, remains, as well as a guided missile station at Barking Sands on Kaua'i.³ The 25th Infantry Division, first activated in October 1941, remains at Schofield Barracks; Marines are stationed at Kaneohe; and the US Pacific Command (USPACOM), successor to the World War II-era Commander-in-Chief, US Pacific Command (CINCPAC) is at Camp H. M. Smith in Moanalua.⁴ The Navy remains as well, although Naval Station Pearl Harbor has recently merged with the US Air Force base to become Joint Base Pearl Harbor-Hickam.⁵

To the consternation of conservation advocacy groups and Native Hawaiian activists, the military still runs an active training program in Hawai'i. The Pōhakuloa Training Area covers approximately 133,000 acres of rural Hawai'i Island. Employed as part of the Marine training area of Waikaloa during World War II, Pōhakuloa became an Army center in 1955. With its rough volcanic terrain, the site is used for live-fire exercises, including both artillery and mortar training. To meet state and federal environmental standards, teams must wash their vehicles before entering the area to avoid the transfer of plant spores. The Army also employs over fifty specialists to help protect endangered plants and animals and archaeologists to prevent damage to cultural sites.⁶

On O'ahu, the Army maintains the Makua Training Area (MTA) and the associated Beach Assault Area for similar training. Acquired from the territorial government during World War II, the area now comprises about 875 acres at the western end of O'ahu. With live-fire training halted in 2004, the Army subsequently resumed the full range of military exercises in

³ The Pacific Missile Range Facility, Barking Sands (IATA: BKH, ICAO: PHBK, FAA LID: BKH), a US Naval facility. See "Welcome to the Pacific Missile Range Facility Barking Sands," CNIC, Pacific Missile Range Facility Barking Sands, accessed December 22, 2013, http://www.cnic.navy.mil/regions/cnrh/installations/pacific_missile_range_facility_barking_sands.html/.

⁴ "History of the United States Pacific Command," US Pacific Command, USPACOM History, accessed December 12, 2013, <http://www.pacom.mil/about-uspacom/history.shtml>.

⁵ "History," CNIC, Joint Base Pearl Harbor-Hickam, accessed December 12, 2013, http://www.cnic.navy.mil/regions/cnrh/installations/jb_pearl_harbor_hickam/about/history.html.

⁶ "Pohakuloa Training Area," US Army, Garrison Hawaii, accessed December 27, 2013, <http://www.garrison.hawaii.army.mil/pta/>.

2011 following completion of an extensive environmental impact statement.⁷ However, company-level exercises have transferred to Pōhakuloa and infantry training continues at Schofield Barracks. In June 2012, a federal judge ordered an additional review of Army policy at Makua, citing the need for more complete studies of the effects of training on marine and cultural resources before the resumption of live-fire training at the facility.⁸

The story at Kaho‘olawe has been more positive. The smallest of the eight principal Hawaiian Islands, the uninhabited Kaho‘olawe became a target area for US Navy pilots during World War II.⁹ Recognized for its rich heritage of mostly precontact-era Hawaiian archaeological sites, the island became an increasing topic of debate in the 1980s. In 1981, the entire island was listed in the National Register of Historic Places (NRHP).¹⁰ After decades of protests, led by Native Hawaiians and environmental activists, the Navy ceased its live-fire exercises there in 1990.

In 1994, the island became the property of the state of Hawai‘i, which maintains the site as a cultural and environmental reserve.¹¹ Managed now by the Kaho‘olawe Island Reserve Commission, the island now is host to volunteers dedicated to the reintroduction of native plant species and protection of Native Hawaiian archaeological and cultural sites.¹² A five-year program to remove unexploded ordnance helped make the island safer, though more still needs

⁷ William Cole, “Army Ends Live-fire Training at Makua,” *Honolulu Star-Advertiser* online, January 13, 2011, accessed December 27, 2013, http://www.staradvertiser.com/news/20110113_Army_ends_live-fire_training_at_Makua.html.

⁸ “Judge Wants Updated Makua Valley Studies,” *Army Times* online, June 22, 2012, accessed December 27, 2013, <http://www.armytimes.com/article/20120622/NEWS/206220317/Judge-wants-updated-Makua-Valley-studies>.

⁹ Peter MacDonald, “Fixed in Time: A Brief History of Kahoolawe,” *Hawaiian Journal of History* 6 (1972): 69–90; and Hannibal M. Taveres; Noa Emmett Aluli, A. Frenchy DeSoto, James A. Kelly, and H. Howard Stephenson, *Kaho‘olawe Island: Restoring a Cultural Treasure: Final Report of the Kaho‘olawe Island Conveyance Commission*, March 31, 1993 (Honolulu: Kaho‘olawe Island Conveyance Commission, 1993).

¹⁰ A. Ahlo, *Kaho‘olawe Cultural Resources Management Plan* (Honolulu: Ogden Energy and Environmental Services, Inc., [1981]); R. J. Hommon, Kaho‘olawe Archaeological Sites, Multiple Resources Nomination Form, Washington, DC, National Register of Historic Places, National Park Service, US Department of the Interior, 1980.

¹¹ Sheila Sarhangi, “Saving Kaho olawe,” *Honolulu Magazine* online, November 2006, accessed December 27, 2013, <http://www.honolulu magazine.com/Honolulu-Magazine/November-2006/Saving-Kaho-8216olawe/>.

to be done.¹³ A first step toward reclaiming damaged land, the reclamation of Kaho‘olawe represents an important change in peoples’ attitudes to the environment.



11. 4. Kaho‘olawe from Makena, Maui. Through the initiatives of Hawaiian activists and Senator Daniel Inouye, Kahoolawe became the property of the State of Hawai‘i in 1994. Its purposes are confined to “meaningful safe use of the island for appropriate cultural, historical, archaeological, and educational purposes, as determined by the State of Hawaii.”

The Legacy of War

World War II undoubtedly laid the foundations of our present worldview and united the country in ways never before experienced. It also acquainted Americans with regions other than their own and projected them into places they never dreamed of seeing: Pacific Islands, German forests, and the cities of Rome, Paris, and London. Hawai‘i, too, was one of these new and

¹² “Nā Hoa‘āina,” Kaho‘olawe Island Reserve Commission, Kaho‘olawe Volunteer, accessed December 27, 2013, <http://kahoolawe.hawaii.gov/volunteer.shtml>.

¹³ Gregg K. Kakesako, “Clean Sweep: The Massive Clearing of Bombs and Shells from Kaho‘olawe Falls to Copter Commuters,” *Honolulu Star-Bulletin* online, November 24, 2002, accessed December 27, 2013, <http://archives.starbulletin.com/2002/11/24/news/story11.html>.

exciting places, a part of the United States but a kind of paradise as well—a place once accessible only to the rich and famous, now a part of everyday experience.



11. 5. Tourists at the USS *Arizona* Memorial, 2005.



11. 6. The war helped ensure the eventual growth of Hawai‘i as a tourism mecca. Waikīkī remains a primary destination for over 6 million visitors a year.

The war underwrote the economy and technology of the late twentieth century. Mass tourism, based in large part on the innovations introduced by war-related research and development—including jet propulsion, lightweight metals, new communication technology, plastics, and synthetic rubber—together with new highways, factories, shopping centers, and offices and a fresh sense of national mission would become hallmarks of the postwar years. So too would family vacations, suburban houses, and visits to national parks.

Hawai‘i would be drawn more fully into the United States because of its important role in the war. Statehood may have pushed aside Native Hawaiian values and curtailed remaining hopes of independence, but Hawai‘i’s new status did demonstrate an ideal of racial inclusiveness that would, in turn, help fuel the civil rights movement of the 1960s.

The expansion of the NPS and development of new parks in Hawai‘i and elsewhere was also an outcome of the war. Engendered by an at least century-old faith in nature’s transcendent values and by a growing recognition that the world was a both a finite and fragile place, the country’s newfound awareness of the beauty and significance of the outdoors led, in turn, to a more profound commitment to preserving what remained of a shared inheritance. World War II may have unleashed unprecedented forces of devastation but it also ushered in a newfound respect for the natural environment and its importance to human existence.

SOURCES: ARCHIVES AND PHOTOGRAPHS

Archival Sources

Key archival sources have included the collections of the University of Hawai‘i, Hawai‘i, Asia, and Pacific Collection; the Hawaii State Archives; the archival collections of the Hawaii National Park, later Haleakalā and Hawai‘i Volcanoes National Parks (HALE and HAVO); and the NARA San Bruno and College Park collections.

The most valuable archival sources for the report were correspondence and other records from Haleakalā National Park (HALE) and from Hawai‘i Volcanoes National Park (HAVO). A key source for the report was the Superintendent’s Monthly Reports, available in printed form at HAVO and now digitized for easier use. Supplemented by copies of correspondence, the Superintendent’s Reports for the period between 1938 and 1946 ran to approximately 3,000 pages and contain a wealth of information on park management, relations between the park administration and the military, and dates of visitors and other events. The Superintendent’s Reports and other park records are cited in the footnotes, as are other park-related materials not in general distribution.

The University’s collection includes the Hawai‘i War Records collection. The Hawai‘i War Records Depository (HWRD) is an extensive collection of archival and published materials that document life in Hawaii during World War II. In April 1943, during its first session after the United States’ entrance into World War II, the Hawaii Territorial Legislature passed a joint resolution designating the University of Hawai‘i as the official depository of material related to Hawai‘i’s part in the war. Over a five-year period, individuals, organizations, and agencies throughout the state donated or loaned correspondence, personal accounts, reports, photographs, scrapbooks, phonograph discs, maps, posters, artwork, pamphlets, newspapers, clippings, memorabilia, and other materials, some of it included in this report.

Photographic Sources

The Hawaii War Records Depository (HWRD) also includes 880 photographs taken by the U.S. Army Signal Corps and the U.S. Navy during World War II. These photographs, taken between 1941 and 1946, document the impact of World War II in Hawai'i. They depict Army and Navy activities in Hawai'i and illustrate the military's relationship with Hawaii's civilian population. This report included several images from this collection.

The report also employed additional photographs from the University of Hawai'i, Hawai'i, Asia, and Pacific Collection, held at Hamilton Library at UH Mānoa. These included photographs from private collections donated to the library and from state and federal agencies, again, which donated collections to the library. Librarian Dore Minatodani facilitated high-resolution scans of images used in the report.

Other images were from NARA San Bruno and College Park. These included photographs relating the Hawaii National Park as well as images documenting training exercises. Other photographs were from the Hawai'i State Archives; US Army Museum Hawaii at Fort DeRussy; the Library of Congress; and the Department of Transportation, Airports Division, State of Hawaii. Both HALE and HAVO collections provided images, as did several web sources, including Military Photos and Media, Courtesy Don Moore's War Tales, AcePilots, World War II Gyrene, Ed McFadden, 442nd Veterans Combat Club, and others. Images were also retrieved from the online archives of Temple University, Stanford University, the US Navy, US Marines, US Army, First Battalion, Chinatown Honolulu, Culture & Arts District, 24th Marines, USO Archives, and the National Park Service.

In addition to these sources, the report relied on photo contributions from the Lyman Museum, Hilo, the Maui Historical Society, the Bishop Museum, the University of Hawai'i Hilo Library, the Theatres of Hawai'i Collection, the USS *Oklahoma* Memorial, and the USS *Bowfin* Museum. The John Pershing Early Collection of the New York State Military Museum was especially useful for photographs of the 27th Infantry Division in action. Camp Tarawa Detachment #1255, Marine Corps League allowed for the duplication of images of the 2nd and

5th Marine Divisions in Hawai‘i. The Harvey Collection, held by Graduate Certificate Program in Historic Preservation, Department of American Studies, University of Hawai‘i at Mānoa, was a source of several aerial photographs. Geoff Mowrer kindly allowed reproduction of images from his private collection of Hawai‘i images. More detailed information is provided in the captions.

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This report relied on a wide range of archival, printed, and web sources. Both web and newspaper sources are cited in the footnotes only. Following is a list of printed sources, books, articles, pamphlets, typescripts, and a few, book-length PDFs retrieved from the Internet. The literature on the war is immense, as is that pertaining to Hawai‘i’s special role in the war. The following bibliography provides an overview of important sources, including those cited multiple times in the text.

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APPENDIX A: HAWAI‘I’S NATIONAL PARK

SERVICE UNITS

Units Included in the Study

Hawai‘i Volcanoes National Park (HAVO)

Hawaii National Park began in 1916, the result of the boosterish efforts of Lorrin A. Thurston and other leading members of Hawai‘i’s then *haole* establishment. Supported by Prince Jonah Kūhiō Kalaniana‘oli (1877–1922), Hawai‘i’s nonvoting representative in Congress, Hawai‘i’s pioneering national park included the former lands of Princess Pauahi (Princess Pauahi Bishop, 1831–1884), then owned by the Bishop Estate, and other parcels purchased or exchanged with the territorial government in subsequent years. Officially established on August 1, 1916, it was the eleventh park in the new US system.¹

Originally comprising lands on Maui and Hawai‘i, Hawaii National Park separated in 1960 to form Hawai‘i Volcanoes National Park (HAVO) and Haleakalā National Park (HALE). HAVO spans two active volcanoes, Mauna Loa and Kīlauea. Mauna Loa is probably the largest volcano in the world; Kīlauea, one of the most active. Established a few months prior to passage of the Organic Act that created the administrative structure of the National Park Service (NPS), the new park had expanded to over 200,000 acres by the time of World War II.² In 2004, the park acquired an additional 115,788 acres through a purchase from the Samuel Mills Damon Estate.³ This was the Kahuku Ranch property, a parcel extending west and south of Mauna Loa, and including a former military installation located north of the old ranch residence and service buildings, now just outside the park boundaries to the south.

¹ Jackson, *Administrative History*.

² Dwight Hamilton, “A History of Hawaii Volcanoes National Park,” Hawaii Volcanoes National Park, accessed May 19, 2012, http://www.nps.gov/havo/forkids/upload/20120229_History_of_HAVO_DH.pdf.

HAVO has had strong ties to the military from an early period. Thurston and other backers envisioned the park as a visitor attraction for the Territory of Hawaii and a rest and relation area for local military.⁴ The Kilauea Military Camp (KMC) coincided with the creation of the park, opening on November 17, 1916. Although the NPS acquired the freehold on the property from the Bishop Estate in 1922, the Army continued to manage the camp facility. Despite NPS objections, the Army also acquired rights for training in the Ka'u (south) section of the park during the 1930s. With the outbreak of the war, the military extended its control over most of the park, including the recently rebuilt Volcano House Hotel, a facility then still in private ownership within the park.⁵ KMC became an internment camp for suspect Japanese residents and a prisoner-of-war camp. Popular with military personnel throughout the war, HAVO reverted to NPS control in the postwar period, though some training exercises within the park continued until as late as 1948.

In the postwar period, General Dwight D. Eisenhower stayed for a few days at KMC in 1946.⁶ In 1949, the Army opened KMC to members of all branches of the military. KMC remains a popular rest-and-relaxation center (technically a Morale, Welfare, and Recreation facility) for military personnel and their dependents and families.⁷

The Kilauea branch of Hawaii National Park would experience the war more directly and constantly than other past and present NPS units in Hawai'i—with the obvious exception of the USS *Arizona* Memorial and Visitor Center. Beginning in 1938, the Army Air Corps pressed for a bombing range on the Ka'u Coast of the park.⁸ Despite protests from Superintendent Edward Wingate, the Secretary of the Interior concurred with the Secretary of War and allowed for military use, a move resulting in the “elimination” of lands previously set aside for NPS

³ Peter Sur, “Kahuku Lands Beauty Waiting to be Unlocked,” *Hilo Tribune-Herald*, November 29, 2003, accessed May 6, 2012, <http://hilo.hawaiitribune-herald.com/sections/news/local-news/kahuku-lands-beauty-waiting-be-unlocked.html>.

⁴ Tomonari-Tuggle and Bouthillier, *Integrated Cultural Resources Management Plan*.

⁵ Jackson, *Administrative History*, 30.

⁶ “Kilauea Military Camp,” <http://www.kmc-volcano.com/0about.asp>.

⁷ “Kilauea Military Camp,” <http://www.kmc-volcano.com/0about.asp>.

⁸ Jackson, “Bombs in a National Park,” 102–3.

ownership. Although the area's size was reduced to a little over 3,000 acres, by 1940 the Army had a bombing range at the edge of the park. Called the Na Pu'u O Na Elemakule Range (also the Ka'u Bombing Range or the Ka'u Reservation), this property was never used by the Army, but utilized for Navy bombing practice for a brief period in 1943.⁹ The Army finally returned the property to the NPS in 1950 following several bombing incidents.¹⁰

This was not the only part of the Kīlauea section affected by the war. Also in 1940, the military requested access and use to a proposed site on Mauna Loa, originally for a radar station to match that being constructed at Haleakalā.¹¹ Three months after the war's beginning, the 27th Infantry Division, under the command of Major General Ralph Pennell, moved into facilities at Kīlauea. The home to the Hawaiian Department of the territory's military government as well, the park served in this capacity until fall 1942, when the headquarters shifted to the Federal Building in Hilo. General Pennell requested the use of parklands in what would become the Kau Desert Impact and Training Area, as well as property adjacent to KMC. These areas served as training sites after March 1942, with greatest intensity between late 1942 and 1943.¹²

In addition to the Kau Desert Impact and Training Area, the Army also reestablished a landing strip on the site of the earlier field near Halemaumau Crater, beginning in December 1943. This would remain in use for the duration of the war and, in fact, until as late as 1950, when the territorial government disallowed its use.¹³

Superintendent Wingate was critical of military use within the park and made this clear in his annual report to the director of the NPS for the fiscal year ending June 30, 1943.¹⁴ He cited extensive damage to parklands, protected species of plants and animals, and roads and trails. He

⁹ Jackson, *Administrative History*, 91–93.

¹⁰ Jackson, "Bombs in a National Park," 103–4.

¹¹ Edward Wingate to Director, National Park Report on Requests for "War Uses" of Land, Buildings, etc., February 24, 1943, Army Use of Kīlauea Kau Bombing Range 1942–1948, HAVO Archives, File Code 601-04.1. See also Moniz Nakamura, "Up in Arms!" 9.

¹² Jackson, "Bombs in a National Park," 103–4.

¹³ Jackson, *Administrative History*, 88.

¹⁴ Annual Report to the Director of the National Park Service for the fiscal year ending June 30, 1943, HAVO Archives, cited in Jackson, "Bombs in a National Park," 104–5.

also made reference to numerous violations of the park's agreement with military authorities. In later correspondence, he further itemized damages and pressed for adequate funds for the restoration of the park. By the beginning of 1944, he had the backing of Interior secretary Abe Fortas (1910–1982) who requested that the Army cease training at the Kau Desert Impact and Training Area, suggesting that the Army was operating there without a valid permit.¹⁵ The Army finally discontinued use in January 1945.



12. 1. Hawai'i Volcanoes National Park (HAVO). Kilauea Caldera, 2005.

With the war's end in August 1945, the Army began a modest program of munitions removal and cleanup. This included an acre at the end of Chain of Craters Road and trails and roads within the training area. In 1946 and again in 1949, Army Engineers returned for additional removal of ordnance, including unexploded shells within the Kau Desert Impact and Training Area, carried out by a specialist team from Schofield Barracks.¹⁶ The superintendent's

¹⁵ Abe Fortas to the War Department, January 30, 1944, File Code 601-04.1, HAVO Archives.

¹⁶ Jackson, "Bombs in a National Park," 104; and Jackson, *Administrative History*, 96–97.

monthly report for January 1955 mentioned that duds were still an occasional discovery in the Ka'ū Desert. Other damage was in fact never really addressed by the military.

A final wartime impact was the increase in visitors to the park. Following the initial falloff in visitors after the attack on Pearl Harbor, the Kīlauea section experienced a rapid increase in tourists, beginning the latter part of 1942 into 1943 and 1944. In July 1942, when interisland civilian travel was permitted again, the total count for Kīlauea was 38,580, a figure over twice the normal traffic prior to the war. Of these, 28,080 were considered “military visitors.” The following year, the July figures were at 42,063, nearly three-times the prewar monthly figures.¹⁷

Military visitors in the park, in part because of their sheer numbers and in part because of their relative youth and inexperience, were frequently guilty of minor breaches of rules and regulations within the park. These included trampling rare or endangered plants, going off trail and illegally shooting at goats, pigs, and other animals within the park. Park Service rangers also cited both soldiers and officers for gambling and infractions of drinking regulations.

Haleakalā National Park (HALE)

Haleakalā National Park was part of the original Hawaii National Park created in 1916. With a total of 33,263 acres, the park incorporates the dormant Haleakalā Volcano, a sacred Hawaiian site the name of which translates as “the house of the sun.” The summit of Haleakalā is where the Hawaiian demigod Maui snared the sun in order to slow its passage through the sky, so his mother could dry her *kapa* or bark cloth.¹⁸ The peak reaches an altitude 10,023 feet and features an expansive 6.99-mile-wide “crater” (which geologically is an erosional depression) and numerous volcanic cinder cones. Other sections of the park include Kīpahulu Valley and Nu‘u.

Haleakalā was an early target of military use when the military probed the use of Mauna Loa and Haleakalā as sites for its new, still-untested radar installations. Haleakalā had served

¹⁷ Superintendent's Monthly Reports, July 1943. See also Moniz Nakamura, “Up in Arms!” 23.

already as an “official Weather Bureau ‘Airways Station’” as early as 1940 and would continue to provide a station for atmospheric readings. The Army first broached the idea of a radar station in 1939, finally settling on Haleakalā as the most suitable site. Against Superintendent Wingate’s advice, the Army insisted on locating the device on Red Hill (Pu‘u ‘Ula‘ula) rather than an alternative elevation outside the park boundaries.¹⁹ Following a survey completed in early 1940, Army Engineers began construction of a radar facility beginning in April 1941. With the support camp well underway by the summer, the installation featured a new tower by October.²⁰ The mobile unit, known as an SCR-270 was still inoperable at the war’s beginning.²¹



12. 2. Haleakalā National Park (HALE). View toward Visitors Center, 2010.

Subsequently, the mountain’s summit has subsequently become home to one of the world’s largest ground-based telescope complexes, Haleakalā Observatories or “Science City.”

¹⁸ W. D. Westervelt, *Legends of Maui: A Demi-God of Polynesia and His Mother Hina* (1910; repr., London: Abela Publishing, [2011]).

¹⁹ Jackson, “Military Use,” 130.

²⁰ Superintendent’s Monthly Reports, July, August, and October 1941.

²¹ Jackson, “Military Use,” 130.

Valued for its altitude, clarity, and dryness and for the absence of polluting lights, the astrophysics center has facilities operated by the US Department of Defense, Air Force, University of Hawai‘i, Smithsonian Institution, and Federal Aviation Agency.²² Originally opposed by the NPS, the facilities at the summit were the direct product of military operations during World War II. Fortunately, the complex shifted to the area around Kolekole peak outside the park in the 1960s and other agencies no longer utilize NPS property. The center and NPS presently coexist, although critics both within and outside the agency frequently complain of the visual impact of the observatory upon the spiritual and aesthetic values of the mountain’s summit.²³

Haleakalā also experienced an upsurge in military visitors during the war. In July 1943, during the peak of the wartime buildup, the Maui section of the park received 1,550 visitors, of which 1,070 were members of the Armed Forces.²⁴ These figures remained typical of the wartime years, causing increased wear on trails and the single-access road. As at Kīlauea, soldiers sometimes picked rare plants, trampled areas set aside for conservation, and shot at goats and pigs.

Pu‘uhonua O Hōnaunau National Historical Park (PUHO)

Located on the southwest coast of the island of Hawai‘i and originally called the City of Refuge National Historical Park, the Pu‘uhonua O Hōnaunau National Historical Park entered the US park system beginning in 1955 as the first cultural and historical park unit to be created in Hawai‘i; official designation came in 1961. A response in part to growing recognition of the

²² “Haleakala Observatories,” <http://www.ifa.hawaii.edu/haleakalanew/index.shtml>.

²³ Jackson, “Military Use,” 134–39. Also in Frances Jackson, “Military Use of Haleakala National Park,” Report for the Hawaii Natural History Association and National Park Service, US Department of the Interior, Honolulu, 1972, accessed May 1, 2012,

<http://evols.library.manoa.hawaii.edu/bitstream/handle/10524/316/JL06143.pdf?sequence=1>.

²⁴ Superintendent’s Monthly Reports, July 1943.

importance of Hawaiian history and prehistory, Pu'uhonua O Hōnaunau was a sacred Hawaiian site, dating to as early as 1450 AD and valued by Hawaiians as a place where those breaking a *kapu*, or prohibition, could take refuge from society.²⁵ Including the Hale O Keawe Heiau, a stone platform associated with the chief Keaweikekahiali, the site served as a burial place for Hawaiian *ali'i* well into the early nineteenth century, when Western influence and the end of the *kapu* system halted traditional practice. The site now includes a total of 420 acres and contains the remains of temple platforms, fishponds, *he'e hōlua* (sledding tracks), and the remains of coastal village sites.

Members of the Emergency Police Guard (EPG), the successor to the Home Guard, personnel from the 299th Infantry Regiment, and, after March 1942, the 27th Infantry Division patrolled the area near Pu'uhonua O Hōnaunau, and it is likely that individual soldiers used the site for recreational purposes. Diane Lee Rhodes and Linda Wedel Greene attribute damage to the so-called "Old Heiau" to the "Home Guard" (possibly the EPG following initiation of patrols after December 7, 1941), although they provide no additional information.²⁶ Known billets included the later state beach park at Ho'okena and the Konawaena School in Kealakekua, where infantry from the 27th Division stayed in classrooms and in the adjacent baseball field before being assigned better housing.²⁷ PUHO is primarily significant, however, an important outcome of the postwar era, as the growth of tourism began to justify the expansion of the park system and as the recognition of both the prehistory and history of Hawai'i became a more important factor in state and federal planning.

²⁵ Rhodes and Greene, *Pu'ukohola Heiau NHS, Kāloko-Honokohau NHP, Pu'uhonua o Hōnaunau NHP, A Cultural History of Three Traditional Hawaiian Sites on the West Side of the Island of Hawai'i*, chap. 9.

²⁶ Rhodes and Greene, *Pu'ukohola Heiau NHS, Kāloko-Honokohau NHP, Pu'uhonua o Hōnaunau NHP, A Cultural History of Three Traditional Hawaiian Sites on the West Side of the Island of Hawai'i*, chap. 9.

²⁷ Morihara interview; and Michi Kodama-Nishimoto, Warren S. Nishimoto, and Cynthia Oshiro, *Hanahana: An Oral History Anthology of Hawai'i's Working People* (Honolulu: University of Hawai'i Press, 1995), 166.



12. 3. Pu‘uhonua O Hōnaunau National Historical Park (PUHO), 2005.

Pu‘ukoholā Heiau National Historic Site (PUHE)

Pu‘ukoholā Heiau became a National Historic Site and part of the NPS system in 1972. It was designated a National Historic Landmark in 1962 and listed in the NRHP in 1966. Although significant as a place of veneration as early as the late sixteenth century, the two *heiau* and other features of the site owe their primary significance to the rebuilding of the religious complex by King Kamehameha in 1791. Partially restored by members of a local organization called the Sons of Kamehameha, the site gained formal recognition in 1928 when the territorial government declared it a “Historical Landmark.” In the 1960s, several civic groups, including the Queen Emma Foundation, Queens Medical Center, and Waimea- and Kona-based civic clubs pressed for greater recognition and protection. With a donation of thirty-four acres from the Queen Emma Foundation, encompassing Pu‘ukoholā Heiau and the smaller Mailekini Heiau, as well as the John Young homestead site across the highway, the NPS acquired the site

by an act of Congress on August 17, 1972. The site presently comprises eighty-six acres straddling Highway 270 in South Kohola, Hawai'i.

In the early 1940s, the Pu'ukoholā Heiau site was at the edge of the Army's Waikoloa Maneuver Area, a nearly 100,000-acre-area utilized after 1943 by the Marine Corps as a training site and leased to the military by Parker Ranch owner Richard Kaleioku Smart—who also provided land for a Marine camp in Waimea near his ranch's headquarters.²⁸ Begun in late 1943 and named Camp Tarawa after the successful, though costly battle to occupy Tarawa Atoll in November 1943, the installation was home at times to as many as 20,000 marines. These included the 2nd Marine Division and after July 1944, the 5th Marine Division then preparing for the invasion of Iwo Jima.²⁹

Throughout the over two years of its existence, Camp Tarawa was home successively to approximately 55,000 marines, Navy corpsmen, and Seabees. Training exercises took place throughout Kohala and Waimea, extending as well to the Hamakua Coast on the west side of the island. Marine exercises occurred along the beaches in South Kohala, including the area near Kawaihae. The port also helped provide supplies for Camp Tarawa and for other military operations on the island of Hawai'i, as it does today.³⁰

During the war and afterward, the site was subject to casual use by the military. Surveys conducted by the Bishop Museum, at the request of the Army Corps of Engineers in 1969 and a further archaeological examination of the site by NPS archaeologist Edmund J. Ladd indicated the remains of a coastal observation post on the upper *heiau* platform.³¹ Field telephone lines buried along the top of the wall connected the outpost to foxholes and gun emplacements on the

²⁸ U.S.A Environmental, Waikoloa Maneuver Area EE/CA, Waikoloa History, accessed May 6, 2012, <http://www.usaprojecthost.com/waikoloa/waikoloa%20home.htm>.

²⁹ Bryson, "Waimea Remembers Camp Tarawa."

³⁰ Rhodes and Greene, *Puukohola Heiau NHS, Kaloko-Honokohau NHP, Pu'uhonua o Honaunau NHP*, chap. 7.

³¹ Lloyd J. Soehren, *An Archaeological Survey of the Shores of Ouli and Kawaihae, South Kohala, Hawaii* (Honolulu: Bernice Pauahi Bishop Museum, 1964); Deborah F. Cluff, William Kenji Kikuchi, Russell Anderson Apple, Corps of Engineers, US Army, and Hawaii Division of State Parks, *The Archaeological Surface Survey of Puu Kohola Heiau and Mailekini Heiau, South Kohala, Kawaihae, Hawaii Island (including the inspection of a dismantled section of a stone wall near the Project Control Center in association with Project Tugboat at Kawaihae, Hawaii Island)* (Vicksburg, MS: US Army Corps of Engineers, 1969); and Rhodes and Greene, *Puukohola Heiau NHS, Kaloko-Honokohau NHP, Pu'uhonua o Honaunau NHP*,

beach just south of the *mailekini heiau*. There were also the remains of a tank road running through the Pelekane area, used to transport tanks from the harbor to training areas inland.³²

The present deep-draft harbor of Kawaihae, including the breakwater, revetment, and causeway, dates from the late 1950s, when the territory approved a contract to improve the port facilities.³³ In 1962, the Army Corps of Engineers decided to widen the harbor's entrance, extend the breakwater and build a small-boat facility there. Employing new explosives as a test for the Army's Nuclear Cratering Group, the project met with opposition from residents and community organizations. The Army, nonetheless, completed the project, which proved successful, though expensive.³⁴ To monitor damage to surrounding structures, the Army installed seismic monitoring devices in and around the ancient *heiau*. They also braced Pu'ukoholā Heiau against possible damage.³⁵ Although the explosion resulted in no noticeable harm to the structures, many feared for the safety of the ancient site. This concern no doubt had a large part in the NPS's move to acquire the site shortly after the harbor work was complete.

chap. 7.

³² Edmund J. Ladd, *Ruins Stabilization and Restoration Record, Pu'ukohola Heiau National Historic Site, Kawaihae, Hawaii* (Honolulu: National Park Service, 1986), 7–8; Ladd, Archaeological Field Survey Report: Cape Kumukahi and Kawaihae Lighthouses, tDAR, Archaeological Digital Record, accessed June 1, 2012, <http://core.tdar.org/document/324752>



12. 4. Pu'ukoholā Heiau National Historic Site (PUHE), 2012.

Kaloko-Honōkohau National Historical Park (KAHO)

The NPS established the Kaloko-Honōkohau National Historical Park on November 10, 1978. The site previously had received recognition as a National Historic Landmark, designated on December 29, 1962, and subsequent listing in the National Register of Historic Places, on October 15, 1966. Incorporating 1,163 acres, the park spans the Kona Coast of the island of Hawai'i about three miles north of the town of Kailua-Kona and three miles south of the Keahole International Airport. Route 19 defines the eastern boundary of the relatively open site; the Honōkohau Harbor facility, a state-run commercial facility, marks the south edge.

The site's interpretive value is principally for its display of Native Hawaiian life from as early as 1200 CE. Particularly notable is the presence of two fishponds (*loko i'a*) and a fish trap, which are distributed along the coastal stretch.³⁶ Records suggest that the whole of the Kona Coast was utilized for recreation by service personnel and may have been impacted by the military presence, although no specific training appears to have occurred at this site.

³³ Rhodes, and Greene, *Puukohola Heiau NHS, Kaloko-Honokohau NHP, Pu'uhonua o Honaunau NHP*, chap. 7.



12. 5. Kaloko-Honōkohau National Historical Park (KAHO), 2009.

Ala Kahakai National Historic Trail (ALKA)

Ala Kahakai National Historic Trail is the most recent addition to the NPS sites on the island of Hawai‘i, dating only from 2000. Developed in cooperation with state agencies, Hawai‘i County, and Kamehameha Schools, the trail falls under NPS management control. Over 175 miles long and intersecting with at least 200 ancient *ahupua‘a* or *‘ili*, the trail is accessible from Hawai‘i Volcanoes National Park, Pu‘uhonua O Hōnaunau National Historical Park, Kaloko-Honōkohau National Historical Park, and Pu‘ukoholā Heiau National Historic Site, as from several spots along Highways 19 and 11. The trail is also close to the resort area along the Kohala Coast at the north and stretches into farm and ranch land in North Kohala. Following an ancient pathway, the trail preserves examples of traditional Hawaiian culture, including settlement sites, stone slides (*holua*), and *heiau*.

Extending through several training areas utilized by the Army and Marines, parts of the trail were subject to numerous uses during the wartime period. In rural South Kona, the trail intersected with the Kahuku Ranch, used as a radar station and military installation during

World War II. In the north, the trail passed through parts of the Waikalua Maneuver Area and near the Marine Corps base at Camp Tarawa. Evidence of training exercises, including expended shells from target practice and discarded equipment and excavations and grading are typical examples of wartime use.



12. 6. Ala Kahakai National Historic Trail (ALKA), 2012.

Kalaupapa National Historical Park (KALA)

KALA entered the NPS system in 1980. The park exists as a partnership among the state of Hawai‘i’s Departments of Health, Transportation, and Land and Natural Resources, the Department of Hawaiian Home Lands, the US Coast Guard (which manages the Moloka‘i Light Station), and the NPS.³⁷ Each of these has a separate responsibility for the maintenance of the park’s lands and the few remaining Hansen’s disease (leprosy) patients still resident on the remote peninsula on the north side of Moloka‘i. The present park encompasses 10,779 acres of land.

The northern Kalaupapa peninsula was—and is—the home of victims of Hansen’s disease in the Hawaiian Islands, who were forced to reside there since the late nineteenth

³⁴ “History and Culture,” Kalaupapa National Historic Park, accessed May 16, 2012, <http://www.nps.gov/kala/historyculture/index.htm>.

century. It is separated from the rest of the island by a 2,200-foot-high *pali* or escarpment that made movement from the settlement difficult; a twisting trail provides access for hikers and mules. During its peak years between 1900 and 1940, the settlement included housing for upward of 800 patients and numerous doctors, nurses, and others living on the peninsula to care for them.³⁸ With increased use of antibiotics, patients no longer needed to live in seclusion, and many chose to return to their homes. By 2010, the population of the settlement was ninety, of which about twenty were patients.³⁹ The site honors two Roman Catholic saints: Saint Damien of Moloka'i, Father Jozef De Veuster (1840–1889), canonized in 2009, and Blessed Marianne, Sister Marianne Cope (1838–1918), whose canonization took place in October 2012.⁴⁰

The community at Kalaupapa had little direct involvement in World War II, but the settlement did feel the impacts of the war. In the period immediately after the Pearl Harbor attack, military authorities reassigned patients residing in the Health Department facilities at Kalihi to Kalaupapa. Many did not want to live at the remote location and resented the loss of contact with family and friends in Honolulu.

The small landing strip at Kalaupapa remained in use throughout the war, mainly to service the light station at the far end of peninsula. The station itself became the site of a new radio installation, and the US Coast Guard armed its keepers and assigned them new duties as observers.⁴¹ On the peninsula itself, a 937-acre site on the northwest side, became a training site for US Navy bombing exercises and rocket practice. Known as the Makanalua Bombing Range,

³⁵ Greene, *Exile in Paradise*.

³⁶ Department of Health, State of Hawaii, "Report to the Twenty-Sixth Legislature, State of Hawaii," accessed November 2, 2012, <http://co.doh.hawaii.gov/sites/LegRpt/2011/Reports/1/KALAUPAPA%20REPORT.pdf>.

³⁷ Edward Clifford, *Father Damien: A Journey from Cashmere to His Home in Hawaii* (London: Macmillan, 1889); Gavan Daws, *Holy Man, Father Damien of Molokai* (Honolulu: University of Hawaii Press, 1973); Mary Laurence, O. S. F. Hanley, and O. A. Bushnell, *Pilgrimage and Exile: Mother Marianne of Molokai*, 2nd ed. (Honolulu: Mutual Publishing, 2009); and Rachel Donadio, "Pope Canonizes 7 Saints, Including 2 Women with Ties to New York," *New York Times*, October 21, 2012, accessed November 12, 2012, http://www.nytimes.com/2012/10/22/nyregion/pope-canonizes-kateri-tekewitha-and-marianne-cope.html?_r=0.

³⁸ William Chapman, *Moloka'i Light Station, Historic Resource Study* (Honolulu and Kalaupapa, Moloka'i for the Arizona Memorial Museum Association and the Kalaupapa National Historic Park, Hawai'i, 2001).

this area remained in use from 1941 to 1946. While away from the patient area, bombs and fragments found their way into the community's possession. At least one piece in the NPS Kalaupapa collection, a lamp made from a bomb fragment, evidences the community's access to the site.⁴²



12. 7. Kalaupapa National Historical Park (KALA).

³⁹ "Kalaupapa Munitions Cleanup," *Molokai Dispatch*, March 18, 2012, accessed May 24, 2012, <http://themolokaidispatch.com/kalaupapa-munitions-clean-up/>.

APPENDIX B: CONTRIBUTORS

This study has been a collaborative effort of the Pacific West Region of NPS, Hawai‘i NPS units, American Society for Environmental History (ASEH), University of Hawai‘i at Mānoa (UHM), and Hawai‘i Pacific University (HPU). NPS staff members have contributed significantly to the scope of the project and have also been important sources of information throughout. David Louter, chief of cultural resources and historian with the Pacific West Region gave overall direction to the research and questions. Elizabeth Gordon, cultural resource program manager and archeologist at Haleakalā National Park, and Laura Carter Schuster, chief of the cultural resources division and supervising archeologist at Hawai‘i Volcanoes National Park, have been the key onsite contributors, providing background especially on parks under their responsibility.

Lisa Mighetto, director of the ASEH, exercised oversight over the project, providing insight and guidance. Mighetto is an affiliate faculty member at the University of Washington, where she is associated with the UW Interdisciplinary Arts and Sciences Program. She is the author of *Hard Drive to the Klondike: Promoting Seattle during the Gold Rush, 1897–1898* (University of Washington Press, 2002) and *Wild Animals and American Environmental Ethics* (University of Arizona Press, 1991), and editor of *Muir among the Animals: The Wildlife Writings of John Muir* (Sierra Club Books, 1986).

Kieko Matteson with the Department of History at UHM, coordinated efforts in Hawai‘i, as well as contributing to research, interviews, and both writing and editing. Matteson holds a PhD from Yale in environmental history and has taught European, United States, and environmental history at UHM since 2006. Her 2008 dissertation, “Masters of their Woods: Conservation, Community, and Conflict in Revolutionary France” was awarded the ASEH’s Rachel Carson Prize and Yale’s Henry A. Turner Prize.

George Satterfield conducted early research on the project and provided significant insights into the military on Hawai‘i, his research specialty. Satterfield was associate professor of American history at HPU, where he specialized in United States military history. He is now with the Navy War College in Newport, Rhode Island.

William Chapman with the Department of American Studies at UHM, contributed to the research and wrote the report. Chapman is a professor of American history and director of the Graduate Certificate Program in Historic Preservation at UHM. He is the author of numerous studies for the NPS and frequent contributor to work of UNESCO, the International Council on Monuments and Sites (ICOMOS), and other international organizations. In Hawai'i, he has worked closely with Hawai'i Volcanoes National Park over five summers of field schools. He holds an MS in historic preservation from Columbia University and a DPhil (PhD) from Oxford University.

Katharine Sheldon, the principal graduate assistant on the project, did much of the research at UHM, and at state libraries and archives. Sheldon has a background in history and historic preservation. She has a MA in historic landscape studies from the University of York and is currently an MA candidate in the Department of American Studies at UHM.

Kailikepaokamoana (Kepa) Lyman completed additional research both on the ground and at special collections containing materials on the war and its impacts in Hawai'i. Lyman has an MA in geography from UHM and is currently in the PhD program. He also holds a graduate certificate in historic preservation and another certificate in maritime history and underwater archaeology from UHM in addition to an MA in maritime archaeology from the University of Southampton. He has a special interest in World War II sites in Hawai'i and the Pacific.

¹

APPENDIX C: HAWAIIAN *NĒNĒ*

The Nene, also known as *nēnē* and Hawaiian goose (*Branta sandvicensis*), is a species of goose endemic to the Hawaiian Islands. The official bird of the state of Hawai‘i, the *nēnē* is found wild on the islands of Oahu, Maui, Kaua‘i, and Hawai‘i. The species, a cognate of the Canada goose (*Branta canadensis*), first arrived in Hawai‘i around 500,000 years ago. The Canada goose was also the progenitor of a giant version of a Hawaiian goose, now extinct.¹

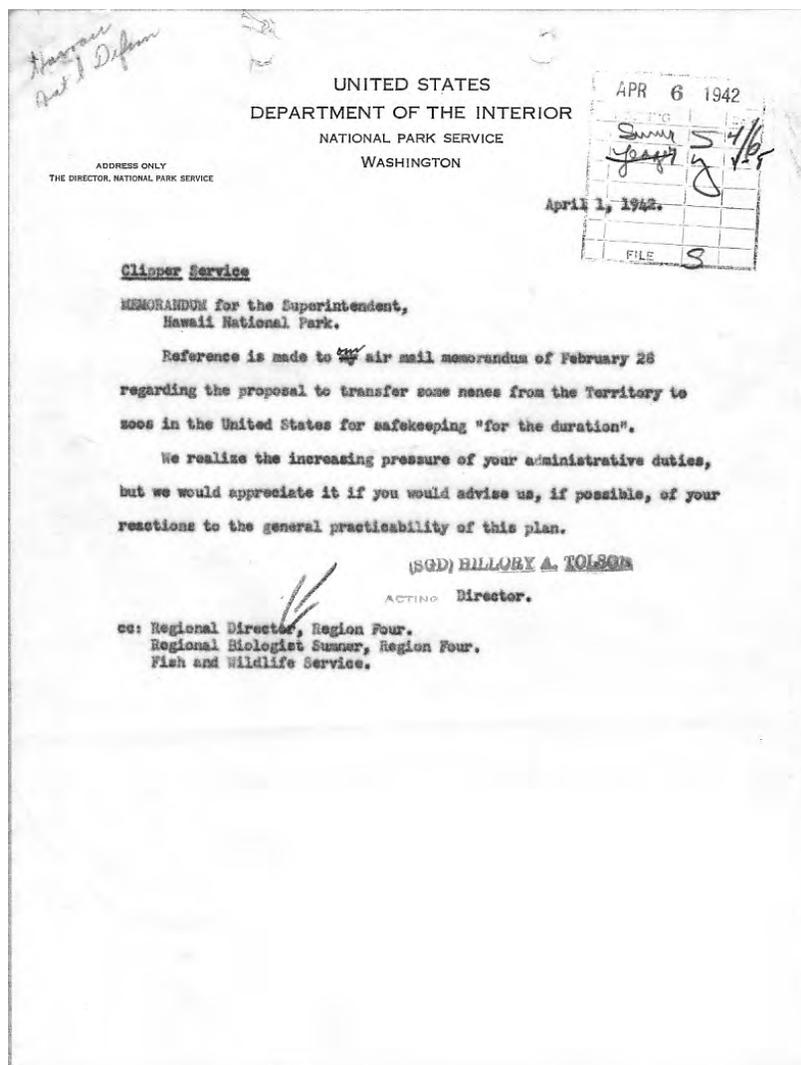
The *nēnē* occupied a special niche in the ecology of the islands. Distributed over at least four islands of the Hawaiian Island chain, the *nēnē* adapted to the rough volcanic soil of Hawai‘i, feeding on leaves, seeds, fruit, grasses, and shrubs. Lacking predators, the species thrived; there were an estimated 25,000 birds on the island of Hawai‘i at the time of the arrival of British navigator James Cook (1728–1779) in 1778. Preyed upon in more recent times by introduced mongoose, pigs, and cats, the population had fallen to about two dozen birds by the 1940s.



13. 1. *Nēnē* at Hawai‘i Volcanoes National Park, 2007.

¹ Paul C. Banko, Jeremy M. Black, and Winston E. Banko, “Hawaiian Goose (*Branta sandvicensis*), in *Birds of North America Online*, ed. A. Poole, Cornell Laboratory of Ornithology, 2014, accessed April 12, 2014, <http://bna.birds.cornell.edu/bna/>.

The National Park Service has long taken a particular interest in the conservation of the species, and reports by park naturalists frequently mention concern for nēnē habitats and the need to protect feeding and breeding grounds. In the postwar period, local advocates, including Hilo entrepreneur (William) Herbert Shipman (1854–1943) and British naturalist Peter Scott (1909–1989), pressed for greater conservation measures. Scott successfully bred the goose in captivity, helping replenish the Hawaiian population.



13. 2. Memorandum concerning the possible evacuation of nēnē from Hawai'i, April 1, 1942.

A little-known fact of the war was the proposal expressed by the NPS regional director Hillary A. Tolson to evacuate the *nēnē* from Hawaii for safekeeping in California. This idea may have originated with NPS staff at Kīlauea, although there is no remaining record of earlier correspondence (referred to in a memorandum of February 28, 1942). Tolson communicated in April to Superintendent Wingate asking whether the proposal to evacuate the *nēnē* was feasible. There was no further action, nor any record of Wingate's response. The Battle of Midway in June 1942 helped allay fears of Japanese invasion and the matter was laid to rest.

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