Commander in Chief, U.S. Navy Pacific Fleet Archaeological Collections Management Program: A Regional Approach

Final Report

Technical Report No. 27

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St. Louis District

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and Management of Archaeological Collections

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Between the spring of 1998 and the winter of 2000 personnel from the U.S. Army Engineer District, St. Louis conducted curation needs assessments and identified potential curation partners for U.S. Navy, Commander in Chief, Pacific Fleet facilities in six Navy regions: Naval Forces, Japan; Naval Forces, Korea; Naval Forces, Marianas (Commonwealth of the Northern Mariana Islands and Guam); Navy Region, Hawaii; Navy Region, Northwest (Washington); and Navy Region, Southwest (California). Approximately 2,345.78 ft^3 of artifacts, 112.22 ft^3 of human skeletal remains, and 307.41 linear feet of associated documentation from archaeological projects conducted on these facilities were examined during the course of the fieldwork. This research was sponsored by the U.S. Navy, Commander in Chief, Pacific Fleet, through the Pacific Division, Naval Facilities Engineering Command.

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Final Report
Technical Report No. 27

by
Kristen Langness Marino and Karolyn K. Kinsey

Michael K. Trimble and
Christopher B. Pulliam
Series Editors

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List of Acronyms

AFB	Air Force Base
ARRC	Anthropology Resource and Research Center
BIOT	British Indian Ocean Territory
CFR	Code of Federal Regulations
CINCPACFLT	Commander in Chief, U.S. Pacific Fleet
CNMI	Commonwealth of the Northern Mariana Islands
COMNAVMAR	Commander, U.S. Naval Forces Marianas
CSU	California State University
FCTC	Fleet Combat Training Center
FISC	Fleet and Industrial Supply Center
FLEACT	U.S. Navy Fleet Activities
FWARG	Far Western Anthropological Research Group
GOJ	Govenrment of Japan
HPO	Historic Preservation Office
HVAC	Heating, Ventilation, Air Conditioning
IARII	International Archaeological Research Institute, Inc.
ITC	International Technology Corporation
MARC	Micronesian Area Research Center
MARS	Micronesian Archaeological Research Services
MCAS	Marine Corps Air Station
MCB	Marine Corps Base
MCBH	Marine Corps Base Hawaii
MEUA	Military Exclusive Use Area
MLA	Military Lease Area
MNI	Minimum Number of Individuals
MOA	Memorandum of Agreement
MoM	San Diego Museum of Man
NAF	Naval Air Facility
NAGPRA	Native American Graves Protection and Repatriation Act
NAS	Naval Air Station
NAVACTS	Naval Activities
NAVBASE	Naval Base
NAVCOM COSC	Naval Command, Control and Ocean Surveillance Center
NAVFAC	Naval Facility
NAVHOSP	Naval Hospital
NAVMAG	Naval Magazine

NAVSTA	Naval Station
NAVSUBASE	Naval Submarine Base
NAWS	Naval Air Weapons Station
NCTAMS EASTPAC	Naval Computer and Telecommunications Area Master Station Eastern Pacific
NCTAMS WESTPAC	Naval Computer and Telecommunications Area Master Station Western Pacific
NHMLAC	Natural History Museum of Los Angeles County
NOLF	Naval Outlying Landing Field
NPWC	Naval Public Works Center
NRTF	Naval Radio Transmitter Facility
NSF	Naval Support Facility
NSRF	Naval Ship Repair Facility
NTC	Naval Training Center
NUWES	Naval Undersea Warfare Engineering Station
NWAC	Naval Warfare Assessment Center
NWS	Naval Weapons Station
OEES	Ogden Environmental and Energy Services
PACMISRANFAC	Pacific Missile Range Facility
PACNAVFACENGCOM	Pacific Division, Naval Facilities Engineering Command
PHRI	Paul H. Rosendahl, Inc.
PMRF	Pacific Missile Range Facility
POC	Point of Contact
SDAC	San Diego Archaeological Center
SDSU	San Diego State University
SLD	St. Louis District
SPAWAR	Space and Naval Warfare Systems Activity Pacific
SURTASS	Surveillance Towed Array Sensor System
SWDIVNAVFACENGCOM	Southwest Division, Naval Facilities Engineering Command
TSF	Training Support Facility
USACE	United States Army Corps of Engineers
UCSB	University of California, Santa Barbara
USGS	United States Geological Survey
UV	Ultraviolet
WSU	Washington State University

Executive Summary

Problem

Federal archaeological collections are a nonrenewable national resource, a legacy to the prehistoric and historic events that have shaped this country. These invaluable resources belong to the American public. The preservation and care of these cultural resources have been mandated by Congress since 1906, and it is incumbent upon the Department of Defense and the U.S. Navy to uphold the laws and regulations set forth by Congress for the proper use of the collections and associated documentation and to care for them in perpetuity.

Unfortunately, for the greater part of the last century, curation of these materials has been insufficient and generally ignored by the responsible agencies. In the past, federal agencies gave little attention to the maintenance of collections once salvage programs were completed. As a result, the integrity of the collections and their associated documentation has steadily deteriorated. Collections and associated information have been lost, damaged, or destroyed. Most of those collections that have survived are stored in sub-standard settings that have never been properly equipped or staffed to serve as long-term repositories.

Standard guidelines for the preservation of federal archaeological collections are set forth in 36 CFR Part 79, Curation of Federally-Owned and Administered Archeological Collections (1991), but very few repositories fully meet these requirements. The improper care and subsequent deterioration of many of these collections not only violates the laws under which they were recovered but also prevents educational and scientific use. Valuable portions of our irreplaceable national heritage have been lost, and our financial investment in archaeological recovery has often been compromised.

In addition, the U.S. Navy has had a presence in U.S. commonwealths and territories, as well as foreign countries where these regulations do not apply. Regular operations by the Navy often involve cultural resources issues and may even include the disturbance of

archaeological sites and possibly the inadvertent discovery of archaeological materials, including human skeletal remains. These activities and possible collections are subject to the laws and regulations set forth by each host country; however, knowledge of and adherence to these policies appear to be minimal and inconsistent. Standard guidelines for adhering to local requirements have not been set by the Navy for its employees stationed in foreign countries, and documentation regarding past episodes dealing with cultural resources has been minimal or nonexistent. Often, the only source of information regarding any past events or issues came from interviews with long-term employees who witnessed or participated in these events.

The Navy is to be commended for making the initial efforts required to identify Navy archaeological collections. Through this project, the Navy will know the location and curation status of its collections, and can take action to improve collections according to federal regulations.

Background

The U.S. Navy as a federal landholding agency is responsible for the management of archaeological and historical resources recovered from lands under its administration. Commanding officers of each naval facility are responsible for complying with all cultural resources laws and regulations, ensuring that archaeological materials recovered from the facility are curated properly. Unfortunately, funding shortfalls, lack of consistent national policy, and the magnitude of the problem have prevented compliance on any large scale. Through the years, most collections have been stored free of charge by universities, museums, state and federal agencies, private societies, and contracting firms. As a consequence of free storage, few collections were allocated the attention necessary for their direct proper care. Inadequate funding and failing facilities now seriously hinder these institutions' abilities to adequately care for the collection.

In 1998, the Commander in Chief, U.S. Pacific Fleet (CINCPACFLT) began funding the U.S. Army Engineer District, St. Louis, to conduct an inventory and assessment of archaeological collections recovered from Navy facilities within its footprint in the Pacific. The scope of this report includes the Navy Region, Hawaii; Navy Region, Northwest; Navy Region, Southwest; Naval Forces, Japan; Naval Forces, Korea; and Naval Forces, Marianas. Collections assessed and subject to 36 CFR Part 79 include only those collections from Navy Region, Hawaii; Navy Region, Northwest; Navy Region, Southwest; and Naval Forces, Marianas. The findings for these Commands are addressed below.

Findings

Status of Repositories

Archaeological collections investigated during the course of this project are stored in a variety of repositories (Table 1). Of these repositories, slightly

more than half (i.e., museums, curation centers, and university laboratories) have a curation mission.

Table 1.
Types and Frequencies of Repositories Curating Navy Collections

Type of Repository	Number Present[a]	%
Contract Firm	12	39
Government Agency	1	3
Navy Base/Navy Museum	5[b]	16
Museum or Curation Center	6	19
University Laboratory/Curation Facility	7	23
Total	31	100

[a] 31 repositories were identified as housing archaeological collections from Navy facilities and visited as part of this research. However, 16 of these 31 had more than one building or more than one room in a single building that was being used for collections storage, bringing the actual number of collections storage areas to 56. One repository, William Manley and Associates, was not evaluated because the records were in the process of being moved to Naval Air Station North Island. Therefore, the statistics that are listed below and those in Chapter 8 are based on the overall total (n=55) of examined collections storage areas.
[b] Additional collections are located at a Navy facility in Japan, which is not included in this total.

In accordance with Supplemental Agreement No. 1, each of the repositories identified during the course of this project were evaluated in order to determine their level of compliance with 36 CFR Part 79. To best accomplish this assessment, statistics pertaining to environmental controls, security, fire safety, and pest management for each repository were collected and are described below. Additional information on these particular points and a breakdown for each repository is located in Chapter 8.

1. **Environmental Controls:** Minimally repositories should possess air conditioning and heating (where applicable). Thirty-seven of the collections storage areas (n=55) that were identified and examined had appropriate environmental controls.

2. **Security:** Minimally, an adequate security system should possess adequate intrusion detection and deterrent features. Thirty-three of the collection storage areas that were examined had a security system that incorporates both aspects.

3. **Fire Safety:** Minimally, an adequate fire-safety system should possess adequate detection and suppression features. Thirty-nine of the collection storage areas that were examined had a fire safety system that incorporates both aspects.

4. **Pest Management:** Minimally, an adequate pest management program consists of regular monitoring and control of pests. Twenty-four of the repositories that were examined possessed adequate pest management programs.

In sum, 11 collections storage areas at six repositories—Natural History Museum of Los Angeles County (Collections Manager's Office), California; San Diego Museum of Man (Laboratory 6 and Laboratory 2), California; University of California, Santa Barbara (Ossuary and Artifact Collections Room); Ogden Environmental and Energy Services (Room 424), Hawaii; The Burke Museum of Natural History and Culture (Hallway, Room 33, and Room 30), Washington; and Washington State University (Room 104 and Room 105)—currently meet all the minimum standards noted in 36 CFR Part 79 for the points listed above (i.e., possess all four of the above attributes).

Status of Archaeological Materials

Navy archaeological materials collections consist of approximately 2,345 ft³ of artifacts, 112 ft³ of human skeletal remains, and 307 linear feet of associated records from 64 Navy facilities located in the United States, Guam, and the Commonwealth of the Northern Mariana Islands (CNMI). Table 2 provides a regional collections summary and Table 3 is a summary of the archaeological collections assessed for this project, listed by location, repository, and facility.

Table 2.
Summary of Archaeological Collections by Navy Region

Navy Region	Artifacts (ft³)	Human Skeletal Remains (ft³)	Records (linear feet)
Naval Forces, Japan	— [a]	—	9.69 [a]
Naval Forces, Korea	—	—	0.57
Naval Forces, Marianas	522.70	27.49	54.42
Navy Region, Hawaii	163.01	0.13	108.58
Navy Region, Northwest	170.30	7.49	3.65
Navy Region, Southwest	1,489.77	77.11	130.50
Total	2,345.78	112.22	307.41

[a] An estimated 2,500 ft³ from Ikego Housing Area, Japan, are stored on-base and are not included in the total because 36 CFR Part 79 does not apply to them. Additional documentation about the archaeological work performed there is also stored on-base, but a total could not be estimated. The total here is for documentation stored in Hawaii. See Chapter 2 for further discussion about the archaeological collections in Japan.

Collection Storage

Overall, primary containers (usually boxes that hold a group of archaeological materials) consist mainly of acidic cardboard boxes of varying sizes (most in the 1.0 ft³ range). Boxes made of archival materials are utilized, but not to the extent necessary for the proper curation of the collections. The remaining primary containers consist of other types of containers such as small boxes, grocery bags, Tyvek® bags, plastic zip-lock bags, or none at all. Similarly, boxes that have a removable lid are present in the collection, but not to the degree that would ensure longer life for the box and easier access to the collections. Most boxes contain some sort of label, if only rudimentary, and many containers are packed improperly, either

Table 3.
Quantity of Archaeological Collections Examined by Repository

State	Repository	Facility	Artifacts (ft³)	Human Skeletal Remains (ft³)	Records (linear feet)
CA	Affinis Environmental Services	NAS Whidbey Island, WA	0.02	—	—
CA	ASM Affiliates	NAS North Island, CA	4.06	—	0.27
CA	California State University, Fullerton	NAS North Island, CA	23.50	1.50	0.42
CA	California State University, Northridge	NAS North Island, CA	267.97	—	22.21
CA	Fort Guijarros Museum Foundation	NAVSUBASE Point Loma, CA	435.80	0.01	7.94
CA	Fowler Museum of Cultural History	NAS North Island, CA	302.62	2.45	5.52
CA	Gallegos & Associates	NAVSUBASE Point Loma, CA	10.20	—	0.19
		NOLF Imperial Beach, CA	—	—	0.06
		NWS Fallbrook, CA	—	—	0.20
CA	KEA Environmental, Inc	NAVSTA San Diego, CA	5.75	—	0.15
		Salton Sea Test Base, CA	1.15	—	0.50
CA	Natural History Museum of Los Angeles County	NAS North Island, CA	31.21	0.03	0.50
CA	NAS North Island	NAS North Island, CA	8.89	4.62	85.26
CA	RMW Paleo Associates, CA	NAVSUBASE San Diego, CA	—	—	0.19
CA	San Diego Archaeological Center	NAS North Island, CA	63.90	—	0.70
		NWS Fallbrook, CA	12.08	—	0.82
		NWS Seal Beach, CA	70.07	—	—
CA	San Diego Museum of Man	NAS North Island, CA	18.39	9.15	0.48
CA	San Diego State University	Admiral Baker Field, CA	22.28	—	3.95
		NAS North Island, CA	196.90	3.30	0.84
CA	SWDIVNAVFACENGCOM	NAVSUBASE Point Loma, CA	6.0	—	—
CA	Southwest Museum	NAS North Island, CA	1.59	5.11	—
CA	University of California, Santa Barbara	NAS North Island, CA	7.41	50.94	0.12
CA	William Manley and Associates	NAVSUBASE Point Loma, CA	—	—	0.18
CNMI	Tinian Historic Preservation Office	MEUA, Tinian, CNMI	36.05	—	—
GU	Anthropology Resource and Research Center	NAVFAC, GU	0.1	5.23	0.12
GU	International Archaeological Research Institute, Inc.	NCTAMS WESTPAC, GU	3.46	3.94	0.02
GU	Marianas Military Museum	Apra Harbor Naval Complex, GU	4.25	—	5.94
GU	Micronesian Archaeological Research Services	NAVACTS Ordnance Annex, GU	10.48	0.59	0.94
		NAVSTA, GU	2.89	0.31	0.02
GU	Micronesian Area Research Center	NAVFAC, GU	40.15	0.07	2.93
GU	Paul H. Rosendahl, Inc.[a]	MLA, Tinian, CNMI	256.82	15.25	10.39
		Andersen AFB, GU	—	—	0.01
		NAVACTS, GU	40.70	1.35	0.20
		NAS Agana, GU	1.93	—	0.02
		NAVMAG, GU	28.07	—	2.78
		NSF, Diego Garcia, BIOT	—	—	0.17
HI	International Archaeological Research Institute, Inc.	MEUA, Tinian, CNMI	7.81	—	0.38
		FISC, GU	5.43	—	1.17
		Apra Harbor Naval Complex, GU	—	—	0.03
		NCTAMS EASTPAC, HI	5.84	—	0.98
		PMRF Barking Sands, HI	—		0.06
HI	Ogden Environmental and Energy Services	MLA, Tinian, CNMI	51.27	0.38	2.40
		Andersen AFB, GU	—	—	0.08
		Apra Harbor Naval Complex, GU	—	—	1.04
		FISC, GU	—	—	0.11
		NAVACTS Ordnance Annex, GU	15.46	0.35	1.75
		NAVACTS Waterfront Annex, GU	—	—	0.01
		NCTAMS WESTPAC, GU	—	—	0.02
		Naval Hospital, GU	—	—	0.01

[a] In December 2000, all Navy collections from PHRI, Guam, were removed. The collections from Tinian were transferred to the Tinian Municipality and those from Guam were transferred to the Guam Preservation Trust.

Table 3.
Quantity of Archaeological Collections Examined by Repository (Continued)

State	Repository	Facility	Artifacts (ft³)	Human Skeletal Remains (ft³)	Records (linear feet)
HI	Ogden Environmental and Energy Services (Continued)	NAVMAG, GU	2.34	—	0.36
		NPWC, GU	—	—	0.03
		NSRF, GU	—	—	0.01
		NAVSTA, GU	—	—	0.15
		Fort Kamehameha, HI	74.79	—	1.59
		Ka'ula Training Target Impact Area, HI	—	—	0.13
		MCBH Kaneohe Bay, HI	1.17	—	—
		NAS Barbers Point, HI	1.17	—	0.22
		NAVBASE Kaho'olawe, HI	—	—	0.38
		NCTAMS EASTPAC, HI	—	—	0.04
		NAVMAG Lualualei, HI	—	—	0.16
		NUWES Lualualei, HI	—	—	0.02
		PMRF Barking Sands, HI	8.19	—	0.91
		Pearl Harbor Naval Complex, HI	—	—	0.41
		SPAWAR (SURTASS), HI	1.17	—	0.18
HI	PACNAVFACENGCOM	MLA, Tinian, CNMI	—	—	15.20
		Saipan Airfields, Saipan, CNMI	—	—	0.05
		Apra Harbor Naval Complex, GU	9.02	0.02	0.69
		FISC, GU	—	—	0.80
		Guam Navy	—	—	2.12
		NAVACTS Ordnance Annex, GU	—	—	0.53
		NAS Agana, GU	—	—	0.24
		NCTAMS WESTPAC, GU	—	—	0.70
		NAVMAG, GU	—	—	2.19
		Bellows AFB, HI	—	—	0.84
		Fort Kamehameha, HI	—	—	9.72
		Iroquois Point Naval Housing Area, HI	—	—	0.10
		Makalapa Flag Quarters, HI	—	—	0.30
		MCBH Kaneohe Bay, HI	—	—	16.20
		Molokai Training Support Facility, HI	—	—	0.69
		NAS Barbers Point, HI	—	—	8.74
		NAVBASE Kaho'olawe, HI[b]	10.06	0.13	18.32
		NCTAMS EASTPAC, HI	—	—	0.04
		NAVMAG Lualualei, HI	—	—	2.70
		NAVMAG Lualualei Waikele Branch, HI	—	—	0.91
		NAVMAG West Loch Branch, HI	—	—	0.01
		NAVPROTEC, HI	—	—	0.25
		NRTF Lualualei, HI	—	—	0.21
		Naval Security Group Activity, HI	—	—	0.10
		NAVSUBASE Pearl Harbor, HI	—	—	0.63
		NUWES Lualualei, HI	—	—	0.08
		PACNAVFACENGCOM, HI	—	—	9.58
		PMRF Barking Sands, HI	—	—	7.84
		Pearl Harbor Naval Complex, HI	—	—	1.92
		Waiawa Floodplain, HI	—	—	0.04
		FLEACT Okinawa/NAF Kadena, Japan	—	—	3.23
		FLEACT Sasebo, Japan	—	—	2.78
		Japan Navy	—	—	0.40
		MCAS Futenma, Japan	—	—	0.08
		MCB Camp Smedley, Japan	—	—	0.08
		NAF Atsugi, Japan	—	—	0.15
		White Beach NAVFAC, Japan	—	—	0.07
		Yokosuka Naval Complex, Japan	—	—	2.20
		FLEACT Chinhae, Korea	—	—	0.57
		Midway Island	—	—	0.38

[b] Collections from NAVBASE Kaho'olawe were transferred to the Bailey Museum on Maui after the St. Louis District's assessment. The State of Hawaii has assumed responsibility for their care.

Table 3.
Quantity of Archaeological Collections Examined by Repository (Continued)

State	Repository	Facility	Artifacts (ft³)	Human Skeletal Remains (ft³)	Records (linear feet)
HI	PACNAVFACENGCOM (Continued)	Wake Island	—	—	1.46
		NSF Diego Garcia, BIOT	—	—	0.53
		Miscellaneous Navy	—	—	22.23
HI	Paul H. Rosendahl, Inc.	Andersen AFB, GU	0.63	—	—
		MCBH Kaneohe Bay, HI	3.03	—	—
		NAS Barbers Point, HI	56.71	—	1.11
		NAVBASE Kaho'olawe, HI	3.01	—	—
		PMRF Barking Sands, HI	0.69	—	—
		Waiawa Floodplain, HI	—	—	0.08
		Midway Island	1.85	—	—
		Wake Island	1.17	—	—
Japan	Yokosuka Naval Complex	Ikego Housing Area, Japan	—[c]	—	—[c]
WA	The Burke Museum of Natural History and Culture	NAS Whidbey Island, WA	15.0	—	0.24
		NAVMAG Indian Island, WA	1.0	—	0.04
WA	Washington State University	NAVMAG Indian Island, WA	154.28	7.49	3.37
Total			2,345.78	112.22	307.41

[c] An estimated 2,500 ft³ are stored on-base and are not included in the total because 36 CFR Part 79 does not apply to them. Additional documentation about the archaeological work performed there is also stored on-base, but a total could not be estimated. See Chapter 2 for further discussion about the archaeological collections in Japan.

overpacked or in some other way that endangers the collections. Many of the boxes are dirty or dusty.

Most of the collections are stored in polyethylene, zip-lock bag secondary containers (those containers included within the primary containers). Many of these plastic bags need to be replaced because of tears or increasing brittleness due to storage in environments lacking proper environmental controls. The remaining collections are stored loose within the primary containers or in paper bags, small acidic or acid-free cardboard boxes, or a variety of other types of containers, which are detailed in each chapter.

Collection Composition

Archaeological collections consist primarily of lithics and unmodified shell. Table 4 presents the major prehistoric and historic material classes (by volume) encountered during the course of this research.

Status of Human Skeletal Remains

At present, human skeletal remains recovered from CINCPACFLT Navy facilities have been identified at 17 repositories (Table 5). The human remains assessed during this project encompass approximately 112 ft³.

In general, complete rehabilitation (e.g., reboxing, rebagging, labeling) needs to be carried out in order to stabilize the remains, and a complete inventory needs to be generated in order to comply with the Native American Graves Protection and Repatriation Act (NAGPRA) for those remains that have not already been inventoried. Remains from Guam and

Table 4.
Summary of Material Classes of Artifacts from CINCPACFLT Facilities

Material Class	%	Total Cubic Footage
Lithics	21.30	499.65
Prehistoric Ceramics	9.92	232.60
Faunal Remains	9.72	228.01
Shell (unmodified)	19.43	455.79
Botanical	1.20	28.15
Flotation	2.53	59.35
Soil	9.0	211.12
^{14}C	1.03	24.16
Human Skeletal Remains	4.78	112.22
Worked Shell	2.05	48.09
Worked Bone	0.80	18.77
Brick/Masonry	3.49	81.87
Historic Ceramics	2.11	49.50
Metal	5.90	138.40
Glass	3.50	82.10
Textiles	0.12	2.81
Other	3.12	73.19
Total	100.0	2,345.78

Table 5.
Summary of Human Skeletal Remains from CINCPACFLT Navy Facilities

Repository	Facility	Volume of Human Skeletal Remains (ft^3)
California State University, Fullerton	NAS North Island, CA	1.50
Fort Guijarros Museum Foundation, CA	NAVSUBASE Point Loma, CA	0.01
Fowler Museum of Cultural History, CA	NAS North Island, CA	2.45
Natural History Museum of Los Angeles County, CA	NAS North Island, CA	0.03
NAS North Island	NAS North Island, CA	4.62
San Diego Museum of Man, CA	NAS North Island, CA	9.15
San Diego State University, CA	NAS North Island, CA	3.30
Southwest Museum, CA	NAS North Island, CA	5.11
University of California, Santa Barbara	NAS North Island, CA	50.94
Anthropology Resource and Research Center, GU	NAVFAC, GU	5.23
International Archaeological Research Institute, Inc., GU	NCTAMS WESTPAC, GU	3.94
Micronesian Archaeological Research Services, GU	NAVACTS Ordnance Annex, GU	0.59
	NAVSTA, GU	0.31
Micronesian Area Research Center, GU	NAVFAC, GU	0.07
Paul H. Rosendahl, Inc., GU	MLA, Tinian, CNMI	15.25
	NAVACTS, GU	1.35
Ogden Environmental and Energy Services, HI	MLA, Tinian, CNMI	0.38
	NAVACTS Ordnance Annex, GU	0.35
PACNAVFACENGCOM, HI	Apra Harbor Naval Complex, GU	0.02
	NAVBASE Kaho'olawe, HI	0.13
Washington State University	NAVMAG Indian Island, WA	7.49
Total		112.22

Tinian do not need to be inventoried for NAGPRA compliance. Human skeletal remains are discussed further in each chapter.

Status of Documentation

Navy archaeological records encompass 307.41 linear feet and include various types of records (Table 6). Paper records (156.78 linear feet) comprise the largest type, followed by project reports (84.54 linear feet) that document archaeological work on Navy lands.

Table 6.
Summary of Record Types from CINCPACFLT Facilities

Records Type	%	Total Linear Feet
Paper[a]	51.0	156.78
Reports	27.5	84.54
Oversized	6.2	19.06
Audiovisual	1.2	3.69
Photographic	13.2	40.58
Computer	0.9	2.76
Total	100.0	307.41

[a] Includes record types such as maps, drawings, and blueprints. This category is defined in detail in each chapter.

Professional-quality archival practices were noted at a few of the repositories visited. In most cases, paper records have not been housed in acid-free folders, photographs have not been isolated and stored in chemically inert sleeves, and large-scale maps have not been stored flat in map cases. In few instances did a set of project documentation appear to exist in its entirety at the repository with the collection. Project documentation is more often than not fragmentary or non-existent. This could result from a number of factors. Collections managers and archaeologists might not consider the original associated documentation a part of their curatorial responsibilities, or contractors might not transfer all or any of the associated records with the collection. In many cases, records might have been produced but were lost or purged. In some cases, especially with the earliest collections, records never might have been produced. Regardless, it appears that many records that should have been generated during an archaeological investigation could not be located.

Status of Repository Management Controls

The majority of repositories holding Navy archaeological collections, particularly those repositories that were intended for the curation of collections, maintain some type of internal management policies. These policies range from comprehensive curation plans with accommodations made for every portion of the collection to more basic policies that are aimed at preparing collections for deposition in a dedicated long-term storage repository. Specific policies are detailed in each chapter.

Discussion Items

The following points of discussion outline details or problems that were encountered at specific repositories. In some instances they provide complementary information to that contained in the report, and in others they provide the only information for a specific repository and/or collection.

Arizona State Museum, University of Arizona

Tucscon, Arizona

According to Chris Coleman at the Natural History Museum of Los Angeles County, original photos from the Big Dog Cave site (CA-SCLI-119) on San Clemente Island (NAS North Island, California) are housed at Arizona State Museum.

Affinis Environmental Services

El Cajon, California

The records from NAS Whidbey Island, Washington, that are housed at Affinis Environmental Services could not be located for the St. Louis District on-site visit. Staff at Affinis said that the records are stored in acidic cardboard boxes with telescoping lids in the same room as the artifacts.

Bowers Museum of Cultural Art

Santa Ana, California

In 1935 and 1936, Wilbur and Nell Murbarger collected artifacts, consisting of groundstone, flaked stone, faunal, and floral remains, from San Clemente Island (NAS North Island, California). These items were on display at the Bowers Museum of Cultural Art until 1948 and 1949, when they were returned to the Musbargers, who intended to open their own museum; however, an examination of county historical records revealed that no museum was ever opened (Walker et al. 1993). The current location of the artifacts is unknown.

Brian F. Mooney Associates

San Diego, California

Brian F. Mooney Associates might have archaeological collections from NAVSUBASE Point Loma, California. The company was subcontracted by Ogden Environmental and Energy Services and produced a report about Point Loma (Carrico and Cooley 1997). St. Louis District's multiple telephone calls to Brian F. Mooney Associates were never returned.

Digital Systems Research, Inc.

Ridgecrest, California

Far Western Anthropological Research Group (FWARG) subcontracted Digital Systems Research to conduct work on NAS North Island, California. According to staff at FWARG, Digital Systems Research does not have any collections. However, the St. Louis District was unable to contact anyone at Digital Systems Research to confirm this.

Foster Wheeler Environmental Corporation
Sacramento, California

Approximately 1.0 linear foot of records from NAVMAG Indian Island, Washington, is housed at Foster Wheeler Environmental Corporation. The St. Louis District was unable to arrange a mutually agreeable time to review the collections with the staff at Foster Wheeler.

IT/OHM Remediation Services Corporation
San Diego, California

IT/OHM Remediation Services Corporation subcontracted archaeological work on Salton Sea Test Base, California, to KEA Environmental, Inc. in San Diego. Salton Sea Test Base collections were reviewed at KEA, and it is doubtful that any collections are at IT/OHM; however, no one at IT/OHM could be reached to confirm this.

International Technology Corporation
Irvine, California

International Technology Corporation (ITC) subcontracted archaeological work on NWS Seal Beach, California, to Chambers Group, Inc. in Irvine. No collections are located at Chambers Group, and it is doubtful that any collections are at ITC; however, no one at ITC could be reached to confirm this.

NAS North Island
San Diego, California

Three foreign museums potentially hold collections from San Clemente Island on NAS North Island: Goteborgs Etnografiska Museum, Goteborg, Sweden (13 artifacts); Museum Fur Volkerkunde, Berlin, Germany (possible stone cup from San Clemente [San Elemente]); and Otago Museum, Dunedin, New Zealand (eight artifacts from W. O. Stewart collection) (Walker et al. 1993). Additionally, a small collection from the early part of the twentieth century is at the Peabody Essex Museum, which prepared a NAGPRA Section 5 Inventory for a skull and soapstone vessel fragments. The items were determined to be culturally unaffiliated. Collections are also with the Heye Foundation, Museum of the American Indian. However, the collections at the Peabody Essex and the Heye Foundation were collected prior to the Navy's occupation of San Clemente Island. Human skeletal remains from San Clemente Island at the Wilford Archaeology Lab at the University of Minnesota, Minneapolis, were transferred to the University of California, Santa Barbara in 1995. Additionally, collections from Mesa College were returned to NAS North Island.

Ogden Environmental and Energy Services
San Diego, California

Ogden Environmental and Energy Services in California no longer has an archaeological department. The company conducted archaeological work on NWS Seal Beach (Fallbrook Detachment); NAS Miramar; NAVSUBASE San Diego; and Naval Warfare Assessment Center Corona, all in California.

The current location of any artifact and records collections that might have been generated is unknown.

Tetra Tech, Inc.

San Diego, California

Tetra Tech, Inc. subcontracted archaeological work on NAS Lemoore and NAWS Point Mugu, both in California, to Gallegos and Associates in Carlsbad, California. No collections from these bases are located at Gallegos and Associates, and it is doubtful that any collections are at Tetra Tech; however, no one at Tetra Tech could be reached to confirm this.

Westec Services, Inc.

San Diego, California

Westec Services conducted archaeological work on NAVSUBASE Point Loma, California. Westec Services later became ERCE, which then became Ogden Environmental and Energy Services, which lost its archaeology department (see above). Any artifact or records collections are probably lost.

William Manley and Associates

San Diego, California

At the time of the St. Louis District review, records from NAVSUBASE Point Loma, California, that were housed at William Manley and Associates were about to be transferred to NAS North Island, California, where Mr. Manley was to start working. Because of this, the records were reviewed, but the repository was not. Approximately 0.18 linear feet of associated documentation, including administrative and background paper records (0.08 linear feet), reports (0.08 linear feet), and color prints and negatives (0.02 linear feet) were to be transferred. At the time of the assessment, the records were stored in acidic folders in a desk drawer. The folders were labeled directly in pen and with an adhesive label.

Historic Preservation Office

San Jose, Tinian, Commonwealth of the Northern Mariana Islands

One box of artifacts (1.7 ft^3) could not be examined due to its inaccessible location in the storage area at the Tinian Historic Preservation Office.

Marianas Military Museum

Agat, Guam

One bag of prehistoric ceramics (0.25 ft^3) was located by someone walking around Apra Harbor Naval Complex. The ceramics given to Jennings Bunn, Jr., the caretaker of collections at the Marianas Military Museum, but their provenience on the base is unknown.

Bishop Museum
Honolulu, Hawaii

Any CINCPACFLT collections at the Bishop Museum were not assessed as part of this project.

International Archaeological Research Institute, Inc.
Honolulu, Hawaii

Associated documentation from a cultural resources survey conducted on FLEACT Chinhae, Korea, is located at International Archaeological Research Institute, Inc. (IARII). The survey was conducted during the St. Louis District's visit to Korea. Because collections at IARII had already been assessed, the St. Louis District did not return to IARII to review the FLEACT Chinhae documentation.

Pacific Division Naval Facilities Engineering Command
Pearl Harbor, Hawaii

All of the artifacts and human skeletal remains (10.19 ft^3) from NAVBASE Kaho'olawe, Hawaii, have been transferred from PACNAVFACENGCOM to the Bailey Museum in Hawaii since the St. Louis District's review.

Archaeological Services Consultants, Inc.
Columbus, Ohio

Hardlines: Design & Delineation subcontracted Archaeological Services Consultants to conduct work on NAVSUBASE San Diego, California (Hardlines: Design & Delineation 1995a and 1995b). Although no artifacts were collected, it is not known if any records were generated. No one at Archaeological Services Consultants could be reached to discuss the work.

Boardman Bombing Range, Oregon

Additional records for Boardman Bombing Range in Oregon, and possibly some other Navy facilities in Washington, may be stored at a Washington contractor's office. This has yet to be resolved. No objects or human skeletal remains are believed to be at this office.

Joe Waterhouse, Sr.
Olympia, Washington

Less than 1.0 ft^3 of artifacts from site 45JE16 on NAVMAG Indian Island, Washington, was loaned from Washington State University in Pullman to the Klallam tribe via Joe Waterhouse, Sr. These collections were examined at Mr. Waterhouse's residence by the St. Louis District in June 1994 (Halpin and Holland 1997).

Smithsonian Institution
Washington, D.C.

The Fort Guijarros Museum Foundation sent a potential human cranial fragment from site CA-SDI-12000 on NAVSUBASE Point Loma, California, to Dr. Doug Owsley at the Smithsonian Institution who confirmed that it is human. The cranial fragment is still at the Smithsonian.

Corrective Actions

A number of corrective actions are necessary to bring the Navy collections, and those repositories housing them, into compliance with 36 CFR Part 79. Several general recommendations include the following.

1. Coalesce collections into repositories in their state or territory of origin and spend requisite funds to upgrade them to meet federal curation standards. Such repositories should have the professional capability and staff to care for archaeological collections in perpetuity.

2. Develop and implement uniform inventory procedures.

3. Develop and implement a formal archives management program.

4. Rehabilitate existing collections by inventorying and cataloging all archaeological collections to a standard consistent with those of a professional museum. In addition, rehouse collections in archival-quality containers.

5. Deveop and implement unique ten-year curation plans at each regional command.

The corrective measures, if carried out, will permit the Navy to meet minimum federal requirements for the adequate long-term curation of archaeological collections. By adopting this approach, the Navy has the opportunity to implement a curation program that allows public access and will serve its needs well into the future.

Conclusions

In general, CINCPACFLT archaeological collections and associated records are deteriorating in their current storage environments. The findings presented in this report will assist CINCPACFLT in the implementation of a long-term consistent management plan for the proper curation of these materials. Federal archaeological collections represent an invaluable nonrenewable resource that will forever lose their educational and research value and potential if not properly cared for. Increased attention to these collections will more adequately preserve them for use by future generations.

Acknowledgments

The St. Louis District is grateful to the staff at every State Historic Preservation Office, Navy facility, and repository that was visited as part of this project for the time, effort, and contributions they made to the completion of the research. Likewise, the St. Louis District extends thanks to the staff at Pacific Division, Naval Facilities Engineering Command, particularly Annie Griffin, for recognizing the Navy's need for a project of this nature and for their continued commitment to the proper curation of Navy collections. Ms. Griffin's continued assistance is vital to the successful completion of the project, and is much appreciated by the staff in the St. Louis District.

1

Introduction

U.S. Navy facilities are responsible for archaeological artifact collections and accompanying documentation (hereafter referred to as archaeological collections) stored in many different institutions throughout the Commander in Chief, Pacific Fleet's (CINCPACFLT) footprint in the Pacific. The project area covered in this report consists of Navy facilities in six navy regions: Navy Region, Hawaii; Navy Region, Northwest (Washington); Navy Region, Southwest (California); Naval Forces, Japan; Naval Forces, Korea; and Naval Forces, Marianas (U.S. Territory of Guam and the Commonwealth of the Northern Mariana Islands). Although the Commonwealth of the Northern Mariana Islands, Japan, and Korea are not subject to the same laws and regulations as the United States and its territories, the archaeological collections still must be maintained for future use.

Archaeological collections from Marine Corps bases in Hawaii and Japan and Navy bases in Diego Garcia, Midway Island, and Wake Island were not included as part of the project; however, because collections from these locations were sometimes integrated with the other CINCPACFLT collections, information about them has been included in some repository chapters.

The responsibility for archaeological collections is mandated through numerous legislative enactments, including the Antiquities Act of 1906 (16 U.S.C. 431-433), the Historic Sites Act of 1935 (16 U.S.C. 461-467), the Archaeological and Historic Preservation Act of 1974 (16 U.S.C. 469-469c), the National Historic Preservation Act of 1966 (16 U.S.C. 470), and the Archaeological Resources Protection Act of 1979 (16 U.S.C. 470aa-470mm). Executive Order 11593 (U.S. Code 1971) and amendments to the National Historic Preservation Act in 1980 provide additional protection for these resources. The implementing regulation for securing the preservation of archaeological collections is 36 CFR Part 79, Curation of Federally-Owned and Administered Archeological Collections.

Additionally, the Department of the Navy's Environmental and Natural Resource Manual, Historic and Archeological Resources Protection (OPNAVINST 5090.1B,23-6.6k, Ch 1,2 February 1998), states that commanding officers of shore facilities must provide for storage and professional curation of significant archaeological collections acquired as a result of carrying out legal compliance actions.

Archaeological collections, as defined in 79.4(a) of 36 CFR Part 79, are "material remains that are excavated or removed during a survey, excavation or study of a prehistoric or historic resource, and associated records that prepared or assembled in connection with the survey, excavation or other study." Associated records are further defined as "original records (or copies thereof) that are prepared, assembled and document efforts to locate, evaluate, record, study, preserve or recover a prehistoric or historic resource" [79.4(a)(2)]. Therefore, in keeping with these descriptions, all archaeological investigations—survey, excavation, or other study—generate records associated with that specific endeavor, regardless of whether or not archaeological materials were recovered. In this

report the term "associated documentation" is used to describe that set of archaeological records generated as a result of a survey, excavation, or other study.

The Native American Graves Protection and Repatriation Act (25 U.S.C. 3001 et seq., NAGPRA) was enacted in 1990 to identify federal holdings of Native American human remains, funerary objects, sacred objects, and objects of cultural patrimony. In addition, NAGPRA mandates that federal agencies reach agreements with Native American Tribes, Alaskan Native, and Hawaiian Native groups on the repatriation or disposition of these remains and objects. All federal agencies were required to meet mandated deadlines for compliance with NAGPRA by November 16, 1993, for their summaries of unassociated funerary objects, sacred objects, and objects of cultural patrimony, and by November 15, 1995, for their inventories of human remains and associated funerary objects.

As the first step in complying with 36 CFR Part 79, staff at the Pacific Division Naval Facilities Engineering Command (PACNAVFACENGCOM) in Hawaii began providing funds to the U.S. Army Corps of Engineers in Fiscal Year 1998 for the purpose of inventorying archaeological collections recovered from CINCPACFLT facilities. Pre-fieldwork for the current project began in the spring of 1998, and fieldwork began in the fall of 1998. Repository visits continued through the winter of 2000.

As part of this curation assessment project, CINCPACFLT would receive a general inventory of collections, providing a firm estimation of the magnitude of curation needs. In addition, collections managers at storage facilities and cultural resource managers at Navy facilities would receive a plan addressing their specific curation needs.

A Memorandum of Agreement (MOA) between PACNAVFACENGCOM and the St. Louis District was signed in July 1998. Supplemental Agreement No. 1 to the MOA outlines the following services that the St. Louis District would perform for CINCPACFLT and PACNAVFACENGCOM.

(a) Perform background research at each regional command, including meeting and coordinating with appropriate command personnel.

(b) Perform archaeological curation needs assessments in all six Navy regions.

(c) Determine rehabilitation costs for all archaeological materials for which the regional commands are responsible.

(d) Provide options (including costs) for the long-term curation of collections.

(e) Research repatriation issues and furnish recommendations regarding PACNAVFACENGCOM implementation/ execution.

(f) Furnish PACNAVFACENGCOM with a CINCPACFLT curation report addressing each regional command.

(g) Assist CINCPACFLT with implementation of collections management recommendations.

Methods

Methods used during the course of this project have been developed by the St. Louis District and are those that have proven the most efficient in providing requisite data in the most time- and cost-effective manner. These methods are detailed below, and the phases sometimes overlapped. All phases of the project were conducted by St. Louis District personnel.

Pre-Fieldwork

Archaeologists at PACNAVFACENGCOM were interviewed by the St. Louis District in order to gather baseline information and to compile a list of the Navy facilities located within most of the project areas outside of the continental United States. Information regarding the Navy Regions Northwest and Southwest were gathered through each respective regional office.

Literature review

At the Navy base archaeologist offices, all administrative files, archived files, associated documentation, and facility maps were examined to begin identifying collections and their possible locations. Generally, the historic preservation offices of each state or territory also were visited in order to

review the archaeological reports and site files collected for the Navy property within their respective areas.

Planning for Assessments

Data generated from information collected during the literature review were used to compile a list of all agencies, firms, and institutions associated with the recovery or curation of archaeological materials belonging to each specific Navy region. This list of potential repositories was shortened through telephone interviews that established whether or not the repository did indeed hold Navy archaeological collections. Those with collections were scheduled for assessments (Table 7).

Curation Assessments

Each curation assessment followed the same format.

1. A survey questionnaire was completed for every facility involved with the curation of Navy archaeological collections. The questionnaires solicit information on repositories, artifact collections, and associated documentation.

2. A building evaluation was completed to determine whether or not the facility approached compliance with the requirements for repositories specified in 36 CFR Part 79. Forms address topics such as structural adequacy, space use, environmental controls, security, fire detection and

Table 7.
Schedule of Curation Assessments

Location	Repository	Date of Assessment
California	Affinis Environmental Services	February 29, 2000
	ASM Affiliates	February 29, 2000
	CSU, Fullerton	February 25 and April 28, 1999
	CSU, Northridge	March 1, 2000
	Fort Guijarros Museum Foundation, NAVSUBASE Point Loma	February 18, 1999
	Fowler Museum of Cultural History, University of California, Los Angeles	February 23, 1999
	Gallegos and Associates	April 26, 1999
	KEA Environmental, Inc.	February 28, 2000
	Natural History Museum of Los Angeles County	February 24, 1999
	NAS North Island	February 16 and April 21–23, 1999
	RMW Paleo Associates	September 2000*
	San Diego Archaeological Center	February 19, 1999
	San Diego Museum of Man	February 22, 1999
	San Diego State University	April 19–21, 1999
	SWDIVNAVFACENGCOM	February 17, 1999
	Southwest Museum	February 24, 1999
	UCSB	March 2, 2000
	William Manley and Associates	February 28, 2000
CNMI	Tinian Historic Preservation Office	May 25, 1999
Guam	ARRC, University of Guam	May 28, 1999
	IARII	May 20, 1999
	Marianas Military Museum, Apra Harbor Naval Complex	May 17 and 21, 1999
	MARS	May 21, 1999
	MARC, University of Guam	May 19, 1999
	PHRI	May 19–20, 1999
Hawaii	IARII	September 10, 1999
	Ogden Environmental and Energy Services	September 15–17, 1999
	PACNAVFACENGCOM	November 16–19, 1998 and September 9–10, 1999
	PHRI	September 13–15, 1999
Japan	Ikego Housing Area	July 8, 1999
Washington	The Burke Museum of Natural History and Culture, University of Washington	February 4, 2000
	WSU	February 7, 2000

* Information about associated documentation at RMW Paleo Associates was gathered via telephone because a mutually agreeable time to visit could not be arranged. The St. Louis District has visited RMW Paleo in the past and is familiar with the repository.

suppression, pest management, and utilities. Data were generated both by observation and through discussion with collections and facilities managers.

3. Examination of all documentation was conducted to determine the presence of the different records types, the amount present, and its condition. Types of documentation include project and site reports, administrative files, field records, curation records, and photographic records. For each type of document the total linear feet, physical condition of the containers and the records, and the overall condition of the storage environment were collected. The determination of whether or not the facility is in compliance with the archives-management requirements specified in 36 CFR Part 79 is based on this information.

4. Examination and evaluation of artifact collections were conducted to determine their condition and compliance with 36 CFR Part 79. Assessments included examination of (a) the condition of primary and secondary containers, (b) the degree of container labeling, (c) the extent of laboratory processing, (d) the material classes included in each collection, and (e) the condition and approximate amount of any human skeletal remains. Primary containers are generally acidic or acid-free cardboard boxes that contain artifacts. Secondary containers are those included within the primary container, and they are composed of a wider range of materials. Secondary containers may include, but are not limited to, acidic paper bags; plastic sandwich bags; archival or non-archival plastic zip-lock bags; glass jars; film vials; aluminum foil; newspaper; packing materials; or small acidic or acid-free cardboard boxes.

Artifact and record rehabilitation was based on the number of tasks remaining to be performed on each collection. See Table 109 for additional information.

5. Those facilities with NAGPRA materials were noted during the assessment; however, they should have completed all compliance-related summaries and inventories associated with Section 5 and 6 of NAGPRA under separate cover.

Report Generation

Following completion of all curation assessment activities and the entry of all information into respective databases, a written report was produced that detailed the results of the St. Louis District investigations. General information included in the report are estimates of the sizes of collections and their condition, descriptions of the repositories, and recommendations for the rehabilitation of the repositories and/or the collections according to the federal standards established in 36 CFR Part 79.

Chapter Synopsis

Preceding Chapter 1 is an executive summary of the project, and Chapter 8 outlines the overall findings of the project. Chapter 9 identifies general recommendations to improve the curation of Navy archaeological collections. These chapters should provide CINCPACFLT and PACNAVFACENGCOM with baseline data for cultural resources management and oversight in the Pacific Rim. Chapters 2–7 include regional summaries with a general section that addresses curation management issues—rehabilitation, NAGPRA or host nation issues, curation partners, and a recommendations section—including costs for rehabilitation and curation partners. The chapters are further broken down into subchapters, 4-1 through 7-17, which contain detailed regional descriptions of the individual curation assessments. Appendices 1 and 2 contain 36 CFR Part 79 and NAGPRA (P.L. 101-601), respectively. Appendices 3 through 5 contain the results of the St. Louis District's architectural analyses of potential curation repositories in the different Navy regions.

2

Naval Forces, Japan

Region Summary

Number of Facilities with Collections: 8

Volume of Artifact Collections: Approximately 2,500 ft³

Artifact Collections Origins: Ikego Housing Area

Linear Feet of Records: 9.69 (the linear feet of additional records from Ikego Housing Area could not be determined)

Record Collections Origins: FLEACT Okinawa/NAF Kadena (3.23 linear feet); FLEACT Sasebo, Japan (2.78 linear feet); Japan Navy (0.40 linear feet); MCAS Futenma (0.08 linear feet); MCB Camp Smedley (0.08 linear feet); NAF Atsugi (0.15 linear feet); White Beach NAVFAC (0.07 linear feet); Yokosuka Naval Complex (2.20 linear feet); NSF, Diego Garcia (0.70 linear feet)

The presence of the United States in Japan began as the Commander Naval Forces, Far East, which was established in 1947 with the mission to administer Navy units assigned to Japan. It was active during the Korean War, and during the 1950s the boundaries changed and some operational control was transferred to CINCPACFLT. In 1957, boundaries and control changed again, and it was reassigned as Commander Forces, Japan. Finally, in 1962, it was redesignated as Commander U.S. Naval Forces, Japan (Commander U.S. Naval Forces Japan 2001).

The following U.S. Naval facilities in Japan were visited and researched for this project.

- FLEACT Okinawa/NAF Kadena
- FLEACT Sasebo
- NAF Atsugi
- NAF Misawa
  - White Beach NAVFAC
- Yokosuka Naval Complex
  - Yokosuka NAVBASE
  - Ikego Housing Area

Archaeological collections from Marine Corps bases and the Navy base in Diego Garcia were not included as part of the project; however, because collections from these locations were sometimes integrated with the other CINCPACFLT collections, information about them has been included.

St. Louis District personnel visited each of the Navy facilities in Japan and met with staff members involved with cultural resources. These interviews enabled the St. Louis District to obtain an understanding of the management of cultural resources for each facility and identify issues specific to each facility. St. Louis District personnel visited local museums and met with Japanese archaeologists, Prefectural Boards of Education, and museum professionals in order to learn about their policies and procedures regarding cultural resources and to hear any issues, interests, or concerns they may have for cultural resources or buried cultural properties located on U.S. Navy bases in Japan.

Curation Assessments

Curation needs assessments conducted during the project identified approximately 2,500 ft³ of artifacts and 9.69 linear feet of associated documentation that were generated during archaeological projects on Naval Forces, Japan facilities (Table 8).

Table 8.
Volume of Collections From Facilities in Naval Forces, Japan

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
FLEACT Okinawa/ NAF Kadena	—	—	3.23
FLEACT Sasebo	—	—	2.78
Japan Navy	—	—	0.40
MCAS Futenma	—	—	0.08
MCB Camp Smedley	—	—	0.08
NAF Atsugi	—	—	0.15
White Beach NAVFAC	—	—	0.07
Yokosuka Naval Complex	—	—	2.20
NSF, Diego Garcia	—	—	0.70
Total	—	—	9.69

The 2,500 ft³ of artifacts were not assessed as part of this project at the Navy's request and because 36 CFR Part 79 does not apply to them. Collections are housed at two identified locations: PACNAVFACENGCOM, Hawaii (Chapter 5-3), and Paul H. Rosendahl, Inc., Guam (Chapter 4-7) (Table 9).

The only known artifact collections from a U.S. Navy base in Japan came from a large excavation that took place on Ikego Housing Area. The nine-year excavation and processing of 2,500 boxes of artifacts were funded by the city of Zushi, and local archaeologists and their staff conducted the work. The U.S. Navy had no involvement in the project; however, it has provided a storage space on the base. At the request of Navy personnel, the St. Louis District did not conduct its standard curation needs assessment.

Another site on land occupied by the U.S. Navy at Ikego, which is expected to be similar to the previous site at the Ikego Housing Area, will soon be investigated prior to a construction project. It is unknown if any subsequent collections will be stored on base. The evidence of other artifacts from U.S. Navy bases in Japan is only anecdotal.

Long-Term Curation

The "Law for the Protection of Cultural Properties" developed by the Cultural Properties Protection Department of the Agency for Cultural Affairs, Government of Japan, January 1989 (provisional translation), explains that if a historic or archaeological site is discovered or if an excavation is to take place, the Commissioner for Cultural Affairs must be informed and consulted. When objects are unearthed as a result of excavations, the finder must turn them over to the local chief of

Table 9.
Repositories Housing Collections from Naval Forces, Japan

Repository	Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
PHRI, Guam	NSF, Diego Garcia	—	—	0.17
PACNAVFACENGCOM, Hawaii	FLEACT Okinawa/NAF Kadena	—	—	3.23
	FLEACT Sasebo	—	—	2.78
	Japan Navy	—	—	0.40
	MCAS Futenma	—	—	0.08
	MCB Camp Smedley	—	—	0.08
	NAF Atsugi	—	—	0.15
	White Beach NAVFAC	—	—	0.07
	Yokosuka Naval Complex	—	—	2.20
	NSF, Diego Garcia	—	—	0.53
Total		—	—	9.69

police except when the owner of the object is known. If the object is recognized as a potential cultural property, the chief of police submits the object to the Commissioner of Cultural Affairs in order to make that determination.

In addition to the national regulations, each Prefecture and most of the municipalities have enacted their own cultural property protection regulations. Prefectures and municipalities can designate their own cultural properties. Each Prefectural Board of Education is required to have a specialist who inspects and provides guidance for the protection of local cultural properties.

Rehabilitation of Collections

Currently, the 2,500 boxes of artifacts from Ikego Housing Area are not stored in the conditions necessary to maintain them for future use. The U.S. Navy should consult with the Government of Japan to determine the best rehabilitative action necessary for the collections.

Host Nation Issues

Other Cultural Assets: Historic Architecture, Historic Landscapes, and Sacred Sites

Various buildings, important landscapes, and sacred sites were viewed by the St. Louis District during their visit. The St. Louis District architect thoroughly assessed one building at Yokosuka Naval Complex, the Masonic Lodge, in order to determine the historic significance of the building and landscape. The architectural assessment is located in Appendix 3.

A variety of cultural resources are located at NAF Atsugi, including a threatened building called the "White House," (a former Japanese Imperial Navy Command building), a sacred tree that locals still visit, an outdoor stone staircase made of an important, local stone, and the remaining landscape of a shrine, the building structure of which was demolished in the 1980s.

A unique collection of historic buildings constructed of imported brick, including a former Imperial Navy Command Building, was viewed at FLEACT Sasebo. A local group of Japanese architects called the Red Brick Detective Society have shown interest in thoroughly documenting the brick buildings.

Archaeological Sites

Okinawan archaeologists reached an agreement with FLEACT Okinawa to allow them to excavate a portion of a site at White Beach, which probably will be partially destroyed when the location is given a cement cap. The Commander requested a written request for this work. Site destruction by the DoD in Okinawa is an especially sensitive issue after an important site was partially destroyed by the Marine Corps.

DoD Communication

NAF Misawa is a tenant of the Air Force, who has conducted an Integrated Cultural Resources Management Plan for the Misawa Air Base and Ripsaw Range. However, none of this information had been presented to Cultural Resource staff at NAF Misawa prior to the St. Louis District's visit. An important archaeological site on Okinawa was destroyed by a construction project undertaken by the Air Force on the Navy portion of the Air Force base. The Navy had no involvement with the project.

Curation Partners

St. Louis District personnel assessed some repositories that potentially may serve as temporary storage facilities for any future archaeological collections prior to their presentation to the Government of Japan, which is the owner of any archaeological materials on U.S. Navy facilities in Japan. Standards in 36 CFR Part 79 do not apply to U.S. Navy bases in Japan; however, these standards reflect professional museum standards that will preserve and protect the collections while they are in the temporary possession of the U.S. Navy. It would be in the best interest of the U.S. Navy to follow standards in 36 CFR Part 79 in the event that archaeological materials are uncovered and temporarily stored on base prior to their transfer to the Government of Japan. Potential repositories for temporarily housing collections were assessed by the St. Louis District architect at Yokosuka Naval Complex and the results are presented in Appendix 3.

Recommendations

1. Develop and implement written policies and procedures for Navy personnel to follow for:

   a. The discovery of archaeological materials or human remains on base including a list of the U.S. Navy officials and Government of Japan officials that should be notified and the order and method in which they are to be notified;
   b. The processing of archaeological materials collected on base; and
   c. Identification and protection of historic structures, landscapes, archaeological sites, and sacred sites.

2. Educate base employees about their role in identifying and protecting archaeological materials on base and their role in notifying appropriate officials upon their discovery.

3. Educate base employees about their role in protecting sacred sites on base.

4. Provide educational opportunities regarding the care of archaeological collections for base employees who may be responsible for archaeological collections.

5. Identify a temporary repository for collections that meets the standards in 36 CFR Part 79.

6. Develop a working relationship with local archaeologists, city officials from the Boards of Education, museum professionals, the Commissioner for Cultural Affairs, and any interested parties concerned about archaeology, historic architecture, sacred sites, and/or important features or landscapes on U.S. Navy Bases in Japan.

7. Request a legal opinion from the U.S. Navy Legal Department in order to identify specific obligations the U.S. Navy has regarding any archaeological materials, human skeletal remains, sacred sites, or historic architecture or landscapes on U.S. Navy bases in Japan.

8. Request a legal opinion from the U.S. Navy Legal Department regarding the storage of Japanese archaeological collections on base.

9. Obtain translated copies of the Government of Japan regulations regarding archaeological recovery and curation to distribute to U.S. Navy personnel.

10. Update each base's Cultural Resource Management Plan.

11. Protocols regarding cultural asset issues should be developed for archaeologists, architects, or other interested professionals with legitimate research interests who wish to request actions on U.S. Navy lands.

12. At NAF Atsugi, the St. Louis District recommends that the "White House" be adequately assessed before a final decision regarding demolition is made. A thorough documentation of the building should be completed whether it is destroyed or not.

13. Possible solutions to protecting sites such as the staircase or sacred tree at NAF Atsugi should be investigated further. Interested local parties should be consulted so that putting up a historical marker at the tree or constructing a new staircase next to the stone staircase won't ruin the historical or sacred integrity of the sites.

14. NAF Misawa, a tenant facility of the Air Force, should develop better lines of communication with the Air Force regarding cultural resources.

15. FLEACT Okinawa should provide guidance regarding cultural resources for tenant facilities on Okinawa.

16. A detailed strategy addressing the potential discovery of another prolific site at Ikego Housing Area must be written before the work is begun.

3

Naval Forces, Korea

Region Summary

Number of Facilities with Collections: 1

Volume of Artifact Collections: None

Artifact Collections Origins: Not applicable

Linear Feet of Records: 0.57

Record Collections Origins: FLEACT Chinhae

Commander, Fleet Activities, Chinhae occupies approximately 84 acres in the city of Chinhae in Kyongsangnam-do in the southern Republic of Korea. It began as a U.S. Naval Advisory Group in 1946, which became the first Fleet Detachment, Naval Station, JUSMAG-K in July 1969 and was later reorganized as the Chinhae Facility in 1972. The Fleet Detachment, Naval Station, JUSMAG-K became a tenant activity called the Field Logistics Center, Chinhae, in 1972, but it was disestablished in 1988. Chinhae Facility was reorganized as Commander, U.S. Naval Forces, Korea Detachment, Chinhae in 1978. Following reorganization in 1984, the Commander, Fleet Activities, Chinhae was established with Commander, U.S. Naval Forces, Detachment Chinhae as a tenant activity (Standard Installation Topic Exchange Service 2000b; U.S. Fleet Activities Chinhae, South Korea 2000).

Curation Assessments

Approximately 0.57 linear feet of associated documentation is housed at PACNAVFACENGCOM in Hawaii (Chapter 5-3). Several tombs are known to be on base, and some human skeletal remains were uncovered during construction. Archaeologists from the contractor IARII in Hawaii were conducting a survey during the St. Louis District visit. Several sites were located and tomb locations were mapped (Welch 1999). No artifacts were collected during the assessment, and any documentation that was generated would be housed at IARII.

Long-Term Curation

Laws and regulations that affect archaeological collections in the United States, such as 36 CFR Part 79 and NAGPRA, do not apply to U.S. military installations overseas. Any collections located on U.S. military bases overseas remain the property of the host nation. Archaeological collections in the Republic of Korea become the property of the Ministry of Culture in Seoul. A designated Minister of Culture determines the ultimate disposition of archaeological collections, i.e., if they are loaned to a city or national museum, or remain at the Ministry of Culture. The exception is for family tombs, which remain the property of the family. The Minister can also identify an object as a “Treasure,” which is considered to be of significant value to humanity and history.

Rehabilitation of Collections

The recent archaeological survey by IARII identified artifacts on FLEACT Chinhae, but none were recovered. Associated documentation for the project is located at IARII in Hawaii. The rehabilitation requirements for the documentation at PACNAVFACENGCOM are discussed in Chapter 5-3.

Host Nation Issues

Approximately 27–30 tombs are on base and their locations were mapped during IARII's survey. FLEACT Chinhae does not know the owners or relatives of the tombs because the tombs are too old; however, some people still visit the tombs on Korean Thanksgiving Day. In 1993 or 1994 human skeletal remains were located during U.S. Navy Seabees construction. Korean policy is that the permission of the owner or relatives of the skeletal remains must be acquired before moving remains. In the Seabees' case, no owner could be found, so the skeletal remains were reburied.

Curation Partners

Standards in 36 CFR Part 79 do not apply to U.S. Navy bases in Korea; however, these standards reflect professional museum standards that will preserve and protect the collections while they are in the temporary possession of the U.S. Navy. It would be in the best interest of the U.S. Navy to follow standards in 36 CFR Part 79 in the event that archaeological materials are uncovered and temporarily stored on base prior to their transfer to the Ministry of Culture. Because the Ministry of Culture has the ultimate decision over the disposition of any artifacts recovered from FLEACT Chinhae, the U.S. Navy has little control over where collections will be placed. However, the U.S. Navy can provide an adequate temporary facility for the collections until their disposition is determined. During the St. Louis District's visit to Korea, the Chinhae City Museum and Kimhae National Museum were visited. Both are newer facilities, and the Kimhae National Museum appears to be a state-of-the-art facility. It seems that any collections generated from FLEACT Chinhae would be transferred to these museums, which are excellent curation partners.

Recommendations

1. Develop and implement written policies and procedures for U.S. Navy personnel to follow for:

   a. The discovery of archaeological materials or human remains on base;

   b. The processing of archaeological materials collected on base;

   c. The identification and protection of sacred sites; and

   d. Allowing access to the tombs by visiting families on Korean Thanksgiving Day, or at any time.

2. Create a list of the U.S. Navy officials and Republic of Korea officials that should be notified and the order and method in which they are to be notified when archaeological collections have been discovered.

3. Educate base employees about their role in identifying and protecting archaeological materials on base and their role in notifying appropriate officials upon their discovery.

4. Educate base employees about their role in protecting sacred sites on base.

5. Provide educational opportunities regarding the care of archaeological collections for base employees who may be responsible for archaeological collections.

6. Identify a temporary repository for collections until their ultimate disposition is determined by the Ministry of Culture.

7. Develop a working relationship with local archaeologists, museum professionals, the Ministry of Culture, and any interested parties concerned about archaeology or historic architecture on FLEACT Chinhae.

8. Request a legal opinion from the U.S. Navy Legal Department in order to identify specific obligations the U.S. Navy has regarding any

archaeological materials, human skeletal remains, sacred sites, or historic architecture or landscapes on FLEACT Chinhae. Review Department of Defense Instruction 4715.5-G, Overseas Environmental Baseline Guidance Document, Chapter 12, Historic and Cultural Resources; USFK Circular 200-97-10, Korea Environmental Governing Standards; and USFK Pamphlet 200-1, Chapter 12, Historic and Cultural Resources.

9. Obtain translated copies of Republic of Korea regulations, both national and local, regarding the recovery and curation of archaeological materials.

4

Naval Forces, Marianas

Region Summary

Number of Facilities with Collections: 17

Volume of Artifact Collections: 522.70 ft³

Collections Origins: MEUA, Tinian, CNMI (43.86 ft³); MLA, Tinian, CNMI (308.09 ft³); Andersen AFB, Guam (0.63 ft³); Apra Harbor Naval Complex, Guam (13.27 ft³); FISC, Guam (5.43 ft³); NAVACTS, Guam (40.70 ft³); NAVACTS Ordnance Annex, Guam (25.94 ft³); NAS Agana, Guam (1.93 ft³); NCTAMS WESTPAC, Guam (9.30 ft³); NAVFAC, Guam (40.25 ft³); NAVMAG, Guam (30.41 ft³); and NAVSTA, Guam (2.89 ft³)

Linear Feet of Records: 54.42 linear feet

Collections Origins: MEUA, Tinian, CNMI (0.38 linear feet); MLA, Tinian, CNMI (27.99 linear feet); Saipan Airfields, Saipan, CNMI (0.05 linear feet); Andersen AFB, Guam (0.09 linear feet); Apra Harbor Naval Complex, Guam (7.70 linear feet); FISC, Guam (2.08 linear feet); Guam Navy (2.12 linear feet); NAVACTS, Guam (0.20 linear feet); NAVACTS Ordnance Annex, Guam (3.22 linear feet); NAVACTS Waterfront Annex, Guam (0.01 linear feet); NAS Agana, Guam (0.26 linear feet); NCTAMS WESTPAC, Guam (1.72 linear feet); NAVFAC, Guam (3.05 linear feet); NAVHOSP, Guam (0.01 linear feet); NAVMAG, Guam (5.33 linear feet); NPWC, Guam (0.03 linear feet); NAVSRF, Guam (0.01 linear feet); NAVSTA, Guam (0.17 linear feet)

Volume of Human Skeletal Remains: 27.49 ft³

Collections Origins: MLA, Tinian, CNMI (15.63 ft³); Apra Harbor Naval Complex, Guam (0.02 ft³); NAVACTS, Guam (1.35 ft³); NAVACTS Ordnance Annex, Guam (0.94 ft³); NCTAMS WESTPAC, Guam (3.94 ft³); NAVFAC, Guam (5.30 ft³); NAVSTA, Guam (0.31 ft³)

U.S. Naval Station, Guam, was established in August 1899, following the ceding of Guam to the United States through the Treaty of Paris in December 1898. Guam was surrendered to the Japanese in December 1941 during World War II but was liberated by the United States in July 1944. In 1952, NAVSTA Guam was reassigned under the military command of Commander, U.S. Naval Forces, Marianas. NAVSTA Guam and NAVMAG were consolidated into NAVACTS in October 1994, and in October 1997, NAVACTS was consolidated into Commander, U.S. Naval Forces, Marianas. The U.S. Naval Forces, Marianas (COMNAVMAR) has the mission of providing waterfront, ordnance, and other logistic support to fleet units and operational forces of 5th and 7th Fleet and on-island commands (Standard Installation Topic Exchange Service 2000a).

Japan, which had occupied the Marianas Islands since 1914, began to militarize Tinian in 1931, and in 1939 began constructing airfields at the northern end of the island. In July 1944, U.S. troops invaded Tinian and captured the airfield, converting it into North Field. Navy Seabees expanded the existing roads and runways for use with B-29

bombers. Tinian was used to house the atomic bombs that were dropped on Japan in August 1945. Following the end of World War II, the U.S. military abandoned Tinian until the early 1970s. The U.S. military now leases the northern end of Tinian from the Marianas Public Land Corporation through a 50-year lease (Craib 1995).

The Navy facilities and commands in Guam, Tinian, and Saipan identified during this project include the following.

Saipan, CNMI
- Saipan Airfields

Tinian, CNMI
- Military Exclusive Use Area
- Military Lease Area
- Relocatable-Over-the-Horizon Radar Site

Guam
- Andersen Air Force Base
- Andersen South
- Apra Harbor Naval Complex
- Camp Covington
- Commander, U.S. Naval Forces Marianas Communications Annex
- Fleet Industrial Supply Center
- Naval Activities
- Naval Activities Ordnance Annex
- Naval Activities Waterfront Annex
- Naval Air Station Agana
- Naval Communications Area Master Station
- Naval Computer and Telecommunications Area Master Station Western Pacific (Barrigada and Finegayan)
- Naval Facility
- Naval Hospital
- Naval Hospital Annex
- Naval Magazine
- Naval Magazine Fena Valley
- Naval Public Works Center
- Naval Ship Repair Facility
- Naval Station
- Naval Station Nimitz Hill Annex

Curation Assessments

Curation needs assessments conducted during the project identified approximately 522 ft³ of artifacts, 27 ft³ of human skeletal remains, and 54 linear feet of associated documentation that were generated during archaeological projects on Naval Forces, Marianas facilities (Table 10). Collections are housed at 11 locations: Tinian Historic Preservation Office, Tinian, CNMI (Chapter 4-1); Anthropology Resource and Research Center, Guam (Chapter 4-2); IARII, Guam (Chapter 4-3); Marianas Military Museum, Guam (Chapter 4-4); MARS, Guam (Chapter 4-5); MARC, Guam (Chapter 4-6); PHRI, Guam (Chapter 4-7); IARII, Hawaii (Chapter 5-1); Ogden Environmental and Energy Services, Hawaii (Chapter 5-2); PACNAVFACENGCOM, Hawaii (Chapter 5-3); and PHRI, Hawaii (Chapter 5-4) (Table 11). Artifacts from Tinian and Saipan are the property of the People of the Commonwealth of the Northern Mariana Islands and are protected under the provisions of CNMI P.L. 3-39.

Table 10.
Volume of Collections from Facilities in Naval Forces, Marianas

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
MEUA, Tinian, CNMI	43.86	—	0.38
MLA, Tinian, CNMI	308.09	15.63	27.99
Saipan Airfields, Saipan, CNMI	—	—	0.05
Andersen AFB, Guam	0.63	—	0.09
Apra Harbor Naval Complex, Guam	13.27	0.02	7.70
FISC, Guam	5.43	—	2.08
Guam Navy	—	—	2.12
NAVACTS, Guam	40.70	1.35	0.20
NAVACTS Ordnance Annex, Guam	25.94	0.94	3.22
NAVACTS Waterfront Annex, Guam	—	—	0.01
NAS Agana, Guam	1.93	—	0.26
NCTAMS WESTPAC, Guam	9.30	3.94	1.72
NAVFAC, Guam	40.25	5.30	3.05
NAVHOSP, Guam	—	—	0.01
NAVMAG, Guam	30.41	—	5.33
NPWC, Guam	—	—	0.03
NSRF, Guam	—	—	0.01
NAVSTA, Guam	2.89	0.31	0.17
Total	522.70	27.49	54.42

Long-Term Curation

U.S. Navy collections represent nonrenewable resources that must be properly conserved and managed so that they will continue to be available for research and public use. In order to properly maintain collections, they should be rehabilitated to meet the standards identified in 36 CFR Part 79.

Table 11.
Repositories Housing Collections from Naval Forces, Marianas

Repository	Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
Tinian HPO, Tinian, CNMI	MEUA, Tinian, CNMI	36.05	—	—
ARRC, Guam	NAVFAC Guam	0.10	5.23	0.12
IARII, Guam	NCTAMS	3.46	3.94	0.02
Marianas Military Museum, Guam	Apra Harbor Naval Complex, Guam	4.25	—	5.94
MARS, Guam	NAVACTS Ordnance Annex, Guam	10.48	0.59	0.94
	NAVSTA Guam	2.89	0.31	0.02
MARC, Guam	NAVFAC Guam	40.15	0.07	2.93
PHRI, Guam[a]	MLA, Tinian, CNMI	256.82	15.25	10.39
	Andersen AFB, Guam	—	—	0.01
	NAVACTS, Guam	40.70	1.35	0.20
	NAS Agana, Guam	1.93	—	0.02
	NAVMAG, Guam	28.07	—	2.78
IARII, Hawaii	MEUA, Tinian, CNMI	7.81	—	0.38
	FISC, Guam	5.43	—	1.17
	Apra Harbor Naval Complex, Guam	—	—	0.03
	NCTAMS, Guam	5.84	—	0.98
Ogden Environmental and Energy Services, Hawaii	MLA, Tinian, CNMI	51.27	0.38	2.40
	Andersen AFB, Guam	—	—	0.08
	Apra Harbor Naval Complex, Guam	—	—	1.04
	FISC, Guam	—	—	0.11
	NAVACTS Ordnance Annex, Guam	15.46	0.35	1.75
	NAVACTS Waterfront Annex, Guam	—	—	0.01
	NCTAMS, Guam	—	—	0.02
	NAVHOSP, Guam	—	—	0.01
	NAVMAG, Guam	2.34	—	0.36
	NPWC, Guam	—	—	0.03
	NSRF, Guam	—	—	0.01
	NAVSTA, Guam	—	—	0.15
PACNAVFACENGCOM, Hawaii	Saipan Airfields, Saipan, CNMI	—	—	0.05
	MLA, Tinian, CNMI	—	—	15.20
	Apra Harbor Naval Complex, Guam	9.02	0.02	0.69
	FISC, Guam	—	—	0.80
	Guam Navy	—	—	2.12
	NAVACTS Ordnance Annex, Guam	—	—	0.53
	NAS Agana, Guam	—	—	0.24
	NCTAMS WESTPAC, Guam	—	—	0.70
	NAVMAG, Guam	—	—	2.19
PHRI, Hawaii	Andersen AFB, Guam	0.63	—	—
Total		522.70	27.49	54.42

[a] In December 2000, all Navy collections from PHRI, Guam, were removed. The collections from Tinian were transferred to the Tinian Municipality and those from Guam were transferred to the Guam Preservation Trust.

Additionally, a long-term curation facility should be identified that meets 36 CFR Part 79.

Rehabilitation of Collections

Collections, including artifacts, human remains, and records, from Navy facilities are scattered throughout Guam, Hawaii, and Tinian. Conditions for each collection vary; however, all of the collections, with the exception of those from CNMI where 36 CFR Part 79 does not apply, require some rehabilitation in order to satisfy 36 CFR Part 79. It is recommended that the collections from CNMI be rehabilitated according to the procedures outlined in 36 CFR Part 79 for their long-term preservation and use. Because of that, CNMI is included in the following points. General guidelines for rehabilitating collections have been addressed in the recommendations summary section. Appropriate steps taken in anticipation of new collections can allow cultural resource managers to avoid this problem in the future.

NAGPRA, Consultation, and Host Nation Issues

NAGPRA as a law does not apply to commonwealths or territories of the United States,

including Guam and Tinian. However, Navy personnel and staff at the repositories housing Navy collections should be familiar with NAGPRA and its requirements so they will know how to proceed in the event that a similar law is passed for U.S. territories or by CNMI. Table 12 identifies the amount and location of human skeletal remains from Guam and Tinian.

Table 12.
Location and Volume of Human Skeletal Remains from Naval Forces, Marianas

Repository	Facility	Volume of Human Skeletal Remains (ft^3)
ARRC, University of Guam	NAVFAC Guam	5.23
IARII, Guam	NCTAMS	3.94
MARS, Guam	NAVACTS Ordnance Annex, Guam	0.59
	NAVSTA, Guam	0.31
MARC, University of Guam	NAVFAC, Guam	0.07
PHRI, Guam	MLA, Tinian, CNMI	15.25
	NAVACTS, Guam	1.35
Ogden Environmental and Energy Services, Hawaii	MLA, Tinian, CNMI	0.38
	NAVACTS Ordnance Annex, Guam	0.35
PACNAVFACENGCOM, Hawaii	Apra Harbor Naval Complex, Guam	0.02
Total		27.49

The remains should be analyzed to determine which are Japanese or Chamorro. In the interest of international harmony, any Japanese human skeletal remains should be repatriated to Japan. Examples of potential Japanese human skeletal remains include teeth with silver caps, which were located at site 66-03-1193 on NCTAMS. The remains are believed to be from a soldier, but it is not stated if it is a Japanese or American soldier (Craib and Yoklavich 1996:37). Additionally, a tooth most likely from a Japanese soldier was located on NCTAMS (Ogden Environmental and Energy Services 1994:A.7). Furthermore, IARII recovered human skeletal remains that are either historic World War II interments or prehistoric burials from NAVACTS at site PS-12, Tuparao Village (Carucci 1993:63, 115, 300).

Curation Partners

Several buildings were evaluated for possible use as long-term curation repositories for the collections from Guam and Tinian. These include the Guam Preservation Trust (Guam Museum), Guam; Marianas Military Museum on COMNAVMAR, Guam; War in the Pacific National Historical Park, Guam; and Northern Mariana Islands Museum of History and Culture, Saipan.

General requirements for a repository to satisfy 36 CFR Part 79 have been outlined in the recommendations summary. This project and resulting report is a first step in gaining control of the collections. Up to this point, management of the collections has been sporadic and inconsistent. Collections have remained, known or unknown to the Navy, in museums and contractor's offices. The unofficial relegation of the management of these collections to these various entities over the years has kept the Navy from properly managing its own collections and has lead to various problems, such as loss or damage of artifacts and missing information due to the loss or damage of original records.

The results of the St. Louis District's architectural assessment are provided in Appendix 4.

Recommendations

Plan of Action

A comprehensive plan of action for compliance with 36 CFR Part 79 standards minimally must address four points—(1) inventory and rehabilitation of the artifact collections, (2) rehabilitation of the associated records, (3) proper long-term care of the collections and records, and (4) proper management of collections.

Rehabilitation of Collections

In order for collections to be properly inventoried and rehabilitated, the St. Louis District recommends using a single contractor to process the collections. Ideally, collections must be first coalesced into one suitable repository before they are inventoried, organized, and repackaged. Another less desirable option is sending a contractor to each location where collections are currently stored to rehabilitate the collections. Table 13 identifies the estimated cost for the St. Louis District to rehabilitate all collections, including artifacts, human skeletal remains, and associated documentation. Costs are based on figures determined during a different St. Louis District project (U.S. Army Corps of Engineers 2000). Minimally, the St. Louis District, or another

Table 13.
Rehabilitation Cost for Facilities with Collections in Naval Forces, Marianas

Facility	Artifacts	Records
MEUA, Tinian, CNMI	$ 28,728	$ 744
MLA, Tinian, CNMI	212,036	54,860
Saipan Airfields, Saipan, CNMI	—	98
Andersen AFB, Guam	412	176
Apra Harbor Naval Complex, Guam	8,704	15,092
FISC, Guam	3,556	4,076
Guam Navy	—	4,155
NAVACTS, Guam	27,542	392
NAVACTS Ordnance Annex, Guam	17,606	6,311
NAVACTS Waterfront Annex, Guam	—	20
NAS Agana, Guam	1,264	509
NCTAMS WESTPAC, Guam	8,672	3,371
NAVFAC, Guam	29,835	5,978
NAVHOSP, Guam	—	20
NAVMAG, Guam	19,918	10,446
NPWC, Guam	—	60
NSRF, Guam	—	20
NAVSTA, Guam	2,096	333

professional collections management agency or company, should provide quality assurance and oversight for the rehabilitation process to ensure a satisfactory product.

To ensure future collections are handled and rehabilitated appropriately, staff should be provided training or educational opportunities, such as a curation and collections management workshop.

NAGPRA, Consultation, and Host Nation Issues

CINCPACFLT should assist Navy Region, Marianas with developing proposed guidelines for the repatriation of Japanese human skeletal remains to Japan. If possible, the remains should be inventoried and the individual should be identified. Navy Region, Marianas should also keep up-to-date on NAGPRA occurrences in the event that a similar law is passed for Guam and CNMI.

Curation Partners

Because of various political issues between the islands of Guam and Saipan, the Northern Mariana Islands Museum of History and Culture is not recommended for the curation of collections from Guam. Staff at the Saipan Historic Preservation Office said that they could provide the land if the Navy provided the funding for a new storage facility to hold collections from CNMI, including those from Tinian. However, because of the issues between Guam and Saipan, a facility on Saipan is not suggested. The War in the Pacific National Historical Park focuses solely on World War II, and archaeological collections from Navy bases do not fit the museum's primary mission. Finally, the Guam Preservation Trust (Guam Museum) has a collections storage facility located near the Guam Historic Preservation Office in a building that is leased from the Navy.

The St. Louis District recommends that COMNAVMAR collections be coalesced and housed at either the Guam Perservation Trust (Guam Museum) or the Marianas Military Museum. Guam Perservation Trust has a suitable building that is leased from the Navy, and with a few additions, such as fire suppression systems, would meet 36 CFR Part 79. The curation facility could house additional archaeological collections; however, storage units, such as space-saver shelves, are recommended to accommodate future growth. The Guam Perservation Trust building has dedicated staff to supervise archeological curation.

COMNAVMAR wants to remove the Marianas Military Museum from Apra Harbor Naval Complex. Therefore, if the collections are to be housed there, the Navy must ensure that the museum remains on base, and that a dedicated, permanent position is in place to manage the collections. Storage space for additional archaeological collections in the museum is inadequate, but the museum could potentially expand into the portion of the building that is used for storing communication supplies. It that happens, the building must be rehabilitated to meet the standards in 36 CFR Part 79.

Management of Collections

After selecting a curation facility or facilities for the long-term storage of collections, the cultural resource manager must ensure not only that the collections are well managed and maintained, but also that the repository holding the collections remains adequately managed and maintained

according to 36 CFR Part 79. This can be accomplished in the following manner.

1. The cultural resource manager must have an adequate understanding of 36 CFR Part 79.

2. Persons responsible for cultural resources should be provided a written collection management manual outlining their responsibilities and the responsibilities of the curation facility.

a. The cultural resource manager must ensure budgetary requirements for proper care and management of collections is met.

b. The cultural resource manager must oversee the appropriate handling of any human skeletal remains.

c. The cultural resource manager must keep all documentation regarding the management of collections (i.e., curation agreements, initial and subsequent collections inventories, collection and repository inspection reports, annual collection update reports, and any other related documents).

d. The cultural resource manager must ensure that the curation facility is following 36 CFR Part 79 by requiring an annual report and by ensuring periodic, professional inspections of the collections and the facility.

(1) An annual report written by the curation facility should include the status of the collection (current condition, any conservation treatments, progress of any on-going processing or rehabilitating); any use of the collection, including names and purposes of individuals given access; citations from any documents resulting from use of collections; outgoing and returned loans; problems; any physical changes within the facility; or any policy changes that may effect the collections.

(2) An on-site inspection of the collection by professional collections managers should be conducted annually to assure maintenance of management standards. Random collection location checks should be included as part of these annual inspections.

(3) A physical inspection of the curation facility by professional collections managers should be conducted annually to assure continued observance of standards (standards are addressed under long-term curation).

3. Establish guidelines that address the following aspects of collections management or include references to *Guidelines for the Field Collection of Archaeological Materials and Standard Operating Procedures for Curating Department of Defense Archaeological Collections*.

a. Initial preparation of materials, including a condition assessment, a complete inventory, and planned activities.

b. Appropriate written policies and procedures of the repository for collections management (i.e., loan/access policies, handling and storage, conservation assessment, qualified staff, appropriate internal access, and duplication and safety of original records).

c. Appropriate written policies and procedures of the repository for the management of the facility housing the collections (i.e., physical security, meeting local codes, intrusion and fire-detection and -suppression systems, adequate environmental controls, pest management, emergency preparedness plan, and special collections safety).

4. Allow access to qualified researchers.

5. Emphasize collections management training.

4-1

Tinian Historic Preservation Office

San Jose, Tinian, Commonwealth of the Northern Mariana Islands

Repository Summary

Volume of Artifacts: 36.05 ft³

Collection Origin: Military Exclusive Use Area, CNMI

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: None

Human Skeletal Remains: None

Date of Visit: May 25, 1999

Persons Contacted: Carmen Sanchez and Ray Taitano

The Tinian Historic Preservation Office (HPO) houses approximately 36.05 ft³ of artifacts from projects conducted on Military Exclusive Use Area on Tinian, CNMI (Table 14). The St. Louis District team examined the majority of the artifacts from the MEUA; approximately 1.7 ft³ (one box) of the total 36.05 ft³ were not examined because they were inaccessible.

Table 14.
Volume of Navy Archaeological Collections Housed at the Tinian HPO

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
MEUA, Tinian, CNMI	36.05	—	—
Total	36.05	—	—

Assessment

The Tinian HPO is located in a one-story building in San Jose (Figure 1). The building is approximately 50–60 years old and has areas devoted to offices and storage. Archaeological collections are housed in one room that measures 792 ft².

Figure 1. The Tinian HPO is located in a one-story concrete structure.

Structural Adequacy

The building has a concrete foundation and poured concrete exterior walls. The roof is constructed with wood trusses and galvanized tin on top. The assessment team noted several cracks in the walls. One metal exterior door is located in the repository. Locked, louvered glass windows are located throughout the building. The collections storage area in the HPO is similar in structure to the rest of the repository. It has a concrete floor covered with tile and plasterboard interior walls. The ceiling is a mahogany laminate panel.

Environmental Controls

The repository is cooled by a window air conditioning unit. The collections storage area has no environmental controls, but cool air from the adjoining room can enter if the door connecting it to the rest of the building is open. There is no lighting in the collections storage area.

Pest Management

There is no program to monitor and control for pests. There have been no infestations reported; however, roaches and spiders were noted by the assessment team.

Security

The repository exterior door has a lock, and windows lock. The collections storage area door, which is a piece of ¼-inch plywood attached to the door frame, has a makeshift dead-bolt lock.

Fire Detection and Suppression

There are no fire-detection and -suppression systems for the repository.

Artifact Storage

Storage Units

Approximately 36.05 ft³ of artifact collections are stored on the floor of the collections storage area (Table 15).

Table 15.
Percentage by Volume of Navy Artifacts Housed at the Tinian HPO

Material Class	%
Lithics	22.0
Prehistoric Ceramics	6.0
Faunal Remains	—
Shell (unmodified)	—
Botanical	—
Flotation	2.0
Soil	48.0
^{14}C	—
Human Skeletal Remains	—
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	12.0
Metal	10.0
Glass	—
Textiles	—
Other	—
Total	100.0

Note: Totals do not include the 1.7 ft³ (one box) that could not be examined because it was inaccessible.

Primary Containers

The majority of the artifact collections are stored in acidic cardboard boxes measuring 36 x 21 x 33 and 14 x 14 x 15 inches (d x w x h) (Figure 2). The boxes

Figure 2. Some artifacts are stored in acidic cardboard boxes that have been stacked on the floor.

are torn and compressed, and approximately one-third of the boxes are labeled. Labels are written directly in marker or with pieces of paper taped to the box fronts. Labels include the site number, box number, and soil sample number. Artifacts are also stored in a large unlabeled metal Japanese rice cooking pot, which totals approximately 8 ft^3 (Figure 3).

Figure 3. Some artifacts are stored in a large metal rice cooker.

Secondary Containers

Secondary containers for the artifact collections consist of plastic garbage bags and paper bags, and some of the artifacts are loose in the primary containers. The paper bags are labeled directly in ink, marker, or pencil. Information variably includes site number, date, provenience, investigator, and catalog, bag, and/or sample numbers.

Laboratory Processing and Labeling

The collections have not been cleaned, sorted, or labeled.

Human Skeletal Remains

No human remains from MEUA are housed at the Tinian HPO.

Records Storage

There were no associated records at the Tinian HPO.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Archaeological collections are located in one room of the repository. They are not organized within that room.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site Record Administration

The Tinian HPO utilizes its own site-numbering system.

Computerized Database Management

There is no computerized database for the collections.

Written Policies and Procedures

Minimum Standards for Acceptance

The Tinian HPO only houses collections from Tinian.

Curation Policy

The Tinian HPO does not have a written curation policy.

Records Management Policy

The Tinian HPO does not have a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Procedures

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

The Tinian HPO does not have a written inventory policy.

Latest Collection Inventory

The Tinian HPO has not inventoried the collections.

Curation Personnel

The Tinian HPO employees two full-time staff who serve as collections managers for the archaeological collections.

Curation Financing

Curation is financed through the operating budget of the HPO.

Access to Collections

Access to the collections is controlled by the staff. Researchers are permitted to review the collections by appointment.

Future Plans

No future plans are currently in place.

Comments

1. The Tinian HPO is a permanent curation facility.

2. No environmental controls are present in the collections storage area. The repository itself has a window air conditioning unit.

3. There is no pest-management plan that includes monitoring and control.

4. Basic security deterrents are in place, but no security-detection measures are present.

5. No fire-suppression or -detection measures are in place.

6. Artifacts are kept in plastic garbage bags, paper bags, or loose in acidic cardboard boxes and one large metal rice cooking pot.

7. None of the artifacts have been cleaned, sorted, or labeled.

Recommendations

1. Artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), (d) storage in appropriate archival primary and secondary containers that have been labeled, and (e) insertion of acid-free labels in each secondary container.

2. Install storage devices, such as enameled metal shelves or cabinets, to hold collections, rather than storing them on the floor.

3. Install an air conditioning system in the collections storage area. Ensure that dust filters are present.

4. Take measures to monitor and control humidity levels in the collections storage areas.

5. Implement a pest-management program, which includes monitoring and control, to protect collections from pests such as roaches and spiders.

6. Install lights in the collections storage area, and ensure that they are equipped with UV filters.

7. Replace the plywood door leading to the collections storage area with a solid door. Install security deterrents and detection devices, such as dead-bolt locks, key locks, motion detectors, and intrusion alarms in the repository and collections storage area.

8. Install fire-suppression and -detection measures in the repository and collections storage area. These include manual fire alarms, a sprinkler system, smoke detectors, fire extinguishers, heat sensors, and fire alarms wired into the local fire department.

9. Create and implement the procedures and policies as noted in “Collections Management Standards” above.

4-2

Anthropology Resource and Research Center

University of Guam
Mangilao, Guam

Repository Summary

Volume of Artifacts: 0.10 ft³

Collection Origin: NAVFAC (Ritidian Point), Guam

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.12 linear feet

Collection Origin: NAVFAC (Ritidian Point), Guam

Compliance Status: Associated documentation requires complete rehabilitation to comply with current federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 5.23 ft³

Collection Origin: NAVFAC (Ritidian Point), Guam

Compliance Status: NAGPRA does not apply to human skeletal remains from Guam. Human skeletal remains represent a minimum number of three individuals from Ritidian Point.

Date of Visit: May 28, 1999

Person Contacted: Dr. Gary Heathcote, Professor

The University of Guam, Anthropology Resource and Research Center (ARRC) houses approximately 5.33 ft³ of artifacts and human skeletal remains and 0.12 linear feet of associated documentation from projects conducted on NAVFAC (Ritidian Point), Guam (Table 16).

Table 16.
Volume of Navy Archaeological Collections Housed at the ARRC

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVFAC, Guam	5.33	—	0.12
Total	5.33	—	0.12

Assessment

ARRC is located in Building DC #32 on a portion of the University of Guam (Figure 4). The building is approximately 20–30 years old and was originally

Figure 4. The ARRC is located in a building formerly used for faculty housing.

constructed for use as faculty housing. The building contains space for artifact holding and processing, materials/supplies storage, artifact and records study areas, offices, a resource library, and an osteological laboratory. The collections are stored in one room, which measures approximately 1,350 ft^2.

Structural Adequacy

The building has a concrete foundation and roof and concrete block exterior walls. There was no evidence of water damage; however, staff note some problems after storms/typhoons. Three hollow-core wooden exterior doors are located in the repository. Numerous aluminum-framed Plexiglas® windows, equipped with shades, are located throughout the building. The collections storage area in ARRC is similar in structure to the rest of the repository. It has a concrete floor covered with tile.

Environmental Controls

The building is cooled by three window air conditioning units. No heating systems are necessary in the tropical climate. Fluorescent and incandescent lights that are not equipped with UV filters are utilized in the building.

Pest Management

Insects are controlled through an electric bug zapper, and geckos have been noted in the building. However, the geckos aid in controlling the number of insects present.

Security

The repository is patrolled by the University of Guam security. Exterior doors are secured with dead-bolt and key locks. Windows are locked, and access to the building is controlled by ARRC staff.

Fire Detection and Suppression

Fire suppression consists of fire extinguishers placed throughout the building. There are no fire detection measures.

Artifact Storage

Storage Units

Approximately 0.1 ft^3 of artifact collections are stored on adjustable wooden shelving units in a closet (Table 17). Units measure 19 x 21.5 x 72 inches (d x w x h).

Table 17.
Percentage by Volume of Navy Artifacts Housed at the ARRC

Material Class	%
Lithics	0.25
Prehistoric Ceramics	0.25
Faunal Remains	—
Shell (unmodified)	0.25
Botanical	—
Flotation	—
Soil	1.0
^{14}C	—
Human Skeletal Remains	98.0
Worked Shell	0.25
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	—
Total	100.0

Primary Containers

Artifact collections are stored in acidic cardboard boxes of varying measurements. Boxes are glued and taped and are secured by folded flaps. Box labels are adhesive and are written in ink. Labels identify the project, burial number, and box contents.

Secondary Containers

Secondary containers for the collections consist of 2-mil plastic bags, paper bags, a small acidic cardboard box, and a plastic vial. Nested within these are tertiary containers consisting of 1- and 2-mil plastic bags. Secondary containers are labeled directly in ink and with adhesive labels. Information variably includes date, provenience, project, investigator, contents, and burial number.

Laboratory Processing and Labeling

The collections have been cleaned and are sorted by burial number. None have been directly labeled.

Human Skeletal Remains

Approximately 5.23 ft^3 of human skeletal remains (MNI=3) are currently housed at ARRC. They are stored with the artifacts, as noted above. Some skeletal remains are wrapped in tissue, cardboard pieces, or styrofoam peanuts in order to stabilize them.

Records Storage

Approximately 0.12 linear feet of associated documentation from NAVFAC are housed at ARRC (Table 18). Records are housed in folders in a metal filing cabinet.

Table 18.
Linear Footage of Navy Associated Documentation Housed at the ARRC

Material	Naval Facility, Guam
Paper	0.04
Reports	0.04
Maps and Oversized Documents	—
Audiovisual	—
Photographs	0.04
Computer	—

Paper Records

Paper records total 0.08 linear feet and include administrative and excavation documents and reports.

Photographic Records

Photographic records total 0.04 linear feet and consist of negatives, color slides, contact sheets, and radiographs.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Staff at ARRC are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

The collections have not been entered into a computerized database.

Written Policies and Procedures

Minimum Standards for Acceptance

ARRC does not accept outside collections for curation.

Curation Policy

ARRC does not have a written curation policy.

Records Management Policy

ARRC does not have a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

ARRC does not have a written inventory policy.

Latest Collection Inventory

The collections have not been inventoried

Curation Personnel

Archaeological collections are managed by the staff of the Anthropology Department at the University of Guam.

Curation Financing

Curation is financed through the University of Guam.

Access to Collections

Access to the collections is controlled by staff.

Future Plans

No future plans are currently in place.

Comments

1. ARRC is a permanent curation facility for the collections they have generated.

2. Basic environmental controls are in place.

3. There is no integrated pest-management plan in effect.

4. Basic security deterrents are in place, but no security-detection measures are present.

5. Basic fire-suppression measures are present, but no detection measures are in place.

6. Artifacts and human skeletal remains are kept in tertiary containers consisting of 1- to 2-mil plastic bags that are in secondary containers of 2-mil plastic bags, paper bags, an acidic cardboard box, and a plastic vial within acidic cardboard boxes.

7. All artifacts have been cleaned, but none have been directly labeled.

8. Associated records are housed in a metal filing cabinet.

Recommendations

1. Artifacts require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival files, (b) creation of a finding aid, and (c) creation of a duplicate copy for security.

3. Take measures to monitor and control humidity levels in the collections storage area.

4. Implement a pest-management program, which includes monitoring and control, to protect collections from pests.

5. Equip lights with UV filters.

6. Install security-detection devices, such as motion detectors and intrusion alarms in the repository and collections storage area.

7. Install fire-detection measures and additional suppression systems in the repository and collections storage area. These include manual fire alarms, a sprinkler system, smoke detectors, heat sensors, and fire alarms wired into the local fire department.

8. Create and implement the procedures and policies as noted in “Collections Management Standards” above.

4-3

International Archaeological Research Institute, Inc.

Tamuning, Guam

Repository Summary

Volume of Artifacts: 3.46 ft³
Collection Origin: NCTAMS, Guam
Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.02 linear feet
Collection Origin: NCTAMS, Guam
Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 3.94 ft³
Collection Origin: NCTAMS, Guam
Compliance Status: Human skeletal remains have been inventoried. NAGPRA requirements are not necessary for human skeletal remains from Guam.

Date of Visit: May 20, 1999

Person Contacted: Richard Olmo, Office Manager

The Guam office of International Archaeological Research Institute, Inc. (IARII) houses approximately 7.40 ft³ of artifacts and human skeletal remains and 0.02 linear feet of associated documentation from projects conducted on NCTAMS, Guam (Table 19).

Table 19.
Volume of Navy Archaeological Collections Housed at IARII, Guam

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NCTAMS, Guam	3.46	3.94	0.02
Total	3.46	3.94	0.02

Assessment

IARII is located in a one-story building that was originally constructed 11–20 years ago for use as a store (Figure 5). The building occupies approximately 900 ft² and has space for an artifact holding area, artifact washing and processing, and artifact and document storage.

Structural Adequacy

The building has a concrete foundation, exterior walls, and roof. Some cracks are present in the concrete due to typhoon damage. Several windows are present throughout the building, and two windows, one in the bathroom and one holding the window air conditioner, have been covered with plywood. The other windows have been fitted with venetian blinds. Inside the building, the floor is concrete covered with tile. Interior walls and the

Figure 5. IARII is housed in a concrete structure.

ceiling are concrete. A wooden back door and a double set of wooden front doors are present. The double doors have three small windows in each door.

Environmental Controls

The building is cooled with a window air conditioning unit and fans. Heating systems are not necessary in the tropical climate. Natural light and fluorescent lights that are not equipped with UV filters are used in the building.

Pest Management

IARII staff spray the building for insects on an as-needed basis. Ants are known to enter through the bathroom, but no signs of an infestation were present during the assessment.

Security

Doors are equipped with dead-bolt locks, and the back door has bars on it. One side of the double front doors has steel rods attached to the door that enter the ceiling and floor to prevent access, and a steel plate is present to prevent the door from being pushed in. Windows are locked and have bars on them.

Fire Detection and Suppression

There are no fire-detection or -suppression devices in the building, but it is considered to be fireproof.

Artifact Storage

Storage Units

Approximately 7.4 ft^3 of artifacts and human skeletal remains are housed at IARII. The collection had just arrived at the IARII office and, therefore, was stored on a table until a more specific storage space could be assigned (Table 20).

Table 20.
Percentage by Volume of Navy Artifacts Housed at IARII, Guam

Material Class	%
Lithics	—
Prehistoric Ceramics	45.4
Faunal Remains	0.5
Shell (unmodified)	0.2
Botanical	—
Flotation	—
^{14}C	—
Human Skeletal Remains	53.2
Worked Shell	—
Worked Bone	0.2
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	0.5
Total	100.0

Other material classes include pumice, coral, and soil.

Primary Containers

The artifacts are housed in acidic cardboard boxes and coolers of varying dimensions (Figure 6). The boxes are labeled with an adhesive label written in marker. Information includes contractor, contents, Navy base, and box number.

Figure 6. Some collections from NCTAMS are in paper bags secured with rubber bands in a cooler.

Secondary Containers

Artifacts are housed in paper bags and 1- and 2-mil plastic grocery bags. Tertiary containers, consisting of 2-mil plastic zip-lock bags, are nested within some of the secondary containers. Secondary containers are labeled directly in marker with provenience, project, lab number, bag number, and material class. Each tertiary container is also labeled and has an interior paper label identifying the lab number.

Laboratory Processing and Labeling

Approximately 95% of the artifacts have been cleaned, and none have been directly labeled. Artifacts are sorted by material class and provenience.

Human Skeletal Remains

Approximately 3.94 ft^3 (MNI=4) of human skeletal remains from NCTAMS, Guam, are stored with the artifacts housed at IARII. The remains are housed in plastic bags within paper bags, which are housed in the coolers. The remains have been cleaned and are not labeled directly.

Records Storage

Approximately 0.02 linear feet of original associated documentation are housed in a three-ring binder, which is labeled directly in marker (Table 21). Additional records include photocopies of maps, level forms, field notebooks, and photograph logs, which are not included here.

Table 21.
Linear Footage of Navy Associated Documentation Housed at the IARII

Material	NCTAMS, Guam
Paper	0.02
Reports	—
Maps and Oversized Documents	—
Audiovisual	—
Photographs	—
Computer	—

Paper Records

Paper records total 0.02 linear feet and include lab and pottery catalog lists.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned, but they are catalogued upon receipt. A lab catalog is kept with different numbers than the field catalog so artifacts can be cross referenced.

Location Identification

IARII staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

There is no published guide to the collections.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

A computerized database is not used for collections management.

Written Policies and Procedures

Minimum Standards for Acceptance

Only collections that were generated by IARII projects are kept at the IARII office.

Curation Policy

IARII does not possess a comprehensive curation plan.

Records Management Policy

IARII does not possess a records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written loan policy in place.

Deaccessioning Policy

There is no written deaccessioning policy.

Inventory Policy

IARII does not have a written inventory policy.

Latest Collection Inventory

The collections have not been inventoried.

Curation Personnel

There are no designated personnel to curate the collections; however, IARII staff are all responsible for the care and management of the collections.

Curation Funding

Curation is financed through project funds.

Access to Collections

Access to collections is controlled by IARII staff. Access to the collections is permitted by researchers with IARII supervision.

Future Plans

IARII has no future plans regarding curation or collections storage.

Comments

1. IARII is not a permanent collection repository.

2. Adequate cooling systems are in place.

3. A pest-management plan is in place that includes control but not monitoring against insects and rodents.

4. Basic security deterrents and no security-detection systems are present in the repository.

5. There are no fire-suppression or -detection measures in the repository.

6. Artifacts are kept in 2-mil plastic zip-lock bags, which are in paper bags and 1- and 2-mil plastic grocery bags. The bags are in acidic cardboard boxes and coolers on a table.

7. Approximately 95% of the artifacts have been cleaned, and none have been directly labeled.

8. The entire collection had not yet arrived at IARII; therefore, it had not been reboxed yet.

9. Paper records are stored in three-ring binders.

10. Human skeletal remains are present in the collection.

11. Typically, collections are sent to the Guam Museum upon completion of a project. IARII retains Navy collections until a permanent repository is determined.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), (d) storage in appropriate archival primary and secondary containers that have been labeled, and (e) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) creation of an archival duplicate copy for security.

4-4

Marianas Military Museum

Apra Harbor Naval Complex
Agat, Guam

Repository Summary

Volume of Artifacts: 4.25 ft³

Collection Origin: Apra Harbor Naval Complex, Guam

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 5.94 linear feet

Collection Origin: Apra Harbor Naval Complex, Guam

Compliance Status: Associated documentation requires complete rehabilitation to comply with current federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: May 17 and 21, 1999

Person Contacted: Jennings Bunn, Jr., Archaeologist

The Marianas Military Museum houses approximately 4.25 ft³ of artifacts and 5.94 linear feet of associated documentation from projects conducted on Apra Harbor Naval Complex, Guam (Table 22).

Table 22.
Volume of Navy Archaeological Collections Housed at the Marianas Military Museum

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
Apra Harbor Naval Complex, Guam	4.25	—	5.94
Total	4.25	—	5.94

Assessment

The Marianas Military Museum is located in a one-story structure on Apra Harbor Naval Complex in Agat, Guam. It was originally constructed for use as a communications center during the Cold War. The museum occupies approximately 30% of the building; the remaining 70% is used to store communications supplies. A ¼-inch plasterboard wall separates the two areas. The museum has occupied the building since approximately 1993 or 1994. The museum portion of the building has areas devoted to exhibits, records storage, and offices. Archaeological collections are housed in two areas of the museum: in the exhibit area of the museum and in the base archaeologist's office.

Structural Adequacy

The building has a concrete foundation, walls, and ceiling. One set of metal double doors leads to the museum from the exterior of the building.

No windows are located in the building. The office and exhibit space have a concrete floor covered with linoleum and a suspended acoustical tile ceiling. Interior walls in the museum are plaster.

Environmental Controls

Collection Storage Area 1—Museum

The museum is equipped with air conditioning; no heating systems are necessary in the tropical climate. Track lighting is used in the exhibit area

Collection Storage Area 2—Archaeologist's Office

The building is equipped with air conditioning; no heating systems are necessary in the tropical climate. Non-UV filtered fluorescent lights are used in the office and lobby areas of the museum.

Pest Management

It is unknown if a pest management program is utilized at the Marianas Military Museum.

Security

The museum is located on a guarded U.S. Navy base. A chainlink fence topped with barbed wire surrounds the building, and a chainlink gate is locked after hours; however, portions of the fence were noted to be damaged during the St. Louis District's visit. The exterior metal double doors leading to the museum are secured with dead-bolt and key locks. The museum is also equipped with motion detectors.

Fire Detection and Suppression

The museum is equipped with fire extinguishers and manual fire alarms.

Artifact Storage

Approximately 4.25 ft³ of artifacts are housed at the Marianas Military Museum (Table 23).

Storage Units

Collection Storage Area 1—Museum

The majority of the artifact collections are stored in four display cabinets in the exhibit area (Figure 7).

Table 23.
Percentage by Volume of Navy Artifacts Housed at the Marianas Military Museum

Material Class	%
Lithics	—
Prehistoric Ceramics	6.0
Faunal Remains	—
Shell (unmodified)	—
Botanical	—
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	—
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	40.0
Metal	14.0
Glass	40.0
Textiles	—
Total	100.0

Figure 7. The majority of the archaeological collections are currently on display.

Two of the cabinets are constructed of glass and measure 16 x 72 x 72 and 19.75 x 48 x 39 inches (d x w x h). The other two cabinets are constructed of glass and wood and measure 26 x 135.5 x 61 and 18 x 72 x 52 inches (d x w x h). The cabinets hold approximately 4.0 ft³ of archaeological collections.

Collection Storage Area 2—Archaeologist's Office

Approximately 0.25 ft³ are stored on top of a metal filing cabinet in the base archaeologist's office.

Primary Containers

Collection Storage Area 1—Museum

The 4.0 ft³ of artifacts that are on display in the museum do not have primary containers.

Collection Storage Area 2—Archaeologist's Office

Approximately 0.25 ft³ of artifacts are housed in an unlabeled plastic zip-lock bag.

Secondary Containers

There are no secondary containers present in the collection.

Laboratory Processing and Labeling

The collections have been cleaned but are not sorted or directly labeled.

Human Skeletal Remains

No human skeletal remains from Apra Harbor Naval Complex are curated at the Marianas Military Museum.

Records Storage

Approximately 5.94 linear feet of associated documentation from Apra Harbor Naval Complex are housed in Mr. Bunn's office (Table 24). Records are housed in three drawers of a metal filing cabinet that measures 28.5 x 18 x 60 inches (d x w x h). They are filed in folders that have been labeled directly in marker and with adhesive labels.

Table 24.
Linear Footage of Navy Associated Documentation Housed at the Marianas Military Museum

Materials	Apra Harbor Naval Complex, Guam
Paper	4.11
Reports	0.56
Maps and Oversized Documents	0.56
Audiovisual	—
Photographs	0.67
Computer	0.04

Paper Records

Paper records totaling 5.23 linear feet include administrative, background, and survey records, reports, and maps.

Photographs

Photographic records consist of 0.67 linear feet of color and black-and-white prints of varying sizes, negatives, slides, and contact sheets.

Computer

Approximately four 3.5-inch computer disks (0.04 linear feet) are housed at the Marianas Military Museum.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Approximately 94% of the archaeological collections are on display in the museum. Staff at the Marianas Military Museum are familiar with the location of the remaining 6% of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

There is no computerized database management system in place.

Written Policies and Procedures

Minimum Standards for Acceptance

Only those items depicting World War II in the Pacific or archaeological items from Apra Harbor Naval Complex are accepted by the Marianas Military Museum.

Curation Policy

The Marianas Military Museum does not have a written curation policy.

Records Management Policy

The Marianas Military Museum does not have a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

The Marianas Military Museum does not have a written inventory policy.

Latest Collection Inventory

The collections have not been inventoried recently.

Curation Personnel

The Marianas Military Museum is supervised by Jennings Bunn, Jr., who serves as curator and archaeologist. The Marianas Military Museum Foundation, a non-profit organization created in September 1997, has a Board of Directors that is active in museum functions.

Curation Financing

Finance for the curation of collections is provided in the operating budget of the Marianas Military Museum.

Access to Collections

Access to the collections is controlled. Additionally, visitors first must register to enter the military base where the museum is located.

Future Plans

No plans are currently in place.

Comments

1. The Marianas Military Museum is a permanent curation facility.

2. Adequate environmental controls are in place.

3. It is unknown if a pest management plan is in effect.

4. Excellent security deterrents and detection measures are in place.

5. Basic fire-detection and -suppression systems are present.

6. All artifacts have been cleaned, but none have been directly labeled. Approximately 94% of the artifacts are currently on display in the museum.

7. Associated records, including photographic materials, are housed in folders in a metal filing cabinet.

Recommendations

1. Artifacts not on display require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

2. Records require (a) physical arrangement in some sort of logical order, (b) packaging in archival containers and in archival files, (c) appropriate and consistent labeling of all file folders, (d) creation of a finding aid, and (e) creation of an archival duplicate copy for security.

3. Humidity levels should be monitored and controlled.

4. Implement a pest-management plan, if one is not already in effect.

5. Additional fire-detection and -suppression measures, such as alarms wired directly to the fire department and a sprinkler system, should be installed.

6. Create and implement the procedures and policies as noted in “Collections Management Standards” above.

4-5

Micronesian Archaeological Research Services

Mangilao, Guam

Repository Summary

Volume of Artifact Collections: 13.37 ft³

Collection Origin: NAVACTS Ordnance Annex (Nimitz Hill), Guam (10.48 ft³); NAVSTA, Guam (2.89 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.96 linear feet

Collection Origin: NAVACTS Ordance Annex (Nimitz Hill), Guam (0.94 linear feet); NAVSTA, Guam (0.02 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with current federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.90 ft³

Collection Origin: NAVACTS Ordnance Annex (Nimitz Hill), Guam (0.59 ft³); NAVSTA, Guam (0.31 ft³)

Compliance Status: NAGPRA does not apply to human skeletal remains from Guam. An undetermined number of individuals from the Agat/Santa Rita Wastewater System Project, partially on NAVSTA Guam, are housed at Micronesian Archaeological Research Services. An undetermined number of individuals from NAVACTS Ordnance Annex (Nimitz Hill) are also housed at Micronesian Archaeological Research Services.

Date of Visit: May 21, 1999

Person Contacted: Darlene Moore, Archaeologist

Micronesian Archaeological Research Services (MARS) houses approximately 14.27 ft³ of artifacts and human skeletal remains and 0.96 linear feet of associated documentation from NAVACTS Ordnance Annex (Nimitz Hill) and NAVSTA, both in Guam (Table 25).

Table 25.
Volume of Navy Archaeological Collections Housed at MARS

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVACTS Ordnance Annex, Guam	10.48	0.59	0.94
NAVSTA, Guam	2.89	0.31	0.02
Total	13.37	0.90	0.96

Assessment

MARS is located in a one-story house that was first leased by MARS in 1992 (Figure 8). The house was constructed in 1991 and has areas devoted to offices, temporary artifact storage, artifact processing, and a kitchen. Artifacts are stored in the collection storage

Figure 8. MARS is located in a house.

room, which measures approximately 180 ft². Additional artifacts are in the office/laboratory area of the repository awaiting processing.

Structural Adequacy

The repository has a concrete foundation, exterior walls, and roof. Two wooden exterior doors are located in the front and back of the repository, and a double sliding glass door is present. Windows covered with miniblinds are located on each exterior wall. The interior floors and ceilings of the collection storage room and office/laboratory are concrete, and the interior walls are concrete block covered with cement plaster.

Environment

The building has a split unit air conditioner. No heat is necessary in the tropical climate. Lighting in the building is provided by fluorescent and incandescent bulbs, which have not been equipped with UV filters.

Pest Management

There is a program for pest management at MARS. Staff monitor the repository for ant and roach activity with traps. A termite problem three years ago was eliminated by exterminators.

Security

Security measures consist of key locks on the front and back doors and dead-bolt locks on the sliding glass door. Windows lock and are further secured with wooden dowels.

Fire Detection and Suppression

Smoke detectors are located throughout the building. No fire suppression systems are in the building.

Artifact Storage

Storage Units

Collection Storage Area 1—Collection Storage Room

Approximately 14.27 ft³ of artifacts and human skeletal remains (Table 26) from NAVACTS Ordnance Annex (Nimitz Hill) and NAVSTA are housed at MARS. Collections are stored on a metal shelving unit that measures 18 x 35 x 69 inches (d x w x h) and on two metal and wood shelves that measure 14 x 33 x 66.5 inches (d x w x h) (Figure 9).

Table 26.
Percentage by Volume of Navy Artifacts Housed at MARS

Material Class	NAVACTS Ordnance Annex, Guam (%)	NAVSTA, Guam (%)
Lithics	6.5	1.1
Prehistoric Ceramics	7.7	0.7
Faunal Remains	6.1	2.0
Shell (unmodified)	11.2	0.2
Botanical	0.7	—
Flotation	—	—
Soil	2.3	3.4
^{14}C	2.0	0.2
Human Skeletal Remains	4.1	2.2
Worked Shell	0.1	—
Worked Bone	—	—
Brick/Masonry	0.6	0.9
Historic Ceramics	2.2	1.6
Metal	22.6	10.1
Glass	11.1	—
Textiles	—	—
Other	0.4	—
Total	77.6	22.4

Other material classes include plastic and silk flowers.

Collection Storage Area 2—Office/Laboratory

Additional artifacts are located on a table, where they are being processed (Figure 10).

Figure 9. Artifacts that have been processed are housed on metal shelving units.

Primary Containers

Collection Storage Area 1—Collection Storage Room

Artifact collections are housed in acidic cardboard boxes of varying sizes, plastic grocery bags, and plastic zip-lock bags. Boxes are labeled with a paper label written in marker that has been taped to the box. Bags are labeled directly in marker. The labels include some or all of the following data: site number, box number, contents, project, or catalog numbers.

Collection Storage Area 2—Office/ Laboratory

The artifacts that were being processed were housed in an acidic cardboard box, Tyvek® bags, plastic grocery bags, a paper grocery bag, and plastic zip-lock bags. The containers were labeled directly in marker with some or all of the following information: project, site number, contents, catalog numbers, or provenience.

Figure 10. Artifacts that are awaiting processing are stored on a table in a variety of containers.

Secondary Containers

Secondary containers for the artifact collections consist of 1- to 2-mil plastic zip-lock bags, plastic grocery bags, and paper bags. Nested within these is a tertiary level of plastic zip-lock bags and paper bags. The secondary containers are labeled directly in marker with some or all of the following: site number, provenience, project, date, catalog number, material class.

Laboratory Processing and Labeling

Approximately 70% of the artifacts have been cleaned, and none have been directly labeled. Most of the collections are sorted, either by material class, provenience, or project.

Human Skeletal Remains

Collection Storage Area 1—Collection Storage Room

Approximately 0.9 ft^3 of human skeletal remains representing an undetermined number of individuals from NAVACTS Ordnance Annex (Nimitz Hill) and NAVSTA are curated at MARS. The remains from NAVSTA were located during the Agat/Santa Rita wastewater system project. All remains are in good condition and are stored in paper and plastic bags in acidic cardboard boxes.

Table 27.
Linear Footage of Navy Associated Documentation Housed at MARS

Facility	Paper	Reports	Maps and Oversized Documents	Audiovisual	Photographs	Computer
NAVACTS Ordnance Annex, Guam	0.44	—	—	—	0.50	—
NAVSTA, Guam	0.01	—	—	—	0.01	—

Figure 11. Associated documentation from an ongoing project on Nimitz Hill is kept in an acidic cardboard box.

Records Storage

Collection Storage Area 2—Office/ Laboratory

Approximately 0.96 linear feet of associated documentation from NAVACTS Ordnance Annex (Nimitz Hill) and NAVSTA are housed in the MARS repository (Table 27). The project on NAVACTS Ordnance Annex (Nimitz Hill) is ongoing, so at the time of the assessment the records were temporarily stored in folders and commercial photograph processing sleeves in an acidic cardboard box on a desk (Figure 11). The box is labeled directly in marker with project and contents. Associated documentation from NAVSTA was stored in manila folders in an acidic cardboard box. The folders were labeled directly in pencil, and the box was labeled with a paper label written in marker and taped to the box. Label information consists of project, provenience, and bag number.

Paper Records

Paper records (Nimitz Hill) consist of 0.44 linear feet of survey and excavation records, drawings, and a field catalog.

Photographic Records

Photographic records total 0.51 linear feet and consist of color and black-and-white photographic prints, which are in commercial processing sleeves and a stationery envelope.

Maps and Oversized Documents

Maps from NAVACTS Ordnance Annex (Nimitz Hill) comprise 0.01 linear feet.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Staff at MARS are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

A database is utilized by MARS staff.

Written Policies and Procedures

Minimum Standards for Acceptance

MARS does not accept outside collections for curation.

Curation Policy

MARS does not have a written curation policy as it is not a long-term curation facility.

Records Management Policy

MARS does not have a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

MARS does not have a written inventory policy.

Latest Collection Inventory

The archaeological collections are inventoried upon receipt.

Curation Personnel

MARS does not have a full-time curator. Archaeological staff members are responsible for the curation of archaeological collections.

Curation Financing

Financing for the temporary curation of collections is written into each contract.

Access to Collections

Access to the collections is controlled by archaeological staff. Researchers are permitted to review the collections by appointment.

Future Plans

No future plans are currently in place.

Comments

1. MARS is not a permanent curation facility.

2. Basic environmental controls are in place.

3. Basic security deterrents are in place, but no security-detection measures are present.

4. Basic fire-detection measures are in place, but no fire-suppression systems is present.

5. Artifacts are kept in tertiary containers consisting of plastic zip-lock bags and paper bags that are in secondary containers of 1- to 2-mil plastic zip-lock bags and paper bags. Primary containers consist of acidic cardboard boxes, plastic grocery bags, paper grocery bags, plastic zip-lock bags, and Tyvek® bags.

5. Approximately 70% of the artifacts have been cleaned, but none have been directly labeled. During the assessment, some artifacts were being processed.

6. Paper, photographic, and cartographic records are housed in folders in acidic cardboard boxes. Photographic records are in commercial processing sleeves. Duplicate copies of the NAVSTA records have been made, but they are stored with the original records.

7. Human skeletal remains are present in the collection from NAVACTS Ordnance Annex (Nimitz Hill) and from the Agat/Santa Rita Wastewater System Project, which was partially on NAVSTA, Guam.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) creation of a finding aid, and (c) creation of a duplicate copy for security.

4-6

Micronesian Area Research Center

University of Guam
Mangilao, Guam

Repository Summary

Volume of Artifacts: 40.15 ft³
Collection Origin: NAVFAC, Guam
Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 2.93 linear feet
Collection Origin: NAVFAC, Guam
Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.07 ft³
Collection Origin: NAVFAC, Guam
Compliance Status: Some human skeletal remains were housed at Micronesian Area Research Center, but the majority was at the University of Guam's Anthropology Resource and Research Center (see Chapter 4-2) for analysis.

Date of Visit: May 19, 1999

Person Contacted: Dr. Hiro Kurashina, Director

Micronesian Area Research Center (MARC) houses approximately 40.22 ft³ of artifacts and human skeletal remains and 2.93 linear feet of associated documentation from projects conducted on NAVFAC, Guam (Table 28). Due to time constraints, only a portion of the collections could be assessed on a box-by-box basis; therefore, the totals for percentage of material class and linear footage of records are estimates applied to the entire collection.

Table 28.
Volume of Navy Archaeological Collections Housed at MARC

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVFAC, Guam	40.15	0.07	2.93
Total	40.15	0.07	2.93

Assessment

MARC is located in the Computer Center Building, which was originally constructed in 1991 for university use (Figure 12). The structure has two stories, and MARC is located on the first floor.

Artifacts are housed in the Storage Room, located adjacent to Room 117, the Archaeology Office, where records are kept. MARC has areas devoted to receiving/loading, wet and dry laboratories, artifact and document storage, material supply storage, mechanical/utility room, study rooms, and office areas.

Structural Adequacy

The building has a concrete foundation and concrete block exterior walls. The roof is metal. Steel-framed

Figure 12. MARC is located on the University of Guam.

windows are present throughout the building, but none are in the collection storage area. Inside the building, the floor is concrete covered with tile. Interior walls are concrete, and the ceiling is suspended acoustical tile. A wood door with a glass panel leads from the hallway to Room 117. Another wood door leads to the Dry Lab, where the Storage Room is accessible through a large overhead steel sliding door. One set of double metal doors leads from the hallway outside Room 117 to the exterior of the building.

Environmental Controls

The building is equipped with an air conditioning system that includes dust filters. Heating systems are not necessary in the tropical climate. Fluorescent lights that are not equipped with UV filters are used in the building.

Pest Management

MARC staff take precautions, including control but not monitoring, against insects and rodents every three years.

Security

Security cameras are mounted throughout the building, and campus security patrols the area. Doors are equipped with key locks and access to certain areas of the building is controlled. Artifacts are housed in the Storage Room, which is accessible only through a large steel overhead sliding door that is secured with a padlock.

Fire Detection and Suppression

Fire-detection devices in the building include manual fire alarms and smoke detectors. The building is equipped with a sprinkler/suppression system, fire doors, fire walls, and fire extinguishers.

Artifact Storage

Storage Units

Approximately 40.22 ft^3 of artifacts and human skeletal remains are housed at MARC. Artifacts are housed on wooden shelves that measure 17 x 36 x 92 inches (d x w x h) and 11.75 x 48 x 95 inches (d x w x h) (Table 29).

Table 29.
Percentage by Volume of Navy Artifacts Housed at MARC

Material Class	%
Lithics	10.0
Prehistoric Ceramics	15.1
Faunal Remains	0.5
Shell (unmodified)	19.3
Botanical	—
Flotation	—
Soil	16.6
^{14}C	4.1
Human Skeletal Remains	0.1
Worked Shell	0.8
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	8.5
Glass	24.9
Textiles	—
Other	—
Total	100.0

Primary Containers

The artifacts are housed in acidic cardboard boxes and acidic shoeboxes of varying dimensions (Figure 13). The boxes are labeled directly in marker and/or pen, and some have a pre-printed acidic paper label taped to the box. Information includes project location, date of collection, name of collector, box contents and/or date.

Secondary Containers

Artifacts are housed in paper bags and 1- and 2-mil plastic zip-lock and twist-tie bags. Tertiary containers, consisting of 1- and 2-mil plastic bags

Figure 13. Most of the artifacts are housed in plastic bags in shoeboxes.

secured with twist-ties and paper clips, are nested within the secondary containers. Some secondary containers are labeled directly in marker and/or pencil or with an adhesive label that identifies provenience, project, date, material class, and investigator. Some paper bags have pre-printed stamped labels on them that have been filled in with the same information. The majority of the paper bags are labeled with acidic paper labels inserted in the bags that have the same information.

Laboratory Processing and Labeling

Approximately 100% of the artifacts have been cleaned, and none have been directly labeled. Artifacts are sorted by material class.

Human Skeletal Remains

Approximately 0.07 ft³ (MNI=1) of human skeletal remains from NAVFAC, Guam are stored with the artifacts housed at MARC. The remains are housed in plastic bags in acidic cardboard boxes. The remains have been cleaned and are not labeled directly. During the assessment, the majority of the human skeletal remains were being analyzed at the University of Guam's Anthropology Resource and Research Center (see Chapter 4-2).

Records Storage

Approximately 2.93 linear feet of associated documentation are housed in manila folders, three-ring binders, and acidic cardboard document boxes in a metal filing cabinet in Room 117 (Table 30) (Figure 14). The filing cabinet drawers are labeled with Post-it notes® that identify the project. The folders and document boxes have been labeled directly in pencil and/or with a typed adhesive label. Some of the records totals included here are for photocopies of originals.

Table 30.
Linear Footage of Navy Associated Documentation Housed at MARC

Materials	NAVFAC Guam
Paper	1.75
Reports	0.67
Maps and Oversized Documents	—
Audiovisual	—
Photographs	0.51
Computer	—

Figure 14. Associated records are in a variety of folders in a metal filing cabinet.

Paper Records

Paper records total 2.42 linear feet and include administrative, background, survey, and analysis documents, and reports. Paper records are kept in the manila folders, document boxes, and three-ring binders.

Photographs

Approximately 0.51 linear feet of black-and-white aerial prints, slides, and contact sheets are housed at MARC. Slides are kept in plastic sleeves and contact sheets are kept in three-ring binders.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

MARC staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

There is no published guide to the collections.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

A computerized database is not used for collections management.

Written Policies and Procedures

Minimum Standards for Acceptance

No collections are accepted for curation, and only those materials from University of Guam projects are housed at MARC.

Curation Policy

MARC does not possess a comprehensive curation plan.

Records Management Policy

MARC does not possess a records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

Collection materials are loaned to qualified researchers.

Deaccessioning Policy

There is no written deaccessioning policy.

Inventory Policy

MARC does not have a written inventory policy.

Latest Collection Inventory

The date of the last inventory is not known.

Curation Personnel

There are no designated personnel to curate the collections; however, the director and laboratory manager are responsible for the care and management of the collections.

Curation Funding

Curation is subsidized by the Government of Guam.

Access to Collections

Access to collections is controlled by MARC staff. Access to the collections is permitted by researchers with MARC supervision.

Future Plans

MARC has no future plans regarding curation or collections storage but does wish to return the collections to the Navy.

Comments

1. MARC is a permanent collection repository.

2. Adequate cooling systems with dust filters are in place.

3. A pest management plan is in place that includes control but not monitoring against insects and rodents.

4. Adequate security deterrents and detection systems are present in the repository.

5. Excellent fire-suppression and -detection measures are in place in the repository.

6. Artifacts are kept in 1- and 2-mil plastic zip-lock and twist-tie bags, which are in paper bags and 1- and 2-mil plastic zip-lock and twist-tie bags. The bags are in acidic cardboard boxes on wooden shelves.

7. Approximately 100% of the artifacts have been cleaned, but none have been directly labeled.

8. Records are stored in manila folders, acidic cardboard document boxes, and three-ring binders in a metal filing cabinet.

9. Some contaminants, such as staples and paper clips, are present in the records.

10. Human skeletal remains are present in the collection.

Recommendations

1. Artifacts require (a) sorting, (b) direct labeling (when applicable), (c) storage in appropriate archival primary and secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) creation of an archival duplicate copy for security.

3. Remove contaminants, such as staples and paper clips, from the collections.

4. Install humidity-monitoring devices, and ensure that humidity levels are maintained.

5. Implement an integrated pest-management plan that includes both monitoring and control.

6. Ensure that fluorescent lights are equipped with UV filters.

7. Additional security detection systems, such as intrusion alarms and motion detectors, should be installed in the collection storage area.

8. Create and implement the policies and guidelines as noted above if they are not currently in place.

4-7

Paul H. Rosendahl, Inc.

Barrigada, Guam

Repository Summary

Volume of Artifacts: 327.52 ft³

Collection Origin: MLA Tinian, CNMI (256.82 ft³); NAVACTS, Guam (40.70 ft³); NAVMAG, Guam (28.07 ft³); NAS Agana, Guam (1.93 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 13.57 linear feet

Collection Origin: MLA Tinian, CNMI (10.39 linear feet); Andersen AFB, Guam (0.01 linear feet); NAVACTS, Guam (0.20 linear feet); NAS Agana, Guam (0.02 linear feet); NAVMAG, Guam (2.78 linear feet); NSF Diego Garcia (0.17 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 16.60 ft³

Collection Origin: MLA Tinian, CNMI (15.25 ft³); NAVACTS, Guam (1.35 ft³)

Compliance Status: NAGPRA does not apply to human skeletal remains from Guam and Tinian.

Collection Update: In December 2000, all Navy collections from this repository were removed. The collections from Tinian were transferred to the Tinian Municipality and those from Guam were transferred to the Guam Preservation Trust.

Date of Visit: May 19-20, 1999

Persons Contacted: Dr. Dave DeFant, Archaeologist, and Dr. Melissa Kirkendall, Lab Director

The Guam office of Paul H. Rosendahl, Inc. (PHRI) houses approximately 344.12 ft³ of artifacts and human skeletal remains and 13.57 linear feet of associated documentation from projects conducted on MLA Tinian, CNMI; Andersen AFB, Guam; NAVACTS, Guam; NAS Agana, Guam; NAVMAG, Guam; and NSF Diego Garcia (Table 31).

Table 31.
Volume of Navy Archaeological Collections Housed at PHRI, Guam

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
MLA Tinian, CNMI	256.82	15.25	10.39
Andersen AFB, Guam	—	—	0.01
NAVACTS, Guam	40.70	1.35	0.20
NAS Agana, Guam	1.93	—	0.02
NAVMAG, Guam	28.07	—	2.78
NSF Diego Garcia	—	—	0.17
Total	327.52	16.60	13.57

Assessment

The Guam office of PHRI is located in part of the former RIM Enterprise building, which was originally constructed approximately 30 years ago (Figure 15). The structure is an L-shaped building, part of which is two-story. PHRI occupies the first floor of the two-story area. The second floor is the location of a Korean church. The PHRI office is approximately 5,000 ft², and artifacts and records are housed in a 2,700-ft² area of the room. PHRI has areas devoted to artifact holding and processing, temporary artifact storage, records storage, library, and office areas.

Figure 15. PHRI is located in a concrete structure with other businesses and a church.

Structural Adequacy

The building has a concrete foundation and a metal roof. Exterior walls are concrete block and corrugated metal. Over the years, many renovations have been made to the building, which has one set of steel-framed windows without shades. Inside the building, the floor is concrete covered with tile. Interior walls are constructed of plasterboard and painted concrete block. The ceiling is open to reveal the plywood subfloor and steel beams above. One set of double glass doors with metal frames is located in the building. The doors are covered with bamboo shades.

Environmental Controls

The building is equipped with two air conditioning units that keep the targeted temperature at 70–72º F. Heating systems are unnecessary in the tropical climate. Fluorescent and incandescent lights that are not equipped with UV filters are used in the building.

Pest Management

PHRI staff take precautions, including control but not monitoring, against insects and rodents on an as-needed basis. Silverfish were noted in one of the boxes with human skeletal remains.

Security

Security for the building consists of intrusion alarms that are wired directly to a security company, motion detectors, and controlled access. The window is locked, and the double doors have dead-bolt and key locks. These doors serve as the only way to enter the building. During off-hours, a large metal gate is pulled across the doors and padlocked. Only three staff members have keys to the collections storage areas.

Fire Detection and Suppression

Fire extinguishers and manual fire alarms are present in the building.

Artifact Storage

Storage Units

Approximately 344.12 ft³ of artifacts and human skeletal remains are housed at PHRI. Some artifacts are housed in wooden storage cabinets that measure 38 x 54 x 103 inches (d x w x h). The storage cabinets are painted and have hinged plywood doors. Artifacts are also on wooden shelves that measure 54 x 54 x 86 inches (d x w x h) (Table 32).

Primary Containers

Artifacts are housed in acidic cardboard boxes of varying dimensions, paper grocery bags, paper lunch bags, or loose on the shelves (Figure 16). The boxes are labeled directly in marker and/or pencil, and some have an acidic paper label taped to the box. Information includes project number, box number, contents, location, date, and artifact processing information (e.g., washed, sorted, analyzed). Some boxes have a paper inventory list inside.

Table 32.
Percentage by Volume of Navy Artifacts Housed at PHRI, Guam

Material Class	MLA Tinian, CNMI (%)	NAVACTS, Guam (%)	NAVMAG, Guam (%)	NAS Agana, Guam (%)
Lithics	3.8	0.6	2.6	—
Prehistoric Ceramics	45.1	1.4	0.3	0.1
Faunal Remains	1.0	0.6	0.06	—
Shell (unmodified)	3.1	2.0	1.2	0.1
Botanical	0.2	0.03	0.06	—
Flotation	—	—	—	—
Soil	0.6	0.5	0.06	—
^{14}C	0.05	0.1	0.1	0.1
Human Skeletal Remains	4.4	0.4	—	—
Worked Shell	5.6	0.05	—	—
Worked Bone	0.03	—	—	—
Brick/Masonry	0.06	0.03	0.06	—
Historic Ceramics	5.2	0.1	0.3	—
Metal	6.2	3.6	1.1	0.1
Glass	3.0	2.0	1.1	0.1
Textiles	—	—	—	—
Other	0.5	0.6	1.1	0.01
Total	79.0	12.2	8.2	0.55

Other material classes include pigment, cable, bakelite, plastic, rubber, asbestos, worked coral, ceramic tiles, and pumice.

Figure 16. Some collections are housed in pre-stamped paper bags in cardboard boxes.

Secondary Containers

Artifacts are housed in paper bags and 2- to 4-mil plastic zip-lock bags. Tertiary containers, consisting of 2- to 4-mil plastic zip-lock bags, paper bags, acidic cardboard boxes, and plastic film vials, are nested within the secondary containers. Some artifacts are wrapped in bubble wrap, newspaper, toilet paper, or paper towels. Secondary containers are labeled directly in marker and/or pencil with site number, provenience, site name, project, date, bag number, material class, accession number, lab number, feature number, artifact count, and comments. Paper bags have pre-printed stamped labels on them that have been filled in with the same information. Loose artifacts are labeled with paper tags tied with string to the object.

Laboratory Processing and Labeling

Approximately 95% of the artifacts have been cleaned, and 5% have been directly labeled in black or white ink, sometimes over a white base coat or covered with a clear top coat. Some prehistoric ceramics have been glued together, and some are taped and rubber banded together. Artifacts are sorted by material class and project.

Human Skeletal Remains

Approximately 15.25 ft^3 (MNI=10) of human skeletal remains from MLA, Tinian, are stored separated from the artifacts with other burials housed at PHRI. Approximately 1.35 ft^3 (MNI is indeterminate) of human skeletal remains from NAVACTS, Guam, are housed in the storage cabinets with the rest of the artifacts. The remains are housed in paper bags, plastic bags, and plastic film vials in acidic cardboard boxes of varying dimensions. The remains have not been processed.

Records Storage

Approximately 13.57 linear feet of associated documentation are housed in acidic cardboard boxes and three-ring binders on wooden shelves, in a metal filing cabinet, and in a box on a desk in a cubicle at PHRI (Table 33) (Figure 17). The boxes have been labeled directly in marker, with an adhesive label, or written on a piece of paper taped to the box. The labels identify project number, project name, and/or box contents. Within the filing cabinet drawer and the boxes, records are kept in file folders, envelope folders, or loose within the box. The folders have been labeled with an adhesive label or directly in marker, pencil, or pen. Some of the records totals included here are for photocopies of originals that are stored at the PHRI office in Hilo.

Figure 17. Some records are in fold-over folders in a metal filing cabinet.

Paper Records

Paper records total 12.57 linear feet and include administrative, survey, excavation, and analysis documents, drawings, photograph logs, inventory forms, accession forms, burial forms, box lists, and copies of black and white photographs. Paper records are kept in the folders in the boxes and in the filing cabinet. Field notebooks are loose in the boxes.

Photographs

Approximately 0.75 linear feet of black-and-white prints, negatives, slides, and contact sheets are housed at PHRI. Some of the photographic documents are housed in archival sleeves in three-ring binders; the remainder is housed in folders with the paper records.

Maps and Oversized Documents

Maps, including USGS topographic maps, total 0.25 linear feet and are housed with the paper records in folders in cardboard boxes.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

PHRI staff are familiar with the location of the collections.

Table 33.
Linear Footage of Navy Associated Documentation Housed at PHRI, Guam

Facility	Paper	Reports	Maps and Oversized Documents	Audiovisual	Photographs	Computer
Military Lease Area, Tinian, CNMI	9.72	—	0.15	—	0.52	—
Andersen Air Force Base, Guam	—	—	—	—	0.01	—
Naval Activities, Guam	0.01	—	—	—	0.19	—
Naval Air Station Agana, Guam	0.01	—	—	—	0.01	—
Naval Magazine, Guam	2.66	—	0.10	—	0.02	—
Naval Support Facility, Diego Garcia	0.17	—	—	—	—	—

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

PHRI is not a permanent curation facility and does not have a published guide to the collections.

Site-Record Administration

A site-numbering system unique to Guam is utilized.

Computerized Database Management

Files are maintained on a computerized database and are being transferred to zip disk.

Written Policies and Procedures

Minimum Standards for Acceptance

PHRI is a contracting firm and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those materials from PHRI projects are housed at PHRI.

Curation Policy

PHRI is a contracting firm and holds collections only for analysis purposes. They are not a long-term curation repository and do not possess a comprehensive curation plan.

Records Management Policy

PHRI does not possess a records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

Collection materials remain at PHRI and are not loaned.

Deaccessioning Policy

Because collections are not permanently curated at PHRI, there is no written deaccessioning policy.

Inventory Policy

PHRI does not have a written inventory policy.

Latest Collection Inventory

The date of the last inventory is not known.

Curation Personnel

There are no designated personnel to curate the collections; however, the laboratory director is responsible for the care and management of the collections.

Curation Funding

Project funds are used to purchase storage supplies needed for the collections.

Access to Collections

Access to collections is limited to the staff. PHRI staff supervise any visitors.

Future Plans

PHRI has no future plans regarding curation or collections storage.

Comments

1. PHRI is not a permanent collection repository.

2. Adequate cooling systems are in place.

3. A pest-management plan is in place that includes control but not monitoring against insects and rodents.

4. Excellent security deterrents and detection systems are present in the repository.

5. Basic fire-suppression and -detection measures are in place in the repository.

6. Artifacts are kept in paper bags, 2- and 4-mil plastic bags, acidic cardboard boxes, and plastic vials in paper bags and 2- and 4-mil plastic zip-lock bags in acidic cardboard boxes, paper bags, or loose on the shelves. Some artifacts are wrapped in bubble wrap, newspaper, toilet paper, or paper towels. Storage units consist of wooden shelves and wooden storage cabinets.

7. Approximately 95% of the artifacts have been cleaned and 5% have been directly labeled.

8. Boxes are overpacked and are very heavy.

9. Records are stored in file folders in a metal filing cabinet, in an acidic cardboard box on a table in an office, and in three-ring binders and acidic cardboard boxes on wooden shelves.

10. Some photographic records are in archival sleeves.

11. Some contaminants, such as staples and paper clips, are present in the records.

12. Some original records are sent to the PHRI office in Hilo. If this is done, photocopies of the records are made and kept in Guam.

13. At the time of the assessment, six boxes of shell from Tinian were with Jeanette Simons at PACNAVFACENGCOM in Honolulu.

14. Human skeletal remains are present in the collection.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival primary and secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) (some) creation of an archival duplicate copy for security.

5

Navy Region, Hawaii

Region Summary

Number of Facilities with Collections: 26

Volume of Artifact Collections: 163.01 ft³
Collections Origins: Fort Kamehameha (74.79 ft³); MCBH Kaneohe Bay (4.20); NAS Barbers Point (57.88); NAVBASE Kaho'olawe (13.07 ft³); PMRF Barking Sands (8.88 ft³); SPAWAR (SURTASS) (1.17 ft³); Midway Island (1.85 ft³); Wake Island (1.17 ft³)

Linear Feet of Records: 108.58 linear feet
Collections Origins: Bellows AFB (0.84 linear feet); Fort Kamehameha (11.31 linear feet); Iroquois Point Naval Housing Area (0.10 linear feet); Ka'ula Training Target Impact Area (0.13 linear feet); Makalapa Flag Quarters (0.30 linear feet); MCBH Kaneohe Bay (16.20 linear feet); Molokai TSF (0.69 linear feet); NAS Barbers Point (10.07 linear feet); NAVBASE Kaho'olawe (18.70 linear feet); NCTAMS EASTPAC (0.08 linear feet); NAVMAG Lualualei (2.86 linear feet); NAVMAG Lualualei Waikele Branch (0.91 linear feet); NAVMAG West Loch Branch (0.01 linear feet); NAVPROTEC (0.25 linear feet); NRTF Lualualei (0.21 linear feet); Naval Security Group Activity (0.10 linear feet); NAVSUBASE Pearl Harbor (0.63 linear feet); NUWES (0.10 linear feet); PACNAVFACENGCOM (9.58 linear feet); PMRF Barking Sands (8.81 linear feet); Pearl Harbor Naval Complex (2.33 linear feet); SPAWAR (SURTASS) (0.18 linear feet); Waiawa Floodplain (0.12 linear feet); Miscellaneous Navy (22.23 linear feet); Midway Island (0.38 linear feet); Wake Island (1.46 linear feet)

Volume of Human Skeletal Remains: 0.13 ft³
Collections Origins: NAVBASE Kaho'olawe

Navy Region, Hawaii is the U.S. Navy's largest and most strategic island base in the Pacific. Extending over 12,600 acres of land and water, it serves as the headquarters of five major fleet commands. Navy Region, Hawaii has overall responsibility for nearly 60,000 acres of land and water. U.S. Navy history in Hawaii was established in the 1860s, and King Kalakaua granted the United States exclusive rights to Pearl Harbor in an 1887 treaty. Originally named the U.S. Naval Station, Hawaii, it was designated the 14th Naval District in 1916. In 1998 the Naval Base designation was dropped (Commander Navy Region, Hawaii 2000).

The Navy facilities and commands in Hawaii identified during this project include:

Bellows Air Force Base (Marines Training Area)
Camp H. M. Smith
Fleet Industrial Supply Center
Fort Kamehameha Area Pearl Harbor
Iroquois Point Naval Housing Area
Ka'ula Training Target Impact Area
Makalapa Flag Quarters
Makua Military Reservation
Manana Family Housing Area

Marine Corps Base Hawaii Kaneohe Bay
Microwave Relay Station Kolekole Pass
Molokai Training Support Facility
Naval Air Station Barbers Point
Naval Air Station Kaneohe Bay
Naval Base Kaho'olawe
Naval Computer and Telecommunications Area Master Station Eastern Pacific
Naval Computer and Telecommunications Area Master Station Wahiawa
Naval Magazine Lualualei
Naval Magazine Lualualei Waikele Branch
Naval Magazine Pearl Harbor
Naval Magazine West Loch Branch
Naval Public Works Center Pearl Harbor
Naval Radio Transmitter Facility Lualualei
Naval Security Group Activity
Naval Shipyard Pearl Harbor
Naval Station Pearl Harbor
Naval Submarine Base Pearl Harbor
Naval Undersea Warfare Engineering Station Lualualei
NAVPROTEC
Pacific Division Naval Facilities Engineering Command
Pacific Missile Range Facility Barking Sands
Pearl City Warehouse Annex
Pearl Harbor Naval Complex
Pearl City Peninsula
Puuloa Range
Space and Naval Warfare Systems Activity Pacific
Surveillance Towed Array Sensor System
Telecommunications Facility 'Opana
Wahiawa Naval Reservation
Waiawa Floodplain
Wailupe Naval Radio Station

Archaeological collections from Marine Corps bases, Midway Island, and Wake Island were not included as part of the project; however, because collections from these locations were sometimes integrated with the other CINCPACFLT collections, information about them has been included.

Curation Assessments

Curation needs assessments conducted during the project identified approximately 163 ft³ of artifacts, 0.13 ft³ of human skeletal remains, and 108.58 linear feet of associated documentation that were generated during archaeological projects on Navy Region, Hawaii facilities (Table 34). Collections are housed at four locations: IARII, Hawaii (Chapter 5-1); Ogden Environmental and Energy Services (Chapter 5-2); PACNAVFACENGCOM (Chapter 5-3); and PHRI, Hawaii (Chapter 5-4) (Table 35).

Table 34.
Volume of Collections from Facilities in Navy Region, Hawaii

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
Bellows AFB	—	—	0.84
Fort Kamehameha	74.79	—	11.31
Iroquois Point Naval Housing Area	—	—	0.10
Ka'ula Training Target Impact Area	—	—	0.13
Makalapa Flag Quarters	—	—	0.30
MCBH Kaneohe Bay	4.20	—	16.20
Molokai TSF	—	—	0.69
NAS Barbers Point	57.88	—	10.07
NAVBASE Kaho'olawe	13.07	0.13	18.70
NCTAMS EASTPAC	—	—	0.08
NAVMAG Lualualei	—	—	2.86
NAVMAG Lualualei Waikele Branch	—	—	0.91
NAVMAG West Loch Branch	—	—	0.01
NAVPROTEC	—	—	0.25
NRTF Lualualei	—	—	0.21
Naval Security Group Activity	—	—	0.10
NAVSUBASE Pearl Harbor	—	—	0.63
NUWES	—	—	0.10
PACNAVFACENGCOM	—	—	9.58
PMRF Barking Sands	8.88	—	8.81
Pearl Harbor Naval Complex	—	—	2.33
SPAWAR (SURTASS)	1.17	—	0.18
Waiawa Floodplain	—	—	0.12
Miscellaneous Navy	—	—	22.23
Midway Island	1.85	—	0.38
Wake Island	1.17	—	1.46
Total	163.01	0.13	108.58

Long-Term Curation

U.S. Navy collections represent nonrenewable resources that must be properly conserved and managed so that they will continue to be available for research and public use. In order to properly maintain collections, they should be rehabilitated to meet the standards identified in 36 CFR Part 79. Additionally, a long-term curation facility should be identified that meets 36 CFR Part 79.

Table 35.
Repositories Housing Collections from Navy Region, Hawaii

Repository	Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
IARII, Hawaii	PMRF Barking Sands	—	—	0.06
Ogden Environmental and Energy Services, Hawaii	Fort Kamehameha	74.79	—	1.59
	Ka'ula Navy Training Target Impact Area	—	—	0.13
	MCBH Kaneohe Bay	1.17	—	—
	NAS Barbers Point	1.17	—	0.22
	Naval Base Kaho'olawe	—	—	0.38
	NCTAMS EASTPAC	—	—	0.04
	NAVMAG Lualualei	—	—	0.16
	NUWES	—	—	0.02
	PMRF Barking Sands	8.19	—	0.91
	Pearl Harbor Naval Complex	—	—	0.41
	SPAWAR (SURTASS)	1.17	—	0.18
PACNAVFACENGCOM	Bellows AFB	—	—	0.84
	Fort Kamehameha	—	—	9.72
	Iroquois Point Naval Housing Area	—	—	0.10
	Makalapa Flag Quarters	—	—	0.30
	MCBH Kaneohe Bay	—	—	16.20
	Molokai TSF	—	—	0.69
	NAS Barbers Point	—	—	8.74
	NAVBASE Kaho'olawe	10.06	0.13	18.32
	NCTAMS EASTPAC	—	—	0.04
	NAVMAG Lualualei	—	—	2.70
	NAVMAG Lualualei Waikele Branch	—	—	0.91
	NAVMAG West Loch Branch	—	—	0.01
	NAVPROTEC	—	—	0.25
	NRTF Lualualei	—	—	0.21
	Naval Security Group Activity	—	—	0.10
	NAVSUBASE Pearl Harbor	—	—	0.63
	NUWES	—	—	0.08
	PACNAVFACENGCOM	—	—	9.58
	PMRF Barking Sands	—	—	7.84
	Pearl Harbor Naval Complex	—	—	1.92
	Waiawa Floodplain	—	—	0.04
PHRI	MCBH Kaneohe Bay	3.03	—	—
	NAS Barbers Point	56.71	—	1.11
	NAVBASE Kaho'olawe	3.01	—	—
	PMRF Barking Sands	0.69	—	—
	Waiawa Floodplain	—	—	0.08
	Midway Island	1.85	—	—
	Wake Island	1.17	—	—
Total		163.01	0.13	108.58

Rehabilitation of Collections

Collections, including artifacts, human remains, and records, from Navy facilities are scattered throughout the state of Hawaii. Conditions for each collection vary; however, all of the collections require some rehabilitation in order to satisfy 36 CFR Part 79. General guidelines for rehabilitating collections have been addressed in the recommendations summary section. Appropriate steps taken in anticipation of new collections can allow cultural resource managers to avoid this problem in the future.

NAGPRA and Consultation

NAGPRA issues have affected many of the facilities and commands in Hawaii. Each is in varying stages of the NAGPRA process. Except for PMRF Barking

Sands, most NAGPRA issues for the rest of the region have been handled by archaeologists at PACNAVFACENGCOM. During this review, human skeletal remains were only noted at PACNAVFACENGCOM, which held 0.13 ft^3 of remains from NAVBASE Kaho'olawe. Since the St. Louis District's visit, all collections from NAVBASE Kaho'olawe have been transferred to the Bailey House Museum in Hawaii.

During the St. Louis District's review, some problems were encountered in determining the location and disposition of NAGPRA-related human remains and associated funerary objects from Navy facilities. PHRI completed an inventory report of Native Hawaiian human remains and associated funerary objects from Navy facilities and determined that the remains were housed at three repositories: the Bishop Museum, PACNAVFACENGCOM, and IARII. The remains were recovered from 1938 to 1995 (Pua-Kaipo 1995). The following discussion items, identified in Federal Register notices, the inventory report by PHRI (Pua-Kaipo 1995), a previous St. Louis District project (Felix et al. 2000), and various archaeological reports, are presented to assist the Navy in NAGPRA compliance.

Several collections curated at the Bishop Museum have been listed in the Federal Register. These include four collections from Fort Kamehameha, all found in the 1980s; a collection from NAS Barbers Point; a collection from Iroquois Point Naval Housing Area at PWC Pearl Harbor; a collection from PMRF Barking Sands; a collection from NAVMAG West Loch Branch; and a collection from Wailupe Naval Radio Station that was a gift from an individual. It is believed that all of the human remains at the Bishop Museum from Navy facilities on Kauai have been repatriated, except for those originating from PMRF Barking Sands.

Fort Kamehameha

A Federal Register Notice dated June 20, 1997, identifies several human skeletal remains that were recovered and were at the Bishop Museum: in 1940 one individual from Hickam Field; in 1982 one individual with four associated objects from Quarters #16; in 1987 four individuals from Quarters #14; in 1988 one individual from Battery Hasbrouck; and in 1989 two individuals from a lot adjacent to Battery Hasbrouck. None of these remains and associated funerary objects can be conclusively identified from the archaeological reports.

According to a fax from Ogden dated September 4, 1996, the Bishop Museum was curating a total of 85 human remains for the Navy, three for the Army, and two for the Air Force from investigations at Fort Kamehameha between 1990 and 1995. Twenty-one of the burials included associated funerary objects. Repatriation of human remains and associated funerary objects, including animal remains, was completed on July 29, 1997 (Annie Griffin, personal communication).

Two reports (Anderson 1995:24–27, Table 1; Anderson and Bouthillier 1998:5–8, Table 1) identify that one adult and three juveniles were excavated in 1988 from under Quarters #14 (see Streck 1988); one adult, one preform, and one adze were uncovered in a 1991 survey at a wastewater treatment plant (see Shun and Schilz 1991); in 1992 Phase I subsurface testing at the wastewater treatment plant revealed a human burial in component I and nine burials in component II (see Drolet 1993); in 1993 Phase II subsurface testing in component I revealed 17 human and two animal burials; in 1994 testing beneath roadways uncovered four human and one animal burials; 1994 testing of the wastewater plant revealed seven human and one animal burials; and in 1994–1995 Phase IV emergency data recovery at the wastewater plant revealed 43 human and animal burials. These remains were at the Bishop Museum

Robert Drolet (1996:81) states that during Phase IV recovery, 46 burial features were excavated, including 38 human burials, isolated human remains, and eight animal burials. Tables 6a, 6b, and 6c in Drolet (1996:88–97) identify that 46 individuals, which includes one mandible found in one grave and adult vertebra found with juvenile remains, were recovered. There were associated funerary objects, including animal and human teeth, shells, fish and animal bones, coral boulders, and basalt pebbles, which were housed at the Bishop Museum.

Drolet's letter report (1993:4) states that during Phase II, 19 human burials and two animal burials were identified but not removed. He also states that in component 2, 19 human burials were located and 18 were excavated during Phase II (1993:5). One burial was not excavated because of its location beneath House 2. One burial was near

Settling Tank 4, and 17 burials were located between the pier and House Lot 4. The total number of burials includes one unexcavated burial (Shun and Schilz 1991), nine burials excavated in the area of Settling Tank 4 during Phase I, and 18 burials excavated during Phase II. A few associated funerary objects, including lithics and braided cord, were also reported. Drolet (1993:10) reports the 18 human burials recovered from Phase II were placed in storage at Ogden Environmental and Energy Services (OEES). An osteology report (Pietrusewsky et al. 1996), presumably referring to this same project, lists 27 individuals for Phase I and Phase II.

Drolet (1994) reports four human burials and one animal burial in Burial Features 1–6 beneath Fort Kamehameha roadways. Lithics and shell were associated with some of the burials.

Drolet (1997a:50) states each set of human remains recovered during Phase III work was individually boxed, and associated artifacts and remains were sent to OEES laboratory for processing and analysis. There were 15 human burials and three animal burials recovered (1997a:Table 8).

In Drolet's report (1996) of Phase I fieldwork conducted between October 1991 and March 1992, initially two human burials and one human long bone were excavated from the Settling Tank 4 construction site (CTR26FE1, CTR7FE1, and CTR23FE1). Fourteen human remains and associated funerary objects, including bone disks, coffee bean sinker, shell, glass beads, basalt pebbles, shark tooth, wooden pole, mirror, and bird skeleton, were excavated (1996:Table 24). Drolet mentions six previous human burials between 1975–1989 from Houses 8, 14, and 16 (1996:7–8). Adult and juvenile human remains were also identified in the fill for Battery Hasbrouck, and a human burial was under House 2 (Shun and Schilz 1991).

A report (Drolet et al. 1995) identifies that 18 human burials were excavated during Phase II recovery at the wastewater plant. Lithics, a chicken burial, two human molars, cordage, and coral boulders were associated with the interments.

Six bones found in 1989 were temporarily curated in a locked metal storage cabinet in the paratrooper rigger unit at the Battery (Streck and Watanabe 1989). Eulberg (1995) reports one individual was inadvertently discovered alongside Battery Hasbrouck.

Byars (1988) and Hinkes (1988) discuss the remains of a young woman and three children discovered under Fort Kamehameha housing. Reportedly, the remains were analyzed by U.S. Army Central Identification Laboratory, Hawaii (CILHI) personnel (CILHI 0008-88, 0009-88, 0010-88, 0011-88), turned over to Bishop Museum, and eventually repatriated.

A memorandum by Dr. Bruce Masse (1992) addresses Phase I fieldwork associated with Fort Kamehameha Sewage Treatment Plant Expansion Project. Masse reports that 11 sets of remains were blessed and were housed at OEES.

Naval Reservation Pearl City Peninsula

In 1990 seven burials (TMK9-7-19:10) were located by IARII. Lisa Anderson's report (1995:17) does not specify what became of the remains.

Iroquois Point Naval Housing Area

A Federal Register Notice dated February 23, 1999, says the Bishop Museum reported that between 1963 and 1988 three individuals were recovered from site 50-80-13-3703 on Iroquois Point Naval Housing Area. Athens (1987) states that one individual as well as five human bones and objects not associated with burial were excavated in 1987. Athens (1987:6) states the skeletal remains are curated in Dr. Michael Pietrusewky's laboratory at the University of Hawaii.

One nearly complete mandible was located on Iroquois Point Naval Housing Area in 1988. It was identified as human by Sara Collins of CILHI, and was housed at the Bishop Museum.

NAS Barbers Point

Approximately 42 human remains have been recovered from NAS Barbers Point and are located at the Bishop Museum. These include:

- Three in 1938 (Catalog Nos. 1268–1270)
- More than 20 in 1959 (Catalog Nos. 2775–2780)
- One by Soehren in 1962 (Catalog No. 2791, site 50-Ca-B6-9), the remainder of which was collected by Navy personnel in 1981
- One in 1964 (Catalog No. 2836)
- One from Nimitz Beach, Area II in 1974 (Catalog No. 3427)
- Seven in 1980 (Catalog Nos. 3221–3225, sites 50-80-12-2620, 2621)

One in 1983 (Catalog No. 3224, site 50-80-12-2706)

One in 1989 (site 50-80-12-2220)

One in 1990 (Nimitz Beach beach cottage, identified by Dr. Peter Miller, CILHI)

A third burial was removed from site 50-80-12-1753 (1753-I) (Bishop Site #50-Oa-B6-9) by the Bishop Museum in 1962 (Tuggle and Tuggle 1994:32; Welch 1987:10). The location of the remains is unknown.

During a previous project by the St. Louis District (Felix et al. 2000), human skeletal remains and approximately 525 associated and unassociated objects (fishing gear, tools, personal items) were noted from projects conducted in 1975, 1976, 1984, and 1988. Of these, human skeletal remains (MNI=1) and objects (n=84) were on sites 50-80-12-2710 and -2711 Feature 28 (temporary loan 1988.126).

The small amount of remains collected by CILHI in 1990 was inventoried at PACNAVFACENGCOM. One partial mandible (Catalog No. PACNAV-1) was inadvertently discovered within site 50-80-12-2220 at Nimitz Beach in 1992. A burial (MNI=1) was recovered during excavation in 1990 (Schilz and Landrum 1994:25). According to the report, the remains were removed to CILHI. Additional human bone fragments associated with the burial were recovered during screening. No associated cultural materials were found.

Two possible infants and one subadult with associated nonhuman bone were recovered in 1993 (site 50-80-12-1724) at NAS Barbers Point. Two subadults from site 50-80-12-1752, Feature 100 (Catalog No. 1) and Feature 101 (Catalog No. 2) were recovered in 1995. These remains were housed at IARII.

Two reports (Trembly 1995:1; Welch 1987:10) identify an inadvertent discovery at site 50-80-12-532 (2220) in 1995, and state that the remains were turned over to Charlotte Hunter of PACNAVFACENGCOM. This is the second burial from the same site; the first burial was excavated in 1974. Rechtman (1998:32) states that one perforated human tooth was recovered from site 2220 during excavations in 1998. The report does not indicate where the tooth and other artifacts are curated.

An appendix by Dr. Dianne Trembly (O'Hare et al. 1996) states that four individuals were examined but not removed during Phase II fieldwork by PHRI. However, three teeth, some infant bone fragments, and three adult bone fragments were inadvertently removed from site 1721, Feature A; site 5094, Feature C; site 5097, Feature B; and site 5108, feature H. Neither the report nor the appendix mentions the disposition of these isolated remains.

NAS Barbers Point Naval Housing

Addendum letter reports (Hutchinson 1993; Welch 1993) state that originally human bone was identified at site 1726, Feature 2. Additionally, human bone (MNI=2) was recovered from site 1724-19 and during screening from site 1724-54 (MNI=~1). Tuggle (1997:iv) states that human bone was identified in three features—1724-19, 1724-54, and 1726-2—but gives no indication of whether or not the remains were removed. The remains were collected and held at IARII, pending advice on disposition.

During a previous St. Louis District project (Felix et al. 2000), human skeletal remains were identified at IARII (MNI=~3), including one mandible not associated with the other human remains. The remains were in bags labeled LN192.1, LN193, LN192.2, 100.03, and a paper envelope. No human remains were assessed at IARII during this CINCPAC project.

NAVMAG West Loch Branch

At NAVMAG West Loch Branch two to three individuals with four associated objects were recovered during the first excavation (date unknown) by Aki Sinoto of the Department of Anthropology at the Bishop Museum. In 1974, 10 individuals with 58 associated objects were recovered. The remains (Catalog Nos. 3228–3229) were recovered from Site 50-Oa-B1-79.

The Federal Register Notice dated August 26, 1999, states that 13 individuals and 62 associated objects, including nonhuman bone, beads, mirror, and a plate, recovered from NAVMAG Lualualei West Loch were at the Bishop Museum. The items were recovered from Bishop Museum site #50-Oa-B1-79 in 1978 by Sinoto. The associated report states that it is "recommended that remains stay at Bishop for analysis then be blessed and

reinterred at safe location in general vicinity" (Sinoto 1978).

Jenson and Head (1997:61) state that site 50-80-13-2310 excavated by Sinoto in 1978 contained 10 individuals and analysis determined the feature to be probably a "Chinese family sepulcher." The site was not relocated during their 1994–1995 Phase I survey.

PMRF Barking Sands

In general, the only archaeological collections found at PMRF Barking Sands are human skeletal remains. Remains have already been reburied on base. When remains are inadvertently discovered, notification is given to a particular local family who has been living in the area for generations. The Burial Council recognizes this family as ancestral to this region. Reburials are generally unmarked to protect them from disturbance. It is unknown if the location of reburials is recorded. Remains are never collected unless they would decidedly be disturbed or destroyed. In this case, they are reburied nearby.

Several burials with human remains have been discovered on PMRF, but little in the reports indicate what became of the remains (Drolet 1997b, 1997c, 1998; Drolet and Powell 1998; Rechtman 1998; Wulzen et al. 1997). Drolet (1997b:12) states that "three surface scatters of unidentified mammal bone (possibly human) were identified, briefly documented, and buried in place without determination of species." One report states that at site 50-30-05-2035, human remains were "reported to the PACMISRANFAC Environmental Officer, who dealt with them according to standing procedures" (Wulzen et al. 1997:74).

The remains of one individual recovered from a trench on PMRF Barking Sands in 1966 (Catalog No. 2943) were submitted by Commander R. W. Foster, Jr., Officer-in-Charge, to the then Curator of Collections, E. H. Bryan, Jr., at the Bishop Museum A cranium and mandible in 1967 (Catalog No. 2944) came from the same trench and were brought to Commander Foster. Three individuals with associated cloth (Catalog No. 2951) were recovered from a burial cave (site KA-C5-6) in 1967. The recovery of partial remains of two individuals (Catalog No. 2999) were reported by Commander Foster in 1970. Associated funerary objects consist of nonhuman bone.

The Federal Register Notice dated December 4, 1996, reports that in 1967, Captain Robert W. Rynd, U.S. Navy, donated the incomplete remains of two adults and one sub-adult, and one burial *kapa* to the Bishop Museum. They are believed to have come from Kauhao Valley, Waimea, Kauai, but it is unclear from maps whether or not this is on Navy property.

In a Federal Register Notice dated February 23, 1999, the Bishop Museum reported that during 1966–1970, four individuals and one associated object (nonhuman long bone) were recovered from PMRF Barking Sands site 50-30-05-1834, previously Bishop site number Ka-C5-5. According to reports (Drolet et al. 1996:39; Drolet 1998:11, Table 1; Drolet and Powell 1998:15), these two sites are not one and the same. Site 50-30-05-1834 has reported burial features and Site Ka-C5-5 is a burial disinterred with others destroyed or reported in the same area. The report maps indicate these two sites are some distance apart, and Drolet (1998:15) states that the skeletal remains were never conclusively identified. During previous St. Louis District reviews, three boxes (Box Numbers: 2943, 2944, 2999) totaling 3.90 ft^3 of human remains were at the Bishop Museum (Felix et al. 2000).

Wailupe Naval Radio Station

One skull from Wailupe Naval Radio Station was donated to the Bishop Museum from a private individual in 1974. The remains were acquired in 1927 from an officer at the Wailupe Naval Radio Station.

Curation Partners

Proper long-term curation in Hawaii is problematic due to a lack of qualified repositories with adequate space, staffing, and funding. In light of this, CINCPACFLT asked the St. Louis District to evaluate several buildings within the Pearl Harbor Naval Complex to determine if one could be renovated for use as a curation facility. Subsequently, all Hawaiian collections would be processed and stored in this facility unless Native Hawaiian groups request collections to remain on the island of origin, such as the case for any future collections from PMRF Barking Sands on Kauai.

General requirements for a repository to satisfy 36 CFR Part 79 have been outlined in the

recommendation summary. This project and resulting report is a first step in gaining control of the collections. Up to this point, management of the collections has been sporadic and inconsistent. Collections have remained, known or unknown to the Navy, in museums and contractor's offices. The unofficial relegation of the management of these collections to these various entities over the years has kept the Navy from properly managing its own collections and has lead to various problems, such as loss or damage of artifacts and missing information due to the loss or damage of original records. The results of the St. Louis District's architectural assessment are provided in Appendix 5.

Recommendations

Plan of Action

A comprehensive plan of action for compliance with 36 CFR Part 79 standards minimally must address five points—(1) inventory and rehabilitation of the artifact collections, (2) rehabilitation of the associated records, (3) proper long-term care of the collections and records, (4) proper management of collections, and (5) full compliance with NAGPRA.

Rehabilitation of Collections

In order for collections to be properly inventoried and rehabilitated the St. Louis District recommends using a single contractor to process the collections. Ideally, collections must be first coalesced into one suitable repository before they are inventoried, organized, and repackaged. Another less desirable option is sending a contractor to each location where collections are currently stored to rehabilitate the collections. Table 36 identifies the estimated cost for the St. Louis District to rehabilitate all collections, including artifacts, human skeletal remains, and associated documentation. Costs are based on figures determined during a different St. Louis District project (U.S. Army Corps of Engineers 2000). Minimally, the St. Louis District, or another professional collections management agency or company, should provide quality assurance and oversight for the rehabilitation process to ensure a satisfactory product.

To ensure future collections are handled and rehabilitated appropriately, staff should be provided educational opportunities such as a curation and collections management workshop.

Table 36.
Rehabilitation Cost for Facilities with Collections in Navy Region, Hawaii

Facility	Artifacts	Records
Bellows AFB, HI	$ —	$ 1,646
Fort Kamehameha, HI	48,987	22,167
Iroquois Point Naval Housing Area, HI	—	196
Ka'ula Training Target Impact Area, HI	—	254
Makalapa Flag Quarters, HI	—	588
MCBH Kaneohe Bay, HI	2,751	31,752
Molokai TSF, HI	—	1,352
NAS Barbers Point, HI	37,911	19,737
NAVBASE Kaho'olawe, HI	8,646	36,652
NCTAMS EASTPAC, HI	—	156
NAVMAG Lualualei, HI	—	5,605
NAVMAG Lualualei Waikele Branch, HI	—	1,783
NAVMAG West Loch Branch, HI	—	19
NAVPROTEC, HI	—	490
NRTF Lualualei, HI	—	411
Naval Security Group Activity, HI	—	196
NAVSUBASE Pearl Harbor, HI	—	1,234
NUWES, HI	—	196
PACNAVFACENGCOM, HI	—	18,776
PMRF Barking Sands, HI	5,816	17,267
Pearl Harbor Naval Complex, HI	—	4,566
SPAWAR (SURTASS)	766	352
Waiawa Floodplain, HI	—	235
Miscellaneous Navy	—	43,570
Midway Island	1,211	744
Wake Island	766	2,861

NAGPRA and Consultation

The Navy should identify which tasks and corresponding costs need to be completed in order to comply with NAGPRA guidelines and regulations. At minimum a qualified professional should examine materials in order to produce all necessary NAGPRA-compliance documentation.

An upcoming project to build additional beach houses on PMRF Barking Sands most likely will uncover human burials. Steps to ensure proper notification and consultation of the appropriate families/groups that satisfy NAGPRA must be in place. A past solution, after consultation with the appropriate parties when human remains have been discovered for past projects, was to transfer and rebury the human remains in a safer location on PMRF Barking Sands.

Curation Partners

Ideally, if a building within the Pearl Harbor Naval Complex can be rehabilitated to satisfy stipulations in 36 CFR Part 79, then the St. Louis District could recommend the creation of a Navy curation facility for all appropriate collections. However, having an adequate physical structure does not completely fulfill the necessary requirements for appropriate long-term curation. Providing adequate staffing, giving adequate access to researchers or other qualified people, and protecting collections from easy access by others are essential. Additionally, the Navy must take steps to ensure that the collections, including associated documentation, are not removed from the building without the notification and permission of the responsible archaeologists. Figures for rehabilitating a structure are pending. However, determining costs for the long-term curation of collections within a Navy facility would need to cover the cost of materials, staff time, etc.

Collections from PMRF Barking Sands may require a repository on the island of Kauai for temporary or permanent storage. Some possibilities have been tentatively identified. These include (a) employing the local community college with an archaeology program; (b) the Kauai Museum; or (c) purchasing a pre-built, self-contained room with environmental controls for use on base. None of these repositories have been evaluated and further inquiries into these possibilities have not been made. The Kauai Museum and archaeology department of the community college should be contacted and assessed for suitability as a repository if either is interested in curating collections. The cost for an architectural feasibility study is approximately $13,000.

Appendix 5 contains the St. Louis District's architectural assessment of buildings in Hawaii.

Management of Collections

After selecting a curation facility or facilities for the long-term storage of collections, the cultural resource manager must ensure not only that the collections are well managed and maintained, but also that the repository holding the collections remains adequately managed and maintained according to 36 CFR Part 79. This can be accomplished in the following manner.

1. The cultural resource manager must have an adequate understanding of 36 CFR Part 79.

2. Persons responsible for cultural resources should be provided a written collection management manual outlining their responsibilities and the responsibilities of the curation facility.

   a. The cultural resource manager must ensure budgetary requirements for proper care and management of collections are met.

   b. The cultural resource manager must oversee the appropriate handling of any NAGPRA items (see NAGPRA discussion).

   c. The cultural resource manager must keep all documentation regarding the management of collections (i.e., curation agreements, initial and subsequent collections inventories, collection and repository inspection reports, annual collection update reports, and any other related documents).

   d. The cultural resource manager must ensure that the curation facility is following 36 CFR Part 79 by requiring an annual report and by ensuring periodic, professional inspections of the collections and the facility.

      (1) An annual report written by the curation facility should include the status of the collection (current condition, any conservation treatments, progress of any on-going processing or rehabilitating); any use of the collection, including names and purposes of individuals given access; citations from any documents resulting from use of collections; outgoing and returned loans; problems; any physical changes within the facility; or any policy changes that may effect the collections.

      (2) An on-site inspection of the collection by professional collections managers should be conducted annually to assure maintenance of management standards. Random collection location checks should be included as part of these annual inspections.

      (3) A physical inspection of the curation facility by professional collections

managers should be conducted annually to assure continued observance of long-term curation standards.

3. Establish guidelines that address the following aspects of collections management or include references to *Guidelines for the Field Collection of Archaeological Materials and Standard Operating Procedures for Curating Department of Defense Archaeological Collections*.

   a. Initial preparation of materials, including a condition assessment, a complete inventory, and planned activities.

   b. Appropriate written policies and procedures of the repository for collections management (i.e., loan/access policies, handling and storage, conservation assessment, qualified staff, appropriate internal access, and duplication and safety of original records.

   c. Appropriate written policies and procedures of the repository for the management of the facility housing the collections (i.e., physical security, meeting local codes, intrusion and fire detection and suppression systems, adequate environmental controls, pest management, emergency preparedness plan, and special collections safety).

4. Allow access to qualified researchers.

5. Emphasize collections management training.

5-1

International Archaeological Research Institute, Inc.

Honolulu, Hawaii

Repository Summary

Volume of Artifacts: 19.08 ft³

Collection Origin: MEUA Tinian, CNMI (7.81 ft³); FISC, Guam (5.43 ft³); NCTAMS, Guam (5.84 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 2.62 linear feet

Collection Origin: MEUA Tinian, CNMI (0.38 linear feet); Apra Harbor Naval Complex, Guam (0.03 linear feet); FISC, Guam (1.17 linear feet); NCTAMS, Guam (0.98 linear feet); PMRF Barking Sands, Hawaii (0.06 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: Approximately 0.30 ft³ of human skeletal remains (MNI=3) were recovered from NAS Barbers Point Family Housing Project and were reviewed during the St. Louis District's previous visit in March 1997 (Felix et al. 2000). Since that visit, and prior to the 1999 visit, the remains were returned to the Navy.

Date of Visit: September 10, 1999

Persons Contacted: Dr. Stephen Athens, Projects Manager, and Gail Murakami, Collections Manager

International Archaeological Research Institute, Inc. (IARII) houses approximately 19.08 ft³ of artifacts and 2.62 linear feet of Navy associated documentation from projects conducted on MEUA Tinian, CNMI, Apra Harbor Naval Complex, Guam, FISC, Guam, NCTAMS, Guam, and PMRF Barking Sands, Hawaii (Table 37). The St. Louis District previously evaluated Navy collections at IARII in March 1997 for a different project (Felix et al. 2000). During the 1999 visit, the St. Louis District did not reassess any material from the previous visit.

Table 37.
Volume of Navy Archaeological Collections Housed at IARII

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
MEUA Tinian, CNMI	7.81	—	0.38
Apra Harbor Naval Complex, Guam	—	—	0.03
FISC, Guam	5.43	—	1.17
NCTAMS, Guam	5.84	—	0.98
PMRF Barking Sands, Hawaii	—	—	0.06
Total	19.08	—	2.62

Assessment

The 30-year old building was acquired by IARII in 1999 and renovated in April 1999. It is a two-story building with the first floor occupied by IARII (Figure 18). The second floor consists of apartments that are currently leased to residential tenants. The main building is approximately 28 x 80 feet and additional space in the rear measures approximately 34 x 26 feet. The first floor repository includes approximately 10,320 ft² of offices, records storage, collections storage, a kitchen area, and laboratory space in the rear of the building. Artifact collections are housed in two areas of the IARII building: Room 106, which is the main artifact storage area, and the lab in the rear of the building. Associated documentation is housed in a third area, a room used for employee work stations.

Figure 18. IARII is located in a concrete structure with apartments on the second floor.

Structural Adequacy

The building has a concrete foundation, and exterior walls are hollow tile bricks with fixed, non-operable windows. The windows are secured by bars on the outside and are fitted with venetian blinds inside. The floors are concrete covered with carpeting. The roof is flat and of unknown construction. The ceiling in the building consists of 2 x 4 foot suspended acoustical tiles.

Collections Storage Area 1—Room 106

A locked wooden door leads from Room 106 to the outside.

Collections Storage Area 2—Laboratory

The laboratory is used for processing artifacts, and a sink to clean artifacts is located outside the building next to the exterior door. An interior door of the laboratory leads to a small room (approximately 10 x 12 feet) that is used for housing artifacts.

Environmental Controls

Room 106, the laboratory, and the records room are all equipped with window air conditioning units, which control temperature and humidity. The building has fluorescent lights not equipped with UV filters throughout and exterior security lights.

Pest Management

There is no pest-management program in place. The building was treated for termites during construction by drilling holes and injecting chemicals.

Security

Intrusion detection system (IDS) tape is on outside windows for security. There are exterior security lights, and a wood fence is being constructed along one side of the building for additional security. Windows are secured on the exterior by metal bars. The residential apartments are also considered to provide additional 24-hour protection. There is no interior connection between the first floor offices and the second floor apartments or the laboratory in the rear. Doors are locked with dead-bolt and key locks.

Fire Detection and Suppression

Wall-mounted fire extinguishers are present throughout the repository. It was reported that a fire code review was conducted during renovation and that an automatic fire suppression system was considered unnecessary.

Collections Storage Area 1—Room 106

An additional fire extinguisher is located in Room 106.

Artifact Storage

Artifact collections are housed in two areas of the IARII building: the main artifact storage area (Room 106) and the laboratory in the rear of the building.

Storage Units

Collections Storage Area 1—Room 106

Navy collections in Room 106 are located on two rows of metal shelves with four units in each row (Figure 19). The units measure 24.5 x 35 x 106 inches (d x w x h). There are five shelves in each unit, and the top shelf is also used for artifact storage. Each shelf is covered by fiberboard and is 22 inches in height.

Collections Storage Area 2—Laboratory

Navy artifacts in the laboratory are located on one row of metal shelves placed against the wall. There are two units of shelves with four shelves. Each unit measures 17.5 x 48.5 x 84 inches (d x w x h). Each shelf is 22.5 inches high and the tops of the units are also used for artifact storage.

Figure 19. Artifacts are housed in cardboard boxes on metal shelves.

Primary Containers

Artifacts and human remains from NAS Barbers Point totaling 5.80 ft³ were previously assessed during the 1997 visit. During the 1999 assessment artifacts from MEUA Tinian, CNMI, FISC, Guam, and NCTAMS, Guam totaled 19.08 ft³ (Table 38). Artifact storage varied with the location of the collection.

Table 38.
Percentage by Volume of Navy Artifacts Housed at IARII

Material Class	MEUA Tinian	FISC, Guam	NCTAMS, Guam
Lithics	1.23	5.97	1.22
Prehistoric Ceramics	9.83	2.84	1.22
Faunal Remains	1.23	—	6.12
Shell (unmodified)	3.28	9.95	19.89
Botanical	0.41	—	—
Flotation	—	—	—
Soil	1.23	—	—
^{14}C	1.23	0.57	0.92
Human Skeletal Remains	—	—	—
Worked Shell	—	—	—
Worked Bone	—	—	—
Brick/Masonry	0.41	—	—
Historic Ceramics	9.83	1.59	0.92
Metal	7.78	1.14	0.31
Glass	3.69	6.26	—
Textiles	—	—	—
Other	0.82	0.11	—
Total	40.97	28.43	30.60

Other material classes include buttons, plastic, and shoe leather.

Collections Storage Area 1—Room 106

All materials in Room 106 were housed in seven acidic boxes measuring 15.75 x 12.5 x 10.25 inches (d x w x h), equaling approximately 1.17 ft³ per box. Primary containers are directly labeled in marker and include the project name, project number, and material class. Five of the primary containers also identify the box number.

Collections Storage Area 2—Laboratory

Artifacts housed in the laboratory are in 10 non-archival boxes of varying sizes. Six of the boxes measure 18.0 x 12.0 x 12.5 inches (d x w x h). The remaining four range in size from 18.25 x 12.25 x 12.5 to 11.25 x 9.25 x 11.25 inches (d x w x h). Eight of the primary containers are directly labeled in

marker with the project name and material class. The remaining two boxes have white and yellow paper labels taped to the box. The labels are typed with project name and material type, and one also has the box number.

Secondary Containers

Collections Storage Area 1—Room 106

In Room 106, secondary containers consist of white, paper cloth-like bags with cotton string closures, 2-mil plastic zip-lock bags, and a cardboard box measuring 11.25 x 9 x 4.75 inches (d x w x h) that is glued with folded flaps. Secondary containers are directly labeled in marker with project, material class, and laboratory number. Tertiary containers consist of plastic 2-mil zip-lock bags, aluminum foil, plastic film canisters, or brown paper bags. There are white and yellow acidic paper inserts inside the secondary or tertiary containers that are labeled in black marker or pencil with provenience, material class, project name and number, ID number, weight, and/or notes. Some of the labels are stapled or have paper clips on Post-it® notes. Pink flagging tape is wrapped around some lithic artifacts inside secondary containers in one box.

Collections Storage Area 2—Laboratory

In the laboratory, secondary containers consist of cardboard beer flats and 2-mil plastic zip-lock bags. The beer flats are labeled with a typed white paper label taped to the flat and some of the flats are also labeled in marker. Information on the labels includes project name and material type, and one plastic bag is not labeled. The remaining plastic zip-lock bags are directly labeled in marker with project name, date, catalog number, and provenience.

Approximately 95% of the artifacts are loose within one of the primary containers.

Laboratory Processing and Labeling

All of the artifacts are cleaned and sorted by material type and provenience, but none of the artifacts are directly labeled. Pink flagging tape and/or white and yellow paper inserts are inside secondary containers labeled in pencil with material class, bag number, ID number, weight, and project. White paper labels written in pencil are taped to some bottles and identify bag number, weight, project, and notes.

Human Skeletal Remains

No human skeletal remains from Navy facilities are currently curated at IARII.

Records Storage

Collections Storage Area 3—Work Stations

Records are housed in a room that is also used for three employee work stations (Figure 20). Records are located on wooden shelving units attached to three walls. On one wall are four units with five shelves each, and the tops of the units are also used for record storage. Another wall has eight shelves to a unit with the top of the unit also used for record storage.

During the 1997 visit, Navy associated documentation totaling 3.25 linear feet was assessed. During the 1999 assessment, 2.62 linear feet of associated documentation (Table 39) was stored in 10 acidic accordion files and three three-ring binders. The accordion files are kept on open wood

Table 39.
Linear Footage of Navy Associated Documentation Housed at IARII

Facility	Paper	Reports	Maps and Oversized Documents	Audiovisual	Photographs	Computer
MEUA, Tinian	0.23	0.04	—	—	0.08	0.02
Apra Harbor Naval Complex, Guam	—	0.02	—	—	0.01	0.01
FISC, Guam	0.46	0.46	0.04	—	0.15	0.06
NCTAMS, Guam	0.46	0.31	0.13	—	0.08	—
PMRF Barking Sands, Hawaii	—	0.04	—	—	0.01	0.01

Figure 20. Records are stored in cardboard boxes on wooden shelves.

shelves. One of the accordian files is legal-size and open, while others are fold-over with elastic closures. One folder has a string tie. Three of the accordian files have glued or taped paper labels, and one file is directly labeled in marker. The remaining six accordian files are not labeled. Those files that are labeled identify the date, project name, or installation, and are arranged by project and by region. One of the three-ring binders has an adhesive label. A finding aid for records location is available in the form of a database. Copies of the database are on regular disks and a zip disk.

Paper Records

There are approximately 2.02 linear feet of paper records, which includes administrative, background, survey, excavation, and analysis documents, and maps, reports, and drawings. Some of the paper records are in manila folders within the accordion files.

Photographs

Photographs totaling 0.33 linear feet include color prints, black-and-white prints, negatives, and slides. They are stored in commercial processing envelopes in unlabeled three-ring binders, letter-size envelopes, and small manila envelopes with adhesive labels in pencil. A small amount of color prints are stored in a plastic envelope. Some of the large aerial photographs are laminated.

Maps and Oversized Documents

Copies of maps totaling 0.17 linear feet are folded and are included with the paper records.

Computer

Computer disks totaling 0.10 linear feet are housed with the paper records in accordian files.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Collections are located in three areas of IARII. Staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

IARII is not a permanent curation facility, and does not have a published guide to the collections.

Site-Record Administration

A site-numbering system unique to Hawaii is utilized.

Computerized Database Management

A computerized database is utilized by IARII staff.

Written Policies and Procedures

Minimum Standards for Acceptance

IARII is a contracting firm, and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those objects from IARII projects are housed at IARII.

Curation Policy

IARII is an archaeological contracting firm and holds collections only for analysis purposes. They are not a long-term curation repository and do not possess a comprehensive curation plan.

Records Management Policy

IARII does not possess a records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

Collection materials remain in the building except for special loan situations, such as lending to the Bishop Museum.

Deaccessioning Policy

Because collections are not permanently curated at IARII, there is no written deaccessioning policy in effect.

Inventory Policy

IARII does not have a written inventory policy.

Latest Collection Inventory

The date of the last inventory is not known.

Curation Personnel

The management of the collections is the responsibility of the Collections Manager, Gail Murakami.

Curation Financing

Curation activities are not adequately funded. Project funds were used to process and package the collections in their current containers.

Access to Collections

The laboratory staff have access to the collections. Outside interests must make an appointment with the Collections Manager.

Future Plans

There are no future plans for upgrading the condition of the collections. Consideration is being given to transfer collections housed in two off-site storage areas to Room 106.

Comments

1. IARII is not a permanent curation facility.

2. Window air conditioners are present in each of the collections storage areas. A heating system is not present, but usually is not necessary in Hawaii.

3. Basic security deterrents are present, but no security-detection measures are in place.

4. Basic fire-suppression measures are in place, but fire-detection systems are not present.

5. Artifacts are stored in plastic zip-lock bags, paper cloth-like bags, a cardboard box, and cardboard beer flats in acidic cardboard boxes.

6. The majority of the primary containers are overpacked.

7. Associated documentation is housed in manila folders and envelopes in accordion files and three-ring binders.

8. Some contaminants, such as staples and paper clips, are present in the collections.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) placement of maps in an archival flat storage file, and (c) creation of an archival duplicate copy for security.

5-2

Ogden Environmental and Energy Services

Honolulu, Hawaii

Repository Summary

Volume of Artifacts: 155.56 ft³

Collection Origin: MLA Tinian, CNMI (51.27 ft³); NAVMAG, Guam (2.34 ft³); NAVACTS Ordnance Annex, Guam (15.46 ft³); Fort Kamehameha, Hawaii (74.79 ft³); MCBH Kaneohe Bay, Hawaii (1.17 ft³); NAS Barbers Point, Hawaii (1.17 ft³); PMRF Barking Sands, Hawaii (8.19 ft³); SPAWAR (SURTASS), Hawaii (1.17 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 10.01 linear feet

Collection Origin: MLA Tinian, CNMI (2.40 linear feet); Andersen AFB, Guam (0.08 linear feet); Apra Harbor Naval Complex, Guam (1.04 linear feet); FISC, Guam (0.11 linear feet); NAVACTS Ordnance Annex, Guam (1.75 linear feet); NAVACTS Waterfront Annex, Guam (0.01 linear feet); NCTAMS, Guam (0.02 linear feet); NAVHOSP, Guam (0.01 linear feet); NAVMAG, Guam (0.36 linear feet); NPWC, Guam (0.03 linear feet); NSRF, Guam (0.01 linear feet); NAVSTA, Guam (0.15 linear feet); Fort Kamehameha, Hawaii (1.59 linear feet); Ka'ula Navy Training Target Impact Area, Hawaii (0.13 linear feet); NAS Barbers Point, Hawaii (0.22 linear feet); NAVBASE Kaho'olawe, Hawaii (0.38 linear feet); NCTAMS, Hawaii (0.04 linear feet); NAVMAG Lualualei, Hawaii (0.16 linear feet); NUWES, Hawaii (0.02 linear feet); PMRF Barking Sands, Hawaii (0.91 linear feet); Pearl Harbor Naval Complex, Hawaii (0.41 linear feet); SPAWAR (SURTASS), Hawaii (0.18 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.73 ft³

Collection Origin: MLA Tinian, CNMI (0.38 ft³); NAVACTS Ordnance Annex, Guam (0.35 ft³)

Compliance Status: Human skeletal remains from commonwealths and territories of the United States are not covered under NAGPRA; therefore, no Section 5 and 6 summaries and inventories are required.

Date of Visit: September 15–17, 1999

Persons Contacted: Steve Clark, Cultural Resource Manager, and Mary Riford, Laboratory Director

Ogden Environmental and Energy Services (Ogden) houses approximately 156.29 ft³ of artifacts and human skeletal remains and 10.01 linear feet of Navy associated documentation from projects

Table 40.
Volume of Navy Archaeological Collections Housed at Ogden Environmental and Energy Services

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
MLA Tinian, CNMI	51.27	0.38	2.40
Andersen AFB, Guam	—	—	0.08
Apra Harbor Naval Complex, Guam	—	—	1.04
FISC, Guam	—	—	0.11
NAVACTS Ordnance Annex, Guam	15.46	0.35	1.75
NAVACTS Waterfront Annex, Guam	—	—	0.01
NCTAMS, Guam	—	—	0.02
NAVHOSP, Guam	—	—	0.01
NAVMAG, Guam	2.34	—	0.36
NPWC, Guam	—	—	0.03
NSRF, Guam	—	—	0.01
NAVSTA, Guam	—	—	0.15
Fort Kamehameha, Hawaii	74.79	—	1.59
Ka'ula Training Target Impact Area, Hawaii	—	—	0.13
MCBH, Kaneohe Bay, Hawaii	1.17	—	
NAS Barbers Point, Hawaii	1.17	—	0.22
NAVBASE Kaho-olawe, Hawaii	—	—	0.38
NCTAMS, Hawaii	—	—	0.04
NAVMAG Lualualei, Hawaii	—	—	0.16
NUWES, Hawaii	—	—	0.02
PMRF Barking Sands, Hawaii	8.19	—	0.91
Pearl Harbor Naval Complex, Hawaii	—	—	0.41
SPAWAR (SURTASS), Hawaii	1.17	—	0.18
Total	155.56	0.73	9.55

conducted on MLA, Tinian, CNMI; Andersen AFB, Guam; Apra Harbor Naval Complex, Guam; FISC, Guam; NAVACTS Ordnance Annex, Guam; NAVACTS Waterfront Annex, Guam; NCTAMS, Guam; NAVHOSP, Guam; NAVMAG, Guam; NPWC, Guam; NSRF, Guam; NAVSTA Guam; Fort Kamehameha, Hawaii; Ka'ula Training Target Impact Area, Hawaii; MCBH Kaneohe Bay, Hawaii; NAS Barbers Point, Hawaii; NAVBASE Kaho'olawe, Hawaii; NCTAMS, Hawaii; NAVMAG Lualualei, Hawaii; NUWES, Hawaii; PMRF Barking Sands, Hawaii; Pearl Harbor Naval Complex, Hawaii, and SPAWAR (SURTASS), Hawaii (Table 40). The St. Louis District previously evaluated Navy collections at Ogden in March 1997 for a different project (Felix et al. 2000). During the 1999 visit, the St. Louis District did not reassess material from the previous 1997 visit. Most of the repository information has not changed since that visit and will be repeated for this chapter.

Assessment

Ogden is located in a privately-owned structure that is approximately 64 years old and was originally used as the main processing plant for the Dole Corporation (Figure 21). The majority of the Navy associated documentation is housed in Room 600 of the main repository, whereas artifacts, human skeletal remains, and some associated documentation are stored in Rooms 424 and 426 in the laboratory, a separate building located adjacent to the main repository (Figure 22). Ogden occupies approximately 10,000 ft² of the Dole building, which is used for report preparation space, offices, a

Figure 21. The main offices of Ogden are located in a former Dole Corporation building.

Figure 22. Ogden's laboratory is located in a building adjacent to the main structure.

library, and a small kitchen area. The adjacent laboratory building occupies 1,200 ft² and contains a parking garage and additional business offices. The environmental department uses part of Room 426 in the laboratory, which encompasses approximately 50 ft², for storage of field equipment.

Structural Adequacy

The main building foundation is concrete with a steel and concrete building frame. The exterior walls are concrete, and the built-up asphalt roof was renovated 12 years ago.

Collection Storage Areas 1 and 2—Room 424 and Room 426

Rooms 424 and 426 of the lab are similar in construction to the main building. Interior walls are plasterboard and concrete, and a bank of louvered windows is present. Room 424 is the original laboratory space and has been reorganized. It has a bank of jalousie windows covered by venetian blinds.

Collection Storage Area 3—Room 600

Room 600 has wallboard interior walls and concrete floors covered with carpet. Windows have aluminum frames, shades, and are sealed. Ceilings are suspended acoustical tile.

Environmental Controls

Collection Storage Area 1—Room 424

A wall-mounted air conditioner is installed above one of the windows in Room 424. Lighting consists of non-UV filtered fluorescent fixtures.

Collection Storage Area 2—Room 426

There is no air conditioning or cooling system in Room 426. Lighting consists of non-UV filtered fluorescent fixtures.

Collection Storage Area 3—Room 600

Central air conditioning provides environmental control in Room 600 of the main building. Lighting consists of non-UV filtered fluorescent fixtures.

Pest Management

Pest management is monitored by the staff and professional pest management services are provided on an as-needed basis.

Security

A private security company patrols the repository buildings and areas of controlled access are monitored by the staff.

Collection Storage Area 1—Room 424

Room 424 is secured by a locked metal exterior door, an intrusion alarm wired to the police department, and access to the facility is controlled.

Collection Storage Area 2—Room 426

Room 426 has been divided by erecting wood-framed wire mesh "cages." Wood-framed wire doors for the cages are padlocked and kept locked at all times. A locked metal security door is kept locked at all times, and access to the cages is controlled.

Collection Storage Area 3—Room 600

In the main building, all exterior and interior doors are solid wood with key locks.

Fire Detection and Suppression

Collection Storage Area 1—Room 424

Room 424 is equipped with fire alarms wired to the fire department, a sprinkler/suppression system, and numerous fire extinguishers, which are inspected on a regular basis.

Collection Storage Area 2—Room 426

An overhead sprinkler system is located over the cage in Room 426.

Collection Storage Area 3—Room 600

Room 600 is equipped with fire alarms wired to the fire department, a sprinkler/suppression system, and numerous fire extinguishers, which are inspected on a regular basis.

Artifact Storage

Artifact and human skeletal remains totaling 156.29 ft^3 are housed in two rooms, Room 424 and Room 426, in the laboratory building (Table 41). Some small artifacts, such as an adze fragment, bird bones, and soil samples, from PMRF Barking Sands and NAS Barbers Point are housed in Room 600 with the associated documentation.

Storage Units

Collection Storage Area 1—Room 424

Room 424 is the main artifact collections area for active collections. Approximately 63.23 ft^3 of Navy artifacts are housed on six wooden shelving units, in one four-drawer lateral filing cabinet, and on top of and under tables (Figure 23). The shelving units measure 18 x 36 x 72 inches (d x w x h), and each of the four shelves are 16.5 inches high. Particleboard is on top of each shelf and the tops of the shelving units are also used for artifact storage. The lateral filing cabinet measures 19 x 36 x 53 inches (d x w x h). "Uncooked" soil samples are housed in three drawers of the lateral filing cabinet, and each drawer measures 12 inches high.

Collection Storage Area 2—Room 426

Room 426 is a smaller room adjacent to Room 424. The cage contains approximately 92.33 ft^3 of artifacts from inactive collections that were recently removed from a loft in the room. Nonarchaeological items are stored on top of the cage. One row of chrome metal shelving units is used for storage of artifact collections. There are two units of shelving with four shelves each. The units measure 47.5 x 18 x 74.5 inches (d x w x h), and each shelf is

Table 41.
Percentage by Volume of Navy Artifacts Housed at Ogden Environmental and Energy Services

Material Class	MLA, Tinian, CNMI	NAVMAG, Guam	NAVACTS Ordnance Annex, Guam	Fort Kamehameha, Hawaii	MCBH Kaneohe Bay, Hawaii	NAS Barbers Point, Hawaii	PMRF Barking Sands, Hawaii	SPAWAR (SURTASS), Hawaii
Lithics	1.69	0.60	1.46	1.47	0.15	0.11	1.56	—
Prehistoric Ceramics	7.71	0.18	1.50	—	—	—	—	—
Faunal Remains	0.90	—	0.34	3.35	—	0.11	0.61	—
Shell (unmodified)	10.86	0.48	0.76	3.40	0.60	0.11	0.89	—
Botanical	—	—	1.02	3.24	—	0.08	0.08	—
Flotation	0.04	—	—	0.15	—	—	—	—
Soil	6.07	—	3.74	7.10	—	0.22	1.16	0.74
^{14}C	0.94	0.15	0.22	2.77	—	0.11	0.41	—
Human Skeletal Remains	0.25	—	0.22	—	—	—	—	—
Worked Shell	0.85	—	0.02	—	—	—	0.03	—
Worked Bone	—	—	—	1.0	—	—	—	—
Brick/Masonry	0.04	—	0.08	—	—	—	—	—
Historic Ceramics	0.72	—	0.18	5.01	—	—	—	—
Metal	1.54	—	0.34	5.06	—	—	—	—
Glass	1.11	0.08	0.18	12.93	—	—	0.45	—
Textiles	—	—	—	0.26	—	—	—	—
Other	0.41	—	0.04	2.08	—	—	0.04	—
Total	33.13	1.49	10.10	47.82	0.75	0.74	5.23	0.74

Other material classes include celluloid button, rubber, plastic, slate, coin, asphalt shingle, coal, leather, filmstrips, battery core, eggshell, tile, and coral.

Figure 23. Artifacts are housed in cardboard boxes on metal shelves in the laboratory.

20 inches high. The remaining collections are stacked three to five boxes high on the floor.

Primary Containers

During the 1997 assessment 86.95 ft³ of Navy collections were stored on the floor. Collections in 1999 were in some of the same primary and secondary containers as when assessed in 1997. Artifacts examined in 1999 (155.56 ft³) are stored in acidic cardboard boxes and one artifact is loose on the shelf. All primary containers have adhesive labels written in pen and typed. Information consists of project name, company name and address, contract and task order numbers, and box number. Inventory sheets are included in all of the primary containers. The loose artifact has an adhesive label with the same information as the primary containers attached by a twist-tie, and a Post-it® note with provenience, project, and artifact identification is adhered to the artifact. One box contains oversized artifacts, such as tall bottles and large metal objects.

Secondary Containers

Secondary containers include 2- and 4-mil plastic zip-lock bags, plastic freezer, sandwich, grocery, and garbage bags, manila envelopes, newspaper, and paper bags. They are labeled directly in marker with provenience, project name, date, material class, and investigator information. Some secondary containers also have Post-it® notes adhering to them with label information. Tertiary containers include 2-mil plastic zip-lock bags, aluminum foil, plastic film canisters, plastic food container, white shelf paper, and plastic freezer bags. Pink flagging tape with provenience information was noted on some bottles. Newspapers and wrapping paper are used to separate layers of secondary containers in several primary containers.

Laboratory Processing and Labeling

Less than half of the artifacts have been cleaned, and all are sorted by provenience and/or material class. None of the artifacts appear to be directly labeled, but non-archival paper inserts labeled with some information are in tertiary containers.

Human Skeletal Remains

Approximately 0.73 ft³ of human skeletal remains from Navy facilities are housed separately in an open metal shelving unit with four shelves in Room 424. The shelving unit has white paper taped around it to conceal contents. The unit measures 18 x 36 x 72 inches (d x w x h). The human remains are housed in two acidic cardboard primary containers measuring 1 x 1 x 4.25 inches (d x w x h). The primary containers have an adhesive label and a Post-it® note label with the task order written in marker. The remains from Guam have interior acidic paper labels. The remains are wrapped in white cloth, which is tied with white cloth tape. Secondary containers consist of various plastic zip-lock bags of varying thickness, and some are nested. The remains have not been cleaned, and are sorted by provenience.

Records Storage

During the 1997 visit records totaling 2.23 linear feet were housed in non-archival boxes and five-drawer filing cabinets. During the 1999 visit, associated documentation from archaeological projects conducted on Navy facilities was located in Room 424 of the lab and Room 600 of the main Ogden building (Table 42).

Collection Storage Area 1—Room 424

Approximately 0.89 linear feet of records are stored in an unlabeled nonarchival Bankers box in Room 424. The records in Room 424 are organized by project phase, e.g., Phase I, II, III, and IV. Secondary containers consist of acidic legal-sized hanging files and/or manila folders and manila

Table 42.
Linear Footage of Navy Associated Documentation Housed at Odgen Environmental and Energy Services

Facility	Paper	Reports	Maps and Oversized Documents	Audiovisual	Photographs	Computer
MLA Tinian, CNMI	0.99	0.22	0.04	—	1.13	0.02
Andersen AFB, Guam	0.08	—	—	—	—	—
Apra Harbor Naval Complex, Guam	0.56	0.29	0.05	0.02	0.11	0.01
FISC, Guam	0.09	0.01	—	—	0.01	—
NAVACTS Ordnance Annex, Guam	1.10	0.06	0.17	—	0.42	—
NAVACTS Waterfront Annex, Guam	0.01	—	—	—	—	—
NCTAMS, Guam	0.02	—	—	—	—	—
NAVHOSP, Guam	0.01	—	—	—	—	—
NAVMAG, Guam	0.19	0.15	—	—	0.02	—
NPWC, Guam	—	—	—	—	0.03	—
NSRF, Guam	0.01	—	—	—	—	—
NAVSTA, Guam	0.07	0.02	0.03	—	0.01	0.02
Fort Kamehameha, Hawaii	1.37	0.18	0.01	—	0.03	—
Ka'ula Training Target Impact Area, Hawaii	0.09	—	0.04	—	—	—
NAS Barbers Point, Hawaii	0.14	0.06	0.01	—	0.01	—
NAVBASE Kaho'olawe, Hawaii	0.11	0.22	0.02	—	0.03	—
NCTAMS, Hawaii	—	0.04	—	—	—	—
NAVMAG Lualualei, Hawaii	0.10	0.04	0.01	—	0.01	—
NUWES, Hawaii	—	0.02	—	—	—	—
PMRF Barking Sands, Hawaii	0.52	0.21	0.15	—	0.03	—
Pearl Harbor Naval Complex, Hawaii	0.39	0.02	—	—	—	—
SPAWAR (SURTASS), Hawaii	0.09	—	0.04	—	0.05	—

envelopes. These are labeled with plastic holders with typed paper inserts.

Collection Storage Area 3—Room 600

The remainder of the records, 9.12 linear feet, are stored in lateral metal filing cabinets in Room 600 (Figure 24). One filing cabinet is located outside Steve Clark's office, and the other filing cabinet is near the library. Additional records were in a project manager's office and pulled for this assessment. Each four-drawer metal filing cabinet measures 19 x 36 x 54 inches (d x w x h). Both filing cabinets have key locks but were unlocked at the time of the assessment. Some of the filing cabinet drawers are labeled with paper labels inserted in plastic holders. Some inserts have typed or printed information, including "Old Navy" or "New Navy." The "New Navy" labels also have contract numbers and are also printed on Post-it® notes. Some of the files are organized by project. Within the filing cabinets are acidic legal-sized hanging files and/or non-archival manila folders and manila envelopes. These are labeled with plastic holders with typed paper inserts.

Figure 24. Associated documentation is housed in lateral file cabinets in the main office.

Photographs, negatives, and contact sheets are in commercial processing envelopes.

Paper Records

The paper records comprise approximately 7.48 linear feet of the collection, and include administrative, background, survey, excavation, and analysis documents, reports, drawings, National Register forms, site forms, catalog sheets, and photograph logs.

Maps and Oversized Documents

Maps are folded and rolled, and stored with the paper records. They include commercial topographic maps, bluelines, and blueprints, and comprise approximately 0.57 linear feet.

Audiovisual

Approximately 0.02 linear feet of overheads are housed with the paper records.

Photographs

Photographs consist of 1.89 linear feet of color prints, black-and-white prints, negatives, and contact sheets. The majority of photographs, negatives, and contact sheets are in commercial processing envelopes. Some color photographs and negatives are in archival sleeves.

Computer

Computer disks comprise approximately 0.05 linear feet. Disks are housed in cardboard in a manila envelope.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Navy collections are located in three areas of Ogden, and staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

Ogden is not a permanent curation repository, and does not have a published guide to the collections.

Site-Record Administration

A site-numbering system unique to Hawaii is utilized.

Computerized Database Management

A computerized database system is not in used.

Written Policies and Procedures

Minimum Standards for Acceptance

Ogden is a contracting firm, and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those collections from projects that Ogden conducted are housed there.

Curation Policy

Ogden is a contracting firm and holds collections only for analysis purposes. They are not a long-term curation repository and do not possess a comprehensive curation plan.

Records Management Policy

Ogden does not possess a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials, but collection materials remain in the Ogden building and are not loaned out.

Deaccessioning Policy

Because collections are not permanently curated at Ogden, there is no written deaccessioning policy.

Inventory Policy

Ogden does not have a written inventory policy.

Latest Collection Inventory

The date of the last inventory is not known.

Curation Personnel

Mary Riford, Laboratory Manager, maintains collections held by the firm.

Curation Financing

Curation activities receive no funding. Costs associated with curation are taken from the firm's overhead budget.

Access to Collections

Access to the records and artifacts are controlled. Staff require a telephone call or a letter of explanation regarding the specific collections desired and the needs of the particular researcher.

Future Plans

Ogden has no future plans regarding curation or collections storage.

Comments

1. Ogden is not a permanent curation facility.

2. Central air conditioning is present in Room 600 of the main building, and a wall-mounted air conditioner is in Room 424 of the lab. There is no air conditioning in Room 426 of the lab. Heating systems are not usually needed in the tropical climate.

3. Excellent security deterrents are present in both buildings, and Room 424 in the lab is equipped with security detection measures. No security-detection measures are present in Room 600 of the main building and Room 426 of the lab.

4. Excellent fire-detection and -suppression measures are present in Room 600 and Room 424. Adequate fire suppression measures are present in Room 426, but no fire detection measures are in place.

5. Artifacts are housed in Rooms 424 and 426 in 2-mil plastic zip-lock bags, non-archival plastic freezer, sandwich, grocery, and garbage bags, manila envelopes, newspaper, and paper bags in acidic cardboard boxes or loose on six wood shelving units, one four-drawer lateral filing cabinet, on top of and under tables, on the floor, and on chrome metal shelving units.

6. Some small artifacts are housed with the associated documentation.

7. The majority of the primary containers are overpacked.

8. Associated documentation is housed in file folders, manila folders, and manila envelopes in lateral filing cabinets or an acidic cardboard box in Rooms 600 and 424.

9. Some color photographs and negatives are housed in archival sleeves.

10. Some contaminants, such as staples, perma clips, paper clips, and rubber bands, are present in the collections.

11. Human skeletal remains are present in the collections.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), (d) storage in appropriate archival primary and secondary containers that have been labeled, and (e) insertion of acid-free labels in each secondary container.

3. Remove the artifacts from the associated records, and house them with the rest of the artifacts.

4. Records require (a) physical arrangement in some sort of logical order, (b) packaging in archival containers and in archival files, (c) appropriate and consistent labeling of all file folders, and (d) creation of an archival duplicate copy for security.

5. All human remains and associated objects need to be examined and brought into compliance with NAGPRA.

5-3

Pacific Division, Naval Facilities Engineering Command

Pearl Harbor, Hawaii

Repository Summary

Volume of Artifacts: 19.08 ft³

Collection Origin: Apra Harbor Naval Complex (9.02 ft³) and NAVBASE Kaho'olawe, Hawaii (10.06 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 135.90 linear feet

Collection Origin: NSF Diego Garcia, BIOT (0.53 linear feet); MLA, Tinian, CNMI (15.20 linear feet); Saipan Airfields, CNMI (0.05 linear feet); Apra Harbor Naval Complex, Guam (0.69 linear feet); FISC, Guam (0.80 linear feet); Guam Navy (2.12 linear feet); NAVACTS Ordnance Annex, Guam (0.53 linear feet); NCTAMS WESTPAC, Guam (0.70 linear feet); NAVMAG, Guam (2.19 linear feet); Bellows AFB, Hawaii (0.84 linear feet); Fort Kamehameha, Hawaii (9.72 linear feet); Iroquois Point Naval Housing Area, Hawaii (0.10 linear feet); Makalapa Flag Quarters, Hawaii (0.30 linear feet); MCBH Kaneohe Bay, Hawaii (16.20 linear feet); Molokai Training Support Facility, Hawaii (0.69 linear feet); NAS Barbers Point, Hawaii (8.74 linear feet); NAVBASE Kaho'olawe, Hawaii (18.32 linear feet); NCTAMS EASTPAC (0.04 linear feet); NAVMAG Lualualei, Hawaii (2.70 linear feet); NAVMAG Lualualei Waikele Brance, Hawaii (0.91 linear feet); NAVMAG West Loch Branch, Hawaii (0.01 linear feet); NAVPROTEC, Hawaii (0.25 linear feet); NRTF Lualualei, Hawaii (0.21 linear feet); Naval Security Group Activity, Hawaii (0.10 linear feet); NAVSUBASE Pearl Harbor, Hawaii (0.63 linear feet); NUWES Lualualei, Hawaii (0.08 linear feet); PACNAVFACENGCOM, Hawaii (9.58 linear feet); PMRF Barking Sands, Hawaii (7.84 linear feet); Pearl Harbor Naval Complex, Hawaii (1.92 linear feet); Waiawa Floodplain, Hawaii (0.04 linear feet); FLEACT Okinawa/NAF Kadena, Japan (3.23 linear feet); FLEACT Sasebo, Japan (2.78 linear feet); Japan Navy (0.40 linear feet); MCAS Futenma, Japan (0.08 linear feet); MCB Camp Smedley, Japan (0.08 linear feet); NAF Atsugi, Japan (0.15 linear feet); White Beach Naval Facility, Japan (0.07 linear feet); Yokosuka Naval Complex, Japan (2.20 linear feet); FLEACT Chinhae, Korea (0.57 linear feet); Midway Island (0.38 linear feet); Wake Island (1.46 linear feet); Miscellaneous Navy (22.23 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.15 ft³

Collection Origin: Apra Harbor Naval Complex (0.02 ft³) and NAVBASE Kaho'olawe, Hawaii (0.13 ft³)

Compliance Status: Human skeletal remains from commonwealths and territories of the United States are not covered under NAGPRA; therefore, no Section 5 and 6 summaries and inventories are required for Apra Harbor Naval Complex. The State of Hawaii has assumed responsibility for the care of collections from the State-owned island of Kaho'olawe.

Collection Update: Since the St. Louis District assessment, the collections from NAVBASE Kaho'olawe were transferred to the Bailey Museum, Maui. Although the collections remain federal property, the State of Hawaii has assumed responsibility for their care. The information on NAVBASE Kaho'olawe collections in this chapter is provided as background information about the collections.

Date of Visit: November 16–19, 1998 and September 9–10, 1999

Persons Contacted: Annie Griffin, Elizabeth Gordon, Jeannette Simons, Archaeologists, Jeff Dodge, Architect, and Henry Sim

The Pacific Division, Naval Facilities Engineering Command (PACDIV) houses approximately 19.23 ft³ of artifacts and human skeletal remains and 135.90 linear feet of associated documentation from projects conducted on NSF Diego Garcia, BIOT; MLA, Tinian, CNMI; Saipan Airfields, CNMI; Apra Harbor Naval Complex, Guam; FISC, Guam; Guam Navy; NAVACTS Ordnance Annex, Guam; NCTAMS WESTPAC, Guam; NAVMAG, Guam; Bellows AFB, Hawaii; Fort Kamehameha, Hawaii; Iroquois Point Naval Housing Area, Hawaii; Makalapa Flag Quarters, Hawaii; MCBH Kaneohe Bay, Hawaii; Molokai Training Support Facility, Hawaii; NAS Barbers Point, Hawaii; NAVBASE Kaho'olawe, Hawaii; NCTAMS EASTPAC; NAVMAG Lualualei, Hawaii; NAVMAG Lualualei Waikele Brance, Hawaii; NAVMAG West Loch Branch, Hawaii; NAVPROTEC, Hawaii; NRTF Lualualei, Hawaii; Naval Security Group Activity, Hawaii; NAVSUBASE Pearl Harbor, Hawaii; NUWES Lualualei, Hawaii; PACNAVFACENGCOM, Hawaii; PMRF Barking Sands, Hawaii; Pearl Harbor Naval Complex, Hawaii; Waiawa Floodplain, Hawaii; FLEACT Okinawa/NAF Kadena, Japan; FLEACT Sasebo, Japan; Japan Navy; MCAS Futenma, Japan; MCB Camp Smedley, Japan; NAF Atsugi, Japan; White Beach Naval Facility, Japan; Yokosuka Naval Complex, Japan; FLEACT Chinhae, Korea; Midway Island; Wake Island; Miscellaneous Navy (Table 43). When the St. Louis District assessed PACDIV in 1998, archaeological collections were located in three different areas: in Building 97 on Ford Island, in Building X-11, and in Building 406. However, since that visit, the collections have all been moved to the basement of Building 1 and Building 97 on Ford Island. Therefore, only those buildings will be discussed in this chapter.

Assessment

Archaeological collections are housed in Building 97 on Ford Island and in the basement of Building 1 in Naval Shipyard in the Pearl Harbor Naval Complex, where PACDIV is located.

Collection Storage Area 1—Building 1

Building 1 has two floors above grade and one floor below grade. The basement was used during World War II as the location of the intelligence unit responsible for breaking Japanese code. The building is currently used for offices and storage.

Collection Storage Area 2—Building 97

Building 97 was originally constructed during World War II for use as a machine shop. The 3,850-ft² building has one floor above grade, and is currently used for storage of archaeological collections and other general storage.

Structural Adequacy

Collection Storage Area 1—Building 1

Building 1 has a concrete foundation and concrete exterior walls (Figure 25). A number of exterior doors can be used to access the building, and windows fitted with venetian blinds are present throughout the repository. The basement collections storage area has a concrete floor covered with vinyl tile, and a suspended acoustical tile ceiling. Interior walls are cement block and gypsum wallboard, and some are covered with wood paneling and acoustical panels. Locking wooden and metal vault doors are present throughout the basement.

Figure 25. Some collections are now housed in Building 1, which was used during WWII for breaking Japanese code.

Table 43.
Volume of Navy Archaeological Collections Housed at PACNAVFACENGCOM

Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
NSF Diego Garcia, BIOT	—	—	0.53
MLA Tinian, CNMI	—	—	15.20
Saipan Airfields, CNMI	—	—	0.05
Apra Harbor Naval Complex, Guam	9.02	0.02	0.69
FISC, Guam	—	—	0.80
Guam Navy	—	—	2.12
NAVACTS Ordnance Annex, Guam	—	—	0.53
NAS Agana, Guam	—	—	0.24
NCTAMS WESTPAC, Guam	—	—	0.70
NAVMAG, Guam	—	—	2.19
Bellows AFB, Hawaii	—	—	0.84
Fort Kamehameha, Hawaii	—	—	9.72
Iroquois Point Naval Housing Area, Hawaii	—	—	0.10
Makalapa Flag Quarters, Hawaii	—	—	0.30
MCBH Kaneohe Bay, Hawaii	—	—	16.20
Molokai Training Support Facility, Hawaii	—	—	0.69
NAS Barbers Point, Hawaii	—	—	8.74
NAVBASE Kaho'olawe, Hawaii	10.06	0.13	18.32
NCTAMS EASTPAC, Hawaii	—	—	0.04
NAVMAG Lualualei, Hawaii	—	—	2.70
NAVMAG Lualualei Waikele Branch, Hawaii	—	—	0.91
NAVMAG West Loch Branch, Hawaii	—	—	0.01
NAVPROTEC, Hawaii	—	—	0.25
NRTF Lualualei, Hawaii	—	—	0.21
Naval Security Group Activity, Hawaii	—	—	0.10
NAVSUBASE Pearl Harbor, Hawaii	—	—	0.63
NUWES Lualualei, Hawaii	—	—	0.08
PACNAVFACENGCOM, Hawaii	—	—	9.58
PMRF Barking Sands, Hawaii	—	—	7.84
Pearl Harbor Naval Complex, Hawaii	—	—	1.92
Waiawa Floodplain, Hawaii	—	—	0.04
FLEACT Okinawa/NAF Kadena, Japan	—	—	3.23
FLEACT Sasebo, Japan	—	—	2.78
Japan Navy	—	—	0.40
MCAS Futenma, Japan	—	—	0.08
MCB Camp Smedley, Japan	—	—	0.08
NAF Atsugi, Japan	—	—	0.15
White Beach Naval Facility, Japan	—	—	0.07
Yokosuka Naval Complex, Japan	—	—	2.20
FLEACT Chinhae, Korea	—	—	0.57
Midway Island	—	—	0.38
Wake Island	—	—	1.46
Miscellaneous Navy	—	—	22.23
Total	19.08	0.15	135.90

Collection Storage Area 2—Building 97

Building 97 has a concrete pad foundation with a 6-inch sill (Figure 26). Exterior walls are wood siding. Numerous wood-framed windows without shades are located throughout the building. The windows are covered with a heavy gauge wire mesh. The floor is concrete with troughs covered with metal plates. Interior walls are constructed of wood, fiberboard, and plasterboard. The ceiling is fiberboard with water damage from leaks in the roof, which were recently repaired. A double wooden solid-core door and one single wooden solid-core door are present in the building.

Figure 26. Collections are also located in Building 97 on Ford Island.

Environmental Controls

Collection Storage Area 1—Building 1

Building 1 is equipped with an HVAC system; however, during the St. Louis District assessment, the system was not functioning. Lighting is provided by non-UV filtered fluorescent lights.

Collection Storage Area 2—Building 97

Building 97 has a window air conditioning unit. Lighting is provided by non-UV filtered fluorescent lights.

Pest Management

Collection Storage Area 1—Building 1

It is not known if an integrated pest management plan is in place for Building 1.

Collection Storage Area 2—Building 97

Building 97 does not have a pest management plan. Several previous and current insect infestations of termites and spiders were noted during the review.

Security

Both buildings are located on a secure U.S. Navy base protected by base security, and access is limited.

Collection Storage Area 1—Building 1

Steel metal vault doors with combination locks are present throughout the basement in Building 1, and wooden doors have key locks. Large ventilation shafts in the basement are equipped with metal bars.

Collection Storage Area 2—Building 97

Building 97 has a padlock on the door, and doors have key locks. Windows are covered with a heavy gauge wire mesh to prevent intruders.

Fire Detection and Suppression

Collection Storage Area 1—Building 1

Fire extinguishers are in place throughout the basement rooms, and manual fire alarms are present in Building 1.

Collection Storage Area 2—Building 97

Numerous fire extinguishers are present in Building 97.

Artifact Storage

Approximately 19.23 ft^3 of artifacts and human skeletal remains from Apra Harbor Naval Complex and Naval Base Kaho'olawe are housed in Building 1 (Table 44).

Storage Units

Collection Storage Area 1—Building 1

Artifacts are now housed on open shelves and in cabinets in the basement of Building 1. Before they were moved to their current location, artifacts were stored on metal shelves in Building X-11.

Table 44.
Percentage by Volume of Navy Artifacts Housed at PACNAVFACENGCOM

Material Class	Apra Harbor Naval Complex, Guam	NAVBASE Kaho'olawe, Hawaii
Lithics	0.2	22.2
Prehistoric Ceramics	7.1	—
Faunal Remains	3.4	1.6
Shell (unmodified)	27.2	0.8
Botanical	—	3.2
Flotation	—	—
Soil	—	12.4
^{14}C	—	2.6
Human Skeletal Remains	0.1	0.6
Worked Shell and Coral	0.3	4.7
Worked Bone	0.1	2.8
Brick/Masonry	0.2	—
Historic Ceramics	—	—
Metal	2.3	1.4
Glass	0.2	0.1
Textiles	—	—
Other	5.9	0.6
Total	47.0	53.0

Primary Containers

Primary containers consist of acidic cardboard boxes in various sizes (Figure 27). Boxes are labeled directly in pencil and/or with an adhesive label written in marker, and each box contains a materials storage list.

Figure 27. Tyvek® bags and cardboard boxes house some artifacts.

Secondary Containers

Within the acidic cardboard boxes are secondary containers consisting of 2- and 4-mil plastic zip-lock bags, paper bags, plastic boxes, manila envelopes, and Tyvek® bags. The plastic bags are labeled directly in marker, and the Tyvek® bags have tags sewn on them. Label information consists of site number, provenience, project, date, contents, field number, and investigator. Within some bags are paper string tags with metal edges. Nested within some of the secondary containers is a tertiary level consisting of 2-mil plastic zip-lock bags, aluminum foil, plastic vials, and a metal tobacco can.

Laboratory Processing and Labeling

Artifact collections from Apra Harbor Naval Complex have not been cleaned or directly labeled. Approximately 10% of the collections from NAVBASE Kaho'olawe were cleaned and directly labeled in black ink, some on a white background. Artifacts are sorted by provenience and material class.

Human Skeletal Remains

Collection Storage Area 1—Building 1

Human skeletal remains (MNI=3) from Apra Harbor Naval Complex, Guam, totaling approximately 0.02 ft^3 are present in the collection in Building 1. The remains are kept in 2-mil plastic zip-lock bags, labeled directly and with a paper insert, in an acidic cardboard box. Human skeletal remains from NAVBASE Kaho'olawe total approximately 0.13 ft^3, and are kept in 2-mil plastic zip-lock bags in an acidic cardboard box.

Records Storage

Collection Storage Area 1—Building 1

Before records were moved to their current location in Building 1, they were stored on metal shelves in Building X-11 and in filing cabinets in offices in Building 406. In Building 1, approximately 83.62 linear feet of records are kept on shelves and cabinets in acidic cardboard boxes of varying sizes (Table 45). The boxes are labeled directly in marker or with a typed adhesive label. Within the box, records are loose or in manila folders, accordion folders, and/or three-ring binders, which are labeled with adhesive labels or clip-on labels.

Table 45.
Linear Footage of Navy Associated Documentation Housed at PACNAVFACENGCOM

Facility	Paper	Reports	Maps and Oversized Documents	Audiovisual	Photographs	Computer
NSF Diego Garcia, BIOT	0.17	0.13	0.23	—	—	—
MLA, Tinian, CNMI	5.34	6.71	0.82	—	2.29	0.04
Saipan Airfields, CNMI	—	0.05	—	—	—	—
Apra Harbor Naval Complex, Guam	0.55	0.14	—	—	—	—
FISC, Guam	0.08	0.72	—	—	—	—
Guam Navy	0.70	0.29	0.69	—	0.44	—
NAVACTS Ordnance Annex, Guam	0.27	0.17	0.01	—	0.08	—
NAS Agana, Guam	—	—	—	—	0.24	—
NCTAMS WESTPAC, Guam	0.01	—	0.69	—	—	—
NAVMAG, Guam	0.08	1.90	0.21	—	—	—
Bellows AFB, Hawaii	—	0.63	—	—	0.13	0.08
Fort Kamehameha, Hawaii	5.07	4.27	0.14	—	0.24	—
Iroquois Point Naval Housing Area, Hawaii	0.10	—	—	—	—	—
Makalapa Flag Quarters, Hawaii	0.13	0.17	—	—	—	—
MCBH Kaneohe Bay, Hawaii	6.71	5.82	0.69	2.71	0.25	0.02
Molokai Training Support Facility, Hawaii	—	—	0.69	—	—	—
NAS Barbers Point, Hawaii	1.06	6.09	0.77	—	0.82	—
NAVBASE Kaho'olawe, Hawaii	9.24	3.98	0.87	0.58	3.64	0.01
NCTAMS EASTPAC, Hawaii	—	0.04	—	—	—	—
NAVMAG Lualualei, Hawaii	0.46	1.53	0.70	—	0.01	—
NAVMAG Lualualei Waikele Branch, Hawaii	0.22	0.69	—	—	—	—
NAVMAG West Loch Branch, Hawaii	—	—	0.01	—	—	—
NAVPROTEC, Hawaii	—	0.25	—	—	—	—
NRTF Lualualei, Hawaii	0.08	0.13	—	—	—	—
Naval Security Group Activity, Hawaii	0.08	0.02	—	—	—	—
NAVSUBASE Pearl Harbor, Hawaii	—	0.63	—	—	—	—
NUWES Lualualei, Hawaii	0.04	0.04	—	—	—	—
PACNAVFACENGCOM, Hawaii	9.58	—	—	—	—	—
PMRF Barking Sands, Hawaii	4.36	1.92	0.80	—	0.66	0.10
Pearl Harbor Naval Complex, Hawaii	0.53	0.24	0.73	—	0.42	—
Waiawa Floodplain, Hawaii	0.04	—	—	—	—	—
FLEACT Okinawa/NAF Kadena, Japan	0.44	2.29	0.04	—	0.46	—
FLEACT Sasebo, Japan	0.06	2.25	0.04	—	0.42	0.01
Japan Navy	0.17	—	0.23	—	—	—
MCAS Futenma, Japan	—	0.08	—	—	—	—
MCB Camp Smedley, Japan	—	0.08	—	—	—	—
NAF Atsugi, Japan	0.04	0.10	—	—	0.01	—
White Beach Naval Facility, Japan	0.01	0.04	0.02	—	—	—
Yokosuka Naval Complex, Japan	0.06	2.12	—	—	0.02	—
FLEACT Chinhae, Korea	0.17	—	0.23	—	0.17	—
Midway Island	0.15	—	0.23	—	—	—
Wake Island	0.08	1.15	0.23	—	—	—
Miscellaneous Navy	9.16	8.40	0.42	—	3.76	0.49

Collection Storage Area 1—Building 97

In Building 97 on Ford Island, approximately 52.28 linear feet of records are housed in acidic cardboard boxes of various dimensions on open baked enamel metal shelves that measure 24 x 48 x 84.5 inches (d x w x h) (Figure 28). The shelves are directly labeled in marker or with paper taped to the shelf that identifies shelf contents. Boxes are labeled directly in marker or with paper taped to the box. Within the box, records are loose or in three-ring binders, manila envelopes and folders, acidic legal folders, and accordion folders, which are either unlabeled or labeled directly in pen, pencil, and/or marker. Records are arranged by project or chronologically.

Figure 28. Some records, including computer disks, are housed in cardboard boxes.

Because of the quantity of records housed at PACDIV, some could not be separated by individual Navy base. Therefore, these records have been grouped as "miscellaneous Navy" records, and include documents from all of the bases in this chapter.

Paper Records

Paper records totaling 59.35 linear feet are stored in Building 1, and 48.96 linear feet are stored in Building 97. Paper records include administrative, background, survey, excavation, and analysis documents, bound and unbound reports, site forms, and drawings. Some reports are stored in paper bags.

Photographs

Photographic records totaling 10.88 linear feet consist of black and white aerial photos, slides, color and black and white prints, negatives, and contact sheets in Building 1. Some prints are camera-ready, mounted on paper, and some are in mailing envelopes or commercial processing envelopes. Slides are in nonarchival plastic or paper sleeves. In Building 97, photographic records totaling 3.18 linear feet consist of color and black-and-white prints, slides, contact sheets, and negatives. Slides are in small boxes, and contact sheets and some prints are in acidic folders. Some prints and negatives are in original commercial processing envelopes. Some original prints are included in unbound reports.

Maps and Oversized Documents

Paper maps, including USGS topographic maps, blueprints, blueline maps, and Mylar maps totaling 9.36 linear feet are kept loose in boxes or in round, square, and triangular map tubes in Building 1. Maps totaling 0.13 linear feet consist of site maps, plan maps, blueline maps, and USGS topographic maps in Building 97. Some maps are in two-ring flat binders.

Audiovisual

Approximately 2.71 linear feet of videotapes from MCBH Kaneohe Bay and 0.58 linear feet from NAVBASE Kaho'olawe of videotapes are kept in Building 1.

Computer

Several computer disks totaling 0.74 linear feet are in small boxes or loose in the cardboard boxes in Building 1, and 0.01 linear feet of disks are in Building 97.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections have not been accessioned.

Location Identification

PACDIV staff are familiar with the location of the collections, and a database has been created to identify which collections are stored in which box.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

A guide to the collections has not been published.

Site-Record Administration

A site-numbering system unique to Hawaii is utilized.

Computerized Database Management

A database identifies the locations of the collections.

Written Policies and Procedures

Minimum Standards for Acceptance

Archaeological collections are only from CINCPACFLT Navy bases.

Curation Policy

There is no formal curation policy in place that addresses the receipt, processing, and use of materials.

Records Management Policy

There is no formal records management policy addressing guidelines and standards for the curation of documentation.

Field Curation Procedures

No written field curation guidelines have been produced.

Loan Policy

There are no formal loan policies and procedures applying to archaeological materials.

Deaccessioning Policy

A formal deaccessioning policy is not in place.

Inventory Policy

There is no formal inventory policy.

Latest Collection Inventory

The collections have not been inventoried.

Curation Personnel

There are no staff dedicated to the curation of archaeological materials. PACDIV archaeologists are responsible for the curation of the collections.

Curation Financing

Curation is financed through PACDIV's budget.

Access to Collections

Access to the collections is controlled by PACDIV staff. Qualified researchers may examine the collections under supervision.

Future Plans

PACDIV staff wish to move collections to a suitable repository on base.

Comments

1. PACDIV is a permanent curation repository.

2. Building 1 has a non-functioning HVAC system, and a window unit is present in Building 97.

3. It is unknown if an integrated pest management plan is in place for Building 1. Building 97 does not have one. Infestations were noted in Building 1, and live and dead insects were present in both buildings.

4. Adequate security deterrents are present in both Building 1 and 97, but no security-detection devices are installed.

5. Basic fire-detection and -suppression devices are present in Building 1. Basic fire suppression devices are present in Building 97, and no fire detection systems are in place.

6. In Building 1, artifacts are housed in 2- 4-mil plastic zip-lock bags, paper bags, plastic boxes, manila envelopes, and Tyvek® bags in acidic cardboard boxes on metal shelves and cabinets.

7. Approximately 5% of the total collection has been cleaned and labeled.

8. NAVBASE Kaho'olawe artifact collections have been moved to the Bailey House museum in Hawaii.

9. In Buildings 1 and 97, records are housed in manila envelopes and folders, accordion folders, and three-ring binders in acidic cardboard boxes on metal shelves.

10. Some contaminants, such as rubber bands, paper clips, Post-It® notes, and binder clips, are present in the records. Some records are yellowing and curling.

11. In Building 97, some live and dead spiders and insect and rodent feces were noted in the boxes of records. Additionally, boxes are dirty, and some are water damaged.

12. Human skeletal remains are present in the collection.

Recommendations

1. Artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), (d) storage in appropriate archival primary and secondary containers that have been labeled, and (e) insertion of acid-free labels in each secondary container.

2. Records require (a) physical arrangement in some sort of logical order, (b) packaging in archival containers and in archival files, (c) appropriate and consistent labeling of all file folders, and (d) creation of an archival duplicate copy for security.

3. Remove contaminants from collections.

4. Ensure that the HVAC system in Building 1 is functional.

5. Install humidity monitoring devices and ensure that humidity levels are maintained.

6. Implement pest management plans, including both monitoring and control, for both buildings.

7. Ensure that fluorescent lights are equipped with UV filters.

8. Equip both buildings with security detection devices, such as motion sensors and intrusion alarms.

9. Additional fire suppression systems, such as additional fire extinguishers and a sprinkler/suppression system, should be installed in both buildings. Additional fire detection devices, such as smoke detectors and heat sensors wired to the fire department, should be installed in both buildings.

10. Create and implement the policies and guidelines as noted above if they are not currently in place.

5-4

Paul H. Rosendahl, Inc.

Hilo, Hawaii

Repository Summary

Volume of Artifacts: 67.09 ft³

Collection Origin: Andersen AFB, Guam (0.63 ft³); MCBH Kaneohe Bay, Hawaii (3.03 ft³); NAS Barbers Point, Hawaii (56.71 ft³); NAVBASE Kaho'olawe, Hawaii (3.01 ft³); PMRF Barking Sands, Hawaii (0.69 ft³); Midway Island (1.85 ft³); Wake Island (1.17 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 1.19 linear feet

Collection Origin: NAS Barbers Point, Hawaii (1.11 linear feet); Waiawa Floodplain, Hawaii (0.08 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: September 13-15, 1999

Person Contacted: Wanda Pua-Kaipo, Laboratory Supervisor

The Hilo office of Paul H. Rosendahl, Inc. (PHRI) houses approximately 67.09 ft³ of artifacts and 1.19 linear feet of Navy associated documentation from projects conducted on Andersen AFB, Guam; MCBH Kaneohe Bay, Hawaii; NAS Barbers Point, Hawaii; NAVBASE Kaho'olawe, Hawaii; PMRF Barking Sands, Hawaii; Waiawa Floodplain, Hawaii; Midway Island; and Wake Island (Table 46). The St. Louis District previously evaluated some Navy collections at PHRI in March 1997 for a different project (Felix et al. 2000). During the 1999 visit, the St. Louis District identified and confirmed that 6.05 linear feet of associated documentation and 251.20 ft³ of artifacts from the previous 1997 visit were still housed in the repository. Most of the repository information has not changed since the 1997 visit and will be repeated for this chapter.

Table 46.
Volume of Navy Archaeological Collections Housed at PHRI, Hawaii

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
Andersen AFB, Guam	0.63	—	—
MCBH Kaneohe Bay, Hawaii	3.03	—	—
NAS Barbers Point, Hawaii	56.71	—	1.11
NAVBASE Kaho'olawe, Hawaii	3.01	—	—
PMRF Barking Sands, Hawaii	0.69	—	—
Waiawa Floodplain, Hawaii	—	—	0.08
Midway Island	1.85	—	—
Wake Island	1.17	—	—
Total	67.09	—	1.19

Assessment

PHRI leases two separate buildings. The main office occupies the majority of a former furniture store, which PHRI moved into in 1993 (Figure 29).

Figure 29. The main offices of PHRI are located in a former furniture store.

Associated documentation is housed in the library of the two-story main building. Artifacts and field equipment are housed in the warehouse, which is partially below-grade in the Hilo Shopping Center (Figure 30). The shopping center was rebuilt in the early 1960s after being destroyed by the 1960 tsunami, and it was renovated in 1985. PHRI leases approximately 13,400 ft² of the 70,000-ft² building. The warehouse storage area encompasses approximately 900 ft², and includes space for offices, artifact storage, and field equipment, which is stored in an empty elevator shaft next to the hallway.

Figure 30. Additional storage is located in PHRI's warehouse, located under Hilo Shopping Center.

Structural Adequacy

Collection Storage Area 1—Warehouse

The warehouse in the Hilo Shopping Center has a concrete foundation, concrete block walls with a steel frame, and a metal roof covered with tarpaper and EPDM. The artifact storage area has concrete floors, walls, and ceiling.

Collection Storage Area 2—Library

The main office building has a concrete foundation, painted concrete block exterior walls, and a corrugated metal roof. Ceilings are plaster and drywall with suspended acoustical tiles. There are four windows with partial shades along one wall.

Environmental Controls

Collection Storage Area 1—Warehouse

There are no environmental controls in the warehouse storage area. Windows in the office were left open during the day and night for the duration of this assessment. Non-UV filtered fluorescent and incandescent light fixtures are present throughout the storage area.

Collection Storage Area 1—Library

Window air conditioner units are located in the main building. The unit in the library is kept at approximately 60º F to control beetles. Non-UV filtered fluorescent and incandescent light fixtures are present throughout the office area.

Pest Management

In both the main building and the warehouse, pest management precautions are taken on as-needed basis by PHRI staff. A termite infestation in the wooden walls was treated by fumigation on an unknown date.

Security

Collection Storage Area 1—Warehouse

In the warehouse, a wooden door on overhead rollers enters into the artifact storage area and is kept locked at all times. Wooden doors with key locks, also kept locked at all times, enter into the hallway and office space area. Bars cover the outside windows in the

office area and the windows were left open throughout the day and night during this assessment.

Collection Storage Area 2—Library

A jalousie window is above the interior wooden door of the library in the main building. This door has a key lock and is kept locked at all times. Only one staff person has the key. There are five exterior doors with an intrusion alarm wired into security on the back exterior door. There have been no apparent break-in attempts since two weeks after PHRI moved into the building.

Fire Detection and Suppression

Collection Storage Area 1—Warehouse

There are no fire-detection or -suppression systems in place in the warehouse.

Collection Storage Area 2—Library

A smoke detector is present in the library and fire extinguishers are present in common areas of the main building.

Artifact Storage

Storage Units

Collection Storage Area 1—Warehouse

Artifacts are stored on wall-length wood and metal shelving units (Figure 31) in the warehouse. Three wooden shelving units measure 22.63 x 90 x 72 inches (d x w x h). Each unit has four shelves and each shelf is 24 inches high. Six metal shelving units measure 29.5 x 75 x 83.5 inches (d x w x h), and have four shelves per unit. Each shelf is 27 inches high. A third kind of shelving unit is wood with a metal frame. It measures 15.5 x 88.5 x 60 inches (d x w x h). This unit has three shelves that are each 27 inches high. The tops of all of the shelving units are also used for artifact storage. Shelves are labeled with paper labels written in black marker, and have Roman numerals, unit letters, and numbers to identify collection location. Three boxes of artifacts were pulled from the shelves and placed upon tables in the large storage area for assessment.

Figure 31. Artifacts are housed in cardboard boxes, some on metal shelves.

Primary Containers

Artifacts totaling 251.20 ft³ from NAS Barbers Point were previously assessed in 1997. These boxes were accounted for during the 1999 visit, but not reassessed. An additional 67.09 ft³ were assessed during the 1999 visit and were housed in non-archival food and Bankers boxes with stapled inventory sheets inside (Table 47). The primary containers are labeled with the box number written in black marker on paper labels taped to the box.

Secondary Containers

Secondary containers consist of brown paper bags, many of which are double-bagged. The majority of the secondary containers are directly labeled in black marker. Label information consists of project, box/bag number, material class, provenience, and/or date. Tertiary containers include aluminum foil and 2-mil plastic zip-lock bags, which contain paper inserts labeled in ink with material class, provenience, project number, bag number, and investigator.

Table 47.
Percentage by Volume of Navy Artifacts Housed at PHRI, Hawaii

Material Class	Andersen AFB, Guam	MCBH Kaneohe Bay, Hawaii	NAS Barbers Point, Hawaii	NAVBASE Kaho'olawe, Hawaii	PMRF Barking Sands, Hawaii	Midway Island	Wake Island
Lithics	—	0.34	1.78	2.61	—	0.25	—
Prehistoric Ceramics	0.83	—	—	—	—	—	—
Faunal Remains	—	1.37	11.12	—	—	0.25	—
Shell (unmodified)	0.10	2.09	10.46	0.10	—	—	—
Botanical	—	0.33	—	0.82	—	—	—
Flotation	—	—	46.44	—	—	—	—
Soil	—	—	7.08	—	0.78	—	—
^{14}C	—	—	0.10	—	0.25	0.52	—
Human Skeletal Remains	—	—	—	—	—	—	—
Worked Shell	—	0.04	—	—	—	—	—
Worked Bone	—	—	—	—	—	—	—
Brick/Masonry	—	—	—	—	—	—	—
Historic Ceramics	—	—	—	—	—	—	—
Metal	—	0.34	2.52	—	—	1.30	0.18
Glass	—	—	5.05	0.85	—	0.43	1.57
Textiles	—	—	—	—	—	—	—
Other	—	—	—	0.10	—	—	—
Total	0.93	4.51	84.55	4.48	1.03	2.75	1.75

Other material classes consist of a coprolite.

Laboratory Processing and Labeling

None of the artifacts assessed during the 1999 visit had been cleaned. The majority of the artifacts were sorted by provenience and material class. Artifacts have not been directly labeled. One box from the Guam and Tinian collection contains only a paper bag with an empty tertiary container from which a ^{14}C sample had been removed for analysis in 1989. This box was not included in the cubic foot totals.

Human Skeletal Remains

No human skeletal remains from Navy facilities are housed at PHRI.

Records Storage

Collection Storage Area 2—Library

Records totaling 6.05 linear feet were previously assessed in 1997, and were housed in two Bankers boxes and four-drawer filing cabinets, as well as on bookshelves and in filing cabinets as described below. Records assessed in 1999, adding an additional 1.19 linear feet (Table 48) to the total, are housed in a variety of metal filing cabinets, some of which lock, open metal bookshelves, and cardboard map holders. The three metal bookshelves measure 13.5 x 36 x 52 inches (d x w x h) and have four shelves in each unit, and the tops of the bookshelves are also used for records storage. Fifteen three-ring binders house photographs and paper records on the bookshelves. The binders have printed adhesive labels that give the range of project numbers, and the binders are arranged according to project number. Divider sheets with paper inserts inside plastic tabs identify the project numbers and year.

One filing cabinet is an unlocked combination locking file cabinet, which is 31.75 x 19.625 x 53.625 inches (d x w x h). Within this cabinet, computer disks and slides from various

Table 48.
Linear Footage of Navy Associated Documentation Housed at PHRI, Hawaii

Facility	NAS Barbers Point Hawaii	Waiawa Floodplain Hawaii
Paper	—	0.08
Reports	—	—
Maps and Oversized Documents	0.05	—
Audiovisual	—	—
Photographs	0.76	—
Computer	0.30	—

projects are contained in drawers. Three of the four drawers have a paper insert label that is written in marker, pen, and typed with paper material class, e.g., "Slides," "Floppy Disks," or "Formatted." Secondary containers consist of hanging folders and a plastic computer disk box with a key lock, which is unlocked. There are no labels on the secondary containers in two of the drawers, but the folders in one drawer are directly labeled in marker (Figure 32).

Figure 32. Associated documentation is stored in a filing cabinet in the main building.

The other filing cabinet is a fireproof Fire King® cabinet that contains negatives and slides. This four-drawer cabinet measures 25.125 x 20.875 x 52.75 inches (d x w x h). The cabinet has paper insert labels written in pen with project numbers. Secondary containers consist of hanging file folders, a cardboard computer disk box, and a plastic computer disk box with an unlocked key lock. The cardboard box is directly labeled with project number, and the hanging file folders are directly labeled in marker with varying information.

Paper Records

Paper records comprise approximately 0.08 linear feet of the collection and include ^{14}C analysis sheets, which are kept in three three-ring binders on the metal bookshelves. Postcards stating when the ^{14}C sample arrived at the testing laboratory are stapled to the dividers in the bookshelves.

Photographs

Photographic records comprise approximately 0.76 linear feet and consist of negatives and slides. Negatives are housed in the Fire King® filing cabinet in archival plastic sleeves inside manila folders. Slides are in hanging file folders.

Maps and Oversized Documents

Maps comprise approximately 0.05 linear feet of the records collection. The map box contains twenty divided compartments for rolled maps to stand upright, and is kept on top of a metal flat file.

Computer

Computer disks of both 5.25-inch and 3.5-inch-size comprise approximately 0.30 linear feet and are housed in the two filing cabinets.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Collections are located in two separate buildings. PHRI staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

PHRI is not a permanent curation facility, and does not have a published guide to the collections.

Site-Record Administration

A site-numbering system unique to Hawaii is utilized.

Computerized Database Management

Files are not maintained on a computerized database.

Written Policies and Procedures

Minimum Standards for Acceptance

PHRI is a contracting firm, and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those objects from PHRI projects are housed at PHRI.

Curation Policy

PHRI is a contracting firm and holds collections only for analysis purposes. They are not a long-term curation repository and do not possess a comprehensive curation plan.

Records Management Policy

PHRI does not possess a records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

Collection materials remain at PHRI and are not loaned out.

Deaccessioning Policy

Because collections are not permanently curated at PHRI, there is no written deaccessioning policy.

Inventory Policy

PHRI does not have a written inventory policy.

Latest Collection Inventory

The date of the last inventory is not known.

Curation Personnel

There are no designated personnel to curate the collections; however, the laboratory director is responsible for the care and management of the collections.

Curation Funding

Curation activities are not adequately funded. Project funds are used to purchase storage supplies needed for the collections.

Access to Collections

Access to collections is limited to the laboratory staff. PHRI staff supervise any visitors.

Future Plans

PHRI has no future plans regarding curation or collections storage.

Comments

1. PHRI is not a permanent curation facility

2. Window air conditioner units are located in the main building, and there are no environmental controls in the warehouse storage area.

3. Adequate security deterrents and detection measures are present in the main building. Basic security deterrents are present in the warehouse, but no security-detection measures are installed.

4. Basic fire-detection and -suppression measures are present in the main building. No fire detection or suppression systems are in the warehouse.

5. Artifacts are housed in the warehouse in 2-mil plastic zip-lock bags and aluminum foil in brown paper bags in acidic cardboard boxes, which are stored on wood and metal shelving units.

6. The majority of the boxes are overpacked and overstacked.

7. Associated documentation is housed in the main building in manila folders, hanging folders, and plastic and cardboard computer boxes in metal filing cabinets, one of which is fireproof. Other records are in three-ring binders on metal bookshelves.

8. Negatives are stored in archival sleeves; however, a white chalky plaster substance was noted in some negative sleeves.

9. Some contaminants, such as staples, paper clips, tape, and rubber bands, are present in the collections.

10. Some insects were noted in one of the binder dividers containing photographs, and other insects were on shelves and in artifact primary containers.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival primary and secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, (d) creation of an archival duplicate copy for security.

6

Navy Region, Northwest

Region Summary

Number of Facilities with Collections: 2

Volume of Artifact Collections: 170.30 ft³
Collections Origins: NAS Whidbey Island (15.02 ft³) and NAVMAG Indian Island (155.28 ft³)

Linear Feet of Records: 3.65 linear feet
Collections Origins: NAS Whidbey Island (0.24 linear feet) and NAVMAG Indian Island (3.41 linear feet)

Volume of Human Skeletal Remains: 7.49 ft³
Collections Origins: NAVMAG Indian Island

Navy Region, Northwest is the regional coordinator for the Navy in Washington, Oregon, Idaho and Alaska. Navy Region, Northwest provides coordination of base operating support functions for operating forces throughout the region, including facilities and land space management, exercise coordination, housing, environmental compliance, security, family services, port services, air services, bachelor quarters, and logistical concerns for the Navy staff in the area (Command Navy Region Northwest 2000).

The Navy facilities and commands researched during this project include the following.

Washington
- NAS Whidbey Island
- NAVMAG Indian Island (formerly Naval Ordnance Center Detachment Port Hadlock)

Curation Assessments

Curation needs assessments conducted during the project identified approximately170.30 ft³ of artifacts, 7.49 ft³ of human skeletal remains, and 3.65 linear feet of associated documentation that were generated during archaeological projects on Navy Region, Northwest (Table 49). Collections are housed at three locations: The Burke Museum of Natural History and Culture (Chapter 6-1), Washington State University (WSU) in Pullman (Chapter 6-2), and Affinis Environmental Services, California (Chapter 7-1) (Table 50).

Table 49.
Volume of Collections from Facilities in Navy Region, Northwest

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS Whidbey Island	15.02	—	0.24
NAVMAG Indian Island	155.28	7.49	3.41
Total	170.30	7.49	3.65

Table 50.
Repositories Housing Collections from Navy Region, Northwest

Repository	Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
Affinis Environmental Services	NAS Whidbey Island	0.02	—	—
The Burke Museum of Natural History and Culture	NAS Whidbey Island	15.0	—	0.24
	NAVMAG Indian Island	1.0	—	0.04
WSU	NAVMAG Indian Island	154.28	7.49	3.37
Total		170.30	7.49	3.65

Long-Term Curation

U.S. Navy collections represent nonrenewable resources that must be properly conserved and managed so that they will continue to be available for research and public use. In order to properly maintain collections, they should be rehabilitated to meet the standards identified in 36 CFR Part 79. Additionally, a long-term curation facility should be identified that meets 36 CFR Part 79.

Rehabilitation of Collections

Collections, including artifacts, human remains, and records, from Navy facilities are scattered throughout the state of Washington. Conditions for each collection vary; however, all of the collections require some rehabilitation in order to satisfy 36 CFR Part 79. General guidelines for rehabilitating collections have been addressed in the recommendations summary section. Appropriate steps taken in anticipation of new collections can allow cultural resource managers to avoid this problem in the future.

NAGPRA and Consultation

NAS Whidbey Island and NAVMAG Indian Island have been directly effected by NAGPRA. Each base has reacted differently to NAGPRA, reflecting the individual approach each base has for managing archaeological collections.

NAVMAG Indian Island had been consulting with tribes for shell fishing prior to the enactment of NAGPRA. The consultation requirements for NAGPRA were a natural progression for Indian Island and the effected tribes. A notice in the Federal Register for the NAGPRA materials has been published. A formal claim was submitted by the federally recognized Jamestown S'Klallam. Custody of human skeletal remains and funerary objects was transferred to the Jamestown S'Klallam on February 8, 1999, as noted in a Memorandum of Agreement between Indian Island, the Jamestown S'Klallam Tribe, and the Port Gamble S'Klallam Tribe. Repatriation is ongoing, and a burial plot on Indian Island has been set aside for the burial of repatriated human remains.

Collections from NAS Whidbey Island had been housed at Seattle Central Community College and were transferred to BOAS, Inc., a contractor in Seattle. In July 1997, approximately 92 boxes of NAGPRA and non-NAGPRA items from site 45IS81 (Maylor Point) and an unknown provenience were repatriated to the Swinomish tribe, who reburied all items at the Swinomish Tribal Center prior to the publication of a notice in the Federal Register. The NAGPRA materials in the boxes included human skeletal remains (MNI=43) and 10 associated funerary objects. Only the associated documentation remains at the Swinomish Tribal Center. The Samish tribe made a claim on the materials in October 1999 after seeing the notice in the Federal Register (Notice 99-25365). The Swinomish contacted the Samish, informing them about the repatriation and requesting that they rescind their claim on the items. In a letter to NAS Whidbey Island dated January 10, 2000, the Samish said they were going to rescind their claim, but only on those items that had already been repatriated to the Swinomish; it does not affect future inadvertent discoveries. Although the two tribes have come to an agreement over this issue, NAS Whidbey Island personnel need to ensure the issue is documented and receive statements from both tribes identifying their agreement to the reburial situation. A report was never written about the items that were repatriated. The St. Louis District prepared

a NAGPRA report discussing NAS Whidbey Island collections (Halpin and Militello 1999).

Curation Partners

All of the remaining collections are being stored in permanent curation facilities such as the Burke Museum and the WSU Archaeology Collection Center. A portion of the NAVMAG Indian Island collection at WSU has been on loan to an individual for many years. The St. Louis District located the individual and assessed the collection in 1994 (Halpin and Holland 1997); however, since then WSU, Indian Island, and the Jamestown S'Kallam Tribe have been unable to locate this person.

Recommendations

Plan of Action

A comprehensive plan of action for compliance with 36 CFR Part 79 standards minimally must address five points—(1) inventory and rehabilitation of the artifact collections, (2) rehabilitation of the associated records, (3) proper long-term care of the collections and records, (4) proper management of collections, and (5) full compliance with NAGPRA.

Rehabilitation of Collections

Although most of the collection have been rehabilitated to some degree, many problems still need to be addressed, such as improperly or overpacked boxes and improper materials used for packaging. In order for collections to be properly inventoried and rehabilitated, the St. Louis District recommends using a single contractor to process the collections. Ideally, collections must be first coalesced into one suitable repository before they are inventoried, organized, and repackaged. Another less desirable option is sending a contractor to each location where collections are currently stored to rehabilitate the collections. Table 51 identifies the estimated cost for the St. Louis District to rehabilitate all collections, including artifacts, human skeletal remains, and associated documentation. Costs are based on figures determined during a different St. Louis District project (U.S. Army Corps of Engineers 2000). Minimally, the St. Louis District, or another professional collections management agency or company, should provide quality assurance and oversight for the rehabilitation process to ensure a satisfactory product. To ensure future collections are handled and rehabilitated appropriately, staff should be provided educational opportunities such as a curation and collections management workshop.

Table 51.
Rehabilitation Cost for Facilities with Collections in Navy Region, Northwest

Facility	Artifacts	Records
NAS Whidbey Island	$9,838	$470
NAVMAG Indian Island	$106,615	$6,683

NAGPRA and Consultation

NAVMAG Indian Island has closely followed NAGPRA regulations. All NAGPRA materials have been handled appropriately and consultation with the proper tribe is ongoing.

In order to ensure that NAS Whidbey Island and the Samish and Swinomish tribes are in agreement, NAS Whidbey Island staff should complete the following.

1. The Commander should meet with the tribal chairpersons of both the Samish and the Swinomish tribes so that formal government-to-government relationships are established. This meeting will also provide the Commander with the opportunity to assure the tribes that they will both be consulted in the future.

2. Steve Pennix, NAS Whidbey Island ecologist, stated that the Samish and Swinomish tribes have come to an understanding about the transfer and reburial of the NAGPRA items by the Swinomish and that no legal recourse will take place, regardless of the fact that the NAGPRA process for repatriating items was initally misinterpreted. NAS Whidbey needs to make sure it has documentation to that effect. NAS Whidbey Island should send a letter, which outlines what the base perceives to have happened and the resolution of the issue, to both tribal chairpersons. A letter of response, signed by the tribal chairpersons should be requested from each tribe stating whether they agree or disagree with the resolution described in the NAS Whidbey Island letter.

3. NAS Whidbey Island should request a letter from the Samish tribe stating that they are going to withdraw their claim to those NAGPRA items that have already been repatriated to and reburied by the Swinomish tribe in order to ensure that a claim cannot be made at a future date.

4. All letters must be from the NAS Whidbey Island Commander to the tribal chairperson. The final resolution needs to be signed by all parties.

Curation Partners

In comparison to other regions, the Navy Region, Northwest collections are relatively small. The Burke Museum is the recommended repository for western Washington State. The only known remaining NAS Whidbey Island collections are already housed at the Burke Museum. Any future collections should be transferred to the Burke. The curation fees at the Burke Museum are currently a one time fee of $200 to $400 per box, then $75 annually.

Collections from NAVMAG Indian Island are all at WSU; however, staff at WSU have said they would like the collections to be removed from their repository because the Indian Island Northwest Coast collections do not fall under WSU's focus of the Interior Plateau of Washington. WSU currently charges $500/year for the 118 boxes of Indian Island collections. However, due to the strong interest in the faunal remains and tools, WSU would like the collections to be officially returned to the Navy, but kept on loan indefinitely at WSU so they can continue to be researched by students. The St. Louis District recommends returning control of the collections to the Navy, but keeping then on loan to WSU for research.

Management of Collections

The management of collections for each base has been the responsibility of the individual bases. No overall management plan has been established. Because of this, the management has been inconsistent. For the current collections and any new collections that are generated, Navy Region, Northwest should ensure the adequate maintenance of collections for long-term storage in the following manner.

1. The cultural resource manager must have an adequate understanding of 36 CFR Part 79.

2. Persons responsible for cultural resources should be provided a written collection management manual outlining their responsibilities and the responsibilities of the curation facility.

   a. The cultural resource manager must ensure budgetary requirements for proper care and management of collections is met.

   b. The cultural resource manager must oversee the appropriate handling of any NAGPRA items (see NAGPRA discussion).

   c. The cultural resource manager must keep all documentation regarding the management of collections (i.e., curation agreements, initial and subsequent collections inventories, collection and repository inspection reports, annual collection update reports, and any other related documents).

   d. The cultural resource manager must ensure that the curation facility is following 36 CFR Part 79 by requiring an annual report and by ensuring periodic, professional inspections of the collections and the facility.

      (1) An annual report written by the curation facility should include the status of the collection (current condition, any conservation treatments, progress of any on-going processing or rehabilitating); any use of the collection, including names and purposes of individuals given access; citations from any documents resulting from use of collections; outgoing and returned loans; problems; any physical changes within the facility; or any policy changes that may effect the collections.

      (2) An on-site inspection of the collection by professional collections managers should be conducted annually to assure maintenance of management standards. Random collection location checks should be included as part of these annual inspections.

(3) A physical inspection of the curation facility by professional collections managers should be conducted annually to assure continued observance of long-term curation standards.

3. Establish guidelines that address the following aspects of collections management or include references to *Guidelines for the Field Collection of Archaeological Materials and Standard Operating Procedures for Curating Department of Defense Archaeological Collections*.

a. Initial preparation of materials, including a condition assessment, a complete inventory, and planned activities.

b. Appropriate written policies and procedures of the repository for collections management (i.e., loan/access policies, handling and storage, conservation assessment, qualified staff, appropriate internal access, and duplication and safety of original records.

c. Appropriate written policies and procedures of the repository for the management of the facility housing the collections (i.e., physical security, meeting local codes, intrusion and fire detection and suppression systems, adequate environmental controls, pest management, emergency preparedness plan, and special collections safety).

4. Allow access to qualified researchers.

6-1

The Burke Museum of Natural History and Culture

University of Washington
Seattle, Washington

Repository Summary

Volume of Artifacts: 16.0 ft³

Collection Origin: NAS Whidbey Island, Washington (15.0 ft³), and NAVMAG Indian Island (1.0 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.28 linear feet

Collection Origin: NAS Whidbey Island, Washington (0.24 linear feet), and NAVMAG Indian Island, Washington (0.04 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: February 4, 2000

Person Contacted: Laura Phillips, Archaeology Collections Manager

The Burke Museum of Natural History and Culture (Burke) houses approximately 16.0 ft³ of artifacts and 0.28 linear feet of Navy associated documentation from projects conducted on NAS Whidbey Island and NAVMAG Indian Island, both in Washington (Table 52). The St. Louis District previously evaluated Navy collections at the Burke in September 1994, December 1995, and November 1996 for different projects (Halpin and Holland 1997; Shingleton and Yu 1999; U.S. Army Corps of Engineers 1999b). Some of the repository information has not changed since those visits and will be repeated for this chapter; any changes to the repository and storage conditions are provided herein.

Table 52.
Volume of Navy Archaeological Collections Housed at the Burke Museum

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS Whidbey Island, Washington	15.0	—	0.24
NAVMAG Indian Island, Washington	1.0	—	0.04
Total	16.0	—	0.28

Assessment

The Burke Museum moved to its present location on the University of Washington, Seattle, campus in 1962 (Figure 33). The museum was built that year, and has space for gallery and exhibit areas, laboratories for each section (e.g., archaeology, ethnology, geology, and zoology), office space, collections storage areas, and classrooms. Consisting

Figure 33. The Burke Museum is located on the University of Washington campus.

of two above-ground stories and a basement, the museum occupies 77,000 ft², approximately 16,000 ft² of which is used for exhibitions and 7,000 ft² is used for collections storage. The archaeology laboratory and storage space are located in the basement. Navy collections are located in three areas of the museum. Associated documents were recently moved out of a space occupied by artifacts and are being temporarily housed in the former curator's office, Room 30. Navy artifacts are housed in the hallway and a separate storage room, Room 33.

Structural Adequacy

The museum structure is constructed of concrete with brick veneer. The roof was replaced in 1984 and is composed of a tar membrane floating system covered with concrete tiles. The building, including the basement archaeology section, was renovated in 1991. Twenty-two foot ceilings in the upper levels allow for mezzanine levels to be added if necessary. Floors in the upper levels consist of terrazzo and hardwood and the basement floor is poured concrete. Interior walls are concrete cinder blocks and poured concrete.

Environmental Controls

The building has a hot/chilled water forced air system with zoning and temperature controls. The HVAC system was upgraded in 1991; however, humidity is not controlled in the building. Humidity levels in the basement are relatively stable at 50% relative humidity. Fluorescent lighting has been upgraded recently to include UV filters.

Pest Management

No formal integrated pest-management plan has been drafted but Ms. Phillips said they are working on developing one. The collections managers and the facility manager regularly inspect the collections.

Security

The museum has motion detectors, and intrusion alarms are present on ground-level windows, all exterior doors, and some interior doors, including doors to the artifact collections storage rooms. Alarms are wired to campus police and a private security company. Museum policies include keeping windows closed and locked at all times. Receptionists control access to the museum and archaeology section. Visitors must sign in at the reception desk and are required to wear visitor tags that expire in eight hours. Employees are required to wear photographic identification badges. A staff escort is required at all times with visitors in non-public areas. A limited number of staff members have keys to the archaeological collections areas. Collections cabinets are kept locked with limited access to keys.

Fire Detection and Suppression

A wet-pipe, zoned sprinkler system and fire extinguishers are located throughout the repository. Manual fire alarms, heat sensors, and smoke detectors are wired to the fire department, a contracted security company, and the university. The fire-detection and -suppression system was included in the 1991 renovations.

Artifact Storage

Artifacts totaling approximately 16.0 ft³ (Table 53) are housed in two areas of the basement archaeology section, the hallway and Room 33.

Storage Units

Collection Storage Area 1—Room 33

Storage units for the Coale collection from NAVMAG Indian Island and the Bryan artifact from NAS Whidbey Island are housed in steel Delta Designs® cabinets in Room 33, similarly to how they were stored during the September 1994 visit. The Delta Designs® cabinets have adjustable drawers and locking doors (Figure 34). The cabinets are labeled with typed, acid-free paper cards inserted into built-in metal frames and covered with clear plastic.

Table 53.
Percentage by Volume of Navy Artifacts Housed at the Burke Museum

Material Class	NAS Whidbey Island, Washington	NAVMAG Indian Island, Washington
Lithics	1.9	3.1
Prehistoric Ceramics	—	—
Faunal Remains	1.9	3.1
Shell (unmodified)	0.9	—
Botanical	—	—
Flotation	—	—
Soil	87.2	—
^{14}C	—	—
Human Skeletal Remains	—	—
Worked Shell	—	—
Worked Bone	1.9	—
Brick/Masonry	—	—
Historic Ceramics	—	—
Metal	—	—
Glass	—	—
Textiles	—	—
Other	—	—
Total	93.8	6.2

Collection Storage Area 2—Hallway

The Stein collection, which was housed on an open metal shelving unit and a cabinet during the September 1994 visit, from NAS Whidbey Island is located in a locked metal cabinet in the basement hallway.

Primary Containers

Collection Storage Area 1—Room 33

Primary containers for artifacts housed in the Delta Designs® cabinets consist of sliding, metal drawers. Each drawer is lined with polyethylene foam and labeled with an adhesive drawer number.

Figure 34. Some Whidbey Island artifacts are housed in a storage cabinet.

Collection Storage Area 2—Hallway

Primary containers for artifacts housed in the hallway consist of acid-free folded boxes with telescoping lids.

Secondary Containers

Collection Storage Area 1—Room 33

The Coale collection in the Delta Designs® cabinet is now housed in 4-mil plastic zip-lock bags; this collection was in a torn paper bag during the September 1994 visit. The Bryan artifact, in the Delta Designs® cabinet, is also in a 4-mil plastic zip-lock bag with a pre-printed adhesive label identifying site and catalog numbers.

Collection Storage Area 2—Hallway

In the hallway cabinets, the Stein collection is contained in 1- or 2-mil plastic zip-lock bags, small acidic boxes, and 4-mil plastic zip-lock bags with adhesive labels marked in indelible ink.

Laboratory Processing and Labeling

Within the Coale collection, only one artifact has been cleaned and labeled. Some of the larger artifacts in the Stein collection have been labeled,

and washable materials have been cleaned. The Bryan artifact has been cleaned and labeled with indelible ink.

Human Skeletal Remains

No human skeletal remains from Navy facilities are housed at the Burke Museum.

Records Storage

Collection Storage Area 3—Room 30

Records totaling 0.28 linear feet (Table 54) have been moved from the artifact storage room, where they were housed in the boxes with the artifacts in 1994, to the former curator's office, Room 30, for temporary storage. The associated documents are housed in acid-free boxes on wooden shelving (Figure 35). Some of the records are in manila and accordion folders, and some are in acid-free folders labeled with an adhesive typed paper label.

Paper Records

Paper records totaling 0.20 linear feet include field notes, reports, maps, and accession numbers.

Photographic Records

Photographic records comprise approximately 0.08 linear feet of color prints and black-and-white enlarged prints. Half of the photographs are in commercial processing sleeves and half are in neutral envelopes. Negatives are in different boxes.

Table 54.
Linear Footage of Navy Associated Documentation Housed at the Burke Musuem

Materials	NAS Whidbey Island, Washington	NAVMAG Indian Island, Washington
Paper	0.08	0.04
Reports	0.08	—
Maps and Oversized Documents	—	—
Audiovisual	—	—
Photographs	0.08	—
Computer	—	—

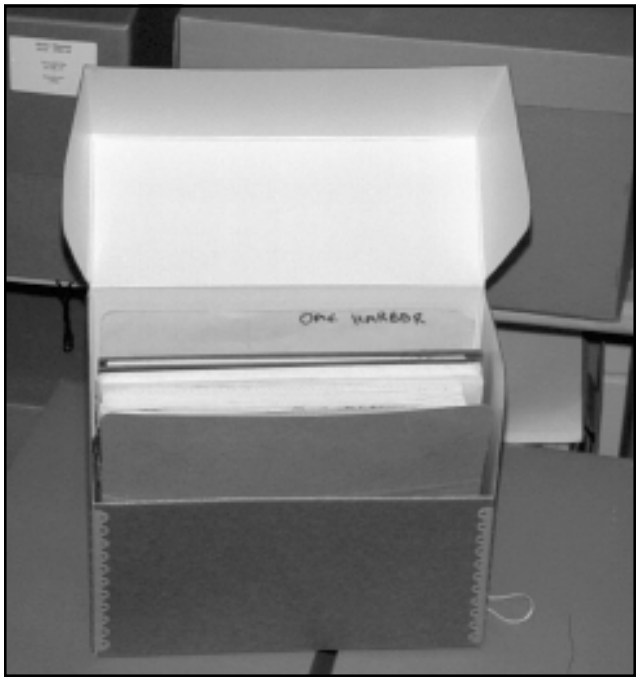

Figure 35. Records are housed in an archival document box.

Collections Management Standards

Registration Procedures

Accession Files

All collections acquired since 1991 have been accessioned. Not all collections acquired prior to 1991 have been systematically accessioned.

Location Identification

The physical location of the collections is identified in the accession records.

Cross-Indexed Files

Files are cross-indexed in a computer system by accession number, site number, and constituent; however, Navy collections are not currently in the system.

Published Guide to Collections

No complete guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is used where applicable.

Computerized Database Management

Collections are managed using a new Argus database program. The Argus program also contains NAGPRA information. The Burke hopes to put the database on the internet to be used with restricted access.

Written Policies and Procedures

Minimum Standards for Acceptance

Archaeological materials must be regional, and archaeological materials from the Pacific Rim are the focus of the museum's collections. Acceptance of archaeological collections is at the discretion of the curator.

Curation Policy

The museum's written *Burke Museum Archaeology Collections Storage and Curation Guidelines* (The Burke Museum of Natural History and Culture 1999) were updated in May 1999.

Records Management Policy

Records management is briefly discussed in the May 1999 updated *Burke Museum Archaeology Collections Storage and Curation Guidelines* (The Burke Museum of Natural History and Culture 1999).

Field Curation Procedures

No written field curation guidelines have been produced.

Loan Policy

Outgoing loans must be approved by the division head. When accepting loans the materials must be approved by the museum director and the executive committee.

Deaccessioning Policy

Deaccessions must be approved by the division curator, the museum director, and the museum's executive committee.

Inventory Policy

The museum does not have a written inventory policy.

Latest Collection Inventory

A comprehensive collections inventory has never been completed. However, a collections summary, required by NAGPRA, has been completed.

Curation Personnel

Laura Phillips is the archaeology collections manager. A new curator has been hired but had not taken office at the time of this assessment.

Curation Financing

Current funds are obtained from a small budgeted museum fund, grants, and a small endowment fund.

Access to Collections

Access to collections must be approved by the section curator or the archaeology collections manager at the time of the assessment. Supervision of staff is required.

Future Plans

Staff members are working on an Integrated Pest Management Plan, have revised an emergency/disaster-preparedness plan, completed and revised a curation policy, and written a new policy requiring researchers to help curate the artifacts by rehabilitating collections into archival containers with new labels. Asbestos has been identified in the steam pipe insulation and a program to correct this is scheduled in future renovations. A moving track space saver shelving unit will be installed in Room 31 and will be used as the archives. Finally, the Burke Museum is assessing plans of building a new museum.

Comments

1. The Burke is a permanent curation facility.

2. The Burke took seriously the suggestions made by the St. Louis District after the assessment in September 1994 (Halpin and Holland 1997), and implemented some of the changes.

3. The building has an HVAC system to control temperature; however, there is no means for humidity control.

4. Fluorescent lights are equipped with UV filters.

5. Currently there is no formal integrated pest management program, but Burke staff are working to implement one. There are standards in place to monitor and control insects.

6. Excellent security-deterrents and -detection systems are present in the building.

7. Excellent fire-detection and -suppression systems are installed in the building.

8. Some artifacts are housed in 4-mil plastic zip-lock bags in the metal drawers of a Delta Designs® cabinet. Other artifacts are housed in 1-, 2-, or 4-mil plastic zip-lock bag and small acidic boxes in acid-free boxes in a locked metal cabinet.

9. Collections have not been uniformly processed and labeled.

10. Records are housed in acid-free, manila, and accordion folders in acid-free boxes on wooden shelves in Room 30.

11. Contaminants, such as staples, paper clips, and tape, are present in the associated documentation.

12. Approximately one-third of the associated documentation at the Burke have been duplicated for security and stored in another room; however, Navy records are not in that one-third. Computer back-up files are stored off-site.

13. Navy collections have not been accessioned by the Burke because the museum cannot accession federal collections since they do not own them.

Recommendations

1. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) creation of an archival duplicate copy for security.

3. Remove contaminants from collections.

4. Install humidity monitoring devices and ensure that humidity levels are maintained.

5. Implement an integrated pest management program.

6-2

Washington State University

Pullman, Washington

Repository Summary

Volume of Artifacts: 154.28 ft³

Collection Origin: NAVMAG Indian Island, Washington

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 3.37 linear feet

Collection Origin: NAVMAG Indian Island, Washington

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 7.49 ft³

Collection Origin: NAVMAG Indian Island, Washington

Compliance Status: Human remains require compliance with NAGPRA. Currently Washington State University students are examining the collections for NAGPRA items.

Collection Update: On September 27, 2000, the human skeletal remains and funerary objects were repatriated to the Skallam tribe, who reburied them.

Date of Visit: February 7, 2000

Person Contacted: Dr. Mary Collins, Assistant Director

Washington State University (WSU) houses approximately 161.77 ft³ of artifacts and human skeletal remains and 3.37 linear feet of associated documentation from projects conducted on NAVMAG Indian Island, Washington (Table 55). The St. Louis District previously evaluated collections at WSU in December 1995 (Shingleton and Yu 1999) and evaluated Navy collections in November 1996 (U.S. Army Corps of Engineers 1999b) for different projects. Most of the repository information has not changed since those visits and will be repeated for this chapter.

Table 55.
Volume of Navy Archaeological Collections Housed at WSU

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVMAG Indian Island, Washington	154.28	7.49	3.37
Total	154.28	7.49	3.37

Assessment

The Anthropology Department at WSU occupies two buildings, College Hall and the anthropology storage building. College Hall is a campus building that includes classrooms, offices, laboratories, and the Museum of Anthropology. Constructed in 1909,

College Hall has three floors above ground and one below, with over 40,000 ft² for anthropology use (Figure 36). At the time of the assessment, artifacts were being analyzed in Rooms 104 and 105 in College Hall. Records are housed in Room 114 of College Hall. The one-story anthropology storage building is 4,200 ft² and was built in 1983 specifically for storage of collections (Figure 37). The building is separated into two large rooms.

Figure 36. Associated documentation and artifacts being analyzed are housed in College Hall.

Figure 37. The majority of the artifacts are housed in the anthropology storage building.

Structural Adequacy

Repository 1—College Hall

The College Hall building has a concrete foundation and brick exterior walls. The roof is composed of a single-ply membrane system that was renovated in 1983. College Hall has multiple exterior doors with key locks and locked windows with shades covering the windows.

Collection Storage Areas 1 and 2—Room 104 and Room 105

The 200 ft² Room 104 and 300 ft² Room 105 serve as laboratories and are nearly identical in configuration, including windows and doors that enter into the hallway with a doorway separating the two rooms. Interior walls are drywall and plaster.

Collection Storage Area 3—Room 114

Room 114 in College Hall is approximately 150 ft² and has two windows and a door that opens into the hallway. Interior walls are drywall and plaster.

Repository 2—Anthropology Storage Building

The anthropology storage building has a concrete foundation and corrugated metal siding exterior walls, which are uncovered in the building's interior. The flat roof is also corrugated metal with fiberglass insulation. The building has no windows, but has an exterior metal door on one side and a large overhead door at one end. An interior door, which is kept locked, separates the two rooms.

Environmental Controls

Repository 1—College Hall

Collection Storage Areas 1, 2, and 3—Room 104, Room 105, and Room 114

A climate-controlled system is in use in College Hall and for sensitive collections storage for textiles and similar artifacts. Air circulation systems have dust filters. Fluorescent lighting in the building does not have ultraviolet filters.

Repository 2—Anthropology Storage Building

The anthropology storage building has an overhead natural gas heating system is in one room, and the other room is unheated. Neither room is equipped with air conditioning. The building is lit with non-UV filtered fluorescent lights.

Pest Management

An integrated pest-management program, which includes monitoring by use of sticky traps and rodent traps, and controlling on an as-needed basis, is in place in both College Hall and the anthropology storage building.

Security

Repository 1—College Hall

Collection Storage Areas 1, 2, and 3—Room 104, Room 105, and Room 114

Security measures in College Hall include key locks on exterior and interior doors, and dead-bolt locks on some interior doors. Rooms are kept locked when not in use, and windows are locked. College Hall has an intrusion alarm system wired to campus police, who also patrol the area. A new security system wired to the police and fire stations was installed in 1999 in both College Hall and the anthropology storage building. Access to both buildings is limited and strictly enforced.

Repository 2—Anthropology Storage Building

Surrounding the anthropology storage building is a chain link fence with a side gate and a large double gate at one end. The fence is topped with three strands of barbed wire. Padlocks are on each gate and are kept locked at all times when the building is not in use.

Fire Detection and Suppression

Repository 1—College Hall

Collection Storage Areas 1, 2, and 3—Room 104, Room 105, and Room 114

In College Hall, manual fire alarms are wired to the local fire department. Heat sensors are located in the third-floor stairwells, and smoke detectors are present throughout the building. Halon fire extinguishers are present in the museum and sensitive collections storage area. No suppression measures are present in Room 114, which is used to house records.

Repository 2—Anthropology Storage Building

The anthropology storage building has a manual fire alarm wired to the local fire department. One fire extinguisher is in the collections storage area.

Artifact Storage

Artifacts totaling 154.28 ft³ are housed in College Hall and the anthropology storage building (Table 56). At the time of the assessment, approximately 18.0 ft³ were being analyzed in Rooms 104 and 105 of College Hall. The remaining 136.28 ft³ of artifacts are housed in the anthropology storage building.

Table 56.
Percentage by Volume of Navy Artifacts Housed at WSU

Material Class	NAVMAG Indian Island, Washington
Lithics	1.80
Prehistoric Ceramics	—
Faunal Remains	16.60
Shell (unmodified)	54.80
Botanical	0.20
Flotation	—
Soil	1.20
^{14}C	0.50
Human Skeletal Remains	4.70
Worked Shell	0.80
Worked Bone	3.90
Brick/Masonry	0.20
Historic Ceramics	1.10
Metal	5.40
Glass	6.20
Textiles	—
Other	2.60
Total	100

Other material classes include wood, buttons, bakelite, coin, and leather.

Storage Units

Repository 1—College Hall

Collection Storage Areas 1 and 2—Room 104 and Room 105

In Rooms 104 and 105 of College Hall, collections are housed on the floor or on tables.

Repository 2—Anthropology Storage Building

Collections in the anthropology storage building are housed on two metal non-movable open shelving units. Each unit measures 83.5 x 36 x 204 inches (d x w x h) and has three shelves.

Primary Containers

Repository 1—College Hall

Collection Storage Areas 1 and 2—Room 104 and Room 105

During the assessment, faunal material from the NAVMAG Indian Island archaeological collections were being analyzed in Rooms 104 and 105 of College Hall. This material is in various stages of analysis, some of which is on a fiberglass tray for sorting. Other collections are stored on the floor in three temporary lidless acidic folded boxes that measure 15.5 x 12.5 x 10 inches (d x w x h). There are no labels on the boxes. In Room 105, 14 acidic boxes have telescoping lids and measure 15.25 x 12 x 10 inches (d x w x h). The boxes are directly labeled in marker from previous collections. Post-it® notes on the boxes identify the box numbers from the Indian Island collections.

Repository 2—Anthropology Storage Building

In the anthropology storage building, primary containers consist of 113 acidic folded boxes with telescoping lids measuring 15.5 x 12 x 10.25 inches (d x w x h). Primary containers have taped paper labels that identify site number, provenience, and box number in marker. “Wa State Archives” is pre-printed on the sides of each box. There is an occasional note in the primary container indicating artifacts that have been removed for further study, and in some instances, returned. All boxes have an acidic inventory sheet identifying, in code, the artifacts contained within. One “peel” is represented and is lying on top of several boxes of Indian Island collections. The peel is a mixture of soil and shell fragments adhering to cloth mesh, which is mounted on a plywood board that measures 48 x 24 x 0.25 inches (d x w x h). The board has two knotted strings for hanging purposes and is not labeled.

Secondary Containers

Secondary containers consist of 4-mil plastic zip-lock bags that are directly labeled in marker. Information on the labels includes the site number and provenience, and in some instances, number of items, weight, inventory number, investigator, and/or site name. Some of the secondary containers have various tertiary containers, including plastic zip-lock bags of various sizes and thickness, a clear plastic vial, brown paper bags, aluminum foil, Styrofoam plates taped with masking tape, and small cardboard boxes that measure 1.0 x 1.0 x 0.5 inches (d x w x h). Ethafoam® is placed around some glass, shell, and bone artifacts, and white cotton has been placed around some shell artifacts. Some of the tertiary containers have been directly labeled in marker, and some secondary containers have 3” x 5” paper labels inserts.

Laboratory Processing and Labeling

The majority of the artifacts have been cleaned and sorted by provenience and material class. A small percentage of faunal artifacts have been directly labeled in white or black ink, sometimes on a white base coat or covered with a clear top coat.

Human Skeletal Remains

Repository 2—Anthropology Storage Building

Approximately 7.49 ft^3 of human skeletal remains and wooden coffin fragments from Navy land were curated in three of the 113 boxes in the anthropology storage building. Approximately 20% of the remains were loosely wrapped in Ethafoam® and secured by rubber bands. The rubber bands were removed and replaced with white cotton string by Dr. Collins during the assessment. The Ethafoam®-wrapped remains were contained in open plastic 4-mil zip-lock bags. Approximately 80% of the human remains were wrapped in Ethafoam® and contained in acidic boxes with telescoping lids.

Preservation of the human remains appears to be good and their present condition is good. The remains have been cleaned and sorted according to provenience. The remains have not been directly labeled, and two or possibly three, individuals are

represented. The report for one of the burials states it is not an actual burial but an association of three bones and surface fragments (Haversat 1977:18). The human remains are considered to be historic Native American and one is possibly 300 years old (Onat 1977:6). Approximately 2% (0.15 ft^3) of the collection consists of wood fragments, identified as coffin or cedar plank fragments, which are contained in a plastic 4-mil zip-lock bag.

A human tooth in good condition was also noted in one box of artifacts from 45JE16, but the tooth has not been determined to be from the two burials that are from 45JE16.

Records Storage

Repository 1—College Hall

Collection Storage Area 3—Room 114

Associated documentation totaling 3.37 linear feet is housed in Room 114 in College Hall and was inventoried by the anthropology staff in 1992 (Table 57). Navy associated documentation is housed in two metal four-drawer filing cabinets and a three-drawer metal map case (Figure 38). The filing cabinets measure 52 x 28.5 x 15 inches (d x w x h), and are labeled with the county name on laser-printed acidic paper labels (Figure 39). The map case measures 11.75 x 26 x 42 inches (d x w x h), and the drawer holding Navy maps is labeled with a paper insert in a metal frame with typed site numbers.

Table 57.
Linear Footage of Navy Associated Documentation Housed at WSU

Materials	NAVMAG Indian Island, Washington
Paper	0.04
Reports	2.67
Maps and Oversized Documents	0.25
Audiovisual	—
Photographs	0.28
Computer	0.13

Paper records and photographs are housed in acidic manila folders and plastic bags (holding artifact cards) within green hanging folders. The hanging folders are labeled with a paper insert in a plastic tab in marker, pen, pencil, or typed information.

Figure 38. Artifacts are housed in cardboard boxes on metal shelving units in the anthropology storage building.

Figure 39. Some associated documentation is housed in metal filing cabinets in College Hall.

Paper Records

The paper records comprise approximately 2.92 linear feet of the collection, and include administrative, background, survey, and excavation documents, reports, and inventory lists.

Photographs

Photographs consist of 0.28 linear feet of color prints, black-and-white prints, negatives, contact sheets, photograph logs, and an unknown amount of x-ray prints. There is a description in an inventory report of some of the negatives and contact sheets. Some of the contact sheets and negatives are in archival and glassine sleeves. Color prints are grouped in archival sleeves, whereas black-and-white prints are in photograph processing envelopes.

Maps and Oversized Documents

Maps consist of approximately 0.04 linear feet of the collection. One oversized map is folded. In the drawer, maps are separated by acidic heavy-duty manila-like sheets, which are directly labeled in pencil with the site number labeled "other Indian Island."

Computer

There are seven 3.5-inch computer disks measuring 0.13 linear feet. They are housed with the paper records.

Collections Management Standards

Registration Procedures

Accession Files

Collections have not been accessioned for a number of years. WSU has collected very little since the establishment of the Center for Northwest Anthropology.

Location Identification

The physical location of the collections is identified in the accession records.

Cross-Indexed Files

Files in some collections are cross indexed by accession number and site number.

Published Guide to Collections

No complete guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

Collections are managed using the Paradox database program.

Written Policies and Procedures

Minimum Standards for Acceptance

Archaeological materials must be regional; archaeological materials from the Interior Plateau are the focus of the museum's collections.

Curation Policy

There is no formal curation policy in place that addresses the receipt, processing, and use of materials.

Records Management Policy

There is no formal records management policy addressing guidelines and standards for the curation of documentation.

Field Curation Procedures

No written field curation guidelines have been produced.

Loan Policy

There are formal loan policies and procedures applying to archaeological materials.

Deaccessioning Policy

A formal deaccessioning policy is in place.

Inventory Policy

There is no formal inventory policy.

Latest Collection Inventory

Navy artifacts and associated documentation were inventoried in 1992.

Curation Personnel

Dr. Mary Collins is the director of the museum and a professor at WSU.

Curation Financing

Curation is financed primarily by funds from university operating budgets. NAVMAG Indian Island pays $500/year for curating an estimated 118 ft^3. Special university funds built the repository, and the university provides salaries, maintenance, and minor capital improvements. Curation agreements are the future mechanism for upgrading collections and repositories.

Access to Collections

Access to collections is controlled by the director and curator and is usually limited to staff and graduate students. Supervision is required.

Future Plans

The staff have contracted the Center for Northwest Anthropology to complete inventories and rebag collections, and are striving for curation agreements with state and federal agencies for the rehabilitation of collections and upgrading of storage locations.

Comments

1. WSU is a permanent curation facility; however, they do not wish to keep the Navy collections because the Indian Island Northwest Coast collections do not fall under WSU's focus of the Interior Plateau of Washington. Due to the strong interest in the faunal remains and tools, Dr. Collins would like the collections to be officially returned to the Navy, but kept on loan indefinitely at WSU so they can continue to be researched by students.

2. A climate-controlled system in use in College Hall, and the anthropology storage building has an overhead natural gas heating system is in one room, and the other room is unheated. Neither room is equipped with air conditioning.

3. An integrated pest management plan is in place for both College Hall and the anthropology storage building.

4. Excellent security-detection measures and deterrents are present in both College Hall and the anthropology storage building.

5. Excellent fire-detection devices are installed in College Hall, and fire suppression systems are adequate. The anthropology storage building has basic fire-detection and -suppression measures in place.

6. Artifacts are housed in tertiary containers consisting of plastic zip-lock bags, a clear plastic vial, brown paper bags, aluminum foil, Styrofoam plates, and small cardboard boxes. The tertiary containers are in secondary containers consisting of plastic 4-mil zip-lock bags, which are in acidic and archival boxes and fiberglass trays. Collections are housed on the floor or on tables in Rooms 104 and 105 of College Hall, where they are being analyzed, and on metal shelving units in the anthropology storage building.

7. Collections have not been uniformly processed and labeled.

8. The majority of the primary containers are overpacked.

9. Records are housed in manila folders and plastic bags in hanging file folders in filing cabinets and map cases. They are very organized and extremely easy to review.

10. Some contact sheets, negatives, and color photographs are in archival sleeves, but black and white prints are in commercial processing envelopes.

11. Some contaminants, such as staples, paper clips, and tape, are present in the records collections.

12. Human skeletal remains are present in the collection. A repatriation list does not match the NAGPRA inventory for NAVMAG Indian Island (Andrefsky et al. 1995). The human tooth from 45JE16 needs to be examined and brought into compliance with NAGPRA.

13. The Center for Northwest Anthropology was contracted to rebag and inventory collections.

Recommendations

1. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival primary and secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) creation of an archival duplicate copy for security.

3. Remove contaminants from collections.

4. Install air conditioning in the anthropology storage building, and ensure that both rooms are equipped with heat.

5. Install humidity monitoring devices and ensure that humidity levels are maintained.

6. Ensure that fluorescent lights are equipped with non-UV filters.

7. Additional fire suppression systems, such as additional fire extinguishers and a sprinkler/suppression system, should be installed in both buildings. Additional fire detection devices, such as smoke detectors and heat sensors wired to the fire department, should be installed in the anthropology storage building.

8. Create and implement the policies and guidelines as noted above if they are not currently in place.

9. All human remains and associated objects need to be examined and brought into compliance with NAGPRA.

7

Navy Region, Southwest

Region Summary

Number of Facilities with Collections: 9

Volume of Artifact Collections: 1,489.77 ft³
Collections Origins: Admiral Baker Field (22.28 ft³); NAS North Island (926.44 ft³); NAVSTA San Diego (5.75 ft³); NAVSUBASE Point Loma (452.0 ft³); NWS Seal Beach (Fallbrook Detachment) (12.08 ft³); NWS Seal Beach (Concord Detachment) (70.07 ft³); Salton Sea Test Base (1.15 ft³)

Linear Feet of Records: 130.50 linear feet
Collections Origins: Admiral Baker Field (3.95 linear feet); NAS North Island (116.32 linear feet); Naval OLF Imperial Beach (0.06 linear feet); NAVSTA San Diego (0.15 linear feet); NAVSUBASE Point Loma (8.31 linear feet); NAVSUBASE San Diego (0.19 linear feet); NWS Seal Beach (Fallbrook Detachment) (1.02 linear feet); Salton Sea Test Base (0.50 linear feet)

Volume of Human Skeletal Remains: 77.11 ft³
Collections Origins: NAS North Island (77.10 ft³); NAVSUBASE Point Loma (0.01 ft³)

Navy Region, Southwest was formerly known as Naval Base San Diego, and was established in 1919 at NAS North Island. It moved to its current location in 1922, when Naval Supply Center buildings at the foot of Broadway Street on Harbor Drive were completed. Navy Region, Southwest played a major role in World War II, Korea, Vietnam, and Cold War commitments, when fleet support activities under Commander Naval Base San Diego remained at a very high level. In 1999 the command was officially renamed Commander Navy Region, Southwest. As the regional coordinator for the Navy in California, Arizona, and Nevada, Navy Region, Southwest provides coordination of base operating support functions for operating forces throughout the region, including housing, environmental compliance, security, family services, port services, air services, bachelor quarters, supply, medical, and logistical concerns for the Navy staff in the area (Commander Navy Region, Southwest 2001).

The Navy facilities and command researched during this project include the following.

- Admiral Baker Field
- Construction Battalion Center Port Hueneme
- La Posta Astrophysical Observatory
- NAF El Centro
- NAS Lemoore
- NAS Miramar
- NAS North Island
- NAWS Point Mugu
- Naval Amphibious Base Coronado
- Naval Amphibious Base San Diego
- Naval OLF Imperial Beach
- Naval Radio Receiving Facility, Imperial Beach
- NRTF Chollas Heights
- NAVSTA San Diego
- NTC San Diego
- NWAC Corona
- NWS Seal Beach (Fallbrook Detachment)

NWS Seal Beach (Concord Detachment)
Point Loma Naval Complex
NAVSUBASE Point Loma (formerly NAVSUBASE San Diego)
FISC Point Loma
FCTC Point Loma
NAVCOM COSC
Salton Sea Test Base

NAS Fallon, Nevada, is also a part of Navy Region, Southwest; however, it was not included in this study. Collections from NAS Fallon had been previously assessed for a project for EFA West and EFA Northwest before the Navy's regional reorganization (Halpin and Holland 1997).

Curation Assessments

Curation needs assessments conducted during the project identified approximately 1,489.77 ft³ of artifacts, 77.11 ft³ of human skeletal remains, and 130.5 linear feet of associated documentation that were generated during archaeological projects on Navy Region, Southwest facilities (Table 58). Collections are housed at 17 locations: ASM Affiliates (Chapter 7-2); CSU Fullerton (Chapter 7-3); CSU Northridge (Chapter 7-4); Fort Guijarros Museum Foundation (Chapter 7-5); Fowler Museum of Cultural History (Chapter 7-6); Gallegos and Associates (Chapter 7-7); KEA Environmental (Chapter 7-8); Natural History Museum of Los Angeles County (Chapter 7-9); NAS North Island (Chapter 7-10); RMW Paleo Associates (Chapter 7-11); San Diego Archaeological Center (Chapter 7-12); San Diego Museum of Man (Chapter 7-13); San Diego State University (Chapter 7-14); SWDIVNAVFACENGCOM (Chapter 7-15); Southwest Museum (Chapter 7-16); University of California, Santa Barbara (Chapter 7-17); and William Manley and Associates (Table 59).

Table 58.
Volume of Collections from Facilities in Navy Region, Southwest

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
Admiral Baker Field	22.28	—	3.95
NAS North Island	926.44	77.10	116.32
Naval OLF Imperial Beach	—	—	0.06
NAVSTA San Diego	5.75	—	0.15
NAVSUBASE Point Loma	452.0	0.01	8.31
NAVSUBASE San Diego	—	—	0.19
NWS Fallbrook	12.08	—	1.02
NWS Seal Beach	70.07	—	—
Salton Sea Test Base	1.15	—	0.50
Total	1,489.77	77.11	130.50

Long-Term Curation

U.S. Navy collections represent nonrenewable resources that must be properly conserved and managed so that they will continue to be available for research and public use. In order to properly maintain collections, they should be rehabilitated to meet the standards identified in 36 CFR Part 79. Additionally, a long-term curation facility should be identified that meets 36 CFR Part 79.

Rehabilitation of Collections

Collections, including artifacts, human remains, and records, from Navy facilities are scattered throughout the state of California. Additional NAS North Island (San Clemente Island) collections identified during a different St. Louis District project (Halpin and Holland 1997), which were not assessed for this project, are located at the Hearst Museum, the Antelope Valley Indian Museum, NAWS China Lake, the National Museum of the American Indian, the Peabody Museum of Anthropology, and various institutions overseas. Conditions for each collection vary; however, all of the collections require some rehabilitation in order to satisfy 36 CFR Part 79. General guidelines for rehabilitating collections have been addressed in the recommendations summary section.

Most of the San Clemente Island collections and some of the other Navy Region, Southwest collections had already been located and assessed by the St. Louis District. Since then, NAS North Island has provided funds for the rehabilitation of a majority of the San Clemente Island collections. SWDIVNAVFACENGCOM also has provided funds for the rehabilitation of some of their collections. Prior to the earlier curation assessments, years of leaving the management of these collections to various entities has lead to various problems, such as loss or damage of artifacts, missing information due to the loss or damage of original records, and inconsistencies in the care of the collections. These

Table 59.
Repositories Housing Collections from Navy Region, Southwest

Repository	Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
ASM Affiliates	NAS North Island	4.06	—	0.27
CSU Fullerton	NAS North Island	23.50	1.50	0.42
CSU Northridge	NAS North Island	267.97	—	22.21
Fort Guijarros Museum Foundation	NAVSUBASE Point Loma	435.80	0.01	7.94
Fowler Museum of Cultural History	NAS North Island	302.62	2.45	5.52
Gallegos and Associates	NAVSUBASE Point Loma	10.20	—	0.19
	Naval OLF Imperial Beach	—	—	0.06
	NWS Fallbrook	—	—	0.20
KEA Environmental	NAVSTA San Diego	5.75	—	0.15
	Salton Sea Test Base	1.15	—	0.50
NHMLAC	NAS North Island	31.21	0.03	0.50
NAS North Island	NAS North Island	8.89	4.62	85.26
RMW Paleo Associates	NAVSUBASE San Diego	—	—	0.19
SDAC	NAS North Island	63.90	—	0.70
	NWS Fallbrook	12.08	—	0.82
	NWS Seal Beach	70.07	—	—
San Diego Museum of Man	NAS North Island	18.39	9.15	0.48
SDSU	Admiral Baker Field	22.28	—	3.95
	NAS North Island	196.90	3.30	0.84
SWDIVNAVFACENGCOM	NAVSUBASE Point Loma	6.0	—	—
Southwest Museum	NAS North Island	1.59	5.11	—
UCSB	NAS North Island	7.41	50.94	0.12
William Manley and Associates	NAVSUBASE Point Loma	—	—	0.18
Total		1,489.77	77.11	130.50

problems have only begun to be addressed. Collections have remained in museums, universities, nonprofit repositories, Navy bases, and contractor's offices. Although some of the collections have had some level of upgrading, and in some cases, methods for rehabilitating were standardized, most of the collections have remained in the repositories in which they were first located, and the management and treatment of the collections have been inconsistent. Appropriate steps taken in anticipation of new collections can allow cultural resource managers to avoid this problem in the future.

NAGPRA and Consultation

It appears that most of the NAGPRA-related materials come from San Clemente Island on NAS North Island. An inventory of most of the human remains and associated funerary objects has been completed; however, a Notice of Inventory Completion has not been published in the Federal Register. Some correspondence has taken place between NAS North Island and some local Native American groups, but a full consultation process has never been implemented. A Section 6 Summary was submitted but rejected, primarily because the remains were classified as culturally unidentifiable. No federally recognized tribe has claimed cultural association with San Clemente Island, but the Kumeyaay, a non-federally recognized tribe in the Los Angeles area has made a claim for these materials.

One bone fragment from NAVBASE Point Loma was sent to the Smithsonian for identification. Results of the analysis indicated that the remains were human.

Curation Partners

The Navy collections from California are scattered throughout the state, on the east coast, and in some foreign institutions. Consolidation of collections for long-term storage is generally recommended for better collections management but is problematic for large collections such as the collections from Navy Region, Southwest due to already overcrowded facilities. Many repositories are no longer accepting collections due to a lack of space.

SWDIVNAVFACENGCOM, the agency responsible for Navy Region, Southwest collections, excluding those from NAS North Island, has adopted a policy of consolidating the collections in one place—San Diego Archaeological Center (SDAC). Several collections have been transferred to SDAC; however, some collections are still held at SWDIVNAVFACENGCOM and various contractor's offices. In addition, collections excavated by a nonprofit foundation set up for the purpose of excavating sites and curating collections from NAVBASE Point Loma are curated on base by the Fort Guijarros Museum Foundation.

Collections from San Clemente Island, under the management of the archaeologist at NAS North Island, have not been consolidated. No current space is large enough to accommodate the entire collection. Most of the repositories, such as universities and other institutions, have a long association with, and research interest for, the collections they have acquired from San Clemente Island. Some of these institutions view their Channel Island materials as part of the backbone of their collections. Because most, if not all, of these collections have been curated for free, the NAS North Island archaeologist has decided to keep the collections in their current locations, except for most of the human skeletal remains that have been transferred to the UCSB. The head of the physical anthropology section at UCSB, Dr. Philip Walker, is widely known for his research with human remains from Native California tribes. He is also an original member of the NAGPRA review committee. The only repository that may be able to acquire enough space for the consolidation of the San Clemente Island collections, SDAC, will not accept human remains for curation, which is a large portion of the San Clemente Island collections.

General requirements for a repository to satisfy 36 CFR Part 79 have been outlined in the recommendation summary. NAS North Island was one of the first DoD entities to begin identifying its collections and taking responsibility for the management and care of these collections and attempting to begin following standards set in 36 CFR Part 79. Collections have been located and assessed. Many of the collections have been rehabilitated to varying degrees. Most of the collections, except for the majority of human skeletal remains, have stayed in the same repositories, most of which do not meet repository standards in 36 CFR Part 79 and generally have not made many improvements for satisfying them.

Recommendations

Plan of Action

A comprehensive plan of action for compliance with 36 CFR Part 79 standards minimally must address five points—(1) inventory and rehabilitation of the artifact collections, (2) rehabilitation of the associated records, (3) proper long-term care of the collections and records, (4) proper management of collections, and (5) full compliance with NAGPRA.

Rehabilitation of Collections

Although a portion of the collections has had some rehabilitation, many were not processed according to standard procedures or they have not been processed in the best way to prepare the collections for long-term curation. In order to accomplish a complete, standardized rehabilitation and inventory of the collection, the St. Louis District recommends using a single contractor to process the collections. Ideally, the collections would first be consolidated before the rehabilitation would begin, but if this is impractical, segments of the collections could be gathered and processed at one time. Another less desirable option is sending a contractor to each location where collections are currently stored to rehabilitate the collections. Minimally, the St. Louis District, or another professional collections management agency or company, should provide quality assurance and oversight for the rehabilitation process to ensure a satisfactory product.

The human skeletal remains are an exception and since most have been consolidated at UCSB, an institution with expertise in human skeletal remains, these could be rehabilitated there. If all the human skeletal remains from San Clemente Island are consolidated at UCSB, the rehabilitation of the approximately 77 ft^3 of human skeletal remains by UCSB would cost approximately $5,583 plus the cost of supplies and staff time, based on UCSB's 1999 fee structure. The rehabilitation of these collections should be done with the cooperation and oversight of a collections manager hired to oversee the rehabilitation of the entire collection using standardized procedures. All original documentation should remain with the rest of the collections;

Table 60.
Navy Region Southwest Collection Consolidation Cost at SDAC

Collection	1st year fee	Annual fee (Years 2-5)	Rehabilitation cost (objects)	Rehabilitation cost (records)	Other Recurring Costs	Other Non-recurring Costs	Total
San Clemente Island	$103,505	$172,508	$215,635	unknown	unknown	unknown	$491,648
Other Navy Region, SW	$67,600	$112,666	$140,833	unknown	unknown	unknown	$321,099

however, archival copies would be provided for the use of UCSB.

The rest of the collections can be rehabilitated through SDAC. Although the collections are in varying stages of rehabilitation, SDAC suggests estimating that each standard size box will cost $250 for rehabilitation. A rehabilitation estimate for the San Clemente Island collection, assuming the rehabilitation for the current collection at SDAC has already been funded, would be $215,635. The cost for rehabilitating the rest of the Navy Region, Southwest collections at SDAC would be $140,833. Additionally, each standard size box measuring approximately one cubic foot will cost $120 a box the first year it enters SDAC. For each of the following four years, an annual fee of $50 for each box will be charged (Table 60). The cost for years 6–10 will be renegotiated. The cost may go down if the total number of cubic feet is diminished as the collections are rehabilitated. Records must also be processed and organized by a trained archivist. SDAC does not address the cost of curating or rehabilitating associated documentation.

The archaeologist at NAS North Island has acquired approximately 85 linear feet of records, mostly associated with San Clemente Island. The St. Louis District recommends having an archivist organize these files. If a duplicate copy was not made of all the records, then it would take approximately 14 months to complete this work at an approximate cost of $55,000. However, if a full safety (duplicate) copy of all records were made, then it would take approximately 17 months to complete at an approximate cost of $104,000.

NAGPRA and Consultation

As of February 1999, an inventory for the NAS North Island San Clemente Island NAGPRA materials had not been submitted to the Park Service because of a disagreement on cultural affiliation. If consultation has not begun, this process must be started immediately. Through consultation, federal agencies acquire assistance from the tribes in the potential identification of the cultural affiliation of the human remains and associated funerary objects.

The archaeologist at SWDIVNAVFACENGCOM has maintained contact with California Legal Services on all Native American issues and has obtained written agreements with area tribes. Continued involvement at this level is encouraged and, in the event of an inadvertent discovery, should make the NAGPRA process proceed smoothly.

The Navy Legal Department should be requested to make an interpretation of the letter written by Dr. Doug Owsley at the Smithsonian regarding the bone fragment found at NAVBASE Point Loma. If the legal department determines the letter as expressing a positive identification, then consultation with tribes must begin immediately. The evidence that no human remains have ever been located on the NAVBASE Point Loma should also be reexamined. A physical anthropologist should sort through the faunal materials to identify any human skeletal remains.

The majority of the San Clemente Island human skeletal remains have been inventoried, although this inventory has not been published in the Federal Register. During the St. Louis District assessment some human skeletal remains were identified mixed in with other materials at the NHMLAC and at UCLA. In order to complete the inventory, a physical anthropologist should be contracted to sort through these collections in order to identify, inventory, and separate these human skeletal remains.

Curation Partners

Ideally, long-term collections management is best handled through consolidating collections into a single location; however, this may not always be the most practical or satisfactory method. In the case of San Clemente Island, there has been a long tradition of collecting and research by many individuals

associated with different California museums, archaeological field schools, and other research projects. Because of this, San Clemente Island collections have been scattered throughout California, mainly in the San Diego and Los Angeles areas.

For long-term storage of collections the St. Louis District recommends at least a partial consolidation of the collections for better management of the collections. All human skeletal remains can be transferred to UCSB. Most of the remaining collections can be placed with SDAC. Using SDAC for the management of collections can be justified for several reasons—it is already the designated repository for most of the Navy Region, Southwest collections, they currently have adequate space and the ability to expand, they are interested in curating more of the Navy's collections, and other adequate repositories do not have enough space or they have policies of only curating collections generated by their own research. With assistance from NAS North Island, some repositories currently holding San Clemente Island collections that are interested in keeping their collections may negotiate long-term loans with SDAC, but the management of these collections should be centralized. Annual inspections of these collections should be conducted to ensure they are being properly cared for.

Curation fees have already been discussed. Other fees that may be negotiated are recurring costs such as the procurement of additional professional and clerical staff and other support costs, and nonrecurring costs such as fees for acquiring appropriate shelving, furniture, and equipment for associated records and an environmental control upgrade.

Management of Collections

The management of collections could be simplified if the collections were coalesced into one repository. This may be impractical, if not impossible; however, the collections may be physically located in more than one location, but the management of the collections could be undertaken by one collections manager. If SDAC were chosen as the designated repository for all of the collections, except for the human skeletal remains curated at UCSB, a collections manager at SDAC would oversee the management and rehabilitation of all of the collections. This would ensure that all of the collections would be uniformly processed and all of the information would be maintained in a single database, even if the collections were not physically in a single location.

7-1

Affinis Environmental Services

El Cajon, California

Repository Summary

Volume of Artifacts: 0.02 ft^3

Collection Origin: NAS Whidbey Island, Washington

Compliance Status: Artifacts require partial rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: see Records Storage below

Collection Origin: NAS Whidbey Island, Washington

Human Skeletal Remains: None

Date of Visit: February 29, 2000

Person Contacted: G. Timothy Gross, Archaeologist

Affinis Environmental Services houses approximately 0.02 ft^3 of artifacts and an unknown amount of associated documentation from projects conducted on NAS Whidbey Island, Washington (Table 61). The St. Louis District previously evaluated NAS Miramar, California, collections at Affinis in August 1993 (U.S. Army Corps of Engineers 1999a). Most of the repository information has not changed since that visit and will be repeated for this chapter.

Table 61.
Volume of Navy Archaeological Collections Housed at Affinis Environmental Services

Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
NAS Whidbey Island, Washington	0.02	—	unknown
Total	0.02	—	unknown

Assessment

The Affinis office is located on the second floor of the Shadow Valley Mall, which was originally constructed as a single-story mall in 1973. The 420-ft^2 collections storage area, where Navy artifacts are housed, is situated across the parking lot in a single-story building. The collections storage area also contains field equipment.

Structural Adequacy

The storage facility has a concrete slab foundation and floor and concrete block exterior walls. The roof, which was replaced in 1992, is shingled on the front of the building and built-up asphalt roof at the rear. A single panel hollow-core exterior door on the north side is the only entrance and exit. Interior walls are constructed of concrete block, and the ceiling is covered with plasterboard.

Environmental Controls

No temperature or humidity controls exist in the collections storage area. The building is lit with non-UV filtered fluorescent lights.

Pest Management

A professional pest management company is used three times a year to spray for pests. The staff stated that they have seen cockroaches, but no signs of pest infestation were observed during the St. Louis District review.

Security

A key lock is present on the exterior door.

Fire Detection and Suppression

No types of fire detection or suppression systems are in place.

Artifact Storage

Artifacts totaling 0.02 ft³ from NAS Whidbey Island are stored in the collections storage area of Affinis (Table 62).

Table 62.
Percentage by Volume of Navy Artifacts House at Affinis Environmental Services

Material Class	NAS Whidbey Island, Washington
Lithics	—
Prehistoric Ceramics	—
Faunal Remains	—
Shell (unmodified)	—
Botanical	—
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	—
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	100
Textiles	—
Other	—
Total	100

Storage Units

Artifacts are housed on top of boxes that are currently being processed (Figure 40).

Figure 40. Artifacts are currently stored on top of boxes that are being processed.

Primary Containers

Artifacts are housed in a 2-mil plastic zip-lock bag that is labeled with a computer-generated archival foil-backed label. Label information consists of project, job number, date, archived date, and bag contents.

Secondary Containers

The secondary containers for the Whidbey Island collections consist of 2-mil plastic zip-lock bags that are labeled with computer-generated archival foil-backed labels. Label information consists of site number, provenience, catalog number, and material class.

Laboratory Processing and Labeling

All of the artifacts have been cleaned, and none have been directly labeled. Artifacts are sorted by catalog number.

Human Skeletal Remains

No human skeletal remains from NAS Whidbey Island are curated at Affinis.

Records Storage

The records from NAS Whidbey Island, Washington, that are housed at Affinis could not be located for the St. Louis District on-site visit. Staff at Affinis said that the records are stored in acidic cardboard boxes with telescoping lids in the same room as the artifacts.

Collections Management Standards

Registration Procedures

Accession Files

All materials are assigned catalog numbers, but not immediately upon receipt.

Location Identification

The location of the collection in the storage area is not identified, but staff are familiar with the physical location of collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

Affinis is not a permanent curation repository, and does not have a published guide to the collections.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

A dBASE database is used for analysis and to manage the artifact catalog.

Written Policies and Procedures

Minimum Standards for Acceptance

Affinis is a contracting firm, and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those collections from projects that Affinis conducted are housed there.

Curation Policy

Affinis is a contracting firm and holds collections only for analysis purposes. They are not a long-term curation repository and do not possess a comprehensive curation plan.

Records Management Policy

Affinis does not possess a written records management policy.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

Because collections are not permanently curated at Affinis, there is no written deaccessioning policy.

Inventory Policy

Affinis does not have a written inventory policy.

Latest Collection Inventory

The collections were last inventoried in 1992.

Curation Personnel

There is no full-time curator for the archaeological collections. There are three full-time archaeologists and three laboratory personnel who work on the collections on an as-needed basis.

Curation Financing

Temporary storage of archaeological collections is funded from contract overhead.

Access to Collections

Affinis does not have a policy on accessing the collections by researchers. However, if developed, it would include maintaining a written receipt for the materials borrowed and a policy that all research be

done in the Affinis laboratory so the material would stay on site.

Future Plans

The staff view research as the primary responsibility associated with each collection. They feel that their facility is adequate for temporary collections storage, but they would move the collections to a regional repository if one becomes available.

Comments

1. Affinis is not a permanent curation facility.

2. No environmental controls (e.g., HVAC) are in place.

3. Basic security deterrents are in place, and no security-detection measures are present in the repository.

4. No fire-suppression or -detection measures are in place.

5. Artifacts are kept in 2-mil plastic zip-lock bags.

6. All artifacts have been cleaned, but none have been directly labeled.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) direct labeling (when applicable), and (b) insertion of acid-free labels in each secondary container.

7-2

ASM Affiliates

Encinitas, California

Repository Summary

Volume of Artifact Collections: 4.06 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.27 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: February 29, 2000

Person Contacted: Dr. Brian Byrd, Archaeologist

ASM Affiliates houses approximately 4.06 ft³ of artifacts and 0.27 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 63).

Table 63.
Volume of Navy Archaeological Collections Housed at ASM Affiliates

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	4.06	—	0.27
Total	4.06	—	0.27

Assessment

ASM Affiliates is located in a one-story office building in the North Shore Business Park (Figure 41). The building is approximately 11–20 years old, and has areas devoted to artifact holding,

Figure 41. ASM Affiliates is located in a concrete office building.

washing, and processing, temporary artifact storage, field equipment storage, and offices. Archaeological collections are housed in an area of the office that measures 288 ft².

Structural Adequacy

The building has a concrete foundation and poured concrete, glass, and wood siding exterior walls. The built-up asphalt roof is a year old. Several cosmetic renovations to the building interior were recently made, including subdividing space, painting, and new carpet. One wood exterior door with a large glass window and a transom is located in the repository. Multiple aluminum-framed windows are located in the building and are covered with blinds. One large window is present in the collections storage area. The collections storage area has a concrete floor covered with carpet, and a suspended acoustical tile ceiling. Interior walls are constructed of drywall.

Environmental Controls

The building is equipped with three air handling units for central air conditioning and an electric heat pump, and the targeted temperature is 70-72º. Dust filters are present. Lighting in the laboratory is provided by fluorescent lights that are not equipped with UV filters.

Pest Management

The building complex manager takes precautions, including control but not monitoring, against rodents on an as-needed basis, and against ants quarterly. A professional pest management company is utilized.

Security

Security consists of a key lock and dead-bolt lock on the exterior door. All of the windows are sealed and cannot be opened. A private security company patrols the building exterior once per hour.

Fire Detection and Suppression

The building is equipped with heat sensors, a sprinkler system, and one fire extinguisher that is present in the kitchen area of the repository. ASM Affiliates has contracted an annual fire prevention inspection with the fire department.

Artifact Storage

Artifacts totaling 4.06 ft³ from NAS North Island (San Clemente Island) are housed in the collections storage area of ASM Affiliates (Table 64).

Table 64.
Percentage by Volume of Navy Artifacts Housed at ASM Affiliates

Material Class	NAS North Island, California
Lithics	12
Prehistoric Ceramics	—
Faunal Remains	17
Shell (unmodified)	—
Botanical	30
Flotation	—
Soil	36
^{14}C	5
Human Skeletal Remains	—
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	—
Total	100

Storage Units

Artifacts are stored on metal shelves that measure 18 x 36 x 72 inches (d x w x h) (Figure 42).

Primary Containers

Artifacts are housed in three archival boxes measuring 15.5 x 12.5 x 10.25 inches (d x w x h) that have telescoping lids (Figure 43). The boxes are labeled with Post-it® notes written in pen with location, site numbers, and materials. Artifacts are also housed in one acidic cardboard box measuring 10 x 10 x 10.5 inches (d x w x h) that has folded flaps. The box is labeled with a computer-generated adhesive label that identifies the project and site numbers.

Figure 42. Artifacts are stored on metal shelves.

Figure 43. Artifacts are housed in archival boxes.

Secondary Containers

Artifacts are housed in 2- to 4-mil plastic zip-lock bags. Nested within the bags are glass vials, plastic film canisters, smaller 4-mil plastic zip-lock bags, and aluminum foil. The secondary containers are labeled directly in marker with some or all of the following: site number, provenience, date, catalog number, and bag number. Acid-free paper tags have been placed in the tertiary containers that are in the acidic cardboard box. Label information on the tags includes site number, provenience, object, material, quantity, and catalog number. Nonarchival field bag tags are placed with the artifacts in the archival boxes. These tags include site number, provenience, date, investigator, and catalog number.

Laboratory Processing and Labeling

Approximately 100% of the artifacts have been cleaned, and none have been directly labeled. Artifacts are sorted by site, provenience, and material class.

Human Skeletal Remains

No human skeletal remains from San Clemente Island are curated at ASM Affiliates.

Records Storage

Associated documentation totaling 0.27 linear feet is housed in the collections storage area at ASM Affiliates (Table 65). Because the project is on-going, associated documentation is stored in three binders on a desk in the principal investigator's office. The binders are labeled with computer-generated tags inserted in plastic sleeves on the binder.

Table 65.
Linear Footage of Navy Associated Documentation Housed at ASM Affiliates

Materials	NAS North Island, California
Paper	0.17
Reports	—
Maps and Oversized Documents	0.01
Audiovisual	—
Photographs	0.09
Computer	—

Paper Records

Paper records from San Clemente Island (0.17 linear feet) include administrative, survey, excavation, and analysis documents, and a photo log.

Photographic Records

Photographic records from San Clemente Island (0.09 linear feet) consist of color prints, negatives, and slides. They are housed in archival sleeves in one of the binders.

Maps and Oversized Documents

Maps from San Clemente Island (0.01 linear feet) are located in archival sleeves in one of the binders.

Collections Management Standards

Registration Procedures

Accession Files

Archaeological collections are not accessioned.

Location Identification

Staff at ASM Affiliates are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

ASM Affiliates is not a permanent curation facility, and does not have a published guide to the collections.

Site-Record Administration

The Smithsonian trinomial site-numbering system is used.

Computerized Database Management

A database is utilized by ASM Affiliates staff, and back-ups are made on CD and kept on-site.

Written Policies and Procedures

Minimum Standards for Acceptance

ASM Affiliates is a contracting firm, and is not a permanent curation repository. Therefore, no collections are accepted for curation, and only those collections from projects that ASM Affiliates conducted are housed there.

Curation Policy

ASM Affiliates does not have a written curation policy as it is not a long-term curation facility; however, they follow the SDAC's guidelines.

Records-Management Policy

ASM Affiliates does not have a written records-management policy; however, they follow the SDAC's guidelines. Some catalogs have a duplicate copy on acid-free paper. One copy accompanies the collections to the final curation facility.

Field Curation Procedures

There are no written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

Because collections are not permanently curated at ASM Affiliates, there is no deaccessioning policy.

Inventory Policy

ASM Affiliates does not have a written inventory policy.

Latest Collection Inventory

The archaeological collections are inventoried upon receipt.

Curation Personnel

ASM Affiliates does not have a full-time curator. The lab director is responsible for the curation of archaeological collections.

Curation Financing

Financing for the temporary curation of collections is written into each contract.

Access to Collections

Access to the collections is controlled by archaeological staff, but no formal access policy has been established. Researchers are permitted to review the collections by appointment.

Future Plans

Upon completion of the report, the collections will be transferred to NAS North Island, California.

Comments

1. ASM Affiliates is not a permanent curation facility.

2. Excellent environmental controls and dust filters are in place.

3. Basic security deterrents are in place, but no security-detection measures are present.

4. Basic fire-suppression and -detection measures are in place.

5. Artifacts are kept in tertiary containers consisting of glass vials, plastic film canisters, 4-mil plastic zip-lock bags, and aluminum foil that are in secondary containers of 2- to 4-mil plastic bags in archival and acidic boxes.

6. All artifacts have been cleaned, but none have been directly labeled. Some artifacts have an acid-free paper tag with them.

7. Records are housed in three-ring binders while the project is on-going.

8. Photographic and cartographic records are housed in archival sleeves.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) creation of a finding aid, and (c) creation of a duplicate copy for security.

7-3

California State University

Fullerton, California

Repository Summary

Volume of Artifacts: 23.50 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.42 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 1.50 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Dr. Phillip Walker at the UCSB, conducted NAGPRA Sections 5 and 6 (Inventory and Summary, respectively) of the collections at CSUF.

Date of Visit: February 25 and April 28, 1999

Point of Contact: Dr. Phylissa Eisentraut, Archaeologist and Collections Manager

California State University, Fullerton (CSUF) houses approximately 25.0 ft³ of artifacts and human skeletal remains and 0.42 linear feet of associated documentation from the Theodore Murphy collection from San Clemente Island on NAS North Island, California (Table 66). This material was originally donated by the Murphy family to the San Diego State Historical Society in 1974, then transferred to CSUF in 1988. Additionally, some of the items are remnants from a former exhibit that were on loan from the University of California Los Angeles collection. The St. Louis District previously evaluated these collections at CSUF in August 1992 for a different project (U.S. Army Corps of Engineers 1997). Most of the repository information has not changed since that visit and will be repeated for this chapter.

Table 66.
Volume of Navy Archaeological Collections Housed at CSUF

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	23.50	1.50	0.42
Total	23.50	1.50	0.42

Assessment

The archaeological laboratory (Room 311) occupies approximately 960 ft² and is located in the Humanities Building on the CSUF campus. The age of the building is not known, but it was originally constructed for classroom and office use. The building is currently used for classrooms, laboratories, and faculty offices.

Structural Adequacy

The Humanities Building is a modern steel-framed structure with a concrete block exterior. The interior walls are plasterboard, and ceilings are suspended Celotex® tile. Floors are overlaid with tile. Numerous windows are present in the building, and two windows fitted with shades are in Room 311. Three doors enter into Room 311: two double doors leading to the hallway and a single door leading to an office.

Environmental Controls

Temperature is controlled by a central heating and air conditioning system. Lighting is provided by fluorescent tubes covered with UV filters.

Pest Management

Rooms are sprayed by a professional company on an as-needed basis.

Security

The Humanities Building is patrolled by campus security, and Room 311 has key locks on doors and partially controlled access. Windows are sealed shut. Some objects from the Murphy collection are stored in a locked metal cabinet.

Fire Detection and Suppression

The Humanities Building is equipped with fire alarms wired to the fire department, and fire hoses are located in the corridor outside Room 311.

Artifact Storage

Artifacts and human skeletal remains totaling 25.0 ft³ are housed in Room 311 in the Humanities Building on CSUF (Table 67).

Table 67.
Percentage by Volume of Navy Artifacts Housed at CSUF

Material Class	NAS North Island, California
Lithics	86.0
Prehistoric Ceramics	—
Faunal Remains	0.2
Shell (unmodified)	—
Botanical	—
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	6.0
Worked Shell	3.0
Worked Bone	2.5
Brick/Masonry	—
Historic Ceramics	0.2
Metal	0.2
Glass	—
Textiles	—
Other	1.9
Total	100

Other material classes include basketry, asphaltum, fur, cloth, leather, gourd, ochre, and wood.

Storage Units

Artifacts are housed primarily on open painted wooden shelving units that measure 18 x 36 x 96 inches (d x w x h). Some artifacts are housed loose on a piece of felt in three glass display cases, but they are not on exhibit. Delicate collections and human skeletal remains from NAS North Island are housed in a two-door locking metal cabinet that measures 24 x 36 x 79 inches (d x w x h) (Figure 44).

Primary Containers

Primary containers consist of acidic cardboard boxes of varying dimensions. Boxes are labeled in marker or pen with some or all of the following: date, catalog number, contents, and/or donor's name.

Secondary Containers

Secondary containers consist of 2-mil plastic zip-lock bags, 1-mil plastic sandwich bags, paper bags, small plastic or acidic cardboard boxes, glass Riker

Figure 44. Some artifacts are housed in cardboard boxes of varying dimensions in metal cabinets.

cases with cotton packing and newspaper; some artifacts are stored loose. None of the secondary containers are directly labeled, but the majority contain paper tags identifying catalog number information that is typed or written in pencil or ink.

Laboratory Processing and Labeling

All of the artifacts in the Murphy Collection have been cleaned and sorted by material class. The catalog number is directly written on lithic materials in india ink; shell, faunal remains, and human skeletal remains have not been directly labeled.

Human Skeletal Remains

Approximately 1.50 ft^3 of human skeletal remains are present in the Murphy Collection at CSUF. The remains (MNI=7) are stored in acidic cardboard boxes in a locking metal cabinet. The remains have been cleaned and sorted, and have not been directly labeled. Acidic paper tags are included with the remains and identify sex and age.

Records Storage

Approximately 0.42 linear feet of associated documentation is housed at CSUF (Table 68). The documents were pulled for the St. Louis District's review; therefore, the assessment team was unable to identify the storage location and type for the records. Records are stored loose in letter-sized acidic folders.

Table 68.
Linear Footage of Navy Associated Documentation Housed at CSUF

Materials	NAS North Island, California
Paper	0.33
Reports	—
Maps and Oversized Documents	—
Audiovisual	—
Photographs	0.09
Computer	—

Paper Records

Paper records, consisting of administrative and background records, comprise approximately 0.33 linear feet of the collection.

Photographs

Approximately 0.09 linear feet of photographic records are present in the collection.

Collections Management Standards

Registration Procedures

Accession Files

All collections are accessioned upon receipt.

Location Identification

The location of the collection within the storage area is not identified in the accession files, which made access to the collection difficult.

Cross-Indexed Files

Files are not cross indexed.

Published Guide to the Collections

A published guide to the collections exists as part of a graduate thesis.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

The repository does not use a computerized database management system.

Written Policies and Procedures

Minimum Standards for Acceptance

There are no minimum standards for acceptance.

Curation Policy

There is no formal curation policy in place that addresses the receipt, processing, and use of materials.

Records Management Policy

There is no formal records management policy addressing guidelines and standards for the curation of documentation.

Field Curation Guidelines

Written field curation guidelines have not been produced.

Loan Policy

Loans are made to other museums upon request, and a record of these transactions is kept.

Deaccessioning Policy

There is no formal written deaccessioning policy in effect.

Inventory Policy

There is no formal inventory policy

Latest Collection Inventory

No inventory has ever been performed.

Curation Personnel

Dr. Eisentraut is a part-time curator of the collections. A few students are analyzing and rehabilitating non-federal collections for several hours a week.

Curation Financing

Funding goes directly to the Anthropology Department. The department may then allocate funds to the repository.

Access to Collections

Collections are readily accessible and made available to researchers upon request. Artifacts are loaned to other museums upon request. Access to collections is controlled exclusively by Dr. Eisentraut.

Future Plans

Dr. Eisentraut is currently researching new storage units and better climate control. She intends to ensure that the collections are properly rehabilitated and stored.

Comments

1. CSUF is a permanent curation facility.

2. The Humanities Building is equipped with a central heating and air conditioning system.

3. Fluorescent lights are equipped with UV filters.

4. An integrated pest-management plan that includes control and monitoring is not in effect; however, rooms are sprayed on an as-needed basis.

5. Basic security-detection measures are present at the Humanities Building, and adequate security deterrents are in place in the building.

6. Basic fire-detection and -suppression systems are present in the building, although none are in Room 311.

7. Artifacts are housed in 2-mil plastic zip-lock bags, 1-mil plastic sandwich bags, paper bags, small plastic or acidic cardboard boxes, glass Riker cases with cotton packing, newspaper, and loose in acidic cardboard boxes on painted wooden shelves, in a locking metal cabinet, and in glass display cases.

8. Lithic artifacts are labeled directly in india ink, and artifacts are sorted by material class.

9. Records were pulled for the St. Louis District review.

10. Human skeletal remains are present in the collection. Dr. Phillip Walker at the UCSB, conducted NAGPRA Sections 5 and 6 requirements (Inventory and Summary, respectively) on the collections at CSUF.

11. A cooperative curation agreement between CSUF and NAS North Island provided for consolidating, cataloging, and repackaging of the Murphy collection in 1988–89.

Recommendations

1. Artifacts require (a) storage in appropriate archival primary and secondary containers that have been labeled, and (b) insertion of acid-free labels in each secondary container.

2. Records require (a) physical arrangement in some sort of logical order, (b) packaging in archival containers and in archival files (c) appropriate and consistent labeling of all file folders, (d) creation of a finding aid, and (e) creation of an archival duplicate copy for security.

3. Install humidity monitoring devices and ensure that humidity levels are maintained.

4. Implement an integrated pest management plan that includes monitoring and control.

5. Install additional security deterrents and detection devices throughout the building, but particularly in Room 311 (e.g., motion detectors, alarms wired to the local police and campus police, and dead bolt locks). Additionally, those metal storage cabinets that can be locked, should remain locked when they are not in use.

6. Additional fire suppression systems, such as fire extinguishers or a sprinkler system, should be installed in Room 311 and throughout the building. Additional fire detection devices, such as manual alarms, smoke detectors, or heat sensors, also should be installed in Room 311 and throughout the building.

7. Create and implement the policies and guidelines as noted above if they are not currently in place.

8. A complete inventory of the collections should be completed.

9. All human remains and associated objects need to be examined and brought into compliance with NAGPRA.

7-4

California State University

Northridge, California

Repository Summary

Volume of Artifacts: 267.97 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 22.21 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: March 1, 2000

Person Contacted: Dr. L. Mark Raab, Professor

The Anthropology Department at California State University, Northridge (CSUN) houses approximately 267.97 ft³ of artifacts and 22.21 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 69). The St. Louis District previously evaluated Navy collections at CSUN in August 1992 (U.S. Army Corps of Engineers 1997) for a different project. Due to the large amount of artifacts and the inaccessibility of some records, the St. Louis District team examined a 10% random sample of artifacts and documentation from San Clemente Island during the 2000 visit.

Table 69.
Volume of Navy Archaeological Collections Housed at CSUN

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	267.97	—	22.21
Total	267.97	—	22.21

Assessment

The CSUN Anthropology Department is located in Sierra Hall, which was originally constructed 31–40 years ago for use as classrooms and offices (Figure 45). The four-story building has areas devoted to artifact holding and processing, temporary artifact storage, records storage, classrooms, and offices. Archaeological artifacts are housed in the 1,000 ft² collections storage area, and records are housed in the 600 ft² main laboratory/curation office.

Figure 45. Collections are housed in Sierra Hall on campus.

Structural Adequacy

Sierra Hall has a concrete foundation and poured concrete slab exterior walls. The building has a flat built-up asphalt roof. Many renovations to the building were recently made, including new tiling, installation of fire doors, and new fire and burglary alarm systems. Multiple aluminum-framed windows are located in the building and some are covered with blinds.

Collection Storage Area 1—Collection Storage Area

No windows are located in the artifact collections storage area, which has a concrete and tile floor, and a suspended acoustical tile ceiling. Interior walls are constructed of plasterboard. One solid wood interior door and one wood and glass exterior door are located in the artifact collections storage area.

Collection Storage Area 2—Main Laboratory/Curation Office

Associated documentation is stored in the main laboratory/curation office area adjacent to the artifact collections storage area. Several shaded windows line one wall of the room, which has a concrete and tile floor and a suspended acoustical tile ceiling. Interior walls are constructed of plasterboard, and one wall is lined with floor-to-ceiling shelves. One interior door is located in the room.

Environmental Controls

Sierra Hall, including both collections storage areas, is equipped with central air conditioning and gas forced-air heat, and dust filters are present. The targeted temperature is 70–72º F. Fluorescent lights that are not equipped with UV filters are used in the laboratory.

Pest Management

The university staff take precautions, including control but not monitoring, against insects and rodents on a monthly or quarterly basis.

Security

Security for the building and collections storage areas consists of intrusion alarms that are wired directly to the police department, and campus police monitor the building. Windows are usually locked, but are sometimes opened for circulation. Doors are locked at night with a key lock. Only pertinent staff members have keys to the collections storage areas, and students must request keys to the room from staff members. The collections storage areas are equipped with intrusion alarms, key locks, and controlled access.

Fire Detection and Suppression

Fire detection methods for the building, including both collections storage areas, consist of smoke detectors, manual fire alarms, and alarms wired directly to the fire department. The building is equipped with a sprinkler system, fire doors, and fire extinguishers.

Collection Storage Area 1—Collection Storage Area

In addition to the above systems, the collections storage area also has a fire door in it.

Artifact Storage

Storage Units

Collection Storage Area 1—Collection Storage Area

Approximately 267.97 ft^3 of artifacts from San Clemente Island are stored in the artifact collections

storage area on metal shelves that measure 5 x 100 x 86 inches (d x w x h) (Table 70).

Table 70.
Percentage by Volume of Navy Artifacts Housed at CSUN

Material Class	NAS North Island, California
Lithics	25
Prehistoric Ceramics	—
Faunal Remains	31
Shell (unmodified)	5
Botanical	3
Flotation	7
Soil	20
^{14}C	1
Human Skeletal Remains	—
Worked Shell	6
Worked Bone	1
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	1
Total	100

Other material classes include mineral pigment.

Figure 46. Artifacts are housed in archival and acidic cardboard boxes on metal shelves.

Primary Containers

Artifacts are housed in archival and acidic cardboard boxes measuring 16.5 x 13 x 10.25 inches (d x w x h) that are folded and have telescoping lids (Figure 46). The boxes are directly labeled in marker with site number, field site number, and box number. Each box contains a sheet of paper noting the site number, year collection, box number, and a list of catalog numbers broken down by provenience and feature number.

Secondary Containers

Artifacts are housed in 4-mil plastic zip-lock bags, plastic vials, acidic boxes, and 1-mil plastic bags tied with string. Tertiary containers, consisting of 2- to 4-mil plastic zip-lock bags and aluminum foil, are nested within the secondary containers. The secondary containers are labeled directly in marker with site number, provenience, date, catalog number, investigator, and material class. Additionally, placed in each bag is a pre-printed bag label, which has space for accession/catalog number, provenience, material class, weight, artifact dimensions, artifact description, quantity, and comments.

Laboratory Processing and Labeling

Approximately half of the artifacts have been cleaned, and half have been directly labeled in ink with the catalog number. Artifacts are sorted by material class and site.

Human Skeletal Remains

No human skeletal remains from San Clemente Island are curated at CSUN. All human skeletal remains from San Clemente Island that were housed at CSUN are housed at UCSB (Chapter 7-17).

Records Storage

Collection Storage Area 2—Main Laboratory/Curation Office

Approximately 22.21 linear feet of associated documentation from San Clemente Island are housed in the main laboratory/curation office at CSUN (Table 71).

Table 71.
Linear Footage of Navy Associated Documentation Housed at CSUN

Materials	NAS North Island, California
Paper	19.25
Reports	—
Maps and Oversized Documents	0.42
Audiovisual	—
Photographs	2.54
Computer	—

Paper Records

Paper records from San Clemente Island (19.25 linear feet) include survey and excavation documents. Some paper records (1.25 linear feet) are stored loose or in manila folders in a metal letter-sized filing cabinet, which is labeled with a piece of computer-generated paper taped to the drawer. The label identifies the project name, and the folders within are labeled directly in pen or with stickers that identify the site number and site name.

The majority of the paper records (18 linear feet) are housed in three-ring binders in wooden wall cabinets that measure 1.67 x 25 x 12 feet (d x w x h) (Figure 47). The binders are labeled directly in pen or marker or with an adhesive label. Label information identifies site number, investigator, date, and provenience.

Photographs

Photographic records from San Clemente Island (2.54 linear feet) consist of negatives, slides, and contact sheets. They are housed in an acidic cardboard box that measures 17.5 x 11.5 x 9.25 inches (d x w x h) and has a telescoping lid. The box, which is located in a wooden wall cabinet, is labeled with the project and box contents.

Maps and Oversized Documents

Maps from San Clemente Island (0.42 linear feet) are located in the metal filing cabinet.

Collections Management Standards

Registration Procedures

Accession Files

All collections are accessioned and identified in a computer database.

Figure 47. The majority of the associated records are stored in boxes or three-ring binders in wooden cabinets.

Location Identification

Locations of the artifacts, by project, within the repository are included in the accession database.

Cross-Indexed Files

The files are cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

A Microsoft Access database is used by the staff, and back-ups are made on disk and CD every six months.

Written Policies and Procedures

Minimum Standards for Acceptance

CSUN does not accept outside collections for curation.

Curation Policy

There is no formal curation policy in place that addresses the receipt, processing, and use of materials.

Records Management Policy

There is no formal records management policy addressing guidelines and standards for the curation of documentation.

Field Curation Procedures

No written field curation procedures have been produced.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

CSUN does not have a written inventory policy.

Latest Collection Inventory

The collections at CSUN have not been inventoried.

Curation Personnel

CSUN does not have a full-time curator. Anthropology Department staff, volunteers, and students are responsible for the curation of the materials.

Curation Financing

Financing for the curation of collections is through the university budget, Navy funding, and Legacy grants.

Access to Collections

Access to the collections is controlled by university staff, but no formal access policy has been established. Researchers are permitted to review the collections by appointment.

Future Plans

CSUN will be receiving additional funds from the Navy in order to upgrade the San Clemente Island collections.

Comments

1. CSUN is a permanent curation facility for the collections they have generated.

2. Excellent environmental controls and dust filters are in place.

3. A pest-management plan is in place that includes control but not monitoring against insects and rodents.

4. Excellent security-deterrents and -detection systems are present in the repository and collections storage area.

5. Excellent fire-suppression and -detection measures are in place in the repository, but not in the collections storage area itself.

6. Artifacts are kept in 2- and 4-mil plastic bags, plastic vials, and acidic boxes in archival and acidic cardboard boxes.

7. Approximately half of the artifacts have been cleaned and directly labeled.

8. Records are stored loose or in manila folders in a metal letter-sized filing cabinet or in three-ring binders in wooden wall cabinets. Photographs are housed in an acidic cardboard box in a wall cabinet.

9. Binders containing survey records are housed in cabinets that are very tall. Boxes of artifacts are stacked and stored several boxes deep. These collections are not readily accessible.

10. Copies of computer files are stored off-site at NAS North Island.

Recommendations

1. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival primary and secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival containers and in archival files, (b) appropriate and consistent labeling of all file folders, (c) creation of a finding aid, and (d) creation of a duplicate copy for security.

3. Take measures to monitor and control humidity levels in the collections storage areas.

4. Implement an integrated pest-management plan that includes monitoring, as well as control, on a regular basis.

5. Ensure that fluorescent light tubes have UV filters.

6. Install additional fire safety measures, such as manual fire alarms, fire extinguishers, and a sprinkler system, in the collections storage areas.

7. Create and implement the procedures and policies as noted in “Collections-Management Standards” above if they are not already in place.

8. Store artifacts and records on shelving/storage units so they are readily accessible.

7-5

Fort Guijarros Museum Foundation

Naval Submarine Base Point Loma
San Diego, California

Repository Summary

Volume of Artifacts: 435.80 ft³

Collection Origin: NAVSUBASE Point Loma, California

Compliance Status: Artifacts require partial rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 7.94 linear feet

Collection Origin: NAVSUBASE Point Loma, California

Compliance Status: Associated documentation requires partial rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.01 ft³

Collection Origin: NAVSUBASE Point Loma, California

Compliance Status: Two human skeletal fragments from NAVSUBASE Point Loma are part of the Fort Guijarros collections. One is potentially historic, and the other is currently at the Smithsonian Institution.

Date of Visit: February 18, 1999

Persons Contacted: Susan Floyd, Director; Maisie Morris, Laboratory Supervisor

Fort Guijarros Museum Foundation houses approximately 435.81 ft³ of artifacts and human skeletal remains and 7.94 linear feet of associated documentation from projects conducted on NAVSUBASE Point Loma, California (Table 72). The St. Louis District previously evaluated Navy collections at Fort Guijarros in July 1993 for a different project (U.S. Army Corps of Engineers 1999a).

Table 72.
Volume of Navy Archaeological Collections Housed at the Fort Guijarros Museum Foundation

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVSUBASE, Point Loma, California	435.80	0.01	7.94
Total	435.80	0.01	7.94

Assessment

The Fort Guijarros Museum Foundation is located on NAVSUBASE Point Loma in San Diego, and has been in operation since 1981. During the 1993 assessment, collections were housed in Building 127. Currently, collections are housed Building 257 and Building 128, the Ballast Point Repository Annex. Building 127 is now used for temporary storage while collections are being processed. Building 257 (Figure 48) occupies 3,200 ft² and was constructed in 1940. Building 128 (Figure 49) occupies 143 ft² and

Figure 48. Building 257 is built into a hill and was originally used as a morgue.

Figure 49. Some collections are stored in Building 128, the Ballast Point Repository Annex.

was constructed in 1904. Both were originally used as morgues and both are currently employed as collections storage facilities.

Structural Adequacy

Collection Storage Area 1—Building 257

The one-story Building 257 is constructed into the side of a hill, with the roof, back, and side walls embedded in the hill. Only the front is accessible from the exterior through a metal panel door. The foundation is concrete, and the ceiling is poured concrete. The walls are 8-inch steel-reinforced concrete. Building 257 was renovated to include steel doors, a concrete floor, a cooling system, and two-ply epoxy paint. No windows are present in the building.

Collection Storage Area 2—Building 128

Building 128 is also single-story and has a concrete foundation. Exterior walls are concrete block covered with plaster. The roof is concrete with a small wood and plaster cupola with asphalt shingles and an exhaust fan. One window in Building 128 has been covered with plywood. The floor in Building 128 is concrete, and walls and ceiling are plaster. The walls have been coated with two-ply epoxy paint. One wooden solid core door is present and has a 14” x 19” wooden grate with mosquito netting.

Environmental Controls

Collection Storage Area 1—Building 257

Targeted temperature in Building 257 ranges between 55–60º and targeted relative humidity is 55%. Conditions are monitored with a hygrothermograph and a small hygrometer, and a system regulator is present in the building. Hygrothermograph paper is changed weekly by Fort Guijarros volunteers. Dust filters are present on the environmental controls. The Public Works Center checks the environmental controls monthly, and the Fort Guijarros volunteers check the monitors and controls weekly. Fluorescent lights fitted with UV filters provide illumination.

Collection Storage Area 2—Building 128

Temperature and humidity controls are not present in Building 128. Lighting is provided with fluorescent lights that are not equipped with UV filters.

Pest Management

There is no pest-management program in Building 257 or 128.

Security

NAVSUBASE Point Loma is a closed base. All visitors must register at the front gate and receive a pass to enter. Military police patrol after normal working hours, and approximately once every hour.

Collection Storage Area 1—Building 257

The door to Building 257 is secured with a key lock. The key is locked in the laboratory where the Fort Guijarros director and a few other volunteers have

access. Additional keys are kept with the master chief, compliance office, and the facilities engineer.

Collection Storage Area 2—Building 128

The door to Building 128 has a key lock.

Fire Detection and Suppression

Collection Storage Area 1—Building 257

No fire-detection or -suppression systems are present in Building 257, but a fire door and a concrete fire wall are present.

Collection Storage Area 2—Building 128

No fire-detection or -suppression systems are present in Building 128.

Artifact Storage

Storage Units

Approximately 435.81 ft³ of artifacts (Table 73) are housed in Buildings 257 and 128 on rigid plastic earthquake-proof Metro Max® shelves with metal reinforcements. The shelves measure 18 x 48 x 87 inches (d x w x h).

Table 73.
Percentage by Volume of Navy Artifacts Housed at the Fort Guijarros Museum Foundation

Material Class	NAVSUBASE Point Loma, California
Lithics	7.23
Prehistoric Ceramics	0.13
Faunal Remains	7.54
Shell (unmodified)	41.03
Botanical	0.88
Flotation	—
Soil	9.30
^{14}C	0.97
Human Skeletal Remains	0.01
Worked Shell	—
Worked Bone	—
Brick/Masonry	15.90
Historic Ceramics	0.27
Metal	11.44
Glass	0.83
Textiles	0.27
Other	4.20
Total	100

Other material classes include leather, whale fritters, coal, pumice, mineral, gravel, egg shell, insect remains, fur, Caucasian human hair, and historic items.

Primary Containers

Artifacts are housed in archival boxes that measure 16.0 x 12.25 x 10.5 and 16.0 x 6.0 x 10.25 inches (d x w x h) (Figure 50). The boxes are labeled directly in pen or with a paper label covered with plastic in a metal clip. Label information is written in pen or marker and includes box number and provenience. Some artifacts are housed in wooden boxes that measure 16 x 16 x 8 inches (d x w x h). The wooden boxes are labeled with a pre-printed adhesive label that identifies material class, site number, box contents, and landowner. Artifacts are also housed in corrugated plastic boxes that measure 10.0 x 12.0 x 11.25 and 16.0 x 8.5 x 10.5 inches (d x w x h).

Figure 50. Artifacts are stored in boxes on earthquake-proof shelves in the bunker tunnel of Building 257.

Secondary Containers

Secondary containers consist of 4-mil polyethylene zip-lock bags that have been labeled with pre-printed acid-free paper inserts that identify provenience, catalog number, material class, object weight, and count. Some of the plastic bags have been directly labeled in pen or marker. Nested within some of the

plastic bags are archival cardboard boxes and additional plastic bags. In the wooden boxes, Spanish tiles are wrapped in archival felt and acid-free tissue, and some are wrapped in bubble wrap.

Laboratory Processing and Labeling

Approximately 77% of the artifacts have been cleaned, and 18% have been directly labeled in india ink over a white base coat. All secondary containers have an acid-free paper label in them.

Human Skeletal Remains

A human premolar from site CA-SDI-12953 was located during analysis by SDSU. It is believed to be a whaler's tooth extracted through medical procedures (May 1998). A human cranial fragment from site CA-SDI-12000 was sent to Dr. Doug Owsley at the Smithsonian Institution who confirmed that it is human. The cranial fragment is still at the Smithsonian. Caucasian human hair is also present in the collection.

Records Storage

Collection Storage Area 1—Building 257

In Building 257, approximately 7.94 linear feet of records are kept on rigid plastic earthquake-proof Metro Max® shelves with metal reinforcements (Table 74). The shelves measure 18 x 48 x 87 inches (d x w x h). On the shelves, paper records, photographs, and some negatives are kept in archival boxes that measure 16.0 x 12.25 x 10.5 inches (d x w x h). The boxes are labeled with an acid-free piece of paper in a metal clip with a plastic cover. The label is written in pen or marker and identifies box number, box contents, and project. Additional slides and negatives are kept on the shelves in corrugated plastic boxes that measure 10.0 x 12.0 x 11.25 inches (d x w x h). The plastic boxes are labeled with an adhesive label written in marker. Copies of the records are kept in storage.

Table 74.
Linear Footage of Navy Associated Documentation Housed at the Fort Guijarros Museum Foundation

Materials	NAVSUBASE Point Loma, California
Paper	3.83
Reports	—
Maps and Oversized Documents	0.50
Audiovisual	—
Photographs	3.61
Computer	—

Paper Records

Approximately 3.83 linear feet of excavation and analysis documents, and drawings are kept in Building 257. Within the archival boxes, paper records are kept in archival and nonarchival folders that are labeled with an acid-free piece of paper inserted in a plastic tab.

Photographs

Approximately 3.61 linear feet of photographic documents, including color prints, black-and-white prints, slides, and negatives, are kept in Building 257. The slides and negatives in the plastic boxes are kept in archival sleeves; the photographs and negatives in the archival boxes are in nonarchival plastic sleeves (Figure 51).

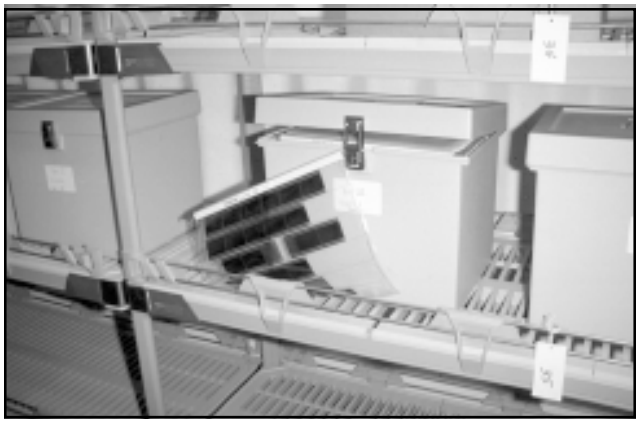

Figure 51. Negatives are stored in archival sleeves in hanging file folders.

Maps and Oversized Documents

Approximately 0.50 linear feet of blueline maps are kept in one of the acid-free boxes. The maps have been rolled and are secured with a rubber band.

Collections Management Standards

Registration Procedures

Accession Files

Materials are cataloged during artifact analysis. Accessioning is discussed in the Fort Guijarros policies and procedures manual (May 1994).

Location Identification

Fort Guijarros is in the process of compiling a box list that will include shelf storage number, and an internal document identifies collections location.

Cross-Indexed Files

The master catalog is cross indexed to specific artifact bags and provides information on provenience, location of field notes, map records, and photographs in the History Database program.

Published Guide to Collections

There is no published guide to the collections.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

The General Analytic Catalog is the lab assistant software system used by the Foundation. Computer back-ups are kept on zip disk. Photographs have been cataloged in a History Database program.

Written Policies and Procedures

Minimum Standards for Acceptance

The Fort Guijarros policies and procedures manual discusses the receipt of collections (May 1994).

Curation Policy

The Fort Guijarros policies and procedures manual covers the processing and use of materials and future preservation (May 1994).

Records Management Policy

The policies and procedures manual addresses records management (May 1994).

Field Curation Procedures

Field curation procedures are discussed in the Fort Guijarros policies and procedures manual (May 1994).

Loan Policy

The Fort Guijarros policies and procedures manual discusses loans incoming to the Foundation, and out-going loan procedures are briefly identified (May 1994).

Deaccessioning Policy

No written policy for deaccessioning exists, but forms are used when material is discarded. Samples of bulk materials (e.g., clam shells, Spanish tiles) are saved for analysis, and the rest is discarded.

Inventory Policy

A draft written inventory policy is currently in place (May et al. 1996).

Latest Collection Inventory

The collections were last inventoried in 1998 (May 1998). A complete box inventory was provided to Navy Region, Southwest in 1996 to assist RECON to prepare a draft inventory summary for NAGPRA compliance, but the summary was not completed.

Curation Personnel

All staff are volunteers who serve in the capacity of director, laboratory supervisor/collection manager, and approximately 15 other regular volunteers.

Curation Financing

Curation is mainly financed by the Fort Guijarros Museum Foundation. The Navy provides the building space, water and electricity, and maintenance of the buildings.

Access to Collections

Access to collections is controlled by the director or lab supervisor for persons having legitimate reasons for requiring access. Fort Guijarros volunteers and NAVSUBASE Point Loma staff review research requests, and visitors are supervised at all times.

Future Plans

Future plans include upgrading the collection database, continuing to copy field documents, and creating additional written procedures.

Comments

1. The Fort Guijarros Museum Foundation is a permanent curation facility.

2. Excellent environmental controls, including temperature and humidity monitoring devices, are present in Building 257. No temperature or humidity controls are present in Building 128.

3. An integrated pest management plan is not present in Building 257 or Building 128.

4. Basic security deterrents are present in Building 257 and Building 128, and no security-detection devices are in place.

5. Basic fire-suppression devices are present in Building 257, and no fire-detection systems have been installed. Building 128 does not have any fire-detection or -suppression devices.

6. Artifacts are housed in 4-mil polyethylene zip-lock bags and acid-free boxes in archival boxes, wooden boxes, and corrugated plastic boxes on plastic earthquake-proof shelves in Buildings 257 and 128.

7. Artifact collections are in the process of being repackaged and entered into a computerized database. As they are repackaged, brown acid-free boxes are replaced by lignin-free boxes and high quality acid-free boxes, which receive monel-metal framed tags with box numbers. Boxes are then moved to Building 257.

8. Building 257 leaks because of an overhead tree that has roots that are diverting water; however, this tree is slated for removal. Some artifact boxes in Building 128 are damp from a leaking ceiling.

9. Records are housed in archival folders in archival boxes and corrugated plastic boxes in Building 257. Photographic documents are in archival sleeves.

10. Some contaminants, such as rubber bands, are present in the records collection.

11. Copies of some records have been produced on acid-free paper, and the duplication of field records is ongoing.

12. Two human skeletal remains, a premolar believed to be historic and a cranial fragment, are part of the Fort Guijarros collection. The cranial fragment is still at the Smithsonian Institution.

13. Fort Guijarros has contracted with SPAWAR to conduct a NAGPRA final inventory summary, notification of Native American tribes, and prepare an inventory document.

14. The Fort Guijarros Museum Foundation is operating the collections management program under a Memorandum of Agreement with NAVSUBASE Point Loma. The entire staff of the Foundation consists of unpaid volunteers.

15. A number of collections are on display in various locations. Several pieces of Chinese ceramics are on exhibit in the San Diego Chinese Historical Museum. A jar, abalone shell, and approximately 25 ceramic sherds are on display in the Bachelor Officer's Quarters "Slattery Hall" on NAVSUBASE Point Loma. Approximately 10 pieces of Spanish tile are on display in Old Town San Diego for the San Diego city schools fourth grade history program. Some plates, cups, and bowls are planned for future interpretive exhibits on the Ballast Point Whaling Station.

16. The Fort Guijarros collections have been frequently used and analyzed by students and professional researchers. They are available for scientific research.

Recommendations

1. Artifacts require (a) direct labeling (when applicable) and (b) storage in appropriate archival primary containers (not wooden boxes).

2. Records require (a) packaging in archival files and (b) continued duplication of all documents.

3. Remove contaminants from the records collection.

4. Install environmental and humidity controls in Building 128 if the collections continue to be kept there.

5. Implement an integrated pest management plan in Buildings 257 and 128.

6. Equip the fluorescent lights in Building 128 with UV filters.

7. Install additional security deterrents and detection devices, such as motion sensors, alarms wired to the police, and dead bolt locks, in Buildings 257 and 128 to increase security.

8. Install additional fire-detection and -suppression systems, such as manual fire alarms, smoke detectors, heat sensors, sprinkler system, fire extinguishers, and alarms wired to the fire department, in Buildings 257 and 128.

9. NAGPRA compliance must be met for the two human skeletal fragments.

10. Building 257 requires immediate remedial steps to stop the water leaking caused by the tree.

7-6

Fowler Museum of Cultural History

University of California
Los Angeles, California

Repository Summary

Volume of Artifacts: 302.62 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 5.52 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 2.45 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human skeletal remains and associated funerary objects in the collection need to be brought into compliance with NAGPRA.

Date of Visit: February 23, 1999

Person Contacted: Wendy Teeter, Curator of Archaeological Collections

The Fowler Museum of Cultural History houses approximately 305.07 ft³ of artifacts and human skeletal remains and 5.52 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 75).

Table 75.
Volume of Navy Archaeological Collections Housed at the Fowler Museum of Cultural History

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	302.62	2.45	5.52
Total	302.62	2.45	5.52

Assessment

The Fowler Museum is currently located in Mira Hershey Hall on the University of California, Los Angeles campus. Hershey Hall occupies 82,223 ft² and was built in the 1920s as a dormitory and cafeteria (Figure 52). It now contains classrooms and offices and part of the building has been adapted for use as a storage repository for archaeological collections. This space is temporary while the permanent facility (Haines Hall) is being retrofitted for earthquake protection. The building has three stories above grade where the classrooms and offices are located. The collection storage area occupies 4,400 ft² on one floor above grade and 1,500 ft² below grade in a wing behind the main section of Hershey Hall where the original kitchen was located. The area has separate rooms for human remains,

Figure 52. Collections are temporarily housed in Hershey Hall.

consultation, funerary objects, and the collections manager's office. The main storage area for archaeological collections also has a study area, records storage area, and space for collections processing. Collections from NAS North Island are housed in four areas of Hershey Hall: the main storage area, the basement, Room 1411D (associated funerary objects room), and Room 1411B (human skeletal remains room).

Structural Adequacy

Hershey Hall has a concrete foundation, poured concrete exterior walls, and a clay tile roof covered with wire mesh to prevent birds from building nests. The roof partly dates to 1931, and was retiled in 1957. The building has numerous original windows with steel frames, and all windows in the collections storage area have a UV protective film over them. Metal doors are present throughout the building.

Collection Storage Areas 1, 2, and 3—Main Storage Area, Room 1411D, and Room 1411B

The main collections storage area, Room 1411D, and Room 1411B have concrete floors with some ceramic tile overlay. The interior walls are constructed of plasterboard, but with some ceramic tile partially covering the walls. The ceilings are made of acoustical tiles, but it is not a suspended ceiling.

Collection Storage Area 4—Basement

The basement has a concrete floor, concrete ceiling, and poured concrete interior walls. No windows are in the basement, and a metal fire door is present.

Environmental Controls

Collection Storage Areas 1 and 4—Main Storage Area and Basement

There are temperature controls in certain areas of the wing, but none in the main storage area or the basement. Lighting in the main storage area and the basement is provided by fluorescent lights that do not have UV filters.

Collection Storage Areas 2 and 3—Room 1411D and Room 1411B

Window air conditioning units are present in the Room 1411D and Room 1411B. The targeted temperature is in the 70s. Rooms are lit with fluorescent lights that do not have UV filters.

Pest Management

The building was monitored and sprayed before the collections were moved to the building.

Security

Security measures for the building include key locks on all doors, motion detectors, controlled access, locked and grated windows, and direct telephone lines to Fowler Museum security and campus police.

Collection Storage Areas 2 and 3—Room 1411D and Room 1411B

In addition to the above, Rooms 1411D and 1411B require a key code to enter, and each employee has a different code. Employees from university facilities require the collection manager to gain access to the collection room.

Fire Detection and Suppression

Fire-detection and -suppression measures include manual fire alarms, smoke detectors, fire doors and walls, fire extinguishers, a fire hose, and a sprinkler system.

Artifact Storage

Storage Units

A total of 305.07 ft³ of artifacts and human skeletal remains is housed in all four collection storage areas at the Fowler Museum (Table 76). Approximately 290.45 ft³ of the artifacts and human skeletal remains are housed in the main storage area, 7.40 ft³ are housed in Room 1411D, and 1.22 ft³ of human skeletal remains are housed in Room 1411B (Figure 53). Artifacts are stored on open metal shelving units measuring 18 x 48 x 87 inches (d x w x h). The shelves are bolted to the ground and have been attached to each other across the aisles for additional support. In the basement, an additional 6.0 ft³ of oversized groundstone objects are also housed on small wooden pallets.

Table 76.
Percentage by Volume of Navy Artifacts Housed at the Fowler Museum of Cultural History

Material Class	NAS North Island, California
Lithics	41.6
Prehistoric Ceramics	—
Faunal Remains	20.0
Shell (unmodified)	9.4
Botanical	2.7
Flotation	2.4
Soil	15.0
^{14}C	1.0
Human Skeletal Remains	0.8
Worked Shell	0.1
Worked Bone	0.7
Brick/Masonry	—
Historic Ceramics	—
Metal	0.5
Glass	0.1
Textiles	—
Other	5.7
Total	100.0

Other material classes include asphaltum, midden samples, petrified wood, surface residue, associated burial items, basketry, cordage, and ochre.

Primary Containers

The majority of the collections are housed in archival boxes that measure 16.5 x 12.75 x 10.0, 16.5 x 13.0 x 10.5, and 13.0 x 18.25 x 3.0 inches, (d x w x h). The boxes are labeled with pre-printed archival labels covered with clear tape, and some boxes are labeled directly in marker. The labels identify accession number, site number, and box number. Collections are also housed in acidic cardboard boxes that measure 20.0 x 12.25 x 12.5 inches (d x w x h). The boxes are labeled directly in marker with accession number and provenience.

Figure 53. Some artifacts are stored in the basement storage area.

Secondary Containers

In the archival boxes, secondary containers consist of archival boxes and 4-mil plastic zip-lock bags that are labeled with a pre-printed acid-free label in a separate zip-lock bag within the secondary container. Label information includes provenience, catalog number, accession number, bag contents, material class, and quantity. Some of the more delicate items have been further separated within the primary containers using stackable interior archival partitions that are divided into four sections. In the acidic cardboard boxes, secondary containers consist of 2-mil plastic zip-lock bags that have been directly labeled with site number, contents, and provenience. An acidic paper card labeled with accession number, project, site number, and provenience is in the plastic bags. Additionally, some artifacts are wrapped in aluminum foil, acid-free tissue, or bubble wrap. Some small items have acid-free paper with numbers inside the bag with the item. The oversized groundstone objects stored in the basement have been wrapped in bubble wrap that has been taped to each object, and are labeled with a pre-printed paper label in a plastic zip-lock bag taped to the bubble wrap.

Laboratory Processing and Labeling

Approximately 90% of the artifacts have been cleaned and approximately 35% of the artifacts have

been directly labeled in india ink, sometimes on a white base coat or nail polish. A large portion of the collection consists of unsorted samples that are not fully processed and labeled.

Human Skeletal Remains

Collection Storage Area 3—Room 1411B

Approximately 1.22 ft³ (MNI=3) of human skeletal remains from sites T-1, SCLI-1, and SCLI-1487 are housed in Room 1411B, which is reserved for only human skeletal remains. The remains are kept in an archival box that measures 16.5 x 12.75 x 10.0 inches (d x w x h) and is directly labeled in marker. Within the box, remains are kept in 2- and 4-mil plastic zip-lock bags that are directly labeled in marker with catalog number and accession number. The cranium is wrapped in bubble wrap and ethafoam. The remains are in good condition.

Approximately 1.23 ft³ of human skeletal remains from sites SCLI-703 and SCLI-1487 are housed with the artifacts in the main storage area in 4-mil plastic zip-lock bags in archival boxes. The MNI is not determined.

Records Storage

Collection Storage Area 1—Main Storage Area

Approximately 5.52 linear feet of records are housed at the Fowler Museum (Table 77). Of that total, 4.77 linear feet are stored in an alcove off of the main collection storage area. Most of the records are housed in three-ring binders in archival boxes measuring 16.5 x 12.75 x 10.0 inches (d x w x h) on open metal shelving units. The boxes are labeled directly in marker with contents and box number, and the binders are labeled directly in marker and with an adhesive label-maker label. Some records are housed in manila envelopes in an acidic cardboard box that measures 12.0 x 10.25 x 10.25 inches (d x w x h).

Approximately 0.75 linear feet of records are stored in three boxes with the associated artifacts on metal shelves in the main artifact storage area. Within these boxes, the records are housed in 4-mil plastic zip-lock bags.

Table 77.
Linear Footage of Navy Associated Documentation Housed at the Fowler Museum of Cultural History

Materials	NAS North Island, California
Paper	4.36
Reports	0.96
Maps and Oversized Documents	—
Audiovisual	—
Photographs	0.03
Computer	0.17

Paper Records

Approximately 4.75 linear feet of administrative, survey, excavation, and analysis documents, reports, and artifact lists are housed in archival and acidic boxes in the records alcove. Approximately 0.57 linear feet of excavation and analysis documents, drawings, reports, and card files are kept in an archival box with the artifacts.

Photographs

Photographic records, including black-and-white prints, color prints, and negatives, total 0.02 linear feet and are kept in the archival and acidic boxes in the records storage alcove. One slide is stored in a small metal cabinet with rows of sliding plastic units (Figure 54). Approximately 0.01 linear feet of color photographs is kept in an archival box with the artifacts.

Figure 54. Negatives are housed in envelopes in a metal cabinet.

Computer

Approximately 0.17 linear feet of computer tapes are kept in an archival box with the artifacts.

Collections Management Standards

Registration Procedures

Accession Files

All materials are accessioned upon receipt.

Location Identification

Location information is identified in the accession files.

Cross-Indexed Files

Files are cross indexed.

Published Guide to the Collections

No published guide to the collections exists.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

Collections are managed with a Paradox program, and the NAS North Island artifacts or bags of artifacts have been entered into a Lab Assistant program. Back-ups are kept on zip disk.

Written Policies and Procedures

Minimum Standards for Acceptance

Curation Policy

A comprehensive curation policy exists that addresses the receipt, processing, use, and future preservation of materials.

Records Management Policy

No records management policy has been established.

Field Curation Procedures

Field curation procedures exist.

Loan Policy

A written loan policy exists.

Deaccessioning Policy

Collections are not deaccessioned.

Inventory Policy

No inventory policy is in place.

Latest Collection Inventory

A collection inventory is currently in progress. A partial inventory took place prior to the move.

Curation Personnel

Wendy Teeter is a part time collections manager. A volunteer provides assistance.

Curation Financing

Outside funding is provided by the landowners, such as NAS North Island, for particular collections. There is no budget for curation. Four volunteers work on collections.

Access to the Collections

Collections may be accessed by individuals with a legitimate reason for access.

Future Plans

Grants are being pursued to make the collections manager position full-time. The entire archaeology collection will be returned to its former building once it has been retrofitted and renovated.

Comments

1. The Fowler Museum is a permanent curation facility.

2. Environmental controls are not present in the basement or the main collections storage area. Rooms 1411D and 1411B have window air conditioning units.

3. An integrated pest-management plan is not in place.

4. Excellent security deterrents and detection devices are in place.

5. Excellent fire-detection and -suppression systems are present in the building.

6. Artifacts are housed in archival boxes and 4-mil plastic zip-lock bags in archival boxes and in 2-mil plastic zip-lock bags in acidic cardboard boxes on metal shelves in the main collection storage area and Room 1411D. In the basement, groundstone artifacts are also kept on wooden pallets.

7. A large portion of the collections consists of unsorted samples that are not fully processed and labeled.

8. Some primary containers have been overpacked or have been packed in a way that puts artifacts at risk for damage.

9. Records are kept in three-ring binders in archival boxes and in manila envelopes in an acidic box on metal shelves in an alcove off the main collection storage area. Some records are kept in 4-mil plastic zip-lock bags in archival boxes with the artifacts in the main collection storage area.

10. Contaminants, such as rubber bands, are present in the records collection.

11. The records have not yet been rehabilitated. The Fowler Museum is going to request additional funds to complete rehabilitation.

12. Human skeletal remains are housed in 2- to 4-mil plastic zip-lock bags in archival boxes in the main collection storage area and Room 1411B. Associated funerary objects are also present in the collection.

13. Some human skeletal remains were transferred to Dr. Phillip Walker at UCSB for analysis and inventory.

14. In 1996, the Fowler Museum repackaged, reboxed, and compressed the NAS North Island collections through a curation improvement project.

15. Hershey Hall is a temporary storage building while Haines Hall is being renovated.

Recommendations

1. Artifacts require (a) cleaning, (b) direct labeling (where applicable), (c) storage in appropriate archival primary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Rebox overpacked artifact boxes.

3. Records require (a) packaging in archival files, (b) creation of a finding aid, and (c) creation of an archival duplicate copy for security.

4. Remove records from the artifact collections.

5. Remove contaminants, such as rubber bands, from the records collection.

6. Ensure that Haines Hall, which will be the permanent repository for the collections, is equipped with environmental and humidity controls, such as an HVAC system.

7. Implement an integrated pest-management plan.

8. Ensure that the lighting in Haines Hall is equipped with UV filters.

9. Ensure that Haines Hall has excellent security-deterrents and -detection devices, as well as excellent fire-detection and -suppression measures.

10. Create and implement the policies and guidelines as noted above if they are not currently in place.

11. Pull all human skeletal remains from artifact boxes and place in the human skeletal remains room. Ensure that NAGPRA compliance is met.

12. Process most of the column samples and the flotation samples to reduce the volume; however, retain a sample for future research.

7-7

Gallegos and Associates

Carlsbad, California

Repository Summary

Volume of Artifacts: 10.20 ft³

Collection Origin: NAVSUBASE Point Loma, California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.45 linear feet

Collection Origin: NOLF Imperial Beach, California (0.06 linear feet); NAVSUBASE Point Loma, California (0.19 linear feet); NWS Fallbrook, California (0.20 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: April 26, 1999

Person Contacted: Dennis Gallegos, Archaeologist

Gallegos and Associates houses approximately 10.20 ft³ of artifacts and 0.45 linear feet of associated documentation from projects conducted on Naval OLF Imperial Beach, NAVSUBASE Point Loma, and Naval Weapons Station Fallbrook, all in California (Table 78). The St. Louis District previously evaluated Navy collections at Gallegos and Associates in September 1993 (U.S. Army Corps of Engineers 1999a) for a different project. Most of the repository information has not changed since that visit and will be repeated for this chapter.

Table 78.
Volume of Navy Archaeological Collections Housed at Gallegos and Associates

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NOLF Imperial Beach, California	—	—	0.06
NAVSUBASE Point Loma, California	10.20	—	0.19
NWS Fallbrook, California	—	—	0.20

Assessment

Gallegos and Associates occupies approximately 639 ft² in a single-story office complex that was built in 1990 (Figure 55). The suite includes a reception area, office, and a laboratory. The laboratory is 522 ft², and has space for a receiving/loading dock, an artifact washing and holding area, an artifact

Figure 55. Gallegos and Associates is located in an office complex.

processing area, a temporary artifact storage area, a records storage area, and offices.

Structural Adequacy

The building has a concrete slab foundation, a steel frame, and concrete block exterior walls. The flat roof is covered with composition paper (tar paper). Interior walls are covered with plasterboard. There is a suspended acoustical tile ceiling in the front office area and a natural wood beam ceiling in the laboratory. The floor in the office area is carpeted, whereas the floor in the laboratory is the concrete slab foundation. Two windows are present in the office area, and a skylight is in the laboratory. Three exterior doors are present, including a single panel glass door, a single panel metal door, and a metal overhead garage door. A single panel wood door separates the front office from the laboratory.

Environmental Controls

Temperature is controlled in the front office area by a central air conditioning system. However, temperature and humidity are not monitored or controlled in the laboratory. Air is circulated by a floor fan. Lighting is provided by fluorescent tubes, skylight, and desk lamps that are not equipped with UV filters.

Pest Management

No integrated pest management exists. If insect or rodent infestation occurs, the staff notify building maintenance, who then correct the problem.

Security

Intrusion alarms and dead-bolt locks are installed on all exterior doors. Key locks exist on the interior doors. All permanent employees have keys to the office and laboratory areas.

Fire Detection and Suppression

A fire extinguisher is located on a wall in the laboratory.

Artifact Storage

Primary Containers

Approximately 9.20 ft^3 of artifacts are housed in archival boxes (Figure 56) that measure 15.50 x 12.25 x 10.50 inches (d x w x h) (Table 79). The boxes are labeled with a printed adhesive label that identifies contractor name and address, provenience, site number, contents, and project number. In addition to the boxes, a metate (approximately 1.0 ft^3) is also housed at Gallegos and Associates.

Figure 56. Artifacts are housed in cardboard boxes.

Secondary Containers

Within the boxes, artifacts are kept in paper bags, which hold tertiary containers consisting of 2-mil plastic zip-lock bags. The bags are labeled with a pre-printed foil-backed adhesive label, and some bags also have a loose paper label inserted in them. The label identifies site number, provenience, project number, project name, object, and weight.

Table 79.
Percentage by Volume of Navy Artifacts Housed at Gallegos and Associates

Material Class	NAVSUBASE Point Loma, California
Lithics	45.0
Prehistoric Ceramics	—
Faunal Remains	2.5
Shell (unmodified)	45.0
Botanical	—
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	—
Worked Shell	0.5
Worked Bone	—
Brick/Masonry	0.5
Historic Ceramics	0.5
Metal	1.0
Glass	1.0
Textiles	—
Other	4.0
Total	100.0

Other material classes include charcoal and wood.

Laboratory Processing and Labeling

Approximately 55% of the artifacts have been cleaned and 20% have been labeled directly in india ink covered with a clear top coat.

Human Skeletal Remains

No human skeletal remains from Navy facilities are housed at Gallegos and Associates.

Records Storage

Approximately 0.45 linear feet of records are housed at Gallegos and Associates (Table 80). Photographic records are kept in binders on painted plywood shelves (Figure 57). Paper records are kept in manila folders and hanging file folders in an acidic box that measures 15.75 x 12.50 x 10.50 inches (d x w x h) on top of a filing cabinet. The folders are labeled with adhesive labels and directly in pen and pencil, and the box is labeled with a computer-generated adhesive label that identifies project number.

Paper Records

The paper records comprise approximately 0.32 linear feet and consist of administrative, background, and survey documents, reports, and catalogues.

Figure 57. Photographic documents and record search results are stored in three-ring binders.

Table 80.
Linear Footage of Navy Associated Documentation Housed at Gallegos and Associates

Facility	Paper	Reports	Maps and Oversized	Audiovisual	Photographs	Computer
NOLF Imperial Beach, California	0.02	0.02	0.01	—	0.01	—
NAVSUBASE Point Loma, California	0.08	0.04	0.01	—	0.06	—
NWS Fallbrook, California	0.12	0.04	0.03	—	0.01	—

Photographs

Approximately 0.08 linear feet of slides, negatives, and color prints are housed at Gallegos and Associates. Photographic records are kept in archival sleeves.

Maps and Oversized Documents

Blueprint maps totaling 0.05 linear feet are present in the records collection.

Collections Management Standards

Registration Procedures

Accession Files

All material is accessioned by project number.

Location Identification

The location of the collection (archaeological materials and records) is identified in the accession file.

Cross-Indexed Files

The files are cross indexed by project number, project name, and site numbers.

Published Guide to Collections

There is no published guide to the collections because Gallegos and Associates is a temporary repository for collections.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

A computerized database is used.

Written Policies and Procedures

Minimum Standards for Acceptance

There are no minimum standards for acceptance; however, Gallegos and Associates only temporarily houses collections that they generated.

Curation Policy

There are written procedures for cataloging archaeological materials.

Records Management Policy

A records management policy is being designed.

Field Curation Procedures

Field curation guidelines do not exist.

Loan Policy

Callegos and Associates rarely loans materials. If a loan request is received, appropriate documentation is completed.

Deaccessioning Policy

There is no deaccessioning policy.

Inventory Policy

There is no inventory policy.

Latest Collection Inventory

The collections and records were last inventoried in 1990 prior to the move into the existing facility.

Curation Personnel

The curation staff consists of four permanent employees: a project manager and three archaeologists. Additionally, temporary staff are hired on an as-needed basis.

Curation Financing

Curation Activities are financed through cultural resource management contracts.

Access to Collections

The permanent staff are the only individuals with keys to the facility. Access is granted to visitors with a legitimate reason for reviewing the collections.

Future Plans

Plans include using acid-free paper and archival boxes.

Comments

1. Gallegos and Associates is not a permanent curation facility.

2. The laboratory, where collections are kept, is not equipped with environmental controls.

3. Basic security deterrents are present, but no security-detection devices are in place.

4. Basic fire-suppression measures are present, but not fire-detection systems are in place.

5. The artifacts are housed in 2-mil plastic zip-lock bags in paper bags in archival boxes.

6. Approximately half of the artifacts have been cleaned and 20% have been directly labeled.

7. Paper records are housed in manila and hanging file folders in an acidic cardboard box. Photographic records are kept in archival sleeves in three ring binders.

8. Collections at Gallegos and Associates were being processed and will be transferred to a permanent repository.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable facilities to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival secondary containers that have been labeled, (d) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, and (b) creation of an archival duplicate copy for security.

7-8

KEA Environmental, Inc.

San Diego, California

Repository Summary

Volume of Artifact Collections: 6.90 ft³

Collection Origin: NAVSTA San Diego, California (5.75 ft³) and Salton Sea Test Base, California (1.15 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for curation.

Linear Feet of Records: 0.65 linear feet

Collection Origin: NAVSTA San Diego, California (0.15 linear feet) and Salton Sea Test Base, California (0.50 linear feet)

Compliance Status: Associated documentation requires complete rehabilitation to comply with current federal guidelines and modern archival preservation standards.

Human Skeletal Remains: None

Date of Visit: February 28, 2000

Person Contacted: Rebecca McCorkle Apple, Archaeologist

KEA Environmental, Inc., houses approximately 6.90 ft³ of artifacts and 0.65 linear feet of associated documentation from NAVSTA San Diego and Salton Sea Test Base, both in California (Table 81).

Table 81.
Volume of Navy Archaeological Collections Housed at KEA Environmental, Inc.

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVSTA San Diego, California	5.75	—	0.15
Salton Sea Test Base, California	1.15	—	0.50

Assessment

KEA Environmental is located in an office building, which was originally constructed as the San Diego National Bank Building (Figure 58). The seven-story building, with two parking levels below grade, is now used for offices and is approximately 11 to 20 years old. The building has areas devoted to artifact holding and washing, temporary artifact storage, materials and supplies storage, offices, and security monitoring space. Archaeological collections are housed in the 595-ft² laboratory.

Structural Adequacy

The San Diego National Bank Building has a concrete foundation and glass panel and granite block exterior walls. The built-up asphalt roof is probably original to the building. Many renovations to the building were recently made. Multiple aluminum-framed windows are located in the building and are covered with blinds. No windows

Figure 58. KEA Environmental is located in an office building that was originally built for the San Diego National Bank.

are located in the laboratory, where the archaeological collections are housed. The laboratory has a concrete and tile floor, and a plaster board ceiling. Interior walls are constructed of wallboard/sheet rock. Two solid wood interior doors are located in the laboratory.

Environmental Controls

The building is equipped with central air conditioning and gas forced-air heat, and dust filters are present. The targeted temperature is 72º F. Humidity is not regulated or monitored. The building is maintained weekly by internal office staff, and a professional cleaning company is responsible for garbage collection and cleaning floors. Fluorescent lights that are not equipped with UV filters are used in the laboratory.

Pest Management

The building manager takes precautions, including control but not monitoring, against insects and rodents on a regular basis.

Security

Security consists of intrusion alarms that are wired directly to the police department. Also present are motion detectors and a 24-hour in-house guard. All doors have key locks, and access to the building is controlled. All of the windows are sealed and cannot be opened. Additionally, storage cabinets in the laboratory have key locks and only three staff members have keys to the laboratory.

Fire Detection and Suppression

Fire detection methods for the building consist of smoke detectors, manual fire alarms, and alarms wired directly to the fire department. The building is equipped with a sprinkler system, fire doors in the elevators, fire walls, and one fire extinguisher. The sprinkler system and the fire extinguisher are located in the laboratory.

Artifact Storage

Storage Units

Approximately 6.90 ft³ of artifacts from NAVSTA San Diego and Salton Sea Test Base are stored on metal shelves that measure 24 x 72 x 78 inches (d x w x h).

Primary Containers

Artifacts are housed in archival boxes measuring 15.5 x 12.5 x 10.25 inches (d x w x h) that are glued and folded and have telescoping lids (Figure 59). The boxes are labeled with an acid-free computer-printed label inserted in a plastic sleeve on the box. Label information consists of contractor, date, job name, job number, contract number, site number, and box contents.

Figure 59. Artifacts are housed in plastic zip-lock bags in archival boxes.

Secondary Containers

Artifacts are housed in 2- and 4-mil plastic zip-lock bags. Nested within the bags are additional zip-lock bags and a small archival box. The secondary containers are labeled directly in marker with

provenience, project, catalog number, and material class. Tertiary bags are also labeled directly with the catalog number.

Laboratory Processing and Labeling

Approximately 85% of the artifacts have been cleaned, and none have been directly labeled. Artifacts are sorted by material class and provenience.

Human Skeletal Remains

No human skeletal remains from Salton Sea Test Base or NAVSTA San Diego are curated at KEA Environmental.

Records Storage

Approximately 0.65 linear feet of associated documentation from Salton Sea Test Base and NAVSTA San Diego are housed in the laboratory at KEA Environmental (Table 82). A duplicate copy of the records has been created on acid-free paper and computer disk. The acid-free paper copy is stored in the laboratory, and the disks are stored off-site.

Table 82.
Linear Footage of Navy Associated Documentation Housed at KEA Environmental, Inc.

Materials	NAVSTA San Diego, CA	Salton Sea Test Base, CA
Paper	0.12	0.46
Reports	—	—
Maps and Oversized Documents	—	0.04
Audiovisual	—	—
Photographs	0.03	—
Computer	—	—

Paper Records

Paper records from NAVSTA San Diego (0.12 linear feet) include excavation and analysis documents. Some paper records are stored on metal shelves in acid-free folders in an archival box measuring 15.5 x 12.5 x 10.25 inches (d x w x h) that is glued and folded and has a telescoping lid. The acid-free folders are labeled directly in pencil and the box is labeled with a computer-printed paper label inserted in a plastic sleeve. Other paper records from NAVSTA San Diego are housed in a three-ring binder on a painted wooden shelf that is bolted to the wall. The binder is labeled with a computer-printed paper label inserted in plastic sleeves on the binder spine and front cover. Label information on the box and binder consists of contractor, box number, date, Navy base, job number, and site number.

Paper records from Salton Sea Test Base (0.46 linear feet) include survey and excavation records. They are stored on shelves in a two-door metal cabinet that measures 18 x 36 x 42 inches (d x w x h). One stack of records is held together with a rubber band and other records are in a three-ring binder that has been labeled with a paper inserted in the binder spine (Figure 60).

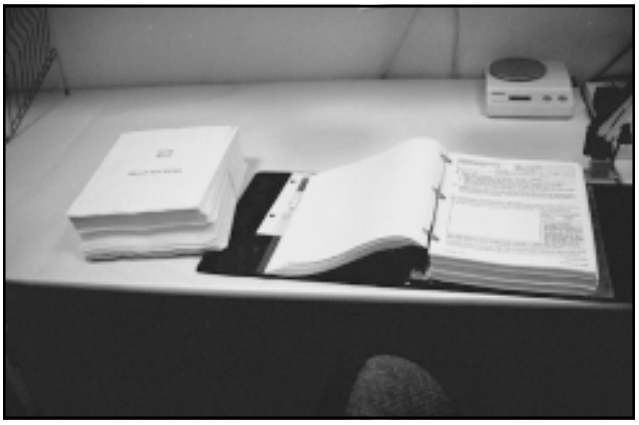

Figure 60. Associated documentation from Salton Sea Test Base is stored in a three-ring binder.

Photographs

Photographic records from NAVSTA San Diego (0.03 linear feet) consist of color and black-and-white prints and negatives. They are housed in the three-ring binder on the wood shelf.

Maps and Oversized Documents

Maps from Salton Sea Test Base (0.04 linear feet) are located in a three-ring binder in the two-door metal cabinet.

Collections Management Standards

Registration Procedures

Accession Files

All materials are currently being accessioned.

Location Identification

Locations of the artifacts, by project and accession number, within the repository are included in the accession file.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is used.

Computerized Database Management

A Microsoft Access database is used by the staff, and back-ups are made on disk every two weeks.

Written Policies and Procedures

Minimum Standards for Acceptance

KEA Environmental does not accept outside collections for curation.

Curation Policy

KEA Environmental is not a long-term curation facility.

Records Management Policy

There is no written records-management policy.

Field Curation Procedures

There are no written field-curation procedures.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

KEA Environmental does not have a written inventory policy.

Latest Collection Inventory

The artifact collection is currently being inventoried. Documentation was recently added to a database.

Curation Personnel

KEA Environmental does not have a full-time curator. Two archaeologists are responsible for the curation of the materials.

Curation Financing

Financing for the curation of collections is written into each contract.

Access to Collections

Access to the collections is controlled by archaeological staff, but no formal access policy has been established. Researchers are permitted to review the collections through written request and appointment.

Future Plans

At the time of the St. Louis District review, no plans for upgrading the curation program were in place. The collections were in the process of being inventoried and accessioned.

Comments

1. KEA Environmental is not a permanent curation facility.

2. Excellent environmental controls and dust filters are in place.

3. Excellent security-deterrents and -detection devices are present.

4. Excellent fire-suppression and -detection measures are in place.

5. Artifacts are kept in 2- and 4-mil plastic bags in archival boxes.

6. Most artifacts have been cleaned, but none have been directly labeled.

7. Records are housed in acid-free folders in an archival box, in three-ring binders on a wooden shelf, and loose in a metal cabinet.

8. Duplicate copies of the records have been made.

9. Records are in good condition, but some contaminants, such as rubber bands, are present.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) direct labeling (when applicable), and (c) insertion of acid-free labels in each secondary container.

3. Records require (a) packaging in archival containers and in archival files, (b) creation of a finding aid, and (c) creation of a duplicate copy for security.

7-9

Natural History Museum of Los Angeles County

Los Angeles, California

Repository Summary

Volume of Artifacts: 31.21 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 0.50 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation complies with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 0.03 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human Skeletal remains were transferred to UCSB (see Chapter 7-17) for analysis in April 1997. A few small elements were identified with the rest of the collection during the St. Louis District review.

Date of Visit: February 24, 1999

Person Contacted: Chris Coleman, Collections Manager

The Natural History Museum of Los Angeles County (NHMLAC) houses approximately 31.24 ft³ of artifacts and human skeletal remains and 0.50 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 83). The St. Louis District previously evaluated Navy collections at NHMLAC in October 1992 (U.S. Army Corps of Engineers 1997) and in December 1993 (Halpin and Holland 1997). Some of the repository information has not changed since those visits and will be repeated for this chapter.

Table 83.
Volume of Navy Archaeological Collections Housed at the Natural History Museum of Los Angeles County

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	31.21	0.03	0.50
Total	31.21	0.03	0.50

Assessment

The museum was constructed in 1914, and has had several renovations, including new wing additions (Figure 61). The museum has space for offices, storage, laboratories, and exhibits. Artifact and documentation collections from NAS North Island are stored in two different areas of the museum.

Figure 61. The Natural History Musuem of Los Angeles County was constructed in 1914.

Artifacts are housed in the 1,500-ft² Anthropological Collections Storage Room, and records are kept in the 120-ft² collections manager's office.

Structural Adequacy

The museum has a concrete foundation and brick exterior. The roof is ceramic tile. Multiple wood-framed windows are located throughout the building.

Collection Storage Area 1—Anthropological Collections Storage Room

The Anthropological Collections Storage Room is located on the mezzanine level, between the second and third floors, in the new annex. It has a concrete floor covered with tile, a concrete ceiling, and concrete block walls covered with plasterboard.

Collection Storage Area 2—Collections Manager's Office

Records are stored in the collections manager's office located on the third floor of the original museum structure. The room has a concrete floor, plaster interior walls, and a suspended acoustical-tile ceiling.

Environmental Controls

Collection Storage Area 1—Anthropological Collections Storage Room

No environmental controls are present in the Anthropological Collections Storage Room, and temperatures range from 50° to 70° F. Humidity levels are monitored with a hygrothermograph, but are not controlled. Light is provided by fluorescent tubes that are fitted with UV filters.

Collection Storage Area 2—Collections Manager's Office

In the collections manager's office, environmental controls consist of a zoned, forced-air heating system and a window air conditioner. Humidity levels are not monitored or controlled. Lighting is provided by fluorescent tubes fitted with UV filters.

Pest Management

A pest management plan is in effect for the museum. Pests are monitored through the use of No-Pest® strips. A conservator is always consulted when a problem is noticed, and storage rooms are regularly sprayed under the supervision of a conservator.

Security

Security measures for the museum include a 24-hour, in-house guard and strictly controlled access. All exterior doors have dead-bolt locks, and all windows have locks.

Collection Storage Area 1—Anthropological Collections Storage Room

Two sets of doors provide access to the Anthropological Collections Storage Area. They remain locked at all times, and each requires a different key. There are no windows in this area.

Collection Storage Area 2—Collections Manager's Office

Two doors also provide access to the collections manager's office, one leading to the hallway and the other to the office of the Anthropology section head. Doors are secured with key locks, and access is controlled by museum staff. Windows have latch locks and are difficult to access from the exterior.

Fire Detection and Suppression

The museum is equipped with manual fire alarms (wired to the fire department) in the hallways and

public areas, smoke detectors in public areas, and fire extinguishers in each room.

Collection Storage Area 1—Anthropological Collections Storage Room

Additionally, sprinkler systems are present in the Anthropological Collections Storage Room and exhibit areas, and fire doors are present in the Anthropological Collections Storage Room.

Artifact Storage

Collection Storage Area 1—Anthropological Collections Storage Room

Artifacts totaling 31.24 ft^3 are housed in the Anthropological Collections Storage Room (Table 84). Since the October 1992 visit, the artifacts have been rehabilitated and placed in the same cabinets, and textiles were rehabilitated and placed in a map cabinet.

Storage Units

Basketry and other fibrous materials are kept in a new metal map case, which is labeled with computer-printed paper labels identifying accession number, collection name, site name, material type, cabinet, and drawer designations (Figure 62). The rest of the artifact collections are stored in two fireproof metal cabinets that measure 25.25 x 56.0 x 49.75 and 32.0 x 29.0 x 87.0 inches (d x w x h). Label information is the same as the map case. The exterior cabinet door is also labeled with the information on computer-printed paper labels slid into attached metal frames.

Table 84.
Percentage by Volume of Navy Artifacts Housed at the Natural History Museum of Los Angeles County

Material Class	NAS North Island, California
Lithics	6.5
Prehistoric Ceramics	—
Faunal Remains	11.7
Shell (unmodified)	7.8
Botanical	6.9
Flotation	—
Soil	—
^{14}C	0.7
Human Skeletal Remains	0.1
Worked Shell	0.2
Worked Bone	2.1
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles/Basketry/Cordage	53.4
Other	10.6
Total	100.0

Other material classes include fur and feathers.

Figure 62. Textiles are housed in archival boxes in museum cabinets.

Primary Containers

The cabinets contain metal and wood drawers, which are lined with $^1/_8$"-thick foam padding. Each drawer is labeled with a pre-printed acid-free paper label stapled to the drawer. Label information includes accession number, collection name, site name, material type, cabinet, and drawer designations.

Secondary Containers

Within the drawers, artifacts are loose or in 4-mil plastic zip-lock bags, plastic vials, plastic coin containers, plastic boxes, or archival boxes, which have been lined with $^1/_8$"-thick foam. The secondary containers have been directly labeled in maker with accession number.

Laboratory Processing and Labeling

Approximately 53% of the collections have been cleaned. Acid-free paper tags attached with cotton string are inside each bag or taped to the bag. Some basketry and fibrous materials also have labels

written in marker on cotton cloth and directly sewn onto each piece with cotton thread. One basket is labeled with india ink and white ink on a clear base coat. Approximately 21% of the non-fibrous artifacts are directly labeled in india ink or white ink over a clear base coat.

Human Skeletal Remains

Collection Storage Area 1—Anthropological Collections Storage Room

Approximately 0.03 ft³ of human skeletal remains from NAS North Island are mixed with the faunal remains in the map case. The remains are labeled in india ink over a clear base coat and are housed in an archival box.

Records Storage

Collection Storage Area 2—Collections Manager's Office

Associated documentation totaling 0.50 linear feet is stored in two filing cabinets that measure 28.5 x 14.75 x 52.0 inches (d x w x h) (Figure 63) in the collections manager's office (Table 85). The cabinets are labeled with a pre-printed piece of paper inserted in a metal slot. Label information identifies series number, dates, and contents. In one of the cabinets records are in an archival box, which is labeled with a paper label stapled to it. In the other cabinet, records are in acid-free folders with pre-printed archival labels.

Figure 63. Some records have been rehabilitated into archival containers.

Table 85. Linear Footage of Navy Associated Documentation Housed at the Natural History Museum of Los Angeles County

Materials	NAS North Island, California
Paper	0.21
Reports	0.08
Maps and Oversized Documents	0.04
Audiovisual	—
Photographs	0.17
Computer	—

Paper Records

The paper records comprise approximately 0.29 linear feet and include excavation and analysis documents, reports, and drawings.

Photographs

Photographic records consist of 0.17 linear feet of black-and-white prints. The prints are in individual archival sleeves in the archival box.

Maps and Oversized Documents

Approximately 0.04 linear feet of maps are present in the collection.

Collections Management Standards

Registration Procedures

Accession Files

Artifacts are accessioned upon receipt by the registrar. The registrar assigns accession numbers, maintains donor files, and keeps artifact lists for each collection.

Location Identification

Collection location is not identified within the accession file. The Anthropology section maintains control of collections through a computerized database and a binder containing an in-house guide to the collections.

Cross-Indexed Files

Files are not cross indexed. Collections are identified by corresponding site designations, which are filed in alphabetical order. Information on any artifact or collection can be searched and located through the computer database.

Published Guide to Collections

No guide to the collections has been published. A multivolume set of records listing all federal collections from California by geographic location and accession number is available for use.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

Museum staff have designed their own computerized database, based on catalog cards, using Filemaker Pro. It was originally designed for ethnographic collections, but Chris Coleman adapted it for use with archaeological collections. This can be downloaded and inserted into a new system if desired.

Written Policies and Procedures

Minimum Standards for Acceptance

Minimum standards for acceptance include complete documentation of provenience. Nothing will be accepted that may present legal problems for the museum. Few archaeological collections are accepted due to space constraints.

Curation Policy

A comprehensive curation policy has been written.

Records Management Policy

No written records management is currently in place. However, the current collections manager has initiated records rehabilitation, which includes assessing, organizing, and computerizing the data and developing records management policies.

Field Curation Procedures

No field curation guidelines have been established. The museum no longer accepts archaeological collections from researchers.

Loan Policy

Loans are processed through the registrar's office. Standard loan forms are used for incoming, long-term, and outgoing loans. Additional stipulations made by the Anthropology section include a ban on photography, proof of insurance, and coverage of shipping costs.

Deaccessioning Policy

Deaccessioning of objects must be approved by obtaining the signatures of the registrar, the director, and the division head.

Inventory Policy

The inventory policy includes a system that categorizes types of collections. Collection category determines the inventory schedule for each type of collection. Collections with a high monetary value are inventoried every five years. The remainder of the collections is inventoried at regular intervals. For security purposes, the inventory schedule for each collection is known only to a few staff members.

Latest Collection Inventory

This could not be determined because of the nature of the inventory policy, as outlined above.

Curation Personnel

Curation personnel include Chris Coleman, Anthropology collections manager; Dr. Margaret Hardin, curator of ethnology and Anthropology section head; Dr. Chris Steiner, assistant curator of ethnology; and Dr. Karen Wise, assistant curator of archaeology.

Curation Financing

Curation is financed through photography fees, budgeted funds from the county, grants, a private museum foundation contributing through an endowment fund, and fund-raising events. Some Navy collections such as the NAS North Island collections have been rehabilitated through funds received through the corresponding installation.

Access to Collections

Access to collections is controlled by Mr. Coleman and curation personnel. Mr. Coleman has sole access to the exhibited materials. Only staff are unsupervised while in the collections storage areas.

Future Plans

Plans for upgrading the curation program include using acid-free materials for documents and secondary containers. General plans include improving the overall storage, cataloging all collections and computerizing the information, organizing, computerizing and rehabilitating the associated documentaton collection, and developing a management plan that encompasses the ethnographic and archaeological collections.

Comments

1. NHMLAC is a permanent curation repository.

2. The Anthropological Collections Storage Room does not have environmental controls. The collection manager's office has zoned forced-air heat and a window air conditioner.

3. An integrated pest management plan is in place for the museum.

4. Excellent security deterrents are in place for both collections storage areas, and adequate security-detection devices are present.

5. Excellent fire-detection and -suppression systems are present in the building.

6. Artifacts are housed in 4-mil plastic zip-lock bags, plastic vials, plastic coin containers, plastic boxes, and archival boxes in wooden and metal drawers in cabinets.

7. Approximately 53% of the artifacts have been cleaned, and 21% have been directly labeled. Most artifacts have a paper tag in the secondary container with them. Some of the collections have not been completely processed and have no direct or indirect labeling. Faunal remains require additional sorting and processing.

8. Records are archivally processed and are housed in archival folders and an archival box in metal filing cabinets. Photographs are in archival sleeves. The security copy of photographs and negatives are at NHMLAC. The originals are at the Arizona Historical Society.

9. Human skeletal remains and associated funerary objects are present in the collection.

Recommendations

1. Some artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), and (d) insertion of acid-free labels in each secondary container.

2. Replace storage units with wooden drawers with archival cabinets. Uncoated wood poses the threat of outgassing and damaging the collections.

3. Install environmental controls in the Anthropology Collections Storage Room.

4. Ensure that humidity levels are maintained.

5. Additional security detection devices, such as motion sensors, should be installed in collections storage areas.

6. Create and implement the policies and guidelines as noted above if they are not currently in place.

7. The faunal remains should be examined to identify any human skeletal remains. All human skeletal remains and associated funerary objects need to be examined and brought into compliance with NAGPRA.

7-10

Naval Air Station North Island

San Diego, California

Repository Summary

Volume of Artifacts: 8.89 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 85.26 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 4.62 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human remains require compliance with NAGPRA.

Date of Visit: February 16 and April 21-23, 1999

Person Contacted: Andrew Yatsko, Archaeologist

Naval Air Station North Island (NASNI) houses approximately 13.51 ft³ of artifacts and human skeletal remains and 85.26 linear feet of associated documentation from projects conducted on NASNI (San Clemente Island), California (Table 86). The St. Louis District previously evaluated Navy collections at NASNI in July 1992 (U.S. Army Corps of Engineers 1997).

Table 86.
Volume of Navy Archaeological Collections Housed at NAS North Island

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	8.89	4.62	85.26
Total	8.89	4.62	85.26

Assessment

Archaeological collections are housed in Building 3 on NASNI. It was constructed in 1918 for use as a carpentry shop and a dope shop (Figure 64). The building now serves as an office building with additional storage and a wood shop. There are two floors above grade, and a mezzanine level is a later addition that has an external staircase leading to it. The building has been extensively modified, and approximately half of the building was added in the 1930s and 1940s. The ground floor storage room measures 150 ft² is used for temporary storage of artifacts, human skeletal remains, some historic documents, and materials/supplies storage. The base archaeologist's office also houses some of the archaeological collections.

Figure 64. Artifacts are stored in plastic zip-lock bags in cardboard boxes.

Structural Adequacy

Building 3 has a concrete foundation and a three-year-old built-up asphalt roof. The walls are reinforced concrete with a masonry fill frame that's not reinforced. Steel-framed windows with vertical venetian blinds surround the building.

Collection Storage Area 1—Ground Floor Storage Room

The floor of the ground floor storage room is tile over concrete. Two of the interior walls are wallboard and two walls are concrete; solid on the bottom half and concrete block on the top half. Floorboards from the above floor make the ceiling. No windows are in this room. A single hollow, corrugated wood door is present in the room.

Collection Storage Area 2—Base Archaeologist's Office

The base archaeologist's office has plaster walls and an acoustical tile ceiling. Particleboard partitions divide the area.

Environmental Controls

The building is warmed with steam heat. There are no environmental controls in the ground floor storage room or the archaeologist's office. Lighting is provided by non-UV filtered fluorescent lights.

Pest Management

Pests are controlled on base by spraying. The frequency of spraying is unknown.

Security

Security measures for Building 3 include key locks on all doors, window screens that cannot be opened, and base security. The ground floor storage room and Mr. Yatsko's office also have key locks, controlled access, and no windows.

Fire Detection and Suppression

A manual fire alarm is positioned near the entrance to Building 3. Fire extinguishers are provided throughout the building. The ground floor storage room and archaeologist's office have no additional protection measures.

Artifact Storage

Artifacts totaling 13.51 ft^3 are housed in the ground floor storage room (7.91 ft^3) and temporarily in the archaeologist's office (5.60 ft^3) in Building 3 (Table 87).

Table 87.
Percentage by Volume of Navy Artifacts Housed at NAS North Island

Material Class	NAS North Island, California
Lithics	25.2
Prehistoric Ceramics	—
Faunal Remains	26.0
Shell (unmodified)	—
Botanical	—
Flotation	1.9
Soil	0.2
^{14}C	3.0
Human Skeletal Remains	34.2
Worked Shell	0.7
Worked Bone	0.2
Brick/Masonry	—
Historic Ceramics	4.0
Metal	2.7
Glass	1.5
Textiles	—
Other	0.4
Total	100

Other material classes include worked wood and an unidentified red substance.

Storage Units

Collection Storage Area 1—Ground Floor Storage Room

Artifacts in the ground floor storage room are housed on open metal shelving units measuring 24 x 36 x 84 inches (d x w x h).

Collection Storage Area 2—Base Archaeologist's Office

Collections stored in the archaeologist's office are stacked on the floor.

Primary Containers

Collection Storage Area 1—Ground Floor Storage Room

In the ground floor storage room, primary containers consist of acidic cardboard boxes of varying dimensions (Figure 65). The boxes are directly labeled in pencil or have an adhesive computer-printed label identifying project, provenience, site number, box number, and contents. One box is unlabeled.

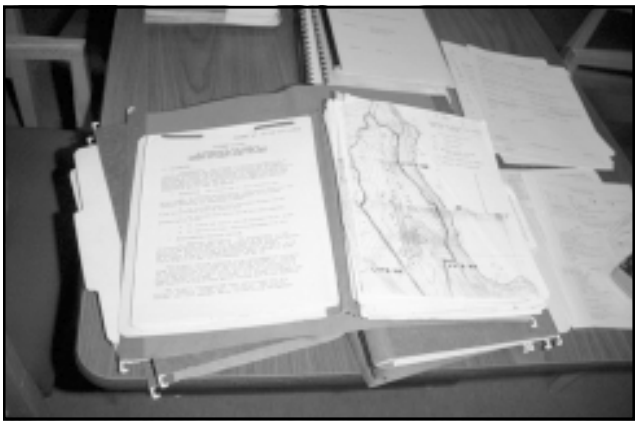

Figure 65. Some records are housed in hanging file folders.

Collection Storage Area 2—Base Archaeologist's Office

In the archaeologist's office, primary containers consist of acidic cardboard boxes measuring 15.5 x 12.5 x 10.0 inches (d x w x h). The boxes are labeled directly in marker with project and site number.

Secondary Containers

Collection Storage Area 1—Ground Floor Storage Room

In the ground floor storage room, secondary containers consist of 2- to 4-mil plastic zip-lock bags and paper bags. Some of the items are loose in the primary containers or are wrapped in plastic bubble wrap or tissue. Some artifacts are in plastic film vials within the plastic bags. The zip-lock bags are labeled directly in marker or with pre-printed adhesive labels written in marker. Label information includes site number, project, catalog number, and contents. Some plastic bags contain paper string tags in them.

Collection Storage Area 2—Base Archaeologist's Office

In the boxes in the archaeologist's office, secondary containers consist of paper bags, which house 4-mil plastic zip-lock bags. Some plastic bags have plastic film vials in them. The bags are labeled with a paper label written in pen inserted in them. Label information includes site number, provenience, date, investigator, material, count, and accession number.

Laboratory Processing and Labeling

None of the artifacts have been cleaned, and only one human skeletal fragment has been labeled directly in black and white ink. Secondary containers contain a computer-printed paper insert identifying site number, provenience, date, catalog number, material class, and object weight.

Human Skeletal Remains

Collection Storage Area 1—Ground Floor Storage Area

Approximately 4.62 ft^3 of skeletal remains (MNI=5) are stored in the ground floor storage room. The remains are wrapped in bubble wrap and in 4-mil plastic zip-lock bags in acidic cardboard boxes measuring 28.0 x 10.0 x 9.5 inches (d x w x h). Some remains are from Mesa College (MNI=3). Some remains (MNI=1) were removed from NASNI (San Clemente Island) by Mr. Yatsko in the mid-1980s because they were eroding from deflated sand dunes. Only one mandible fragment is labeled in white and black ink.

Records Storage

Associated documentation totaling 85.26 linear feet is housed in the ground floor storage room and in the base archaeologist's office (Table 88).

Table 88.
Linear Footage of Navy Associated Documentation Housed at NAS North Island

Materials	NAS North Island, California
Paper	44.64
Reports	32.08
Maps and Oversized Documents	1.62
Audiovisual	1.08
Photographs	5.52
Computer	0.32

Collection Storage Area 1—Ground Floor Storage Area

In the storage room, 13.92 linear feet of records are kept in metal lateral filing cabinets that measure 18 x 36 x 65 inches (d x w x h). The cabinet is labeled with computer-generated labels or in pencil on an acidic card in plastic holders that identify drawer contents. In the filing cabinets, records are kept in manila folders, hanging folders, accordion folders, and cardboard boxes. Some records are kept on shelves in three-ring binders.

Collection Storage Area 2—Base Archaeologist's Office

In the archaeologist's office, 71.34 linear feet of records are housed in manila folders in an acidic cardboard box stacked on the floor, with the associated boxes of artifacts, in manila folders and envelopes on a table, in hanging folders and manila folders in lateral filing cabinets, or in magazine boxes and three-ring binders on metal shelves.

Paper Records

Paper records comprise approximately 12.56 linear feet in the ground floor storage room and 64.16 linear feet in the archaeologist's office. Paper records consist of administrative, background, survey, excavation, and analysis documents, reports, student theses, site forms, photograph logs, inventories, and drawings.

Photographs

Photographic records consist of 1.19 linear feet of black-and-white prints, negatives, slides, and contact sheets are housed in the ground floor storage room. Some slides are kept in a box, and some slides, prints, negatives, and contact sheets are in archival sleeves. Some prints and negatives are in commercial processing envelopes. Approximately 4.33 linear feet of Polaroids, color and black-and-white prints, aerial photographs, negatives, and slides are housed in the archaeologist's office.

Maps and Oversized Documents

Approximately 0.02 linear feet of blueline maps are stored in the lateral filing cabinets in the ground floor storage room, and 1.60 linear feet of camera-ready site maps and other maps are stored in the archaeologist's office.

Computer

Fourteen 3.5-inch disks totaling 0.15 linear feet are present in the ground floor storage room. Some disks are in sleeves. Approximately 0.17 linear feet of 5.25-inch floppies and 3.5-inch disks are stored in the base archaeologist's office.

Audiovisual

Approximately 1.08 linear feet of videotapes and 35mm microfilm are housed in the base archaeologist's office.

Collections Management Standards

Registration Procedures

Accession Files

NASNI does not maintain accession files.

Location Identification

The location of collections is known by Mr. Yatsko.

Cross-Indexed Files

Archaeological files are not cross indexed.

Published Guide to Collections

A published guide to the collections does not exist.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

Archaeological information is maintained in a computer database.

Written Policies and Procedures

Minimum Standards for Acceptance

Collections must be from NASNI.

Curation Policy

NASNI does not have a curation policy.

Records Management Policy

NASNI does not have a records management policy.

Field Curation Procedures

No written field curation guidelines have been produced.

Loan Policy

No written loan policy exists; however, Mr. Yatsko requires written notification of requests for loans.

Deaccessioning Policy

NASNI does not have a deaccessioning policy.

Inventory Policy

There is no formal inventory policy.

Latest Collection Inventory

Collections were inventoried in 1990.

Curation Personnel

There is no full-time curator for the archaeological collections maintained at NASNI. Curatorial responsibilities have been assigned to the base archaeologist.

Curation Financing

Approximately $3000 is budgeted annually for curation.

Access to Collections

Access to the collections is controlled by the base archaeologist. Requests for access must be made through him.

Future Plans

There are no future plans for the collections.

Comments

1. NASNI is not a permanent curation repository.

2. Building 3 is heated with steam heat, but no cooling systems are present. No environmental controls are present in the ground floor storage room or Mr. Yatsko's office.

3. There is not an integrated pest-management program in place.

4. Basic security deterrents are present in Building 3, but no security-detection systems are in place.

5. Basic fire-detection and -suppression devices are present in Building 3.

6. Artifacts are in plastic zip-lock bags and paper bags in acidic cardboard boxes. Some are wrapped in bubble wrap or tissue paper.

7. Collections have not been uniformly processed and labeled.

8. Approximately 0.34 ft^3 of ^{14}C samples will be returned to California State University Northridge.

9. Records are housed in manila folders, hanging folders, accordion folders, and cardboard boxes in filing cabinets and cardboard boxes.

10. Some contact sheets, prints, negatives, and slides are in archival sleeves.

11. Some contaminants, such as Post-it® notes, staples, and paper clips, are present in the records collections.

12. Human skeletal remains are present in the collection.

13. NASNI has a five-year recurring contract with the SDAC, and current contracted projects go there.

14. Mr. Yatsko is working to ensure that NASNI collections at other facilities are improved. He prepared Scopes of Work to improve the curation of San Clemente Island collections at SDSU, the San Diego Museum of Man, the Fowler Museum, and on base. There is a cooperative research agreement for archaeological research at San Clemente Island between NASNI and the University of California, Riverside. There are also cooperative curation agreements between NASNI and the UCLA, SDSU, the San Diego Museum of Man, CSUF, and NHMLAC.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) direct labeling (when applicable), and (c) storage in appropriate archival primary and secondary containers that have been labeled.

3. Records require (a) physical arrangement in some sort of logical order, (b) packaging in archival containers and in archival files, (c) creation of a finding aid, and (d) creation of an archival duplicate copy for security.

7-11

RMW Paleo Associates

Mission Viejo, California

Repository Summary

Volume of Artifact Collections: None

Linear Feet of Records: 0.19 linear feet

Collection Origin: NAVSUBASE San Diego, California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: None

Date of Visit: September 8, 2000

Person Contacted: Ron Bissell, Archaeologist

RMW Paleo Associates (RMW) curates approximately 0.19 linear feet of associated documentation from NAVSUBASE San Diego, California (Table 89). The St. Louis District obtained information about the NAVSUBASE San Diego collection via telephone because the collection was so small and because RMW was visited previously for a different Navy project (Halpin and Holland 1997). Most of the information has not changed since that visit and will be repeated in this chapter.

Table 89.
Volume of Navy Archaeological Collections Housed at RMW Paleo Associates

Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
NAVSUBASE San Diego, California	—	—	0.19
Total	—	—	0.19

Assessment

RMW is located in Mission Viejo Commerce Park, a light industry and small business complex (Figure 66). The one-story structure was built approximately in 1982. Activity areas at RMW include offices, a reception area, a records study area, a processing laboratory, a collections storage area, and an equipment storage area.

Figure 66. Exterior view of the light industrial building that houses RMW Paleo Associates.

Structural Adequacy

The building foundation is concrete slab, and exterior load-bearing walls are concrete and steel with aluminum risers. Interior walls are aluminum and plasterboard. The roof is flat, and made of built-up tar paper. There have been no external renovations, and known internal renovations include the removal of two walls to consolidate three spaces into one. The front of the building is glass, and the aluminum-framed windows are original to the structure. The windows are permanently sealed and have venetian blinds covering them.

Environmental Controls

The building is heated with gas forced-air, and an air conditioning system services the offices, where the records are located, but not the laboratory or storage spaces. The environmental controls for the office space are equipped with dust filters.

Pest Management

According to RMW staff, no pest infestations have occurred. No monitoring or control practices for pests are in place.

Security

Dead-bolt locks on exterior doors provide security. Access to the office and collections storage areas is controlled by staff members. Motion detectors are present in the repository, but they have been disconnected.

Fire Detection and Suppression

RMW maintains several fire extinguishers located throughout the building. The structure is constructed of fire-retardant materials.

Artifact Storage

No artifacts from NAVSUBASE San Diego are being curated at RMW.

Human Skeletal Remains

No human skeletal remains from NAVSUBASE San Diego are curated at RMW.

Records Storage

Approximately 0.19 linear feet of associated documentation, including paper records and photographic materials, from NAVSUBASE San Diego are housed in the office area at RMW (Table 90). Records are stored in a manila folder in a hanging file folder within a filing cabinet. The cabinet is labeled with a paper label insert, and the manila folder is labeled directly in pencil.

Table 90.
Linear Footage of Navy Associated Documentation Housed at RMW Paleo Associates

Materials	NAVSUBASE San Diego, California
Paper	0.06
Reports	0.09
Maps and Oversized Documents	—
Audiovisual	—
Photographs	—
Computer	0.04

Paper Records

Paper records comprise approximately 0.15 linear feet, and include administrative records and master copies of draft reports.

Photographs

Photographic records total approximately 0.04 linear feet, and consist of black-and-white prints and negatives. They are housed in a commercial processing sleeve in the manila folder.

Collections Management Standards

Registration Procedures

Accession Files

No formal accession records are kept.

Location Identification

An informal list contains the number of the site that the federal collection is from and the number of boxes associated with the collection. The physical location of the collection is not indicated.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

A computerized database management system is used for managing the collections.

Written Policies and Procedures

Minimum Standards for Acceptance

The only collections at RMW are those associated with RMW projects, which are stored temporarily.

Curation Policy

RMW is not a long-term curation facility.

Records Management Policy

Records management policies include a check-out system with a sign-out sheet for associated records, making duplicates of final report invoices and memos, and sending copies to the appropriate information centers in California. Files are eventually purged. Information from dirty field maps is transferred to clean replacement maps.

Field Curation Procedures

No formal field curation procedures have been produced. However, informal guidelines include using 4-mil plastic zip-lock bags labeled directly with a permanent marker and using cushioning to protect stacked artifacts.

Loan Policy

There is no written policy regarding loaned materials.

Deaccessioning Policy

No deaccessioning policy is in effect.

Inventory Policy

RMW does not have a written inventory policy.

Latest Collection Inventory

Documents are periodically inventoried.

Curation Personnel

Curation personnel at RMW include Ron Bissell, Joan Brown, and Pat Maxon.

Curation Financing

Curation is financed in several ways; some curation costs are included in the RMW budget, the city and county of San Diego pay a small yearly fee for curation of their collections, and some curation costs are included in project contracts. Clients are charged an additional curation charge over initial budgeted funds, if it appears that curation will be an issue.

Access to Collections

Access to the collections is controlled by RMW staff, but no formal access policy has been established. Researchers are permitted to review the collections.

Future Plans

No future plans are currently in place.

Comments

1. RMW is not a permanent curation facility.

2. Adequate environmental controls and dust filters are in place in the records storage area, but not in the laboratory.

3. No security detection systems are in place, and basic security-deterrents are present.

4. No fire-detection systems are in place, and basic fire-suppression measures are present.

5. Records are in good condition, and are stored in a manila folder in a filing cabinet.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Records require (a) packaging in archival files, (b) creation of a finding aid, and (c) creation of a duplicate copy for security.

7-12

San Diego Archaeological Center

San Diego, California

Repository Summary

Volume of Artifacts: 146.05 ft³

Collection Origin: NAS North Island (San Clemente Island), California (63.90 ft³); NWS Fallbrook, California (12.08 ft³); NWS Seal Beach, California (70.07 ft³)

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 1.52 linear feet

Collection Origin: NAS North Island (San Clemente Island), California (0.70 linear feet); NWS Fallbrook, California (0.82 linear feet)

Compliance Status: Associated documentation requires partial rehabilitation to comply with existing federal guidelines and standards for modern archival preservation

Human Skeletal Remains: None

Date of Visit: February 19, 1999

Person Contacted: Cindy Stankowski, Director

The San Diego Archaeological Center (SDAC) houses approximately 146.05 ft³ of artifacts and 1.52 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), NWS Fallbrook, and NWS Seal Beach, all in California (Table 91). The St. Louis District previously evaluated the Naval Weapons Station Fallbrook collection in 1993 (U.S. Army Corps of Engineers 1999a). Collections from NAS North Island were previously examined at different repositories as well, prior to being consolidated on base, then transferred to SDAC.

Table 91.
Volume of Navy Archaeological Collections Housed at SDAC

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	63.90	—	0.70
NWS Fallbrook, California	12.08	—	0.82
NWS Seal Beach, California	70.07	—	—
Total	146.05	—	1.52

Assessment

SDAC is a nonprofit organization formed in 1993 from a committee of the San Diego County Archaeological Society, and officially opened in 1998. It is located in the ReinCarnation Project building, which is a renovated dairy distributing

plant (Figure 67). The building is at least 40 years old, and has several occupants besides SDAC, including lofts where people live and work, an art gallery, and above the repository is a performance art group. SCAC occupies 5,000 ft² on the first floor of the multi-story building. Activity areas in the repository include a receiving/loading dock, an artifact holding area, artifact processing area, materials/supplies storage area, exhibit area, and an artifact and records study area. Collections are stored in a 1,200-ft² area.

Figure 67. The SDAC is located in the ReinCarnation Building.

Structural Adequacy

The ReinCarnation Project building has a concrete foundation and concrete block exterior walls. The age and type of roof is unknown. Inside, ceilings and floors are concrete. One interior wall of the collections storage area is concrete, and the other walls are made of 12-foot-high chain-link fence. Two gates are used to enter this area. Renovations to the repository include the addition of a low wall to divide the room, and one wall was closed. Large steel-framed windows line the top of one wall. These original windows have been caulked and painted closed. An overhead door and a door leading to interior space are in the repository.

Environmental Controls

The building has no temperature controls. The relative humidity is not regulated, but it is monitored with a digital hygrometer. Lighting is provided by natural sources, fluorescent lights, and incandescent lights that do not have UV filters.

Pest Management

Precautions taken against insects and rodents include weekly monitoring with pheromone traps, door sweeps, care with food, and cracks have been filled with expandable foam. If a collection appears to be contaminated, it is transferred into new boxes and the area is washed. Trash is removed daily and the area is swept and dusted weekly by the curatorial staff.

Security

Security measures include a motion detector and intrusion alarm wired to a private security company. Key locks and dead-bolt locks are used on the doors, which are also wired to the security company. Access to the collections is controlled, and a chain-link fence surrounds the collection storage area. Any NAGPRA-related materials are locked in metal cabinets with a key lock.

Fire Detection and Suppression

Fire protection measures include heat sensors and manual fire alarms that are connected to a private security company. The repository also has fire extinguishers that staff and volunteers have been trained to use.

Artifact Storage

Artifacts totaling 146.05 ft³ are stored behind a 12-foot wire fence that can be accessed through two key-locked gates. Collections are also rehabilitated in this area.

Storage Units

Collections are stored on open metal shelving units measuring 30 x 42 x 69 inches (d x w x h) (Table 92).

Primary Containers

Primary containers consist of an archival box, archival corrugated plastic boxes that measure 15.50 x 12.50 x 10.25 inches (d x w x h), and acidic cardboard boxes that measure 16.50 x 12.75 x 10.25 inches (d x w x h) (Figure 68). Boxes are labeled Post-it notes written in marker or with a printed adhesive label that identifies repository, date, site name, and material class. Large pieces of

Table 92.
Percentage by Volume of Navy Artifacts Housed at SDAC

Material Class	NAS North Island, CA	NWS Fallbrook, CA	NWS Seal Beach, CA
Lithics	32.1	5.4	2.0
Prehistoric Ceramics	0.2	0.7	0.5
Faunal Remains	0.7	0.2	1.1
Shell (unmodified)	0.9	0.3	33.4
Botanical	0.2	0.3	0.1
Flotation	—	—	—
Soil	1.3	1.1	9.0
^{14}C	0.4	0.1	0.1
Human Skeletal Remains	—	—	—
Worked Shell	1.1	—	0.1
Worked Bone	1.1	—	—
Brick/Masonry	—	—	0.4
Historic Ceramics	1.1	—	0.1
Metal	1.1	—	0.3
Glass	2.1	—	0.7
Textiles	—	—	—
Other	1.5	—	0.3
Total	43.8	8.1	48.1

Other material classes include leather, mineral, plastic, wood, and ecofacts.

Figure 68. Artifacts are stored in corrugated plastic boxes on metal shelves.

groundstone are stored loose on $^1/_8$-inch thick archival polyfoam on the metal shelves.

Secondary Containers

Secondary containers consist of paper bags, 2- to 4-mil plastic zip-lock bags, and plastic film vials. Bags have been labeled directly in marker or with a printed adhesive label that identifies site number, date, catalog number, collection name, provenience, material class, and object weight and count. Bags also have archival labels inside them. Some bags also have a tertiary level of plastic zip-lock bags nested in them.

Laboratory Processing and Labeling

Approximately 57% of the collections have been cleaned, and 20% have been directly labeled in india ink over a white base coat. Inventory lists are present in most of the boxes.

Human Skeletal Remains

SDAC has a policy against holding any human skeletal remains; therefore, they do not have any human skeletal remains from Navy facilities.

Records Storage

Associated documentation totaling 1.52 linear feet (Table 93) is housed in the collections storage area in archival document boxes and three-ring binders on open metal shelving units with the artifact boxes (Figure 69). The boxes are labeled with a Post-it note or with a pre-printed adhesive label that identifies

Table 93.
Linear Footage of Navy Associated Documentation Housed at SDAC

Materials	NAS North Island, CA	NWS Fallbrook, CA	Total
Paper	0.68	0.49	1.17
Reports	0.01	—	0.01
Maps and Oversized Documents	—	0.08	0.08
Audiovisual	—	—	—
Photographs	—	0.25	0.25
Computer	0.01	—	0.01

Figure 69. Records are kept in archival document boxes and three-ring binders.

collection, project, contents, and box number. Within the archival boxes, records are kept in archival folders, manila folders, three-ring manila report folders, and large 4-mil plastic zip-lock bags.

Paper Records

Paper records comprise approximately 1.18 linear feet of excavation and analysis documents and reports.

Photographs

Photographs consist of 0.25 linear feet of color prints, black-and-white prints, and slides. The prints are in 4-mil plastic zip-lock bags, and the slides are in archival sleeves.

Maps and Oversized Documents

Approximately 0.08 linear feet of large maps are part of the records collection.

Computer

Approximately 0.01 linear feet of 3.5-inch computer disks are part of the collection.

Collections Management Standards

Registration Procedures

Accession Files

Permanent collections are accessioned upon receipt.

Location Identification

Location of collections is identified in the accession file.

Cross-Indexed Files

Files are being cross indexed on the computerized database.

Published Guide to Collections

There is no published guide to the collections, but one is planned for the future. A web page will also contain information about the collections.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

Collections are managed using a computerized database. Backups on disk are made daily.

Written Policies and Procedures

Minimum Standards for Acceptance

SDAC accepts objects considered to have archeological significance from the San Diego region, provided they meet SDAC's mission and code of ethics (San Diego Archaeological Center 1999).

Curation Policy

SDAC's *Operations Manual* discusses the center's curation policy, and covers receipt, processing, use of materials, and future preservation (San Diego Archaeological Center 1999).

Records Management Policy

The *Operations Manual* covers packaging, environmental requirements, monitoring, and handling guidelines of all types of records (San Diego Archaeological Center 1999).

Field Curation Procedures

SDAC has written field curation guidelines for researchers depositing collections.

Loan Policy

Loans can be made through the use of a written loan agreement for purposes such as exhibition, education, or research with the permission of the

contracting agency/owner (San Diego Archaeological Center 1999).

Deaccessioning Policy

Collections may be deaccessioned after careful consideration for several reasons, such as deterioration beyond repair, over-represented in the collection, or collections no longer fitting the collection profile of SDAC (San Diego Archaeological Center 1999).

Inventory Policy

Collections are inventoried on a quarterly basis. In the event of a disaster, the collections will be inspected and inventoried as soon as possible. Owners of collections may inventory their own collections. Official, culturally affiliated groups may inspect religious or sacred objects (San Diego Archaeological Center 1999).

Latest Collection Inventory

Federal collections are inventoried quarterly, and a status report is sent to the federal agency (San Diego Archaeological Center 1999).

Curation Personnel

Curation personnel include center director, a collections manager, an education coordinator, interns, and volunteers.

Curation Financing

Curation has been financed through an opening fundraiser, donations, grant awards, and service charges. A capital campaign has been considered for the future.

Access to Collections

Individuals wishing access to collections must register and be approved by SDAC personnel. Access is generally granted to academic researchers, archaeology or anthropology professionals, Native American groups, or other qualified individuals. NAGPRA related materials have greater access restrictions.

Future Plans

SDAC is in search of a permanent storage facility, additional collections, more community outreach programs, and possibly a capital campaign.

Comments

1. SDAC is a permanent curation repository.

2. The ReinCarnation building does not have environmental controls; however, SDAC monitors humidity with a digital hygrometer.

3. A pest-management program is in place.

4. Excellent security-deterrents and -detection devices are in place.

5. Adequate fire-detection systems are present, and basic fire-suppression devices are in the building.

6. Artifacts are kept in paper bags, 2- to 4-mil plastic zip-lock bags, and plastic vials in archival corrugated plastic boxes, acidic cardboard boxes, and an archival box on open metal shelving units.

7. Some of the collections have not been processed yet; therefore, most of the collections have not been directly labeled, and about half have not been cleaned. Inventory lists are present in most of the boxes.

8. Records are housed in manila folders, archival folders, manila report folders, and large 4-mil plastic zip-lock bags in archival document boxes and three-ring binders on open metal shelving units with the artifact boxes.

9. Some contaminants, such as staples, paper clips, and binding clips, are present in the collection.

Recommendations

1. Artifacts require (a) cleaning, (b) direct labeling (when applicable), (c) storage in appropriate archival secondary containers that have been labeled, and (d) insertion of acid-free labels in each secondary container.

2. Records require (a) packaging in archival files, and (b) creation of an archival duplicate copy for security.

3. Remove contaminants from the collections.

4. SDAC should move to a permanent repository that includes (a) temperature and humidity controls, (b) both fire detection systems, such as smoke alarms, heat sensors, and manual alarms wired to the fire department or security company, and fire suppression systems, such as a sprinkler system and fire extinguishers, (c) security deterrents, such as key and dead bolt locks, and security detection devices, such as a 24-hour guard, motion sensor, and intrusion alarm wired to a security company, and (d) windows and lights protected by UV filters.

7-13

San Diego Museum of Man

San Diego, California

Repository Summary

Volume of Artifacts: 18.39 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require partial rehabilitation to comply with existing federal guidelines and standards for archaeological curation

Linear Feet of Records: 0.48 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 9.15 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human skeletal remains and associated funerary objects must be brought into compliance with NAGPRA.

Date of Visit: February 22, 1999

Person of Contacted: Ken Hedges, Chief Curator

The San Diego Museum of Man (MoM) houses approximately 27.54 ft³ of artifacts and human skeletal remains and 0.48 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 94). The St. Louis District previously evaluated Navy collections at MoM in July 1992 (U.S. Army Corps of Engineers 1997). MoM was also visited in October 1993 (Halpin and Holland 1997), August 1995 (Halpin and Militello 1999), and February 1997 (Felix et al. 2000), but NAS North Island collections were not reviewed.

Table 94.
Volume of Navy Archaeological Collections Housed at the San Diego Museum of Man

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	18.39	9.15	0.48
Total	18.39	9.15	0.48

Assessment

MoM was built in 1915 as part of the World's Fair Exposition (Figure 70). There are two floors above ground and two floors below. Collections are housed in three areas of the museum complex: artifacts are housed in Laboratory 5, human skeletal remains and records are housed in Laboratory 6, and records are housed in Laboratory 2.

Structural Adequacy

MoM is in a steel-framed, multi-level building. The foundation is reinforced poured concrete pillars and cross-members. The walls are constructed of hollow

Figure 70. Artifacts are kept in archival boxes, which have additional archival layers in them.

bricks covered with stucco, and the roof is asphalt and ceramic tile. The roof has been repaired and renovated through the years on an as-needed basis.

Collection Storage Area 1—Collections Storage, Laboratory 5

Laboratory 5 is used for storage of large artifacts, level-bag materials, and soil samples. It is located in the sub-basement of the museum, and encompasses approximately 865 ft². In the early 1980s the original dirt floor of Laboratory 5 was replaced with poured concrete, and poured concrete walls were also added at that time. There are no windows in Laboratory 5, and two single panel wooden doors lead to Laboratory 4 and the exterior of the museum.

Collections Storage Area 2—Physical Anthropology Laboratory, Laboratory 6

Human skeletal remains are housed in Laboratory 6, which is located in the same wing as Laboratories 5 and 2, but in a different location of the wing. Laboratory 6 encompasses approximately 800 ft² and has a concrete slab floor, insulated plasterboard walls, and an acoustical tile ceiling. A single panel door leads from the laboratory. Laboratory 6 has four windows, one of which is permanently sealed.

Collection Storage Area 3—Curatorial Work Area, Laboratory 2

Laboratory 5 encompasses approximately 1,200 ft² in the basement and is used for artifact and records storage and general curation work space. It has a concrete slab floor, insulated plasterboard walls, and a dropped acoustical tile ceiling. There are no windows in Laboratory 5, and entrance from the main museum is gained through a solid-core, single panel wooden door.

Environmental Controls

Collection Storage Area 1—Collections Storage, Laboratory 5

Temperature and humidity levels are monitored, but not controlled in Laboratory 5. No heating or cooling systems are present. Lighting is provided by non-UV filtered fluorescent tubes.

Collections Storage Area 2—Physical Anthropology Laboratory, Laboratory 6

A central heating and air conditioning system monitors and controls the temperature to 68 –70° F in Laboratory 6. Humidity levels are monitored, but not controlled. The museum is expanding its HVAC system to include Laboratory 6. Lighting is provided by non-UV filtered fluorescent tubes and natural light.

Collection Storage Area 3—Curatorial Work Area, Laboratory 2

Laboratory 2 has a central heating and air conditioning system that monitors and controls the temperature to 68–70° F. Humidity levels are monitored, with a targeted level of 55%. Dust filters are on the heating and cooling registers. Lighting is provided by fluorescent tubes that are equipped with UV filters.

Pest Management

An integrated pest management program is in place at MoM, including monthly spraying of the museum and an on-call policy for specific problems. Organic materials are routinely fumigated before they are brought into the museum building.

Security

Intrusion alarms wired to the police and security offices are on all exterior doors to the facility, including the collections storage areas. Access to all collections storage areas is limited and controlled by museum staff. All doors have keyed dead-bolt locks.

Collection Storage Area 1—Collections Storage, Laboratory 5

Laboratory 5 also has a locked, steel fire door leading to the exterior of the museum. No windows are present in Laboratory 5. The doors to each sub-basement storage level are secured with padlocks, and only curatorial staff and security guards have keys. Security guards patrol the area when the museum is open.

Collections Storage Area 2—Physical Anthropology Laboratory, Laboratory 6

In addition to the security measures noted above, Laboratory 6 also has a keyed padlock on the door, and an electronic coded door lock. Laboratory 6 has four windows, one of which is permanently sealed. Bars have been placed over the other three windows. All four windows are locked, and connected to an alarm system. Windows are accessible by ladder only.

Collection Storage Area 3—Curatorial Work Area, Laboratory 2

As added security, there are no windows in Laboratory 2. The doors to Laboratory 2 remain locked at all times, and only curatorial and security staff have keys. Security guards patrol the area when the museum is open.

Fire Detection and Suppression

Fire detection systems for the entire repository, including the collections storage areas, consist of heat sensors and smoke detectors that are wired to the fire department. Fire extinguishers are located throughout the building. Fire inspections are conducted annually.

Artifact Storage

Approximately 18.30 ft³ of artifacts are housed in Laboratory 5 (Table 95). Approximately 0.09 ft³ of shells are housed with the human skeletal remains in Laboratory 6 (see Human Skeletal Remains). The artifacts have been rehabilitated since the St. Louis District's visit in 1992, and the collections that were in Laboratory 2 were moved to Laboratory 5.

Table 95.
Percentage by Volume of Navy Artifacts Housed at the San Diego Museum of Man

Material Class	NAS North Island, California
Lithics	58.0
Prehistoric Ceramics	—
Faunal Remains	0.7
Shell (unmodified)	4.6
Botanical	0.7
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	33.2
Worked Shell	0.7
Worked Bone	0.7
Brick/Masonry	—
Historic Ceramics	—
Metal	0.7
Glass	—
Textiles	—
Other	0.7
Total	100.0

Other material classes include mineral and asphaltum.

Storage Units

Artifacts are housed on enameled metal and sealed particleboard shelves of varying dimensions. Collections are also housed on the floor, but will be shelved in the future.

Primary Containers

Primary containers consist of archival boxes that measure 16.50 x 12.75 x 10.0 inches (d x w x h) (Figure 71). The boxes are labeled directly in pencil with project location and box number. Post-it® Notes are also on the boxes. Within some of the boxes are folded half-boxes to separate levels.

Secondary Containers

Within the archival boxes are secondary containers consisting of 4-mil plastic zip-lock bags. The bags are labeled with a pre-printed adhesive label that identifies project location, site number, box number, and contents. Nested within the secondary containers are additional zip-lock bags that are labeled directly

Figure 71. Photographic records are stored in wooden drawers.

in marker. Pre-printed archival labels are present in each of the bags.

Laboratory Processing and Labeling

All artifacts have been cleaned, and approximately half have been directly labeled with india ink or white ink, some over a clear base coat

Human Skeletal Remains

Approximately 9.15 ft³ of human skeletal remains from work conducted in the 1950s and 1970s are housed in Laboratory 6. The remains are on open enameled metal shelving units in archival boxes measuring 28.0 x 10.0 x 9.5 inches (d x w x h). The boxes have paper labels written in marker taped to them and identify project location and accession numbers. Within the boxes, the skeletal remains are in 1-mil plastic bags secured with twist-ties, a metal film vial, a plastic film vial, paper bags, glass jars, or loose wrapped in bubble wrap or $^1/_8$-inch archival foam. The boxes contain interior partitions to help cushion the skulls. Most of the remains have been directly labeled in india ink over a clear base coat. Approximately 0.09 ft³ of shells are housed with the human skeletal remains in Laboratory 5.

Records Storage

A total of 0.48 linear feet of associated documentation is housed in Laboratory 6 and Laboratory 2 at MoM (Table 96).

Table 96.
Linear Footage of Navy Associated Documentation Housed at the San Diego Museum of Man

Materials	NAS North Island, California
Paper	0.32
Reports	—
Maps and Oversized Documents	0.04
Audiovisual	—
Photographs	0.12
Computer	—

Collections Storage Area 2—Physical Anthropology Laboratory, Laboratory 6

Approximately 0.17 linear feet of records are housed in metal filing cabinets in Laboratory 6. Within the filing cabinets, records are in manila folders, which are labeled directly in marker.

Collection Storage Area 3—Curatorial Work Area, Laboratory 2

Approximately 0.31 linear feet of records are housed in a metal filing cabinet and in a wooden map cabinet in Laboratory 2. Within the filing cabinet, records are in manila folders, which are labeled directly in marker.

Paper Records

In Laboratory 6, the paper records comprise approximately 0.13 linear feet of administrative, background, excavation, and analysis documents. In Laboratory 2, paper records comprise approximately 0.19 linear feet of survey documents and inventory sheets.

Photographs

In Laboratory 6, photographs consist of approximately 0.04 linear feet of black-and-white prints, negatives, slides, and contact sheets, some of which are in plastic sleeves. In Laboratory 2, photographs consist of approximately 0.08 linear feet of black-and-white prints, negatives, and slides.

Maps and Oversized Documents

Approximately 0.04 linear feet of USGS topographic maps are housed in wooden map cabinets in Laboratory 2.

Collections Management Standards

Registration Procedures

Accession Files

Collections and associated documentation are accessioned upon receipt and updated by the registrar. Accession procedures are discussed in the museum's *Collections Policy* (San Diego Museum of Man 1991).

Location Identification

Locations of the collections at MoM are identified in museum location records.

Cross-Indexed Files

Files are cross-indexed by catalog number, site number, cultural affiliation, and accession date.

Published Guide to the Collections

No guide to the collections has been published.

Site-Record Administration

MoM maintains the site numbering system used by the collector.

Computerized Database Management

Human remains and associated funerary objects have been entered into a computer database.

Written Policies and Procedures

Minimum Standards for Acceptance

The museum no longer accepts archaeological collections. MoM's acceptance policy is discussed in its *Collections Policy* (San Diego Museum of Man 1991).

Curation Policy

MoM revised and published its *Collections Policy* in 1991. This document addresses policies and procedures for acceptance, evaluation, accessioning and deaccessioning of collections, access to collections, and loans.

Records Management Policy

Records management is not specifically addressed in any written policy.

Field Curation Procedures

Archaeological collections are no longer accepted.

Loan Policy

All loans must be approved by the by the director and materials can only be loaned to institutions engaged in educational or scientific pursuits. No loans to individuals are made. The registrar maintains a record of all loans. Loans are discussed in the *Collections Policy* (San Diego Museum of Man 1991).

Deaccessioning Policy

The director and board of trustees must approve an object to be deaccessioned that has been recommended by the chief curator or registrar. A record of each deaccessioned object is created and filed. Deaccessions are discussed in the *Collections Policy* (San Diego Museum of Man 1991).

Inventory Policy

There is no formal inventory policy.

Latest Collection Inventory

The last collections-wide inventory was completed in the 1970s. Inventories are conducted when collections are accessed for research.

Curation Personnel

Four full-time curators and one part-time curator are responsible for the curation of collections from different ethnographic regions.

Curation Financing

Financing for archaeological curation is included as a line item in the SDMM operating budget.

Access to Collections

Collection use is controlled by curatorial personnel. Collections are available to researchers by appointment only. All qualified individuals accessing collections must demonstrate legitimate research needs.

Future Plans

Future plans for upgrading the curation program include achieving status as a regional repository,

upgrading storage facilities (e.g., metal cabinets), and computerizing data.

Comments

1. MoM is a permanent curation repository.

2. There are no environmental controls in Laboratory 5. Laboratory 6 has central air conditioning and heat, and plans are in place to expand the building's HVAC system to include Laboratory 6. Laboratory 2 has central air conditioning and heat, dust filters, and monitoring and control of relative humidity.

3. An integrated pest-management plan is in place for the building.

4. Excellent security-deterrents and -detection devices are present in the building and all collections storage areas.

5. Adequate fire-detection devices, and basic fire-suppression systems are in the building.

6. Artifacts are housed in Laboratory 5 on enameled metal and sealed particleboard shelving units in archival boxes and 4-mil plastic zip-lock bags. In Laboratory 6, human skeletal remains and a few artifacts are housed in 1-mil plastic zip-lock bags in archival boxes on enameled metal shelves.

7. All of the artifacts have been cleaned, and approximately half have been directly labeled.

8. Records are housed in manila folders in metal filing cabinets and in a wooden map cabinet.

9. Some contaminants, such as paper clips, are present in the records collection.

10. MoM is upgrading photographs to include acid free mylar envelopes.

11. Field journals have been copied and are stored in a separate location.

12. Human skeletal remains are present in the collection.

Recommendations

1. Artifacts require (a) direct labeling (when applicable) and (b) storage in appropriate archival secondary containers that have been labeled.

2. Records require (a) packaging in archival containers and in archival files, (b) creation of a finding aid, and (c) creation of an archival duplicate copy for security.

3. Install environmental controls in Laboratory 5.

4. Ensure that humidity levels are maintained in Laboratories 5 and 6.

5. Ensure that fluorescent lights are equipped with UV filters in Laboratories 5 and 6.

6. Additional fire-suppression systems, such as a dry-pipe sprinkler system, should be installed in the museum.

7. Create and implement the policies and guidelines as noted above if they are not currently in place.

8. All human remains and associated objects need to be examined and brought into compliance with NAGPRA.

7-14

San Diego State University

San Diego, California

Repository Summary

Volume of Artifacts: 219.18 ft³

Collection Origin: Admiral Baker Field, California (22.28 ft³), and NAS North Island (San Clemente Island), California (196.90 ft³)

Compliance Status: Artifacts require partial rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: 4.79 linear feet

Collection Origin: Admiral Baker Field, California (3.95 linear feet), and NAS North Island (San Clemente Island), California (0.84 linear feet)

Compliance Status: Associated documentation requires partial rehabilitation to comply with existing federal guidelines and standards for modern archival preservation.

Human Skeletal Remains: 3.30 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human skeletal remains have been inventoried by Dr. Phil Walker at UCSB. Remains should be brought into compliance with NAGPRA.

Date of Visit: April 19-21, 1999

Persons Contacted: Dr. Lynne Christenson, Collections Management Program, and Patty McFarland, Collections Manager

San Diego State University (SDSU) houses approximately 222.48 ft³ of artifacts and human skeletal remains and 4.79 linear feet of associated documentation from projects conducted on Admiral Baker Field (a former Navy facility) and NAS North Island (San Clemente Island), both in California (Table 97). The St. Louis District previously evaluated NAS North Island collections at SDSU in July 1992 (U.S. Army Corps of Engineers 1997) and Admiral Baker Field collections in August 1993 (U.S. Army Corps of Engineers 1999a) for different projects.

Table 97.
Volume of Navy Archaeological Collections Housed at SDSU

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
Admiral Baker Field, CA	22.28	—	3.95
NAS North Island, CA	196.90	3.30	0.84

Assessment

Archaeological collections at SDSU are stored in two separate buildings on campus: the Industrial Arts Building and Love Library.

Repository 1—Love Library

Love Library was constructed in the 1970s and is located on the SDSU campus (Figure 72). There are four floors above grade that include library stacks, offices, material/supplies storage area, and study areas. Archaeological collections are housed in a 1,000-ft² archaeological materials storage area in the basement (Room LL33), which has space devoted to records and artifact storage and computer workspace.

Figure 72. Some collections are housed in the Industrial Arts Building on campus.

Repository 2—Industrial Arts Building

The Industrial Arts Building was constructed in the 1950s for use as a classroom. The wing housing archaeological collections has one floor above grade, and an adjacent wing has several floors above grade. It is believed that many renovations have taken place throughout the building over the years. Collections are stored in Room 100/Laboratory and Room 100B, a film processing room.

Structural Adequacy

Repository 1—Love Library

The building is concrete and steel. The ceiling and floor are concrete, and interior walls are wallboard and concrete block. There are no windows in the collection storage area. A single metal panel door leads to Room LL33 from the basement hallway, and an elevator is present in the room. Overhead pipes are present and collections are stored under the pipes, which transport water for the library humidifier.

Repository 2—Industrial Arts Building

The Industrial Arts Building has a concrete foundation and stucco and plaster exterior walls. Room 100/Laboratory and Room 100B have a concrete slab floor covered with tiles. Interior walls are concrete block and plasterboard. The ceilings are suspended acoustical tile.

Collection Storage Area 1—Room 100/ Laboratory

Windows are present throughout the building, including Room 100/Laboratory. The windows have been permanently sealed and are covered with venetian blinds. A double solid-core wood and glass door leads from the hallway to the 700-ft² Room 100/Lab. The room houses some artifacts and associated documentation.

Collection Storage Area 2—Room 100B

There are no windows in Room 100B. One solid core wood door leads from Room 100/Laboratory to the 15-ft² Room 100B. The room is used primarily to store human skeletal remains and associated funerary objects.

Environmental Controls

Repository 1—Love Library

Environmental controls consist of central air conditioning and forced-air heat. Targeted temperature is 68° F and relative humidity is 35%. A digital “humiguide” is used to monitor humidity levels, but humidity levels are not controlled. There are dust filters in place for the environmental controls. Floors have been sealed, which eliminated some of the dust problem. Lighting is provided by non-UV filtered fluorescent lights.

Repository 2—Industrial Arts Building

Collection Storage Area 1—Room 100/ Laboratory

Room 100/Laboratory has a window air conditioning unit, but no heating system. Lighting is provided by non-UV filtered fluorescent tubes.

Collection Storage Area 2—Room 100B

Room 100B does not have any environmental controls. Lighting is provided by incandescent bulbs.

Pest Management

Repository 1—Love Library

A pest management program that includes both monitoring and control is employed. Precautions include strips for monitoring cigarette beetles and clothes moths. The university sprays the building on a regular basis. Additional precautions include sealing around the pipes and adding a door sweep. A log is kept of pest management precautions.

Repository 2—Industrial Arts Building

A pest management program that includes monitoring is in place in the Industrial Arts Building. Precautions include strips for monitoring cigarette beetles and clothes moths. The university sprays the building on a regular basis.

Security

Repository 1—Love Library

Access to the basement collection storage area in Love Library is controlled. The library is protected by dead-bolt and key locks on all exterior doors. Keys are required for the elevator to the basement and the collection storage room door. Access to the collections storage area is controlled, and campus security patrols the area.

Repository 2—Industrial Arts Building

Access to the building is controlled. Windows are permanently closed, and key locks are present on doors. The building is locked at night and on weekends, and campus security patrols the area. Access to Room 100B has additional restrictions.

Fire Detection and Suppression

Repository 1—Love Library

Love Library has manual fire alarms, fire extinguishers, and fire hoses throughout the building. Room LL33 has a sprinkler suppression system in the room, and a smoke detector in the hallway.

Repository 2—Industrial Arts Building

The Industrial Arts Building is equipped with manual fire alarms, smoke detectors, and fire extinguishers, which are located in the hallway leading to Room 100/Laboratory. There are no additional fire safety measures in Room 100/ Laboratory or Room 100B.

Artifact Storage

Artifacts and human skeletal remains (discussed below) totaling 222.48 ft³ are housed in the Industrial Arts building and Love Library (Table 98).

Table 98.
Percentage by Volume of Navy Artifacts Housed at SDSU

Material Class	Admiral Baker Field, CA	NAS North Island, CA
Lithics	84.0	7.7
Prehistoric Ceramics	—	0.2
Faunal Remains	1.0	0.9
Shell (unmodified)	1.0	0.3
Botanical	—	—
Flotation	—	—
Soil	2.5	0.3
^{14}C	—	—
Human Skeletal Remains	—	1.5
Worked Shell	—	0.1
Worked Bone	—	—
Brick/Masonry	—	—
Historic Ceramics	—	—
Metal	—	0.2
Glass	—	—
Textiles	—	—
Other	—	0.3
Total	88.5	11.5

Other material classes include minerals.

Storage Units

Repository 1—Love Library

Approximately 216.98 ft³ of artifacts are housed in Room LL33 in the basement of Love Library. Artifacts are housed on open metal shelves that measure 42 x 24 x 72 inches (d x w x h).

Repository 2—Industrial Arts Building

Collection Storage Area 1—Room 100/ Laboratory

Approximately 2.20 ft³ of artifacts from Admiral Baker Field are stored on the floor in Room 100/ Laboratory.

Primary Containers

In both repositories, artifacts are housed in archival boxes that measure 15.50 x 12.25 x 10.0 inches (d x w x h) (Figure 73). The boxes are directly labeled in pencil on a pre-stamped label or in marker on a foil-backed adhesive label. Label information includes accession number, site number, box number, project name, site name, and contents.

Figure 73. Artifacts are housed in cardboard boxes on metal shelves in Love Library.

Secondary Containers

Within the archival boxes in both repositories, artifacts are housed in 4-mil plastic zip-lock bags that are labeled in marker or with foil-backed adhesive labels, which identify site number, accession number, provenience, and material class. In some boxes in Love Library, soil samples are nested in paper bags, 1- to 2-mil plastic bags, and glass vials in 4-mil plastic zip-lock bags.

Laboratory Processing and Labeling

Each archival box contains an inventory list within a 4-mil plastic zip-lock bag. Approximately 98% of the artifacts have been cleaned, and 95% have been directly labeled in india ink or white ink, sometimes on a white base coat.

Human Skeletal Remains

Repository 1—Love Library

A potential human tooth fragment might be located in Love Library in Box 289 (catalog #ABF26-760).

Repository 2—Industrial Arts Building

Collection Storage Area 2—Room 100B

In Room 100B, approximately 3.30 ft³ of human skeletal remains (MNI=17) from Nas North Island are housed on the floor in archival boxes that measure 15.50 x 12.25 x 10.0 inches (d x w x h). The boxes are labeled directly in pencil on a pre-stamped label. Label information identifies location and box contents. Within the boxes, the remains are in 4-mil plastic zip-lock bags that are labeled with computer-generated adhesive labels that identify location, site number, and bag contents. Within some of the bags is a tertiary level of 4-mil zip-lock bags. Approximately ninety-seven percent of the remains have been labeled directly in india ink. The remains are part of the Spencer Rodgers collection, which was collected during a San Diego State field school in the 1950s. They have been analyzed by Dr. Philip Walker at UCSB.

Records Storage

Associated documentation totaling 4.79 linear feet is housed in Room LL33 in Love Library and in Room 100/Lab in the Industrial Arts Building (Table 99).

Repository 1—Love Library

In Room LL33, approximately 1.19 linear feet of records are stored on metal shelves that measure 30 x 43 x 96 inches (d x w x h), and one unit measures 13 feet high. Records are housed in archival document boxes that measure 5.0 x 15.5 x 10.5 and 2.5 x 12.5 x 10.5 inches (d x w x h). The boxes are labeled with computer-generated archival

Table 99.
Linear Footage of Navy Associated Documentation Housed at SDSU

Materials	Admiral Baker Field, California	NAS North Island, California
Paper	1.71	0.76
Reports	0.34	0.08
Maps and Oversized Documents	—	—
Audiovisual	—	—
Photographs	1.90	—
Computer	—	—

adhesive labels that identify site number, provenience, contents, and box number. Within the document boxes, records are housed in acid-free folders, labeled directly in pencil, or in 4-mil plastic zip-lock bags.

Repository 2—Industrial Arts Building

Collection Storage Area 1—Room 100/ Laboratory

The processing of records takes place in Room 100/ Laboratory of the Industrial Arts Building, where several Navy boxes were being inventoried, organized, and rehabilitated during the St. Louis District assessment. Approximately 3.60 linear feet of records are stored on the floor under a desk. Some records are housed loose in a plastic box that measures 9.5 x 12.0 x 11.0 inches (d x w x h). The box is labeled directly in pen and with an adhesive label. Most records are housed in archival document boxes that measure 5.0 x 15.5 x 10.5 and 2.5 x 12.5 x 10.5 inches (d x w x h). Some boxes are unlabeled, and some are labeled with computer-generated archival adhesive labels that identify site number, other site designations, contents, and box number. Within the document boxes, records are housed in accordion folders, acid-free folders, acidic cardboard boxes, or 4-mil plastic zip-lock bags (Figure 74).

Paper Records

Repository 1—Love Library

Approximately 1.70 linear feet of survey and analysis documents, reports, drawings, inventories, and photograph/slide logs are housed in Room LL33 of the Love Library.

Figure 74. A variety of record types are stored in Room 100/Laboratory of the Industrial Arts Building.

Repository 2—Industrial Arts Building

Collection Storage Area 1—Room 100/Laboratory Approximately 1.19 linear feet of reports and survey and analysis documents are housed in Room 100/ Laboratory of the Industrial Arts Building.

Photographs

Repository 2—Industrial Arts Building

Collection Storage Area 1—Room 100/ Laboratory

Approximately 1.90 linear feet of black and white prints, negatives, and slides are housed in Room 100/ Laboratory of the Industrial Arts Building. Some slides are housed in archival sleeves and some are in the original slide box. Negatives are in acidic envelopes, and some prints are in commercial processing envelopes.

Collections Management Standards

Registration Procedures

Accession Files

An accession number is given to collections from an individual site. As older collections are revitalized, they are given new accession numbers because the original accession book has been lost.

Location Identification

The location of collections is currently being entered into a computerized database.

Cross-Indexed Files

The files are not cross indexed. A previously used database cross-indexed files by site number and box number.

Published Guide to the Collections

No complete guide to the collections has been published.

Site-Record Administration

The Smithsonian Institution trinomial site-numbering system is utilized.

Computerized Database Management

Quattro-Pro and Lab Assistant IV are used for collections management. A database using Locus is in development.

Written Policies and Procedures

Minimum Standards for Acceptance

SDSU no longer accepts new collections.

Curation Policy

The repository has a draft comprehensive plan for curation that follows the National Park Service standards (San Diego State University n.d.).

Records Management Policy

The draft curation plan covers the management of paper records, photographic materials, maps, and future preservation (San Diego State University n.d.).

Field Curation Procedures

Collections are no longer accepted; therefore, field curation procedures are not in place.

Loan Policy

Collections or objects are loaned for use in exhibits or for educational or research purposes (San Diego State University n.d.).

Deaccessioning Policy

Deaccessioning has been addressed in the draft curation plan. Deaccessioned materials include soil samples stored in deteriorated bags and some objects from the Admiral Baker Field collection. Approximately one-third of the Admiral Baker Field collection has been deaccessioned, but inadequate records have made it impossible to determine exactly which objects have been removed.

Inventory Policy

An inventory policy is in place.

Latest Collection Inventory

The collections were being inventoried during the St. Louis District's visit.

Curation Personnel

Curation personnel include a part-time curator, a part-time collections manager, two part-time student positions, and a student conservator.

Curation Financing

Curation has been financed through San Diego State University Foundation contracts and some Legacy grants. No fees have been charged.

Access to the Collections

Archaeology students or professionals with an appropriate research need or interest may have access to the collections. Native American groups are also permitted access to Native American collections (San Diego State University n.d.).

Future Plans

No future plans have been made since the department has made vast improvements with the repository, storage conditions, and management practices.

Comments

1. SDSU is a permanent curation repository.

2. Love Library is equipped with central air conditioning and forced-air heat. Room 100/ Laboratory in the Industrial Arts Building has a window air conditioner unit, but no heat. Room 100B is not equipped with environmental controls.

3. Love Library has a pest management plan that includes both monitoring and control. The Industrial Arts Building has a pest management plan that includes monitoring.

4. Adequate security deterrents and basic security devices are present in Love Library and the Industrial Arts Building.

5. Adequate fire suppression systems and basic fire detection devices are present in Love Library. Room 100/Laboratory in the Industrial Arts Building has basic fire-detection and -suppression systems. No fire detection devices or suppression systems are located in Room 100B in the Industrial Arts Building.

6. In Love Library, records are housed on open metal shelves in 4-mil plastic zip-lock bags (some soil samples are in paper bags, 1- 2-mil plastic zip-lock bags, and glass vials) in archival boxes. In Room 100/Laboratory and Room 100B in the Industrial Arts Building, artifacts are kept in 4-mil plastic zip-lock bags in archival boxes on the floor.

7. The majority of the collections have been cleaned and directly labeled. Inventory lists are kept in 4-mil plastic zip-lock bags in each of the boxes.

8. In Love Library, records are housed in acid-free folders and 4-mil plastic zip-lock bags in archival document boxes on open metal shelves. In Room 100/Laboratory in the Industrial Arts Building, records are housed in accordion folders, acidic cardboard boxes, and 4-mil plastic zip-lock bags in archival document boxes and one plastic box.

9. Photographic records are housed in original commercial processing envelopes, plastic slide boxes, plain envelopes, and archival sleeves.

10. Contaminants have been removed from the records in Love Library. Some contaminants, such as paper clips, are in the records in the Industrial Arts Building.

11. Security copies of the records have been produced.

12. During the St. Louis District's review, records collections were being rehabilitated in Room 100/ Laboratory in the Industrial Arts Building.

13. Human skeletal remains from Naval Air Station North Island are housed in Room 100B in the Industrial Arts Building. The remains were analyzed by Dr. Phil Walker at UCSB. A potential human tooth is in the collections in Love Library.

14. Collections storage has greatly improved since the St. Louis District's 1992 visit.

15. Some NAS North Island collections are missing or have not been returned after loans have expired. Some missing collections have been identified at California State University, Fullerton (Chapter 7-14).

Recommendations

1. Very few artifacts require (a) cleaning, (b) direct labeling (when applicable), and (c) insertion of acid-free labels in each secondary container.

2. Records require packaging in archival files.

3. Remove contaminants from the records in the Industrial Arts Building.

4. Install heating controls in the Industrial Arts Building, and ensure that Room 100B receives environmental controls.

5. Install humidity monitoring devices in the Industrial Arts Building and ensure that humidity levels are maintained in both buildings.

6. Ensure that pests are controlled in the Industrial Arts Building.

7. Both buildings should be equipped with additional security-detection devices, such as motion sensors, to protect collections during off-hours.

8. Additional fire-detection devices, such as alarms wired to the fire department, should be installed in both buildings. The Industrial Arts Building should have additional fire-suppression systems installed, particularly in Room 100B.

9. Create and implement the policies and guidelines as noted above if they are not currently in place.

10. All human remains and associated objects need to be brought into compliance with NAGPRA.

7-15

Southwest Division Naval Facilities Engineering Command

San Diego, California

Repository Summary

Volume of Artifacts: 6.0 ft³

Collection Origin: NAVSUBASE Point Loma, California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: None

Human Skeletal Remains: None

Date of Visit: February 17, 1999

Person Contacted: Danielle Huey, Archaeologist, and Lowell Martin

Southwest Division Naval Facilities Engineering Command (SWDIVNAVFACENGCOM) houses approximately 6.0 ft³ of artifacts from projects conducted on NAVSUBASE Point Loma, California (Table 100). The St. Louis District previously evaluated different Navy collections at SWDIVNAVFACENGCOM in August 1993 (U.S. Army Corps of Engineers 1999a).

Table 100.
Volume of Navy Archaeological Collections Housed at SWDIVNAVFACENGCOM

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAVSUBASE Point Loma, California	6.0	—	—
Total	6.0	—	—

Assessment

Navy collections are housed in Building 12 on the FISC, Broadway Complex (Figure 75). The building was originally constructed in 1944 for use as a warehouse and administrative functions. It was seismically upgraded in 1994. The building has five floors above ground, and occupies over 42,000 ft². Building 12 has space devoted to temporary artifact storage, warehouse storage, security monitoring, a mechanical/utility room, and a receiving/loading dock.

Figure 75. Artifacts are housed in Building 12.

Structural Adequacy

Building 12 has a concrete foundation, and the exterior walls and roof are poured concrete. Artifacts are located in a fenced area, which measures 1,200 ft², on the first floor of the building. The floor and ceiling are concrete, and interior walls are poured concrete. The storage area also houses items, such as furniture and equipment, from other tenant commands. Steel-framed windows are located throughout the building.

Environmental Controls

The building has no temperature or humidity controls. Lighting is provided by non-UV filtered fluorescent tubes.

Pest Management

Pest control involves inspections and control as needed.

Security

Security measures include a 24-hour in-house guard, key locks, and controlled access. The collections are stored in a padlocked, fenced area within the building. A fence also surrounds the complex.

Fire Detection and Suppression

Building 12 has manual fire alarms, fire doors, fire walls, and fire alarms wired to the fire department. Additionally, fire extinguishers are placed at the building entrance and at the gate entrance of the collection storage area. The building is considered fire-proof.

Artifact Storage

During the 1993 assessment, artifacts were housed in Building 131. Since that visit, collections have been moved to Building 12, where approximately 12.67 ft³ from pertinent facilities are housed.

Storage Units

Artifacts are stored on wooden pallets (Table 101).

Primary Containers

Artifacts are housed in acidic cardboard boxes that measure approximately 12 x 12 x 12 inches (d x w x h) (Figure 76). The boxes are labeled with pre-printed adhesive labels that identify project, box number, date, location, and contents. One large metate is stored loose on the wooden pallet.

Table 101.
Percentage by Volume of Navy Artifacts Housed at the SWDIVNAVFACENGCOM

Material Class	NAVSUBASE Point Loma, California
Lithics	90.0
Prehistoric Ceramics	—
Faunal Remains	5.0
Shell (unmodified)	5.0
Botanical	—
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	—
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	—
Total	100.0

Figure 76. Artifacts are stored on wooden pallets in cardboard boxes.

Secondary Containers

Secondary containers consist of paper bags, which are directly labeled in marker with provenience, project, and date. Some of the artifacts are stored loose in the primary container.

Laboratory Processing and Labeling

The artifacts have not been cleaned or directly labeled.

Human Skeletal Remains

There are no human skeletal remains.

Records Storage

During the 1993 review, SWDIVNAVFACENGCOM housed associated documentation from a number of Navy facilities. During the 1999 assessment, however, only reports were housed at SWDIVNAVFACENGCOM. Because reports are not original records, they were not evaluated.

Collections Management Standards

Registration Procedures

Accession Files

The collections are not accessioned as SWDIVNAVFACENGCOM is not a permanent curation repository.

Location Identification

SWDIVNAVFACENGCOM staff are familiar with the location of the collections.

Cross-Indexed Files

The files are not cross indexed.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

There is not a computerized database for collections.

Written Policies and Procedures

Minimum Standards for Acceptance

SWDIVNAVFACENGCOM is not a permanent curation repository and does not accept collections for curation.

Curation Policy

There is not formal curation policy in place because SWDIVNAVFACENGCOM is not a permanent curation repository.

Records Management Policy

There is not formal records management policy in place because SWDIVNAVFACENGCOM is not a permanent curation repository.

Field Curation Procedures

No written field curation guidelines have been produced.

Loan Policy

There are no formal loan policies because SWDIVNAVFACENGCOM is not a permanent curation repository.

Deaccessioning Policy

There is no deaccessioning policy in place because SWDIVNAVFACENGCOM is not a permanent curation repository.

Inventory Policy

There is no formal inventory policy.

Latest Collection Inventory

The collections have not been inventoried.

Curation Personnel

Cultural Resources staff and an intern at SWDIVNAVFACENGCOM are responsible for the care of the collections while at SWDIVNAVFACENGCOM.

Curation Financing

Care for collections is budgeted through the Navy.

Access to Collections

Qualified researchers may access the collections.

Future Plans

There are no current plans for the collections.

Comments

1. SWNAVFACENGCOM is not a permanent curation repository.

2. Building 12 is not equipped with environmental controls.

3. Adequate security-deterrents and -detection devices are in place.

4. Adequate fire-detection and -suppression systems are present.

5. Artifacts are housed in paper bags and loose in acidic cardboard boxes on a wooden pallet in a fenced in area.

6. The artifacts have not been cleaned or directly labeled.

7. SWNAVFACENGCOM has an agreement with San Diego Archaeological Center (Chapter XX) for curation.

Recommendations

1. Transfer archaeological collections to a permanent repository that meets the curation standards outlined in 36 CFR Part 79. Coordinate with the applicable installation to establish Memoranda of Agreement for the permanent disposition of the collections.

2. Artifacts require (a) cleaning, (b) sorting, (c) direct labeling (when applicable), (d) storage in appropriate archival primary and secondary containers that have been labeled, and (e) insertion of acid-free labels in each secondary container.

7-16

Southwest Museum

Highland Park, California

Repository Summary

Volume of Artifacts: 1.59 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require partial rehabilitation to comply with existing federal guidelines and standards for archaeological curation.

Linear Feet of Records: None

Human Skeletal Remains: 5.11 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human skeletal remains and associated funerary objects need to be brought into compliance with NAGPRA.

Date of Visit: February 24, 1999

Person Contacted: George Kritzman, assistant curator of archaeology

The Southwest Museum houses approximately 6.70 ft³ of artifacts and human skeletal remains from projects conducted on NAS North Island (San Clemente Island), California (Table 102). The St. Louis District previously evaluated these collections in August 1992 (U.S. Army Corps of Engineers 1997). The museum was also visited in November 1993 and July 1994 (Halpin and Holland 1997) and in February 1995 and October 1995 (Halpin and Militello 1999) to review different Navy collections.

Table 102.
Volume of Navy Archaeological Collections Housed at the Southwest Museum

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	1.59	5.11	—
Total	1.59	5.11	—

Assessment

The Southwest Museum was constructed between 1912 and 1914 for use as a museum (Figure 77). The building has several levels above ground, and collections are located in a 1,050-ft² collections storage room in the Caracol Tower. A mezzanine level within the tower provides additional storage space.

Structural Adequacy

The museum building is constructed of steel and concrete a stucco exterior. The tile roof was replaced in 1989. The January 17, 1994, earthquake that hit the Los Angeles area caused visible cracks in the exterior walls, but none of the archaeological collections were damaged. The collections storage room has concrete floors, walls, and ceilings. Six

Figure 77. Navy collections are housed in Caracol Tower.

large aluminum-framed windows without shades or UV filters are present in the collections room. A solid-core wooden door leads to a spiral steel staircase that connects the tower to the exhibit area of the museum.

Environmental Controls

No environmental controls are present in the collections storage room, and temperatures range from approximately 55–95° F. Humidity levels are monitored with a hygrothermograph. Lighting is provided by non-UV filtered incandescent bulbs.

Pest Management

The building is sprayed for pests on an as-needed basis.

Security

The museum is protected by a coded pad intrusion alarm wired to a private security company. A motion detector is located outside the only door to the collections storage room. This door is also equipped with a dead-bolt lock. Access to the collections area is controlled by the assistant curator. There is no access to the windows in the tower due to their extreme height.

Fire Detection and Suppression

Fire detection systems consist of smoke and fire alarms wired to a private security company are located throughout the museum. Fire extinguishers are present throughout the building, and a halon fire extinguisher is located in the collections storage room. The halon extinguisher is serviced yearly, and all staff are instructed in its use.

Artifact Storage

Artifacts and human skeletal remains (Table 103) totaling 6.70 ft³ are housed in the Caracol Tower portion of the museum designated as "C-3 Upper." Collections from NAS North Island are stored on both the mezzanine level and on the lower level of the tower. The status of the collections has not changed since the August 1992 visit.

Table 103.
Percentage by Volume of Navy Artifacts Housed at the Southwest Museum

Material Class	NAS North Island, California
Lithics	8.8
Prehistoric Ceramics	—
Faunal Remains	3.6
Shell (unmodified)	5.8
Botanical (wood & basketry)	4.5
Flotation	—
Soil	—
^{14}C	—
Human Skeletal Remains	76.3
Worked Shell	—
Worked Bone	—
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	1.0
Textiles	—
Other	—
Total	100.0

Storage Units

Approximately 1.59 ft³ of artifacts are housed on the mezzanine level on open metal shelving units that have basting tape stretched across the front to prevent collections from falling during an earthquake. In the lower level of the tower, collections are in wooden drawers of a wooden storage unit.

Primary Containers

On the mezzanine level, primary containers consist of acidic cardboard boxes of varying dimensions (Figure 78). The boxes are labeled in marker on notecards.

Figure 78. Artifacts are housed in cardboard boxes on metal shelves in the tower.

Secondary Containers

Within the cardboard boxes, artifacts are housed in 4-mil plastic zip-lock bags, glass vials, or loose in the boxes. Some secondary containers are directly labeled in marker with catalog number and item description. Some of the artifacts are wrapped in acid free tissue paper.

Laboratory Processing and Labeling

The collections have been cleaned and directly labeled in india ink, sometimes on a base coat.

Human Skeletal Remains

Approximately 5.11 ft^3 of human skeletal remains (MNI=11) are kept on the lower level in wooden cabinets and stacked on shelving units. Primary containers for human skeletal remains consist of wooden drawers, and acidic cardboard boxes of varying dimensions. Within the primary containers, the remains are stored in 1- and 4-mil plastic zip-lock bags, acidic cardboard boxes, or loose in the primary containers. The secondary containers are labeled directly in marker or pen with accession number and provenience. Most of the remains have been labeled directly in india ink.

Records Storage

There are no NAS North Island associated records housed at the Southwest Museum.

Collections Management Standards

Registration Procedures

Accession Files

Collections are accessioned upon receipt by the registrar.

Location Identification

The locations of artifacts within the museum have been entered into a computerized database.

Cross-Indexed Files

Files are cross indexed in the computer system by donor name, location in the museum, and artifact type.

Published Guide to Collections

No guide to the collections has been published.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized. Southwest Museum catalog numbers document individual artifacts.

Computerized Database Management

A computerized database-management system, ARGUS, is used.

Written Policies and Procedures

Minimum Standards for Acceptance

The museum's collections committee makes decisions regarding the acceptance of collections. Only Native American material from North or South America is accepted.

Curation Policy

Curation is covered in a written collections management policy.

Records Management Policy

Records management is covered in the collections management policy.

Field Curation Procedures

The Southwest Museum does not have any written field curation guidelines. Only collections acquired through donation or purchase are accepted.

Loan Policy

Loans can be obtained through the registrar. A loam form must be completed.

Deaccessioning Policy

Deaccessioning is discussed in the collections management policy.

Inventory Policy

No written inventory policy has been established.

Latest Collection Inventory

Between 1985 and 1986, the collections were inventoried and photographed and all data were entered into a computer database.

Curation Personnel

Curation of archaeological collections is the responsibility of a chief curator, curator of collections, and an assistant curator.

Curation Financing

Curation activities are financed through private funds, endowments, and fundraisers. Federal grants provide conservation documentation and archival materials for many portions of the collection.

Access to Collections

Archaeological collections are accessible to interested parties engaged in scholarly research. Researchers must provide the museum with a written letter of intent and make an appointment. For access to the collections a form must be completed recording name, address, purpose of study, and when the information will be published. Researchers are supervised at all times by the assistant curator.

Future Plans

The museum is planning for the seismic retrofit and renovation of the tower.

Comments

1. The Southwest Museum is a permanent curation repository.

2. The Caracol Tower is not equipped with environmental controls.

3. An integrated pest management plan is not in place; however, pests are controlled through spraying.

4. Excellent security-deterrents and -detection devices are in place.

5. Adequate fire-detection and -suppression measures are present.

6. Artifacts and human skeletal remains are housed in 1- and 4-mil plastic zip-lock bags, acidic cardboard boxes, glass vials or loose in wooden drawers in acidic cardboard boxes on open metal shelves.

7. Artifacts have been cleaned and directly labeled.

8. Human skeletal remains and associated funerary objects are present in the collections.

Recommendations

1. Artifacts require (a) storage in appropriate archival primary and secondary containers that have been labeled, and (b) insertion of acid-free labels in each secondary container.

2. Replace wood storage units with appropriate archival cabinets.

3. Install environmental controls in the Caracol Tower, and monitor temperature.

4. Ensure that humidity levels are maintained.

5. Implement an integrated pest management plan.

6. Fit incandescent bulbs and windows with UV filters.

7. Create and implement the policies and guidelines as noted above if they are not currently in place.

8. All human remains and associated objects need to be examined and brought into compliance with NAGPRA.

7-17

University of California

Santa Barbara, California

Repository Summary

Volume of Artifacts: 7.41 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Artifacts require complete rehabilitation to comply with existing federal guidelines and standards for curation.

Linear Feet of Records: 0.12 linear feet

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Associated documentation requires complete rehabilitation to comply with current federal guidelines and modern archival preservation standards.

Human Skeletal Remains: 50.94 ft³

Collection Origin: NAS North Island (San Clemente Island), California

Compliance Status: Human skeletal remains have been inventoried for NAGPRA compliance.

Date of Visit: March 2, 2000

Person Contacted: Dr. Phillip Walker, Professor, and Peter Page, Assistant Curator

The University of California, Santa Barbara (UCSB) houses approximately 58.35 ft³ of artifacts and human skeletal remains and 0.12 linear feet of associated documentation from projects conducted on NAS North Island (San Clemente Island), California (Table 104). The St. Louis District previously evaluated collections at UCSB in November 1993 for a different project (Halpin and Holland 1997).

Table 104.
Volume of Navy Archaeological Collections Housed at UCSB

Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
NAS North Island, California	7.41	50.94	0.12
Total	7.41	50.94	0.12

Assessment

The Repository for Archaeological and Ethnographic Collections in the Anthropology Department at UCSB is located in the Humanities and Social Sciences Building, which was newly constructed in 1996 (Figure 79). The building has four stories above grade with a tower that reaches six stories, and one floor below grade. The building has areas devoted to artifact processing, records storage, offices, classrooms, and a receiving/loading dock. Archaeological collections are located in two areas of the basement: the "ossuary" holds human skeletal remains and a 1,500-ft² collections room houses the artifacts. Due to Native American concerns, only the artifact collections room will be discussed in this chapter.

Figure 79. Navy collections are housed in the basement of the Humanities and Social Sciences Building on campus.

Structural Adequacy

The building has a concrete foundation and poured concrete exterior walls. The built-up asphalt roof is original to the building. Multiple double-glazed aluminum-framed windows are located in the building and are covered with blinds. No windows are located in the collections storage area in the basement. The collections storage area has a concrete floor, and a concrete ceiling. Interior walls are constructed of wallboard/sheet rock. Two single solid wood interior doors and one set of solid wood double doors are located in the collections storage area.

Environmental Controls

The building is equipped with an HVAC system. Five air handlers (fan-coil units) are used for the basement. Pre-filters and HEPA filters are present on the HVAC system. The targeted temperature in the collections storage area is 65º F. Humidity is regulated and monitored with a datalogger. RH is kept at 50–55% throughout the building. Fluorescent lights equipped with UV filters are used in the collections storage area.

Pest Management

According to UCSB staff, there is a program for pest management in the collections storage area, which includes both monitoring and control. Pests (specifically silverfish) are monitored through sticky traps, and dusting is conducted on an as-needed basis by the university facilities management and a professional pest management company.

Security

Security consists of intrusion alarms wired directly to campus police and a central monitoring station, motion detectors, and key pads. All windows have locks, all doors have dead-bolt locks, and storage cabinets are locked. Access to the collections storage area is controlled.

Fire Detection and Suppression

Fire detection methods for the building consist of smoke detectors, manual fire alarms, heat sensors, and alarms wired directly to the fire department. The building is equipped with a wet-pipe sprinkler system, one-hour corridors, and fire extinguishers. A sliding fire door cuts off the elevator shaft in the event of a fire. Additionally, the building is constructed of non-combustible materials. Heat sensors are present in the collections storage area, and it is considered to be fireproof.

Artifact Storage

Storage Units

Approximately 7.41 ft³ of artifacts from NAS North Island are stored on wooden shelves that measure 24 x 47 x 83 inches (d x w x h) (Table 105). Metal bars run across the front of the shelves to protect the boxes during an earthquake.

Table 105.
Percentage by Volume of Navy Artifacts Housed at UCSB

Material Class	NAS North Island, California
Lithics	3.2
Prehistoric Ceramics	—
Faunal Remains	7.0
Shell (unmodified)	1.5
Botanical	—
Flotation	—
Soil	0.4
^{14}C	—
Human Skeletal Remains	87.3
Worked Shell	0.3
Worked Bone	0.3
Brick/Masonry	—
Historic Ceramics	—
Metal	—
Glass	—
Textiles	—
Other	—
Total	100.0

Primary Containers

Artifacts are housed in archival and acidic cardboard boxes in a variety of sizes. Boxes are folded, stapled, or taped, and some have telescoping lids, folded flaps, or are open. The boxes are labeled with a typed adhesive label. Label information identifies the site number and box contents.

Secondary Containers

Artifacts are housed in 2-mil plastic zip-lock bags or loose in the primary container. Approximately half of the secondary containers are labeled directly in marker with site number, provenience, and material class. Approximately eighty percent of secondary containers have a tag inserted in them that identifies site number, provenience, and material class.

Laboratory Processing and Labeling

All of the artifacts have been cleaned, and approximately 80% have been directly labeled in ink. Artifacts are sorted by site number and burial number.

Human Skeletal Remains

Approximately 50.94 ft^3 of human skeletal remains from NAS North Island are housed at UCSB. They are curated in the "ossuary" in some of the boxes noted above. UCSB staff have completed an inventory of human skeletal remains and associated funerary objects for NAS North Island's compliance with NAGPRA. In deference to Native American wishes and UCSB's policy, further information about the storage of the human skeletal remains will not be discussed.

Records Storage

Approximately 0.12 linear feet of associated documentation from NAS North Island are housed in the collections storage area at UCSB (Table 106). Records are housed with the artifacts in an acidic cardboard box measuring 9.5 x 6.5 x 6.5 inches (d x w x h) on a wooden shelf. The box is folded and stapled and has a telescoping lid. It is labeled with a typed adhesive label that identifies site number and box contents.

Table 106.
Linear Footage of Navy Associated Documentation Housed at UCSB

Materials	NAS North Island, California
Paper	0.02
Reports	—
Maps and Oversized Documents	—
Audiovisual	—
Photographs	0.10
Computer	—

Paper Records

Paper records consist of 0.02 linear feet of survey documents. They are stored loose in the acidic cardboard box.

Photographic Records

Photographic records consist of 0.10 linear feet of black-and-white prints and negatives. They are housed in a 2-mil plastic zip-lock bag in the acidic cardboard box with the paper records.

Collections Management Standards

Registration Procedures

Accession Files

All materials are accessioned upon receipt. Collections must receive accession numbers prior to their placement with UCSB, as noted in UCSB's *Procedures for the Submission of Archaeological Collections for Curation*.

Location Identification

Locations of the artifacts within the repository are included in the accession file.

Cross-Indexed Files

The files are cross indexed by accession number.

Published Guide to Collections

No guide to the collections has been published, but UCSB staff hope to publish one soon.

Site-Record Administration

The Smithsonian trinomial site-numbering system is utilized.

Computerized Database Management

A data capture system is used by the staff, and back-ups are made on disk when changes occur to the system. Three back-ups of computerized catalog records are kept in the building, and one is kept in a professor's office in a fireproof cabinet.

Written Policies and Procedures

Minimum Standards for Acceptance

UCSB accepts outside collections for curation, but they must meet UCSB written standards, as noted in *Procedures for the Submission of Archaeological Collections for Curation*, to be accepted.

Curation Policy

UCSB has a written curation policy, entitled *Procedures for the Submission of Archaeological Collections for Curation*. A companion document is entitled *Policies for Perpetual Curation of Archaeological Collections*. Depositors of collections to UCSB must read these documents and sign a form indicating that the documents were understood. The mission statement identifies UCSB's two priorities as fostering research and enhancing education.

Records Management Policy

There is a written records management policy. Additionally, in order for records to be accepted with a collection at UCSB, they must meet the standards identified in *Procedures for the Submission of Archaeological Collections for Curation*.

Field Curation Procedures

There are written field curation procedures.

Loan Policy

There is no written policy regarding loaned materials, but UCSB does have a loan form that is used.

Deaccessioning Policy

UCSB does not deaccession collections.

Inventory Policy

Collections are inventoried upon receipt, as noted in UCSB's *Procedures for the Submission of Archaeological Collections for Curation*.

Latest Collection Inventory

Collections are inventoried upon receipt.

Curation Personnel

UCSB does not have a full-time curator. A part-time graduate student is responsible for the curation of the materials with the assistance of student interns.

Curation Financing

Financing for the curation of collections is through university, curation, and access fees. UCSB's written *Fee Structure* identifies fees associated with curation.

Access to Collections

Access to the collections is controlled by anthropology staff. Researchers are permitted to review the collections by appointment, as long as they have proper credentials.

Future Plans

UCSB has plans to install archival cabinets and upgrade computer resources.

Comments

1. UCSB is a permanent curation facility.

2. Excellent environmental controls and dust filters are in place. UV filters are on fluorescent lights.

3. A pest-management plan, including both monitoring and control, is in place.

4. Excellent security-deterrents and -detection devices are present.

5. Excellent fire-suppression and -detection measures are in place.

6. Artifacts are kept in 2-mil plastic zip-lock bags or loose in archival and acidic cardboard boxes.

7. All artifacts have been cleaned, and approximately 80% have been directly labeled.

8. Records are housed loose in an acidic cardboard box with the artifacts.

9. Human skeletal remains and funerary objects are housed at UCSB. A summary of objects has been completed (Walker et al. 1993).

10. Through a cooperative agreement with the Chumash descendants on the rolls of the Santa Ynez Band of Mission Indians, UCSB has agreed to house human skeletal remains and associated funerary objects in the repository.

Recommendations

1. Artifacts require (a) direct labeling (when applicable), (b) storage in appropriate archival primary and secondary containers that have been labeled, and (c) insertion of acid-free labels in each secondary container.

2. Records require (a) sorting, (b) packaging in archival containers and in archival files, (c) appropriate and consistent labeling of all file folders, (d) creation of a finding aid, and (e) creation of a duplicate copy for security.

3. Replace wooden storage units with appropriate archival cabinets.

8

Findings Summary

Fifty-five collections storage areas at 31 repositories (Table 107) are known to curate 2,345.78 ft³ of artifacts, 112.22 ft³ of human skeletal remains, and 307.41 linear feet of associated documentation recovered from CINCPACFLT Navy facilities. Assessment teams performed complete examinations of all known CINCPACFLT collections at each location (Table 108). A complete building evaluation was conducted for all new repositories that were visited, and building

Table 107.
Repositories Housing Archaeological Collections from CINCPACFLT Facilities

Repository*	City	State/Country	Number of Collections Areas
Tinian HPO	San Jose	CNMI	1
Affinis Environmental Services	El Cajon	CA	1
ASM Affiliates	Encinitas	CA	1
CSU	Fullerton	CA	1
CSU	Northridge	CA	2
Fort Guijarros Museum Foundation, NAVSUBASE Point Loma	San Diego	CA	2
Fowler Museum of Cultural History, University of California	Los Angeles	CA	4
Gallegos and Associates	Carlsbad	CA	1
KEA Environmental, Inc.	San Diego	CA	1
Natural History Museum of Los Angeles County	Los Angeles	CA	2
NAS North Island	San Diego	CA	2
RMW Paleo Associates	Mission Viejo	CA	1
SDAC	San Diego	CA	1
San Diego Museum of Man	San Diego	CA	3
SDSU	San Diego	CA	3
SWDIVNAVFACENGCOM	San Diego	CA	1
Southwest Museum	Highland Park	CA	1
University of California	Santa Barbara	CA	2
ARRC, University of Guam	Mangilao	GU	1
IARII	Tamuning	GU	1
Marianas Military Museum, Apra Harbor Naval Complex	Agat	GU	2
MARS	Mangilao	GU	2
MARC, University of Guam	Mangilao	GU	1
PHRI	Barrigada	GU	1
IARII	Honolulu	HI	3
Ogden Environmental and Energy Services	Honolulu	HI	3
PACNAVFACENGCOM	Pearl Harbor	HI	2
PHRI	Hilo	HI	2
The Burke Museum of Natural History and Culture, University of Washington	Seattle	WA	3
WSU	Pullman	WA	4
Total			55

* William Manley and Assoicates is not included in this table because the collections were in the process of moving to a new repository.

evaluations were updated if the repository had been visited previously. Information derived from the building evaluation was used to determine the level of compliance with 36 CFR Part 79 for each repository. In summary, the following can be concluded: 11 of the 55 collections storage areas housing CINCPACFLT collections meet the minimum standards of 36 CFR Part 79 (Table 109).

Table 108.
Quantity of Archaeological Collections Examined

Repository	Facility	Volume of Artifacts (ft^3)	Volume of Human Skeletal Remains (ft^3)	Volume of Records (linear feet)
Tinian HPO, CNMI				
	MEUA, Tinian, CNMI	36.05	—	—
Affinis Environmental Services, CA				
	NAS Whidbey Island, WA	0.02	—	not determined
ASM Affiliates, CA				
	NAS North Island, CA	4.06	—	0.27
CSU, Fullerton, CA				
	NAS North Island, CA	23.50	1.50	0.42
CSU, Northridge, CA				
	NAS North Island, CA	267.97	—	22.21
Fort Guijarros Museum Foundation, NAVSUBASE Point Loma, CA				
	NAVSUBASE Point Loma, CA	435.80	0.01	7.94
Fowler Museum of Cultural History, University of California, CA				
	NAS North Island, CA	302.62	2.45	5.52
Gallegos and Associates, CA				
	NAVSUBASE Point Loma, CA	10.20	—	0.19
	NOLF Imperial Beach, CA	—	—	0.06
	NWS Fallbrook, CA	—	—	0.20
KEA Environmental, Inc., CA				
	NAVSTA San Diego, CA	5.75	—	0.15
	Salton Sea Test Base, CA	1.15	—	0.50
Natural History Museum of Los Angeles County, CA				
	NAS North Island, CA	31.21	0.03	0.50
NAS North Island, CA				
	NAS North Island, CA	8.89	4.62	85.26
RMW Paleo Associates, CA				
	NAVSUBASE San Diego, CA	—	—	0.19
SDAC, CA				
	NAS North Island, CA	63.90	—	0.70
	NWS Fallbrook, CA	12.08	—	0.82
	NWS Seal Beach, CA	70.07	—	—
San Diego Museum of Man, CA				
	NAS North Island, CA	18.39	9.15	0.48
SDSU, CA				
	Admiral Baker Field, CA	22.28	—	3.95
	NAS North Island, CA	196.9	3.30	0.84
SWDIVNAVFACENGCOM, CA				
	NAVSUBASE Point Loma, CA	6.0	—	—
Southwest Museum, CA				
	NAS North Island, CA	1.59	5.11	—
UCSB, CA				
	NAS North Island, CA	7.41	50.94	0.12

Table 108.
Quantity of Archaeological Collections Examined (Continued)

Repository	Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
William Manley and Associates, CA				
	NAVSUBASE Point Loma, CA	—	—	0.18
ARRC, University of Guam, GU				
	NAVFAC, GU	0.10	5.23	0.12
IARII, GU				
	NCTAMS, GU	3.46	3.94	0.02
Marianas Military Museum, Apra Harbor Naval Complex, GU				
	Apra Harbor Naval Complex, GU	4.25	—	5.94
MARS, GU				
	NAVACTS Ordnance Annex, GU	10.48	0.59	0.94
	NAVSTA, GU	2.89	0.31	0.02
MARC, University of Guam, GU				
	NAVFAC, GU	40.15	0.07	2.93
PHRI, GU				
	Military Lease Area, Tinian, CNMI	256.82	15.25	10.39
	Andersen AFB, GU	—	—	0.01
	NAVACTS, GU	40.70	1.35	0.20
	NAS Agana, GU	1.93	—	0.02
	NAVMAG, GU	28.07	—	2.78
	Naval Support Facility, Diego Garcia	—	—	0.17
IARII, HI				
	MEUA, Tinian	7.81	—	0.38
	FISC, GU	5.43	—	1.17
	NAVACTS Communication Annex, GU	5.84	—	—
	Apra Harbor Naval Complex, GU	—	—	0.03
	NCTAMS, GU	—	—	0.98
	PMRF Barking Sands, HI	—	—	0.06
Ogden Environmental and Energy Services, HI				
	MLA, Tinian	51.27	0.38	2.40
	Andersen AFB, GU	—	—	0.08
	Apra Harbor Naval Complex, GU	—	—	1.04
	FISC, GU	—	—	0.11
	NAVACTS Ordnance Annex, GU	15.46	0.35	1.75
	NAVACTS Waterfront Annex, GU	—	—	0.01
	NCTAMS, GU	—	—	0.02
	Naval Hospital, GU	—	—	0.01
	NAVMAG, GU	2.34	—	0.36
	NPWC, GU	—	—	0.03
	Naval Ship Repair Facility, GU	—	—	0.01
	NAVSTA, GU	—	—	0.15
	Fort Kamehameha, HI	74.79	—	1.59
	Ka'ula Navy Training Target Impact Area, HI	—	—	0.13
	MCBH Kaneohe Bay, HI	1.17	—	—
	NAS Barbers Point, HI	1.17	—	0.22
	Naval Base Kaho'olawe, HI	—	—	0.38
	NCTAMS, HI	—	—	0.04
	NAVMAG Lualualei, HI	—	—	0.16
	NUWES, HI	—	—	0.02
	PMRF Barking Sands, HI	8.19	—	0.91
	Pearl Harbor Naval Complex, HI	—	—	0.41
	SPAWAR (SURTASS), HI	1.17	—	0.18

Table 108.
Quantity of Archaeological Collections Examined (Continued)

Repository	Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
PACNAVFACENGCOM, HI				
	NSR Diego Garcia, BIOT	—	—	0.53
	MLA Tinian, CNMI	—	—	15.20
	Saipan Airfields, Saipan, CNMI	—	—	0.05
	Apra Harbor Naval Complex, GU	9.02	0.02	0.69
	FISC, GU	—	—	0.80
	Guam Navy	—	—	2.12
	NAVACTS Ordnance Annex, GU	—	—	0.53
	NAS Agana, GU	—	—	0.24
	NCTAMS WESTPAC, GU	—	—	0.70
	NAVMAG, GU	—	—	2.19
	Bellows AFB, HI	—	—	0.84
	Fort Kamehameha, HI	—	—	9.72
	Iroquois Point, HI	—	—	0.10
	Makalapa Flag Quarters, HI	—	—	0.30
	MCBH Kaneohe Bay, HI	—	—	16.20
	Molokai Training Support Facility, HI	—	—	0.69
	NAS Barbers Point, HI	—	—	8.74
	Naval Base Kaho'olawe, HI	10.06	0.13	18.32
	NCTAMS EASTPAC, HI	—	—	0.04
	NAVMAG Lualualei, HI	—	—	2.70
	NAVMAG Lualualei Waikele Branch, HI	—	—	0.91
	NAVMAG West Loch Branch, HI	—	—	0.01
	NAVPROTEC, HI	—	—	0.25
	NRTF Lualualei, HI	—	—	0.21
	Naval Security Group Activity, HI	—	—	0.10
	NAVSUBASE Pearl Harbor, HI	—	—	0.63
	NUWES Lualualei, HI	—	—	0.08
	PACNAVFACENGCOM, HI	—	—	9.58
	PMRF Barking Sands, HI	—	—	7.84
	Pearl Harbor Naval Complex, HI	—	—	1.92
	Waiawa Floodplain, HI	—	—	0.04
	FLEACT Okinawa/NAF Kadena, Japan	—	—	3.23
	FLEACT Sasebo, Japan	—	—	2.78
	Japan Navy	—	—	0.40
	MCAS Futenma, Japan	—	—	0.08
	MCB Camp Smedley, Japan	—	—	0.08
	NAF Atsugi, Japan	—	—	0.15
	White Beach Naval Facility, Japan	—	—	0.07
	Yokosuka Naval Complex, Japan	—	—	2.20
	FLEACT Chinhae, Korea	—	—	0.57
	Midway Island	—	—	0.38
	Wake Island	—	—	1.46
	Miscellaneous Navy	—	—	22.23
PHRI, HI				
	Andersen AFB, GU	0.63	—	—
	MCBH Kaneohe Bay, HI	3.03	—	—
	NAS Barbers Pt, HI	56.71	—	1.11
	Naval Base Kaho'olawe, HI	3.01	—	—
	PMRF Barking Sands, HI	0.69	—	—
	Waiawa Floodplain, HI	—	—	0.08
	Midway Island	1.85	—	—
	Wake Island	1.17	—	—

Table 108.
Quantity of Archaeological Collections Examined (Continued)

Repository	Facility	Volume of Artifacts (ft³)	Volume of Human Skeletal Remains (ft³)	Volume of Records (linear feet)
The Burke Museum of Natural History and Culture, University of Washington, WA				
	NAS Whidbey Island, WA	15.0	—	0.24
	NAVMAG Indian Island, WA	1.0	—	0.04
WSU, WA				
	NAVMAG Indian Island	154.28	7.49	3.37
Total		2,345.78	112.22	307.41

Table 109.
Criteria to Determine if Repositories Meet the Minimum Requirements of 36 CFR Part 79

Repository	Fire Safety	Security	Environmental Controls	Pest Management	Meets Minimum 36 CFR Part79
Tinian HPO, CNMI	No	No	No	No	No
Affinis Environmental Services, CA	No	No	No	No	No
ASM Affiliates, CA	Yes	No	Yes	No	No
CSU, Fullerton, CA	Yes	No	Yes	No	No
CSU, Northridge, CA					
Collection Storage Area	Yes	Yes	Yes	No	No
Main Laboratory/Curation Office	Yes	Yes	Yes	No	No
Fort Guijarros Museum Foundation, NAVSUBASE Point Loma, CA					
Building 257	No	Yes	Yes	No	No
Building 128, Ballast Point Repository Annex	No	Yes	No	No	No
Fowler Museum of Cultural History, University of California, CA					
Main Storage Area	Yes	Yes	No	No	No
Room 1411D	Yes	Yes	Yes	No	No
Room 1411B	Yes	Yes	Yes	No	No
Basement	Yes	Yes	No	No	No
Gallegos and Associates, CA	No	Yes	No	No	No
KEA Environmental, Inc., CA	Yes	Yes	Yes	No	No
Natural History Museum of Los Angeles County, CA					
Anthropological Collections Storage Room	Yes	Yes	No	Yes	No
Collections Manager's Office	Yes	Yes	Yes	Yes	Yes
NAS North Island, CA					
Ground Floor Storage Room	Yes	Yes	No	No	No
Base Archaeologist's Office	Yes	Yes	No	No	No
RMW Paleo Associates, CA	No	No	Yes	No	No
SDAC, CA	Yes	Yes	No	Yes	No
San Diego Museum of Man, CA					
Collections Storage, Lab 5	Yes	Yes	No	Yes	No
Physical Anthropology Lab, Lab 6	Yes	Yes	Yes	Yes	Yes
Curatorial Work Area, Lab 2	Yes	Yes	Yes	Yes	Yes
SDSU, CA					
Love Library, Room LL33	Yes	No	Yes	Yes	No
Industrial Arts Building, Room 100/Lab	Yes	No	No	Yes	No
Industrial Arts Building, Room 100B	Yes	No	No	Yes	No
SWDIVNAVFACENGCOM, CA	Yes	No	No	Yes	No
Southwest Museum, CA	Yes	Yes	No	No	No
UCSB, CA					
Ossuary	Yes	Yes	Yes	Yes	Yes
Artifact Collections Room	Yes	Yes	Yes	Yes	Yes
ARRC, GU	No	No	Yes	No	No
IARII, GU	No	No	Yes	No	No
Marianas Military Museum, Apra Harbor Naval Complex, GU					
Museum	Yes	Yes	Yes	No	No
Archaeologist's Office	Yes	Yes	Yes	No	No

Table 109.
Criteria to Determine if Repositories Meet the Minimum Requirements of 36 CFR Part 79 (Continued)

Repository	Fire Safety	Security	Environmental Controls	Pest Management	Meets Minimum 36 CFR Part79
MARS, GU					
Collection Storage Room	No	No	Yes	Yes	No
Office/Lab	No	No	Yes	Yes	No
MARC, University of Guam, GU	Yes	Yes	Yes	No	No
PHRI, GU	Yes	Yes	Yes	No	No
IARII, HI					
Room 106, Main Artifact Storage Area	No	No	Yes	No	No
Lab	No	No	Yes	No	No
Work Stations	No	No	Yes	No	No
Ogden Environmental and Energy Services, HI					
Room 424, Lab	Yes	Yes	Yes	Yes	Yes
Room 426, Lab	Yes	No	No	Yes	No
Room 600, Main Building	Yes	No	Yes	Yes	No
PACNAVFACENGCOM, HI					
Building 1 basement, Naval Shipyard	Yes	No	Yes	No	No
Building 97, Ford Island	No	No	Yes	No	No
PHRI, HI					
Warehouse	No	No	No	No	No
Library	Yes	Yes	Yes	No	No
The Burke Museum of Natural History and Culture, University of Washington, WA					
Hallway	Yes	Yes	Yes	Yes	Yes
Room 33	Yes	Yes	Yes	Yes	Yes
Room 30	Yes	Yes	Yes	Yes	Yes
WSU, WA					
Room 104, College Hall	Yes	Yes	Yes	Yes	Yes
Room 105, College Hall	Yes	Yes	Yes	Yes	Yes
Room 114, College Hall	No	Yes	Yes	Yes	No
Anthropology Storage Building	Yes	No	No	Yes	No

Note: Repositories that have been determined to meet the *minimum* requirements for 36 CFR Part 79 possess the following: Adequate **Fire Safety** indicates that fire detection *and* suppression capabilities are present in the system being used. Adequate **Security** indicates that intrusion detection *and* deterrent capabilities are present in the system being used. Adequate **Environmental Controls** indicate that air conditioning and heat (where necessary) are provided in the repository and collections area. Adequate **Pest Management** indicates that *regular* monitoring *and* control for pests occur in the repository.

Besides evaluating each repository, each type of material (i.e., artifacts, records, human skeletal remains) was also evaluated to determine its level of rehabilitation (Table 110). This information is pertinent in order to more fully understand what each collection requires to bring it into compliance with existing federal standards and guidelines. Five artifact collections require partial rehabilitation and 24 require complete rehabilitation. None of the artifact collections comply with federal guidelines. Three record collections require partial rehabilitation and 22 require complete rehabilitation. Only one of the record collections complies with federal guidelines. Of the 17 skeletal collections identified, seven are not required to comply with NAGPRA because they are from U.S. territories or commonwealths. Compliance is required for seven of the collections. Of the remaining skeletal collections, one has been repatriated, NAGPRA compliance is complete for one, and one NAGPRA inventory has been completed.

Table 110.
Amount of Rehabilitation Necessary for Examined Collections

Navy Region	Repository	Artifacts	Records	Human Skeletal Remains
Naval Forces, Marianas	Tinian HPO, CNMI	Complete	None	None
	ARRC, University of Guam, GU	Complete	Complete	NAGPRA not required
	IARII, GU	Complete	Complete	NAGPRA not required
	Marianas Military Museum, Apra Harbor Naval Complex, GU	Complete	Complete	None
	MARS, GU	Complete	Complete	NAGPRA not required
	MARC, University of Guam, GU	Complete	Complete	NAGPRA not required
	PHRI, GU	Complete	Complete	NAGPRA not required
Navy Region, Hawaii	IARII, HI	Complete	Complete	None
	Ogden Environmental and Energy Services, HI	Complete	Complete	NAGPRA not required
	PACNAVFACENGCOM, HI	Complete	Complete	NAGPRA not required
	PHRI, HI	Complete	Complete	None
Navy Region, Northwest	The Burke Museum of Natural History and Culture, University of Washington, WA	Complete	Complete	None
	WSU, WA	Complete	Complete	Repatriated
Navy Region, Southwest	Affinis Environmental Services, CA	Partial	Not determined	None
	ASM Affiliates, CA	Complete	Complete	None
	CSU, Fullerton, CA	Complete	Complete	NAGPRA completed
	CSU, Northridge, CA	Complete	Complete	None
	Fort Guijarros Museum Foundation, NAVSUBASE Point Loma, CA	Partial	Partial	NAGPRA compliance required
	Fowler Museum of Cultural History, University of California, CA	Complete	Complete	NAGPRA compliance required
	Gallegos and Associates, CA	Complete	Complete	None
	KEA Environmental, Inc., CA	Complete	Complete	None
	Natural History Museum of Los Angeles County, CA	Complete	Complies	NAGPRA compliance required
	NAS North Island, CA	Complete	Complete	NAGPRA compliance required
	RMW Paleo Associates, CA	None	Complete	None
	SDAC, CA	Complete	Partial	None
	San Diego Museum of Man, CA	Partial	Complete	NAGPRA compliance required
	SDSU CA	Partial	Partial	NAGPRA compliance required
	SWDIVNAVFACENGCOM, CA	Complete	None	None
	Southwest Museum, CA	Partial	None	NAGPRA compliance required
	UCSB, CA	Complete	Complete	NAGPRA inventory complete

Note: Artifact and record rehabilitation was based on the number of tasks remaining to be performed on each collection. Tasks are listed in the Recommendations section of each chapter. In cases where 1-2 tasks were recommended, a rating of **Partial** rehabilitation was issued; in cases where 3 or more tasks were recommended, a rating of **Complete** rehabilitation was issued. If a collection is listed as **Complies**, it indicates that the materials comply with federal guidelines and regulations, and if **None** is listed, the collection does not have that particular material type. Under Human Skeletal Remains the indication refers to whether or not a NAGPRA assessment has been completed. If no Human Skeletal Remains are located at the repository, the listing is recorded as **None**.

Archaeological Material Curation

As noted previously, 55 collections storage areas house CINCPACFLT collections; however, only 11 meet the minimum requirements of 36 CFR Part 79. None of these repositories has properly prepared all parts of their collections for long-term curation. Overall, primary containers (boxes that house a group of archaeological materials) consist mainly of acidic cardboard boxes of varying dimensions (most in the 1.0 ft^3 range). Acid-free cardboard boxes and corrugated plastic boxes are utilized, but not to the extent necessary for the proper curation of the collections. The remaining primary containers consist of other types of containers, such as drawers, plastic bags, Tyvek® bags, and paper bags. Similarly, boxes that use a telescoping lid for security and access are present in the collection, but not to the degree that would ensure longer life for the box and easier access to the collections. Most boxes contain some sort of label, if only rudimentary, and some containers were overpacked and/or coated with dust.

Most of the collections are stored in polyethylene zip-lock bag secondary containers (those included within the primary container). Many of these plastic bags need to be replaced because of tears or increasing brittleness caused by storage in environments lacking proper temperature controls. The remaining secondary containers consist of paper bags, small acidic or non-acidic cardboard boxes, plastic boxes, envelopes, plastic vials or film

canisters, loose in the primary container, or in a variety of other types of containers that are detailed in the chapters.

Human Skeletal Remains

Human skeletal remains comprise 4.78% (112.22 ft^3) of the total collection. In those cases where it has not already been done, all human skeletal remains should be examined by a qualified physical anthropologist. Additionally, complete rehabilitation (e.g., reboxing, rebagging, labeling) should be carried out in order to stabilize the remains, and a complete inventory should be generated, except for those collections from Guam and Tinian, in order to comply with NAGPRA.

Records Management

Records associated with archaeological work conducted on CINCPACFLT facilities encompass 307.41 linear feet and include paper, photographic, records, maps, reports, computer disks, and videotapes. In many cases, paper records are not housed in acid-free folders, photographs are not isolated and stored in chemically inert sleeves, and large-scale maps are not stored flat in map drawers. In most cases, documentation for the collections has either been misplaced over the years or simply was not curated with the archaeological materials after fieldwork was completed.

Additionally, most records housed in the repositories are subject to temperature and humidity fluctuations. Acidic materials readily absorb and release moisture, leading to expansion and contraction, dimensional changes that accelerate deterioration and promote major visible damage such as cockling paper, flaking ink, warped covers on books, and cracked emulsion on photographs.

Management Controls

The majority of repositories holding CINCPACFLT archaeological collections maintain some type of internal management policies. These policies range from comprehensive curation plans with accommodations made for every portion of the collection to more basic policies that are aimed at preparing collections for deposition in a dedicated long-term storage repository.

Prior to this collections assessment, CINCPACFLT was unfamiliar with the extent, location, or condition of all of its archaeological collections in the project area. CINCPACFLT personnel should be commended for recognizing this problem and addressing it, but now that specific deficiencies have been identified, action must be taken to protect these collections. At minimum, a plan of action for the long-term management of the collections should implement the following four terms.

1. Inventory all human skeletal remains to comply with NAGPRA.
2. Establish a priority for the collections and their rehabilitation.
3. Inventory and rehabilitate the collections.
4. Develop an Archives Management Plan.

Implementation of these minimal tasks will contribute greatly to our understanding of the culture history of the Pacific.

9

General Recommendations

Federally owned and administered archaeological collections subject to 36 CFR Part 79 within the scope of this project include collections from California, Hawaii, Washington, and the U.S. Territory of Guam. Collections within the scope of this project that do not apply to 36 CFR Part 79 are from CNMI, Japan, and Korea. These collections are the property of the host nation and are subject to the regulations set by the host country. NAGPRA only applies to the United States; it does not apply to any of its territories such as Guam or any foreign country such as CNMI, Japan, or Korea. The following is a summary of recommendations for achieving the standards set forth in 36 CFR Part 79 and NAGPRA. Any recommendations for collections that are not addressed in 36 CFR Part 79 or NAGPRA, such as those from CNMI, Japan, and Korea, or are only considered under 36 CFR Part 79 but not NAGPRA, such as the case for collections found in the U.S. Territory of Guam, are included within the chapters that address each of these places separately. Additional recommendations specific to a regional command are provided in each region's recommendation section.

Develop a Plan of Action

A comprehensive plan of action for compliance with 36 CFR Part 79 standards minimally must address five points—(1) inventory and rehabilitation of the artifact collections, (2) inventory and rehabilitation of the associated records, (3) proper long-term care of the collections and records, (4) proper management of collections and records, and (5) full compliance with NAGPRA.

Rehabilitation of Collections

Collections must be rehabilitated in a manner that is appropriate to the particular material; however, methods of rehabilitating a collection can be generalized in the following way. Replace primary containers with a standard size box made of stable, acid-free materials (cardboard or corrugated plastic). Label these containers either directly with indelible marker, with acid-free foil backed adhesive labels, laser printed or marked with indelible marker, or with clear polyethylene adhesive pockets with label inserts using acid-free paper.

Labels should contain adequate information for proper identification. Label information may include a combination of the following where applicable—name of the federal agency; the facility name detailing the particular parcel of land; project name; site name and number; accession or catalog numbers; additional provenience; donor name, if applicable; box number; contractor name; investigator name; a general description of the box contents such as material class; artifact type or other appropriate description; and any other unique collection information necessary to distinguish it from the rest of the collection. Labels should be clear and informative, and overloading label information should be avoided. A laser printed, acid-free interior inventory sheet will provide more detailed information about the contents. Copies of all the inventory sheets should be kept in the master file.

Except for special circumstances due to the type or nature of an object, collections should be removed from inappropriate secondary containers and placed in at least 2-mil, plastic, zip-lock bags, ensuring they are large enough for easy access and not overfilled causing damage to the objects or the bag. Old labels should be preserved by cutting the information from old bags, placing each in archival, zip-lock polyethylene bags, and inserting them inside the secondary container. New labels should be made by writing directly on the bags with indelible ink and/or writing or laser printing on acid-free adhesive labels, and/or by inserting acid-free paper labels in small archival, plastic, zip-lock bags and placing them inside the secondary container. These may be printed with indelible ink, or laser printed, using information from the old labels plus any additional information such as federal agency, facility, or other important or missing information.

Material remains should be cleaned, stabilized, or conserved as appropriate so as not to preclude any specialized analysis. Objects should be labeled directly with indelible ink, if appropriate for the material and size of the object. Labeling should include site number and catalog number or accession number if applicable. A more consistently legible method for labeling objects entails the use of tiny laser printing on acid free paper that is brushed onto the object with an archival adhesive.

Newly generated collections should be processed according to these guidelines with the supervision of the cultural resource manager and the collection manager at the designated curation facility. Contractors should be required to use the appropriate materials to package and process the collections according to the guidelines. Generally, each curation center will request specific stipulations that need to be met before contractors can submit collections. Regardless of who is responsible for the packaging and labeling of the collection, upon transfer to a curation center for long-term storage, collections must be completely inventoried. Collection managers will continue the process once the collections have entered the facility. Finally, curation costs should be budgeted into each new project.

Keeping the original organization of the collection is adequate if it is appropriate and does not put any portion of the collection in danger. Otherwise, collections should be housed by material class, artifact type, and provenience when possible. Portions of collections considered special—such as highly unique, valuable (scientific or monetary), extremely fragile, or made of a material requiring special storage conditions—may be isolated from the rest of the collections and placed in a suitable environment. Collections should be placed in appropriate storage units so they are easily accessible, not overpacked, too heavy, or stacked too high.

In order to have complete intellectual control over the collections, a database should be created and maintained to include all of the original collection information and any additional information once it has entered the center. Complete files must be maintained to include records of transfer, identification or accession records, physical storage location information, loans, exhibits, subsequent reports or other documents created by researchers, condition reports, damage or loss reports, additional analysis information, and any other appropriate information affecting the collection.

Rehabilitation of Records

All original documentation (field documentation and laboratory analysis) and at least two copies of the project report must be sent to the curation center. An inventory of all of the documentation should accompany the records. Duplicates of all originals should be made using archival materials. The originals should be kept in a separate location. Ideally, two archival duplicates should be made, one set for research use, and the other, along with the originals, set aside for safekeeping. Original documentation includes, but is not limited to, the following.

All pertinent maps both used and generated

Field notes

Photographs, negatives, slides, contact sheets

Drawings

Analysis documents

Artifact inventories

In light of future projects, contractors must be made to understand that every form of

documentation generated during the course of a project is the property of the Navy and that all original documentation must be submitted with the report, whether the report is final or not. Contractors must also be made responsible for filing complete records and submitting reports with the appropriate state agency holding archaeological site files, site location maps, and associated reports. A curation center should be chosen before the finalization of the project report so the location of the collections can be identified within the report for future researchers. Any original documentation, regardless of whether or not any material remains were collected for the project should be kept at the designated curation facility.

Curation Partners

The Navy must choose appropriate curation partners that meet the standards set for curation facilities in 36 CFR Part 79. These standards describe the policies and procedures that curation facilities must follow and the elements that will provide an ideal physical environment to best protect the collection. Appendix 1 contains 36 CFR Part 79.

Management of Collections

Choosing an appropriate curation center that satisfies the previously discussed standards is the first important step in properly managing collections. Entrusting a well-run curation facility with the care of the collections can make the management of collections much easier for Navy personnel; however, there are certain responsibilities that must be undertaken by the Navy to properly manage the collections.

An inventory of all collections and records should be kept and updated as new collections are generated. An organized file of reports, including letter reports and any negative finding reports, should be kept. Up-to-date records must be kept identifying all facilities curating collections and any portion of collections on loan, identifying the borrowing person and institution, terms of the loan, and an inventory of the loaned items. If a collection is determined to be missing, in whole or in part, with no account of its whereabouts, an assessment report should estimate what materials are missing.

The curation facility should provide an estimate of the cost and time necessary to attain collection standards. This report satisfies the initial identification of existing collections, their condition, degree of processing, and size. In selecting a curation facility or facilities for the long-term storage of collections, the cultural resource manager must not only ensure that the collections are well managed and maintained, but also that the repository holding the collections remains adequately managed and maintained according to 36 CFR Part 79. This can be accomplished in the following manner.

1. The cultural resource manager must have an adequate understanding of 36 CFR Part 79 and NAGPRA.

2. Persons responsible for cultural resources should be provided a written collection management manual outlining their responsibilities and the responsibilities of the curation facility.

   a. The cultural resource manager must ensure budgetary requirements for proper care and management of collections is met.

   b. The cultural resource manager must oversee the appropriate handling of any NAGPRA items (see NAGPRA discussion).

   c. The cultural resource manager must keep all documentation regarding the management of collections (i.e., curation agreements, initial and subsequent collections inventories, collection and repository inspection reports, annual collection update reports, and any other related documents).

   d. The cultural resource manager must ensure that the curation facility is following 36 CFR Part 79 by requiring an annual report and by ensuring periodic, professinoal inspections of the collections and the facility.

      (1) An annual report written by the curation facility should include the status of the collection (current condition, any conservation treatments, progress of any on-going processing or rehabilitating); any use of the collection, including names and purposes of individuals given access; citations from any documents resulting from use of collections; outgoing and returned loans; problems; any physical changes within the facility;

or any policy changes that may affect the collections.

(2) An on-site inspection of the collection by professional collections managers should be conducted annually to assure maintenance of management standards. Random collection location checks should be included as part of these annual inspections.

(3) A physical inspection of the curation facility by professional collections managers should be conducted annually to assure continued observance of standards (standards are addressed under long-term curation).

NAGPRA

Recommendations regarding the application of NAGPRA can be divided into two categories—the treatment of collections existing before NAGPRA was enacted in 1990 and the continued obligations the Navy has to negotiate potential NAGPRA-related activities or circumstances.

Collections that existed when NAGPRA was enacted in 1990 were subject to a Section 6 Summary by November 1993 and, where necessary, a Section 5 Inventory by November 1995. Research and identification of affected groups or tribes should have been completed, and consultation with those groups or tribes should have begun. Eventually, the Summaries and Inventories are posted in the Federal Register for those tribes or groups wishing to make a formal claim. CINCPACFLT should ensure that Section 5 nad 6 compliance is completed for those Navy facilities that require it.

Section 3 of NAGPRA provides the processes to take when Native American skeletal remains are inadvertently discovered or intentionally excavated.

The St. Louis District recommends that each relevant CINCPACFLT facility consult with its office of counsel to obtain guidance regarding Native American consultation and repatriation, particularly for those facilities where there are currently no federally-recognized Native American tribes. Finally, it is recommended that each CINCPACFLT facility establish relationships with Native American groups in the region. The creation of good working relationships between the Navy and Native groups will pave the way for beneficial discussions if NAGPRA or other issues arise in the future.

10

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Appendix 1

36 CFR Part 79, Curation of Federally-Owned and Administered Archeological Collections

Part 79—Curation of Federally-Owned and Administered Archaeological Collections

Sec. 79.1 Purpose.

(a) The regulations in this part establish definitions, standards, procedures and guidelines to be followed by Federal agencies to preserve collections of prehistoric and historic material remains, and associated records, recovered under the authority of the Antiquities Act (16 U.S.C. 431-433), the Reservoir Salvage Act (16 U.S.C. 469-469c), section 110 of the National Historic Preservation Act (16 U.S.C. 470h-2) or the Archaeological Resources Protection Act (16 U.S.C. 470aa-mm). They establish:

(1) Procedures and guidelines to manage and preserve collections;

(2) Terms and conditions for Federal agencies to include in contracts, memoranda, agreements or other written instruments with repositories for curatorial services;

(3) Standards to determine when a repository has the capability to provide long-term curatorial services; and

(4) Guidelines to provide access to, loan and otherwise use collections.

(b) The regulations in this part contain three appendices that provide additional guidance for use by the Federal Agency Official.

(1) Appendix A to these regulations contains an example of an agreement between a Federal agency and a non- Federal owner of material remains who is donating the remains to the Federal agency.

(2) Appendix B to these regulations contains an example of a memorandum of understanding between a Federal agency and a repository for long-term curatorial services for a federally-owned collection.

(3) Appendix C to these regulations contains an example of an agreement between a repository and a third party for a short-term loan of a federally-owned collection (or a part thereof).

(4) The three appendices are meant to illustrate how such agreements might appear. They should be revised according to the:

(i) Needs of the Federal agency and any non-Federal owner;

(ii) Nature and content of the collection; and

(iii) Type of contract, memorandum, agreement or other written instrument being used.

(5) When a repository has preexisting standard forms (e.g., a short-term loan form) that are consistent with the regulations in this part, those forms may be used in lieu of developing new ones.

Sec. 79.2 Authority.

(a) The regulations in this part are promulgated pursuant to section 101(a)(7)(A) of the National Historic Preservation Act (16 U.S.C. 470a) which requires that the Secretary of the Interior issue regulations ensuring that significant prehistoric and historic artifacts, and associated records, recovered under the authority of section 110 of that Act (16 U.S.C. 470h-2), the Reservoir Salvage Act (16 U.S.C. 469-469c) and the Archaeological Resources Protection Act (16 U.S.C. 470aa-mm) are deposited in an institution with adequate long-term curatorial capabilities.

(b) In addition, the regulations in this part are promulgated pursuant to section 5 of the Archaeological Resources Protection Act (16 U.S.C. 470dd) which gives the Secretary of the Interior discretionary authority to promulgate regulations for the:

(1) Exchange, where appropriate, between suitable universities, museums or other scientific or educational institutions, of archeological resources recovered from public and Indian lands under that Act; and

(2) Ultimate disposition of archeological resources recovered under that Act (16 U.S.C. 470aa-mm), the Antiquities Act (16 U.S.C. 431-433) or the Reservoir Salvage Act (16 U.S.C. 469-469c).

(3) It further states that any exchange or ultimate disposition of resources excavated or removed from Indian lands shall be subject to the consent of the Indian or Indian tribe that owns or has jurisdiction over such lands.

Sec. 79.3 Applicability.

(a) The regulations in this part apply to collections, as defined in Sec. 79.4 of this part, that are excavated or removed under the authority of the Antiquities Act (16 U.S.C. 431-433), the Reservoir Salvage Act (16 U.S.C. 469-469c), section 110 of the National Historic Preservation Act (16 U.S.C. 470h-2) or the Archaeological Resources Protection Act (16 U.S.C. 470aa-mm). Such collections generally include those that are the result of a prehistoric or historic resource survey, excavation or other study conducted in connection with a Federal action, assistance, license or permit.

(1) Material remains, as defined in Sec. 79.4 of this part, that are excavated or removed from a prehistoric or historic resource generally are the property of the landowner.

(2) Data that are generated as a result of a prehistoric or historic resource survey, excavation or other study are recorded in associated records, as defined in Sec. 79.4 of this part. Associated records that are prepared or assembled in connection with a Federal or federally authorized prehistoric or historic resource survey, excavation or other study are the property of the U.S. Government, regardless of the location of the resource.

(b) The regulations in this part apply to preexisting and new collections that meet the requirements of paragraph (a) of this section. However, the regulations shall not be applied in a manner that would supersede or breach material terms and conditions in any contract, grant, license, permit, memorandum, or agreement entered into by or on behalf of a Federal agency prior to the effective date of this regulation.

(c) Collections that are excavated or removed pursuant to the Antiquities Act (16 U.S.C. 431-433) remain subject to that Act, the Act's implementing rule (43 CFR part 3), and the terms and conditions of the pertinent Antiquities Act permit or other approval.

(d) Collections that are excavated or removed pursuant to the Archaeological Resources Protection Act (16 U.S.C. 470aa-mm) remain subject to that Act, the Act's implementing rules (43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229), and the terms and conditions of the pertinent Archaeological Resources Protection Act permit or other approval.

(e) Any repository that is providing curatorial services for a collection subject to the regulations in this part must possess the capability to provide adequate long-term curatorial services, as set forth in Sec. 79.9 of this part, to safeguard and preserve the associated records and any material remains that are deposited in the repository.

Sec. 79.4 Definitions.

As used for purposes of this part:

(a) Collection means material remains that are excavated or removed during a survey, excavation or other study of a prehistoric or historic resource, and associated records that are prepared or assembled in connection with the survey, excavation or other study.

(1) Material remains means artifacts, objects, specimens and other physical evidence that are excavated or removed in connection with efforts to locate, evaluate, document, study, preserve or recover a prehistoric or historic resource. Classes of material remains (and illustrative examples) that may be in a collection include, but are not limited to:

(i) Components of structures and features (such as houses, mills, piers, fortifications, raceways, earthworks and mounds);

(ii) Intact or fragmentary artifacts of human manufacture (such as tools, weapons, pottery, basketry and textiles);

(iii) Intact or fragmentary natural objects used by humans (such as rock crystals, feathers and pigments);

(iv) By-products, waste products or debris resulting from the manufacture or use of man-made or natural materials (such as slag, dumps, cores and debitage);

(v) Organic material (such as vegetable and animal remains, and coprolites);

(vi) Human remains (such as bone, teeth, mummified flesh, burials and cremations);

(vii) Components of petroglyphs, pictographs, intaglios or other works of artistic or symbolic representation;

(viii) Components of shipwrecks (such as pieces of the ship's hull, rigging, armaments, apparel, tackle, contents and cargo);

(ix) Environmental and chronometric specimens (such as pollen, seeds, wood, shell, bone, charcoal, tree core samples, soil, sediment cores, obsidian, volcanic ash, and baked clay); and

(x) Paleontological specimens that are found in direct physical relationship with a prehistoric or historic resource.

(2) Associated records means original records (or copies thereof) that are prepared, assembled and document efforts to locate, evaluate, record, study, preserve or recover a prehistoric or historic resource. Some records such as field notes, artifact inventories and oral histories may be originals that are prepared as a result of the field work, analysis and report preparation. Other records such as deeds, survey plats, historical maps and diaries may be copies of original public or archival documents that are assembled and studied as a result of historical research. Classes of associated records (and illustrative examples) that may be in a collection include, but are not limited to:

(i) Records relating to the identification, evaluation, documentation, study, preservation or recovery of a resource (such as site forms, field notes, drawings, maps, photographs, slides, negatives, films, video and audio cassette tapes, oral histories, artifact inventories, laboratory reports, computer cards and tapes, computer disks and diskettes, printouts of computerized data, manuscripts, reports, and accession, catalog and inventory records);

(ii) Records relating to the identification of a resource using remote sensing methods and equipment (such as satellite and aerial photography and imagery, side scan sonar, magnetometers, subbottom profilers, radar and fathometers);

(iii) Public records essential to understanding the resource (such as deeds, survey plats, military and census records, birth, marriage and death certificates, immigration and naturalization papers, tax forms and reports);

(iv) Archival records essential to understanding the resource (such as historical maps, drawings and photographs, manuscripts, architectural and landscape plans, correspondence, diaries, ledgers, catalogs and receipts); and

(v) Administrative records relating to the survey, excavation or other study of the resource (such as scopes of work, requests for proposals, research proposals, contracts, antiquities permits, reports, documents relating to compliance with section 106 of the National Historic Preservation Act (16 U.S.C. 470f), and National Register of Historic Places nomination and determination of eligibility forms).

(b) Curatorial services. Providing curatorial services means managing and preserving a collection according to professional museum and archival practices, including, but not limited to:

(1) Inventorying, accessioning, labeling and cataloging a collection;

(2) Identifying, evaluating and documenting a collection;

(3) Storing and maintaining a collection using appropriate methods and containers, and under appropriate environmental conditions and physically secure controls;

(4) Periodically inspecting a collection and taking such actions as may be necessary to preserve it;

(5) Providing access and facilities to study a collection; and

(6) Handling, cleaning, stabilizing and conserving a collection in such a manner to preserve it.

(c) Federal Agency Official means any officer, employee or agent officially representing the secretary of the department or the head of any other agency or instrumentality of the United States having primary management authority over a collection that is subject to this part.

(d) Indian lands has the same meaning as in Sec. -.3(e) of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229.

(e) Indian tribe has the same meaning as in Sec. -.3(f) of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229.

(f) Personal property has the same meaning as in 41 CFR 100-43.001-14. Collections, equipment (e.g., a specimen cabinet or exhibit case), materials and supplies are classes of personal property.

(g) Public lands has the same meaning as in Sec. -.3(d) of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229.

(h) Qualified museum professional means a person who possesses knowledge, experience and demonstrable competence in museum methods and techniques appropriate to the nature and content of the collection under the person's management and care, and commensurate with the person's duties and responsibilities. Standards that may be used, as appropriate, for classifying positions and for evaluating a person's qualifications include, but are not limited to, the following:

(1) The Office of Personnel Management's "Position Classification Standards for Positions under the General Schedule Classification System'' (U.S. Government Printing Office, stock No. 906—028-00000-0 (1981)) are used by Federal agencies to determine appropriate occupational series and grade levels for positions in the Federal service. Occupational series most commonly associated with museum work are the museum curator series (GS/GM-1015) and the museum technician and specialist series (GS/GM-1016). Other scientific and professional series that may have collateral museum duties include, but are not limited to, the archivist series (GS/GM-1420), the archeologist series (GS/GM-193), the anthropologist series (GS/GM-190), and the historian series (GS/GM-170). In general, grades GS-9 and below are assistants and trainees while grades GS-11 and above are professionals at the full performance level. Grades GS-11 and above are determined according to the level of independent professional responsibility, degree of specialization and scholarship, and the nature, variety, complexity, type and scope of the work.

(2) The Office of Personnel Management's "Qualification Standards for Positions under the General Schedule (Handbook X-118)'' (U.S. Government Printing Office, stock No. 906-030-00000-4 (1986)) establish educational, experience and training requirements for employment with the Federal Government under the various occupational series. A graduate degree in museum science or applicable subject matter, or equivalent training and experience, and three years of professional experience are required for museum positions at grades GS-11 and above.

(3) The "Secretary of the Interior's Standards and Guidelines for Archeology and Historic Preservation'' (48 FR 44716, Sept. 29, 1983) provide technical advice about archeological and historic preservation activities and methods for use by Federal, State and local Governments and others. One section presents qualification standards for a number of historic preservation professions. While no standards are presented for collections managers, museum curators or technicians, standards are presented for other professions (i.e., historians, archeologists, architectural historians, architects, and historic architects) that may have collateral museum duties.

(4) Copies of the Office of Personnel Management's standards, including subscriptions for subsequent updates, may be purchased from the Superintendent of Documents, U.S. Government Printing Office, Washington, DC 20402. Copies may be inspected at the Office of Personnel Management's Library, 1900 E Street NW., Washington, DC, at any regional or area office of the Office of Personnel Management, at any Federal Job Information Center, and at any personnel office of any Federal agency. Copies of the "Secretary of the Interior's Standards and Guidelines for Archeology and Historic Preservation'' are available at no charge from the Interagency Resources Division, National Park Service, P.O. Box 37127, Washington, DC 20013-7127.

(i) Religious remains means material remains that the Federal Agency Official has determined are of traditional religious or sacred importance to an Indian tribe or other group because of customary use in religious rituals or spiritual activities. The Federal Agency Official makes this determination in consultation with appropriate Indian tribes or other groups.
(j) Repository means a facility such as a museum, archeological center, laboratory or storage facility managed by a university, college, museum, other educational or scientific institution, a Federal, State or local Government agency or Indian tribe that can provide professional, systematic and accountable curatorial services on a long-term basis.
(k) Repository Official means any officer, employee or agent officially representing the repository that is providing curatorial services for a collection that is subject to this part.
(l) Tribal Official means the chief executive officer or any officer, employee or agent officially representing the Indian tribe.

Sec. 79.5 Management and preservation of collections.

The Federal Agency Official is responsible for the long-term management and preservation of preexisting and new collections subject to this part. Such collections shall be placed in a repository with adequate long-term curatorial capabilities, as set forth in Sec. 79.9 of this part, appropriate to the nature and content of the collections.
(a) Preexisting collections. The Federal Agency Official is responsible for ensuring that preexisting collections, meaning those collections that are placed in repositories prior to the effective date of this rule, are being properly managed and preserved. The Federal Agency Official shall identify such repositories, and review and evaluate the curatorial services that are being provided to preexisting collections. When the Federal Agency Official determines that such a repository does not have the capability to provide adequate long-term curatorial services, as set forth in Sec. 79.9 of this part, the Federal Agency Official may either:

(1) Enter into or amend an existing contract, memorandum, agreement or other appropriate written instrument for curatorial services for the purpose of:

(i) Identifying specific actions that shall be taken by the repository, the Federal agency or other appropriate party to eliminate the inadequacies;

(ii) Specifying a reasonable period of time and a schedule within which the actions shall be completed; and

(iii) Specifying any necessary funds or services that shall be provided by the repository, the Federal agency or other appropriate party to complete the actions; or

(2) Remove the collections from the repository and deposit them in another repository that can provide such services in accordance with the regulations in this part. Prior to moving any collection that is from Indian lands, the Federal Agency Official must obtain the written consent of the Indian landowner and the Indian tribe having jurisdiction over the lands.
(b) New collections. The Federal Agency Official shall deposit a collection in a repository upon determining that:

(1) The repository has the capability to provide adequate long-term curatorial services, as set forth in Sec. 79.9 of this part;

(2) The repository's facilities, written curatorial policies and operating procedures are consistent with the regulations in this part;

(3) The repository has certified, in writing, that the collection shall be cared for, maintained and made accessible in accordance with the regulations in this part and any terms and conditions that are specified by the Federal Agency Official;

(4) When the collection is from Indian lands, written consent to the disposition has been obtained from the Indian landowner and the Indian tribe having jurisdiction over the lands; and

(5) The initial processing of the material remains (including appropriate cleaning, sorting, labeling, cataloging, stabilizing and packaging) has been completed, and associated records have been prepared and organized in accordance with the repository's processing and documentation procedures.

(c) Retention of records by Federal agencies. The Federal Agency Official shall maintain administrative records on the disposition of each collection including, but not limited to:

(1) The name and location of the repository where the collection is deposited;

(2) A copy of the contract, memorandum, agreement or other appropriate written instrument, and any subsequent amendments, between the Federal agency, the repository and any other party for curatorial services;

(3) A catalog list of the contents of the collection that is deposited in the repository;

(4) A list of any other Federal personal property that is furnished to the repository as a part of the contract, memorandum, agreement or other appropriate written instrument for curatorial services;

(5) Copies of reports documenting inspections, inventories and investigations of loss, damage or destruction that are conducted pursuant to Sec. 79.11 of this part; and

(6) Any subsequent permanent transfer of the collection (or a part thereof) to another repository.

Sec. 79.6 Methods to secure curatorial services.

(a) Federal agencies may secure curatorial services using a variety of methods, subject to Federal procurement and property management statutes, regulations, and any agency-specific statutes and regulations on the management of museum collections. Methods that may be used by Federal agencies to secure curatorial services include, but are not limited to:

(1) Placing the collection in a repository that is owned, leased or otherwise operated by the Federal agency;

(2) Entering into a contract or purchase order with a repository for curatorial services;

(3) Entering into a cooperative agreement, a memorandum of understanding, a memorandum of agreement or other agreement, as appropriate, with a State, local or Indian tribal repository, a university, museum or other scientific or educational institution that operates or manages a repository, for curatorial services;

(4) Entering into an interagency agreement with another Federal agency for curatorial services;

(5) Transferring the collection to another Federal agency for preservation; and

(6) For archeological activities permitted on public or Indian lands under the Archaeological Resources Protection Act (16 U.S.C. 470 aa-mm), the Antiquities Act (16 U.S.C. 431-433) or other authority, requiring the archeological permittee to provide for curatorial services as a condition to the issuance of the archeological permit.

(b) Guidelines for selecting a repository.

(1) When possible, the collection should be deposited in a repository that:

(i) Is in the State of origin;

(ii) Stores and maintains other collections from the same site or project location; or

(iii) Houses collections from a similar geographic region or cultural area.

(2) The collection should not be subdivided and stored at more than a single repository unless such subdivision is necessary to meet special storage, conservation or research needs.

(3) Except when non-federally-owned material remains are retained and disposed of by the owner, material remains and associated records should be deposited in the same repository to maintain the integrity and research value of the collection.

(c) Sources for technical assistance. The Federal Agency Official should consult with persons having expertise in the management and preservation of collections prior to preparing a scope of work or a request for proposals for curatorial services. This will help ensure that the resulting contract, memorandum, agreement or other written instrument meets the needs of the collection, including any special needs in

regard to any religious remains. It also will aid the Federal Agency Official in evaluating the qualifications and appropriateness of a repository, and in determining whether the repository has the capability to provide adequate long-term curatorial services for a collection. Persons, agencies, institutions and organizations that may be able to provide technical assistance include, but are not limited to the:

(1) Federal agency's Historic Preservation Officer;

(2) State Historic Preservation Officer;

(3) Tribal Historic Preservation Officer;

(4) State Archeologist;

(5) Curators, collections managers, conservators, archivists, archeologists, historians and anthropologists in Federal and State Government agencies and Indian tribal museum;

(6) Indian tribal elders and religious leaders;

(7) Smithsonian Institution;

(8) American Association of Museums; and

(9) National Park Service.

Sec. 79.7 Methods to fund curatorial services.

A variety of methods are used by Federal agencies to ensure that sufficient funds are available for adequate, long-term care and maintenance of collections. Those methods include, but are not limited to, the following:

(a) Federal agencies may fund a variety of curatorial activities using monies appropriated annually by the U.S. Congress, subject to any specific statutory authorities or limitations applicable to a particular agency. As appropriate, curatorial activities that may be funded by Federal agencies include, but are not limited to:

(1) Purchasing, constructing, leasing, renovating, upgrading, expanding, operating, and maintaining a repository that has the capability to provide adequate long-term curatorial services as set forth in Sec. 79.9 of this part;

(2) Entering into and maintaining on a cost-reimbursable or cost-sharing basis a contract, memorandum, agreement, or other appropriate written instrument with a repository that has the capability to provide adequate long-term curatorial services as set forth in Sec. 79.9 of this part;

(3) As authorized under section 110(g) of the National Historic Preservation Act (16 U.S.C. 470h-2), reimbursing a grantee for curatorial costs paid by the grantee as a part of the grant project;

(4) As authorized under section 110(g) of the National Historic Preservation Act (16 U.S.C. 470h-2), reimbursing a State agency for curatorial costs paid by the State agency to carry out the historic preservation responsibilities of the Federal agency;

(5) Conducting inspections and inventories in accordance with Sec. 79.11 of this part; and

(6) When a repository that is housing and maintaining a collection can no longer provide adequate long-term curatorial services, as set forth in Sec. 79.9 of this part, either:

(i) Providing such funds or services as may be agreed upon pursuant to Sec. 79.5(a)(1) of this part to assist the repository in eliminating the deficiencies; or

(ii) Removing the collection from the repository and depositing it in another repository that can provide curatorial services in accordance with the regulations in this part.

(b) As authorized under section 110(g) of the National Historic Preservation Act (16 U.S.C. 470h-2) and section 208(2) of the National Historic Preservation Act Amendments (16 U.S.C. 469c-2), for federally licensed or permitted projects or programs, Federal agencies may charge licensees and permittees reasonable costs for curatorial activities associated with identification, surveys, evaluation and data recovery as a condition to the issuance of a Federal license or permit.

(c) Federal agencies may deposit collections in a repository that agrees to provide curatorial services at no cost to the U.S. Government. This generally occurs when a collection is excavated or removed from public or Indian lands under a research permit issued pursuant to the Antiquities Act (16 U.S.C. 431-433) or the Archaeological Resources Protection Act (16 U.S.C. 470aa-mm). A repository also may agree to provide

curatorial services as a public service or as a means of ensuring direct access to a collection for long-term study and use. Federal agencies should ensure that a repository that agrees to provide curatorial services at no cost to the U.S. Government has sufficient financial resources to support its operations and any needed improvements.

(d) Funds provided to a repository for curatorial services should include costs for initially processing, cataloging and accessioning the collection as well as costs for storing, inspecting, inventorying, maintaining, and conserving the collection on a long-term basis.

(1) Funds to initially process, catalog and accession a collection to be generated during identification and evaluation surveys should be included in project planning budgets.

(2) Funds to initially process, catalog and accession a collection to be generated during data recovery operations should be included in project mitigation budgets.

(3) Funds to store, inspect, inventory, maintain and conserve a collection on a long-term basis should be included in annual operating budgets.

(e) When the Federal Agency Official determines that data recovery costs may exceed the one percent limitation contained in the Archeological and Historic Preservation Act (16 U.S.C. 469c), as authorized under section 208(3) of the National Historic Preservation Act Amendments (16 U.S.C. 469c-2), the limitation may be waived, in appropriate cases, after the Federal Agency Official has:

(1) Obtained the concurrence of the Secretary of the U.S. Department of the Interior by sending a written request to the Departmental Consulting Archeologist, National Park Service, P.O. Box 37127, Washington, DC 20013-7127; and

(2) Notified the Committee on Energy and Natural Resources of the U.S. Senate and the Committee on Interior and Insular Affairs of the U.S. House of Representatives.

Sec. 79.8 Terms and conditions to include in contracts, memoranda and agreements for curatorial services.

The Federal Agency Official shall ensure that any contract, memorandum, agreement or other appropriate written instrument for curatorial services that is entered into by or on behalf of that Official, a Repository Official and any other appropriate party contains the following:

(a) A statement that identifies the collection or group of collections to be covered and any other U.S. Government-owned personal property to be furnished to the repository;

(b) A statement that identifies who owns and has jurisdiction over the collection;

(c) A statement of work to be performed by the repository;

(d) A statement of the responsibilities of the Federal agency and any other appropriate party;

(e) When the collection is from Indian lands:

(1) A statement that the Indian landowner and the Indian tribe having jurisdiction over the lands consent to the disposition; and

(2) Such terms and conditions as may be requested by the Indian landowner and the Indian tribe having jurisdiction over the lands;

(f) When the collection is from a site on public lands that the Federal Agency Official has determined is of religious or cultural importance to any Indian tribe having aboriginal or historic ties to such lands, such terms and conditions as may have been developed pursuant to Sec. -.7 of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229;

(g) The term of the contract, memorandum or agreement; and procedures for modification, suspension, extension, and termination;

(h) A statement of costs associated with the contract, memorandum or agreement; the funds or services to be provided by the repository, the Federal agency and any other appropriate party; and the schedule for any payments;

(i) Any special procedures and restrictions for handling, storing, inspecting, inventorying, cleaning, conserving, and exhibiting the collection;
(j) Instructions and any terms and conditions for making the collection available for scientific, educational and religious uses, including procedures and criteria to be used by the Repository Official to review, approve or deny, and document actions taken in response to requests for study, laboratory analysis, loan, exhibition, use in religious rituals or spiritual activities, and other uses. When the Repository Official to approve consumptive uses, this should be specified; otherwise, the Federal Agency Official should review and approve consumptive uses. When the repository's existing operating procedures and criteria for evaluating requests to use collections are consistent with the regulations in this part, they may be used, after making any necessary modifications, in lieu of developing new ones;
(k) Instructions for restricting access to information relating to the nature, location and character of the prehistoric or historic resource from which the material remains are excavated or removed;
(l) A statement that copies of any publications resulting from study of the collection are to be provided to the Federal Agency Official and, when the collection is from Indian lands, to the Tribal Official and the Tribal Historic Preservation Officer, if any, of the Indian tribe that owns or has jurisdiction over such lands;
(m) A statement that specifies the frequency and methods for conducting and documenting the inspections and inventories stipulated in Sec. 79.11 of this part;
(n) A statement that the Repository Official shall redirect any request for transfer or repatriation of a federally-owned collection (or any part thereof) to the Federal Agency Official, and redirect any request for transfer or repatriation of a federally administered collection (or any part thereof) to the Federal Agency Official and the owner;
(o) A statement that the Repository Official shall not transfer, repatriate or discard a federally-owned collection (or any part thereof) without the written permission of the Federal Agency Official, and not transfer, repatriate or discard a federally administered collection (or any part thereof) without the written permission of the Federal Agency Official and the owner;
(p) A statement that the Repository Official shall not sell the collection; and
(q) A statement that the repository shall provide curatorial services in accordance with the regulations in this part.

Sec. 79.9 Standards to determine when a repository possesses the capability to provide adequate long-term curatorial services.

The Federal Agency Official shall determine that a repository has the capability to provide adequate long-term curatorial services when the repository is able to:
(a) Accession, label, catalog, store, maintain, inventory and conserve the particular collection on a long-term basis using professional museum and archival practices; and
(b) Comply with the following, as appropriate to the nature and consent of the collection;
(1) Maintain complete and accurate records of the collection, including:
(i) Records on acquisitions;
(ii) Catalog and artifact inventory lists;
(iii) Descriptive information, including field notes, site forms and reports;
(iv) Photographs, negatives and slides;
(v) Locational information, including maps;
(vi) Information on the condition of the collection, including any completed conservation treatments;
(vii) Approved loans and other uses;
(viii) Inventory and inspection records, including any environmental monitoring records;
(ix) Records on lost, deteriorated, damaged or destroyed Government property; and
(x) Records on any deaccessions and subsequent transfers, repatriations or discards, as approved by the Federal Agency Official;

(2) Dedicate the requisite facilities, equipment and space in the physical plant to properly store, study and conserve the collection. Space used for storage, study, conservation and, if exhibited, any exhibition must not be used for non-curatorial purposes that would endanger or damage the collection;

(3) Keep the collection under physically secure conditions within storage, laboratory, study and any exhibition areas by:

(i) Having the physical plant meet local electrical, fire, building, health and safety codes;

(ii) Having an appropriate and operational fire detection and suppression system;

(iii) Having an appropriate and operational intrusion detection and deterrent system;

(iv) Having an adequate emergency management plan that establishes procedures for responding to fires, floods, natural disasters, civil unrest, acts of violence, structural failures and failures of mechanical systems within the physical plant;

(v) Providing fragile or valuable items in a collection with additional security such as locking the items in a safe, vault or museum specimen cabinet, as appropriate;

(vi) Limiting and controlling access to keys, the collection and the physical plant; and

(vii) Inspecting the physical plant in accordance with Sec. 79.11 of this part for possible security weaknesses and environmental control problems, and taking necessary actions to maintain the integrity of the collection;

(4) Require staff and any consultants who are responsible for managing and preserving the collection to be qualified museum professionals;

(5) Handle, store, clean, conserve and, if exhibited, exhibit the collection in a manner that:

(i) Is appropriate to the nature of the material remains and associated records;

(ii) Protects them from breakage and possible deterioration from adverse temperature and relative humidity, visible light, ultraviolet radiation, dust, soot, gases, mold, fungus, insects, rodents and general neglect; and

(iii) Preserves data that may be studied in future laboratory analyses. When material remains in a collection are to be treated with chemical solutions or preservatives that will permanently alter the remains, when possible, retain untreated representative samples of each affected artifact type, environmental specimen or other category of material remains to be treated. Untreated samples should not be stabilized or conserved beyond dry brushing;

(6) Store site forms, field notes, artifacts inventory lists, computer disks and tapes, catalog forms and a copy of the final report in a manner that will protect them from theft and fire such as:

(i) Storing the records in an appropriate insulated, fire resistant, locking cabinet, safe, vault or other container, or in a location with a fire suppression system;

(ii) Storing a duplicate set of records in a separate location; or

(iii) Ensuring that records are maintained and accessible through another party. For example, copies of final reports and site forms frequently are maintained by the State Historic Preservation Officer, the State Archeologist or the State museum or universtiy. The Tribal Historic Preservation Officer and Indian tribal museum ordinarily maintain records on collections recovered from sites located on Indian lands. The National Technical Information Service and the Defense Technical Information Service maintain copies of final reports that have been deposited by Federal agencies. The National Archeological Database maintains summary information on archeological reports and projects, including information on the location of those reports.

(7) Inspect the collection in accordance with Sec. 79.11 of this part for possible deterioration and damage, and perform only those actions as are absolutely necessary to stabilize the collection and rid it of any agents of deterioration;

(8) Conduct inventories in accordance with Sec. 79.11 of this part to verify the location of the material remains, associated records and any other Federal personal property that is furnished to the repository; and

(9) Provide access to the collection in accordance with Sec. 79.10 of this part.

Sec. 79.10 Use of collections.

(a) The Federal Agency Official shall ensure that the Repository Official makes the collection available for scientific, educational and
religious uses, subject to such terms and conditions as are necessary to protect and preserve the condition, research potential, religious or sacred importance, and uniqueness of the collection.
(b) Scientific and educational uses. A collection shall be made available to qualified professionals for study, loan and use for such purposes as in-house and traveling exhibits, teaching, public interpretation, scientific analysis and scholarly research. Qualified professionals would include, but not be limited to, curators, conservators, collection managers, exhibitors, researchers, scholars, archeological contractors and educators. Students may use a collection when under the direction of a qualified professional. Any resulting exhibits and publications shall acknowledge the repository as the curatorial facility and the Federal agency as the owner or administrator, as appropriate. When the collection is from Indian lands and the Indian landowner and the Indian tribe having jurisdiction over the lands wish to be identified, those individuals and the Indian tribe shall also be acknowledged. Copies of any resulting publications shall be provided to the Repository Official and the Federal Agency Official. When Indian lands are involved, copies of such publications shall also be provided to the Tribal Offical and the Tribal Historic Preservation Officer, if any, of the Indian tribe that owns or has jurisdiction over such lands.
(c) Religious uses. Religious remains in a collection shall be made available to persons for use in religious rituals or spiritual activities. Religious remains generally are of interest to medicine men and women, and other religious practitioners and persons from Indian tribes, Alaskan Native corporations, Native Hawaiians, and other indigenous and immigrant ethnic, social and religious groups that have aboriginal or historic ties to the lands from which the remains are recovered, and have traditionally used the remains or class of remains in religious rituals or spiritual activities.
(d) Terms and conditions.

(1) In accordance with section 9 of the Archaeological Resources Protection Act (16 U.S.C. 470hh) and section 304 of the National Historic Preservation Act (16 U.S.C. 470 w-3), the Federal Agency Official shall restrict access to associated records that contain information relating to the nature, location or character of a prehistoric or historic resource unless the Federal Agency Official determines that such disclosure would not create a risk of harm, theft or destruction to the resource or to the area or place where the resource is located.

(2) Section -.18(a)(2) of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229 sets forth procedures whereby information relating to the nature, location or character of a prehistoric or historic resource may be made available to the Governor of any State. The Federal Agency Official may make information available to other persons who, following the procedures in Sec. -.18(a)(2) of the referenced uniform regulations, demonstrate that the disclosure will not create a risk of harm, theft or destruction to the resource or to the area or place where the resource is located. Other persons generally would include, but not be limited to, archeological contractors, researchers, scholars, tribal representatives, Federal, State and local agency personnel, and other persons who are studying the resource or class or resources.

(3) When a collection is from Indian lands, the Federal Agency Official shall place such terms and conditions as may be requested by the Indian landowner and the Indian tribe having jurisdiction over the lands on:

(i) Scientific, educational or religious uses of material remains; and

(ii) Access to associated records that contain information relating to the nature, location or character of the resource.

(4) When a collection is from a site on public lands that the Federal Agency Official has determined is of religious or cultural importance to any Indian tribe having aboriginal or historic ties to such lands, the Federal Agency Official shall place such terms and conditions as may have been developed pursuant to Sec. -.7 of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229 on:

(i) Scientific, educational or religious uses of material remains; and

(ii) Access to associated records that contain information relating to the nature, location or character of the resource.

(5) The Federal Agency Official shall not allow uses that would alter, damage or destory an object in a collection unless the Federal Agency Official determines that such use is necessary for scientifc studies or public interpretation, and the potential gain in scientific or interpretive information outweighs the potential loss of the object. When possible, such use should be limited to unprovenienced, nonunique, nonfragile objects, or to a sample of objects drawn from a larger collection of similar objects.

(e) No collection (or a part thereof) shall be loaned to any person without a written agreement between the Repository Official and the borrower that specifies the terms and conditions of the loan. Appendix C to the regulations in this part contains an example of a short-term loan agreement for a federally-owned collection. At a minimum, a loan agreement shall specify:

(1) The collection or object being loaned;

(2) The purpose of the loan;

(3) The length of the loan;

(4) Any restrictions on scientific, educational or religious uses, including whether any object may be altered, damaged or destroyed;

(5) Except as provided in paragraph (e)(4) of this section, that the borrower shall handle the collection or object being borrowed during the term of the loan in accordance with this part so as not to damage or reduce its scentific, educational, religious or cultural value; and

(6) Any requirements for insuring the collection or object being borrowed for any loss, damage or destruction during transit and while in the borrower's possession.

(f) The Federal Agency Official shall ensure that the Repository Official maintains administrative records that document approved scentific, educational and religious uses of the collection.

(g) The Repository Official may charge persons who study, borrow or use a collection (or a part thereof) reasonable fees to cover costs for handling, packing, shipping and insuring material remains, for photocopying associated records, and for other related incidental costs.

Sec. 79.11 Conduct of inspections and inventories.

(a) The inspections and inventories specified in this section shall be conducted periodically in accordance with the Federal Property and Administrative Services Act (40 U.S.C. 484), its implementing regulation (41 CFR part 101), any agency-specific regulations on the management of Federal property, and any agency-specific statutes and regulations on the management of museum collections.

(b) Consistent with paragraph (a) of this section, the Federal Agency Official shall ensure that the Repository Official:

(1) Provides the Federal Agency Official and, when the collection is from Indian lands, the Indian landowner and the Tribal Offical of the Indian tribe that has jurisdiction over the lands with a copy of the catalog list of the contents of the collection received and accessioned by the repository;

(2) Provides the Federal Agency Official will a list of any other U.S. Government-owned personal property received by the repository;

(3) Periodically inspects the physical plant for the purpose of monitoring the physical security and environmental control measures;

(4) Periodically inspects the collection for the purposes of assessing the condition of the material remains and associated records, and of monitoring those remains and records for possible deterioration and damage;

(5) Periodically inventories the collection by accession, lot or catalog record for the purpose of verifying the location of the material remains and associated records;

(6) Periodically inventories any other U.S. Government-owned personal property in the possession of the repository;

(7) Has qualified museum professionals conduct the inspections and inventories;

(8) Following each inspection and inventory, prepares and provides the Federal Agency Official with a written report of the results of the inspection and inventory, including the status of the collection, treatments completed and recommendations for additional treatments. When the collection is from Indian lands, the Indian landowner and the Tribal Official of the Indian tribe that has jurisdiction over the lands shall also be provided with a copy of the report;

(9) Within five (5) days of the discovery of any loss or theft of, deterioriation and damage to, or destruction of the collection (or a part thereof) or any other U.S. Government-owned personal property, prepares and provides the Federal Agency Official with a written notification of the circumstances surrounding the loss, theft, deterioration, damage or destruction. When the collection is from Indian lands, the Indian landowner and the Tribal Official of the Indian tribe that has jurisdiction over the lands shall also be provided with a copy of the notification; and

(10) Makes the repository, the collection and any other U.S. Government-owned personal property available for periodic inspection by the:

(i) Federal Agency Official;

(ii) When the collection is from Indian lands, the Indian landowner and the Tribal Official of the Indian tribe that has jurisdiction over the lands; and

(iii) When the collection contains religious remains, the Indian tribal elders, religious leaders, and other officials representing the Indian tribe or other group for which the remains have religious or sacred importance.

(c) Consistent with paragraph (a) of this section, the Federal Agency Official shall have qualified Federal agency professionals:

(1) Investigate reports of a lost, stolen, deteriorated, damaged or destroyed collection (or a part thereof) or any other U.S. Government-owned personal property; and

(2) Periodically inspect the repository, the collection and any other U.S. Government-owned personal property for the purposes of:

(i) Determining whether the repository is in compliance with the minimum standards set forth in Sec. 79.9 of this part; and

(ii) Evaluating the performance of the repository in providing curatorial services under any contract, memorandum, agreement or other appropriate written instrument.

(d) The frequency and methods for conducting and documenting inspections and inventories stipulated in this section shall be mutually agreed upon, in writing, by the Federal Agency Official and the Repository Official, and be appropriate to the nature and content of the collection:

(1) Collections from Indian lands shall be inspected and inventoried in accordance with such terms and conditions as may be requested by the Indian landowner and the Indian tribe having jurisdiction over the lands.

(2) Religious remains in collections from public lands shall be inspected and inventoried in accordance with such terms and conditions as may have been developed pursuant to Sec. -.7 of uniform regulations 43 CFR part 7, 36 CFR part 296, 18 CFR part 1312, and 32 CFR part 229.

(3) Material remains and records of a fragile or perishable nature should be inspected for deterioration and damage on a more frequent basis than lithic or more stable remains or records.

(4) Because frequent handling will accelerate the breakdown of fragile materials, material remains and records should be viewed but handled as little as possible during inspections and inventories.

(5) Material remains and records of a valuable nature should be inventoried on a more frequent basis than other less valuable remains or records.

(6) Persons such as those listed in Sec. 79.6(c) of this part who have expertise in the management and preservation of similar collections should be able to provide advice to the Federal Agency Official concerning the appropriate frequency and methods for conducting inspections and inventories of a particular collection.

(e) Consistent with the Single Audit Act (31 U.S.C. 75), when two or more Federal agencies deposit collections in the same repository, the Federal Agency Officials should enter into an interagency agreement for the purposes of:

(1) Requesting the Repository Official to coordinate the inspections and inventories, stipulated in paragraph (b) of this section, for each of the collections;

(2) Designating one or more qualified Federal agency professionals to:

(i) Conduct inspections, stipulated in paragraph (c)(2) of this section, on behalf of the other agencies; and

(ii) Following each inspection, prepare and distribute to each Federal Agency Official a written report of findings, including an evaluation of performance and recommendations to correct any deficiencies and resolve any problems that were identified. When the collection is from Indian lands, the Indian landowner and the Tribal Official of the Indian tribe that has jurisdiction over the lands shall also be provided with a copy of the report; and

(3) Ensuring consistency in the conduct of inspections and inventories conducted pursuant to this section.

Appendix A to Part 79—Example of a Deed of Gift

DEED OF GIFT TO THE
(Name of the Federal agency)

Whereas, the (name of the Federal agency), hereinafter called the Recipient, is dedicated to the preservation and protection of artifacts, specimens and associated records that are generated in connection with its projects and programs;Whereas, certain artifacts and specimens, listed in Attachment A to this Deed of Gift, were recoverd from the (name of the prehistoric or historic resource) site in connection with the Recipient's (name of the Recipient's project) project;Whereas, the (name of the prehistoric or historic resource) site is located on lands to which title is held by (name of the donor), hereinafter called the Donor, and that the Donor holds free and clear title to the artifacts and specimens; andWhereas, the Donor is desirous of donating the artifacts and specimens to the Recipient to ensure their continued preservation and protection;Now therefore, the Donor does hereby unconditionally donate to the Recipient, for unrestricted use, the artifacts and specimens listed in Attachment A to this Deed of Gift; and
The Recipient hereby gratefully acknowleges the receipt of the artifacts and specimens.

Signed: (signature of the Donor)

Date: (date)

Signed: (signature of the Federal Agency Official)

Date: (date)

Attachment A: Inventory of Artifacts and Specimens.

Appendix B to Part 79—Example of a Memorandum of Understanding for Curatorial Services for a Federally-Owned Collection

MEMORANDUM OF UNDERSTANDING FOR CURATORIAL SERVICES BETWEEN THE

(Name of the Federal agency)
AND THE
(Name of the Repository)

This Memorandum of Understanding is entered into this (day) day of (month and year), between the United States of America, acting by and through the (name of the Federal agency), hereinafter called the Depositor, and the (name of the Repository), hereinafter called the Repository, in the State of (name of the State).
The Parties do witnesseth that,
Whereas, the Depositor has the responsibility under Federal law to preserve for future use certain collections of archeological artifacts, specimens and associated records, herein called the Collection, listed in Attachment A which is attached hereto and made a part hereof, and is desirous of obtaining curatorial services; and
Whereas, the Repository is desirous of obtaining, housing and maintaining the Collection, and recognizes the benefits which will accrue to it, the public and scientific interests by housing and maintaining the Collection for study and other educational purposes; and
Whereas, the Parties hereto recognize the Federal Government's continued ownership and control over the Collection and any other U.S. Government-owned personal property, listed in Attachment B which is attached hereto and made a part hereof, provided to the Repository, and the Federal Government's responsibility to ensure that the Collection is suitably managed and preserved for the public good; and
Whereas, the Parties hereto recognize the mutual benefits to be derived by having the Collection suitably housed and maintained by the Repository;
Now therefore, the Parties do mutually agree as follows:
1. The Repository shall:

a. Provide for the professional care and management of the Collection from the (names of the prehistoric and historic resources) sites, assigned (list site numbers) site numbers. The collections were recovered in connection with the (name of the Federal or federally-authorized project) project, located in (name of the nearest city or town), (name of the county) county, in the State of (name of the State).

b. Perform all work necessary to protect the Collection in accordance with the regulation 36 CFR part 79 for the curation of federally-owned and administered archeological collections and the terms and conditions stipulated in Attachment C to this Memorandum.

c. Assign as the Curator, the Collections Manager and the Conservator having responsibility for the work under this Memorandum, persons who are qualified museum professionals and whose expertise is appropriate to the nature and content of the Collection.

d. Begin all work on or about (month, date and year) and continue for a period of (number of years) years or until sooner terminated or revoked in accordance with the terms set forth herein.

e. Provide and maintain a repository facility having requisite equipment, space and adequate safeguards for the physical security and controlled environment for the Collection and any other U.S. Government-owned personal property in the possession of the Repository.

f. Not in any way adversely alter or deface any of the Collection except as may be absolutely necessary in the course of stabilization, conservation, scientific study, analysis and research. Any activity that will involve the intentional destruction of any of the Collection must be approved in advance and in writing by the Depositor.

g. Annually inspect the facilities, the Collection and any other U.S. Government-owned personal property. Every (number of years) years inventory the Collection and any other U.S. Government-owned personal property. Perform only those conservation treatments as are absolutely necessary to ensure the physical stability and integrity of the Collection, and report the results of inventories, inspections and treatments to the Depositor.

h. Within five (5) days of discovery, report all instances of and circumstances surrounding loss of, deterioration and damage to, or destruction of the Collection and any other U.S. Government-owned personal property to the Depositor, and those actions taken to stabilize the Collection and to correct any deficiencies

in the physical plant or operating procedures that may have contributed to the loss, deterioration, damage or destruction. Any actions that will involve the repair and restoration of any of the Collection and any other U.S. Government-owned personal property must be approved in advance and in writing by the Depositor.

i. Review and approve or deny requests for access to or short-term loan of the Collection (or a part thereof) for scientific, educational or religious uses in accordance with the regulation 36 CFR part 79 for the curation of federally-owned and administered archeological collections and the terms and conditions stipulated in Attachment C of this Memorandum. In addition, refer requests for consumptive uses of the Collection (or a part thereof) to the Depositor for approval or denial.

j. Not mortgage, pledge, assign, repatriate, transfer, exchange, give, sublet, discard or part with possession of any of the Collection or any other U.S. Government-owned personal property in any manner to any third party either directly or in-directly without the prior written permission of the Depositor, and redirect any such request to the Depositor for response. In addition, not take any action whereby any of the Collection or any other U.S. Government-owned personal property shall or may be encumbered, seized, taken in execution, sold, attached, lost, stolen, destroyed or damaged.

2. The Depositor shall:

a. On or about (month, date and year), deliver or cause to be delivered to the Repository the Collection, as described in Attachment A, and any other U.S. Government-owned personal property, as described in Attachment B.

b. Assign as the Depositor's Representative having full authority with regard to this Memorandum, a person who meets pertinent professional qualifications.

c. Every (number of years) years, jointly with the Repository's designated representative, have the Depositor's Representative inspect and inventory the Collection and any other U.S. Government-owned personal property, and inspect the repository facility.

d. Review and approve or deny requests for consumptively using the Collection (or a part thereof).

3. Removal of all or any portion of the Collection from the premises of the Repository for scientific, educational or religious purposes may be allowed only in accordance with the regulation 36 CFR part 79 for the curation of federally-owned and administered archeological collections; the terms and conditions stipulated in Attachment C to this Memorandum; any conditions for handling, packaging and transporting the Collection; and other conditions that may be specified by the Repository to prevent breakage, deterioration and contamination.

4. The Collection or portions thereof may be exhibited, photographed or otherwise reproduced and studied in accordance with the terms and conditions stipulated in Attachment C to this Memorandum. All exhibits, reproductions and studies shall credit the Depositor, and read as follows: "Courtesy of the (name of the Federal agency)." The Repository agrees to provide the Depositor with copies of any resulting publications.

5. The Repository shall maintain complete and accurate records of the Collection and any other U.S. Government-owned personal property, including information on the study, use, loan and location of said Collection which has been removed from the premises of the Repository.

6. Upon execution by both parties, this Memorandum of Understanding shall be effective on this (day) day of (month and year), and shall remain in effect for (number of years) years, at which time it will be reviewed, revised, as necessary, and reaffirmed or terminated. This Memorandum may be revised or extended by mutual consent of both parties, or by issuance of a written amendment signed and dated by both parties. Either party may terminate this Memorandum by providing 90 days written notice. Upon termination, the Repository shall return such Collection and any other U.S. Government-owned personal property to the destination directed by the Depositor and in such manner to preclude breakage, loss, deterioration and contamination during handling, packaging and shipping, and in accordance with other conditions specified in writing by the Depositor. If the Repository terminates, or is in default of, this Memorandum, the Repository shall fund the packaging and transportation costs. If the Depositor terminates this Memorandum, the Depositor shall fund the packaging and transportation costs.

7. Title to the Collection being cared for and maintained under this Memorandum lies with the Federal Government.

In witness whereof, the Parties hereto have executed this Memorandum.

Signed: (signature of the Federal Agency Official)

Date: (date)

Signed: (signature of the Repository Official)

Date: (date)

Attachment A: Inventory of the Collection

Attachment B: Inventory of any other U.S. Government-owned Personal Property

Attachment C: Terms and Conditions Required by the Depositor

Appendix C to Part 79—Example of a Short-Term Loan Agreement for a Federally-Owned Collection

SHORT-TERM LOAN AGREEMENT
BETWEEN THE
(Name of the Repository)
AND THE
(Name of the Borrower)

The (name of the Repository), hereinafter called the Repository, agrees to loan to (name of the Borrower), hereinafter called the Borrower, certain artifacts, specimens and associated records, listed in Attachment A, which were collected from the (name of the prehistoric or historic resource) site which is assigned (list site number) site number. The collection was recovered in connection with the (name of the Federal or federally authorized project) project, located in (name of the nearest city or town), (name of the county) county in the State of (name of the State). The Collection is the property of the U.S. Government.

The artifacts, specimens and associated records are being loaned for the purpose of (cite the purpose of the loan), beginning on (month, day and year) and ending on (month, day and year).

During the term of the loan, the Borrower agrees to handle, package and ship or transport the Collection in a manner that protects it from breakage, loss, deterioration and contamination, in conformance with the regulation 36 CFR part 79 for the curation of federally-owned and administered archeological collections and the terms and conditions stipulated in Attachment B to this loan agreement.

The Borrower agrees to assume full responsibility for insuring the Collection or for providing funds for the repair or replacement of objects that are damaged or lost during transit and while in the Borrower's possession. Within five (5) days of discovery, the Borrower will notify the Repository of instances and circumstances surrounding any loss of, deterioration and damage to, or destruction of the Collection and will, at the direction of the Repository, take steps to conserve damaged materials.

The Borrower agrees to acknowledge and credit the U.S. Government and the Repository in any exhibits or publications resulting from the loan. The credit line shall read as follows: "Courtesy of the (names of the Federal agency and the Repository).'' The Borrower agrees to provide the Repository and the (name of the Federal agency) with copies of any resulting publications.

Upon termination of this agreement, the Borrower agrees to properly package and ship or transport the Collection to the Repository.

Either party may terminate this agreement, effective not less than (number of days) days after receipt by the other party of written notice, without further liability to either party.

Signed: (signature of the Repository Official)

Date: (date)

Signed: (signature of the Borrower)

Date: (date)

Attachment A: Inventory of the Objects being Loaned.

Attachment B: Terms and Conditions of the Loan.

Appendix 2

P.L. 101-601, Native American Graves Protection and Repatriation Act

NAGPRA Legislation and Regulations

Public Law 101-601

101st Congress

An Act

To provide for the protection of Native American graves, and for other purposes.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled,

SECTION 1. SHORT TITLE.

This Act may be cited as the "Native American Graves Graves Protection and Repatriation Act".

SEC. 2. DEFINITIONS.

For purposes of this Act, the term-

(1)"burial site" means any natural or prepared Hawaiian physical location, whether originally below, on, or above Natives. the surface of the earth, into which as a part of the Historic death rite or ceremony of a culture, individual human preservation. remains are deposited.

(2) "cultural affiliation" means that there is a note. relationship of shared group identity which can be 25 USC 3001. reasonably traced historically or prehistorically between a present day Indian tribe or Native Hawaiian organization and an identifiable earlier group.

(3) "cultural items" means human remains and- (A) "associated funerary objects" which shall mean objects that, as a part of the death rite or ceremony of a culture, are reasonably believed to have been placed with individual human remains either at the time of death or later, and both the human remains and associated funerary objects are presently in the possession or control of a Federal agency or museum, except that other items exclusively made for burial purposes or to contain human remains shall be considered as associated funerary objects.

(B) "unassociated funerary objects" which shall mean objects that, as a part of the death rite or ceremony of a culture, are reasonably believed to have been placed with individual human remains either at the time of death or later, where the remains are not in the possession or control of the Federal agency or museum and the objects can be identified by a preponderance of the evidence as related to specific individuals or families or to known human remains or, by a preponderance of the evidence, as having been removed from a specific burial site of an individual culturally affiliated with a particular Indian tribe,

(C) "sacred objects" which shall mean specific ceremonial objects which are needed by traditional Native American religious leaders for the practice of traditional Native American religions by their present day adherents, and

(D) "cultural patrimony" which shall mean an object having ongoing historical, traditional, or cultural importance central to the Native American group or culture itself, rather than property owned by an individual Native American, and which, therefore, cannot be alienated, appropriated, or conveyed by any individual regardless of whether or not the individual is a member of the Indian tribe or Native Hawaiian organization and such object shall have been considered inalienable by such Native American group at the time the object was separated from such group.

(4) "Federal agency" means any department, agency, or instrumentality of the United States. Such term does not include the Smithsonian Institution.

(5) "Federal lands" means any land other than tribal lands which are controlled or owned by the United States, including lands selected by but not yet conveyed to Alaska Native Corporations and groups organized pursuant to the Alaska Native Claims Settlement Act of 1971.

(6) "Hui Malama I Na Kupuna O Hawai'i Nei" means the nonprofit, Native Hawaiian organization incorporated under the laws of the State of Hawaii by that name on April 17, 1989, for the purpose of providing guidance and expertise in decisions dealing with Native Hawaiian cultural issues, particularly burial issues.

(7) "Indian tribe" means any tribe, band, nation, or other organized group or community of Indians, including any Alaska Native village (as defined in, or established pursuant to, the Alaska Native Claims Settlement Act), which is recognized as eligible for the special programs and services provided by the United States to Indians because of their status as Indians.

(8) "museum" means any institution or State or local government agency (including any institution of higher learning) that receives Federal funds and has possession of, or control over, Native American cultural items. Such term does not include the Smithsonian Institution or any other Federal agency.

(9) "Native American" means of, or relating to, a tribe, people, or culture that is indigenous to the United States.

(10) "Native Hawaiian" means any individual who is a descendant of the aboriginal people who, prior to 1778, occupied and exercised sovereignty in the area that now constitutes the State of Hawaii.

(11) "Native Hawaiian organization" means any organization which—

(A) serves and represents the interests of Native Hawaiians,

(B) has as a primary and stated purpose the provision of services to Native Hawaiians, and

(C) has expertise in Native Hawaiian Affairs, and shall include the Office of Hawaiian Affairs and Hui Malama I Na Kupuna O Hawai'i Nei.

(12) "Office of Hawaiian Affairs" means the Office of Hawaiian Affairs established by the constitution of the State of Hawaii.

(13) "right of possession" means possession obtained with the voluntary consent of an individual or group that had authority of alienation. The original acquisition of a Native American unassociated funerary object, sacred object or object of cultural patrimony from an Indian tribe or Native Hawaiian organization with the voluntary consent of an individual or group with authority to alienate such object is deemed to give right of possession of that object, unless the phrase so defined would, as applied in section 7(c), result in a Fifth Amendment taking by the United States as determined by the United States Claims Court pursuant to 28 U.S.C. 1491 in which event the "right of possession" shall be as provided under otherwise applicable property law. The original acquisition of Native American human remains and associated funerary objects which were excavated, exhumed, or otherwise obtained with full knowledge and consent of the next of kin or the official governing body of the appropriate culturally affiliated Indian tribe or Native Hawaiian organization is deemed to give

right of possession to those remains.

(14) "Secretary" means the Secretary of the Interior.

(15) "tribal land" means-

(A) all lands within the exterior boundaries of any Indian reservation;

(B) all dependent Indian communities;

(C) any lands administered for the benefit of Native Hawaiians pursuant to the Hawaiian Homes Commission Act, 1920, and section 4 of Public Law 86-3.

SEC 3. OWNERSHIP.

(a) NATIVE AMERICAN HUMAN REMAINS AND OBJECTS.—The ownership or control of Native American cultural items which are excavated or discovered on Federal or tribal lands after the date of enactment of this Act shall be (with priority given in the order listed)—

(1) in the case of Native American human remains and associated funerary objects, in the lineal descendants of the Native American; or

(2) in any case in which such lineal descendants cannot be ascertained, and in the case of unassociated funerary objects, sacred objects, and objects of cultural patrimony—

(A) in the Indian tribe or Native Hawaiian organization on whose tribal land such objects or remains were discovered; Claims.

(B) in the Indian tribe or Native Hawaiian organization which has the closest cultural affiliation with such remains or objects and which, upon notice, states a claim for such remains or objects; or

(C) if the cultural affiliation of the objects cannot be reasonably ascertained and if the objects were discovered on Federal land that is recognized by a final judgment of the Indian Claims Commission or the United States Court of Claims as the aboriginal land of some Indian tribe—

(1) in the Indian tribe that is recognized as aboriginally occupying the area in which the objects were discovered, if upon notice, such tribe states a claim for such remains or objects, or

(2) if it can be shown by a preponderance of the evidence that a different tribe has a stronger cultural relationship with the remains or objects than the tribe or organization specified in paragraph (1), in the Indian tribe that has the strongest demonstrated relationship, if upon notice, such tribe states a claim for such remains or objects. Regulations.

(b) UNCLAIMED NATIVE AMERICAN HUMAN REMAINS AND OBJECTS.—Native American cultural items not claimed under subsection (a) shall be disposed of in accordance., with regulations promulgated by the Secretary- in consultation with the review committee established under section 8,-Native American groups, representatives of museums and the scientific community.

(c) INTENTIONAL EXCAVATION AND REMOVAL OF NATIVE AMERICAN HUMAN REMAINS AND OBJECTS.—The intentional removal from or excavation of Native American cultural items from Federal or tribal lands for purposes of discovery, study, or removal of such items is permitted only if—

(1) such items are excavated or removed pursuant to a permit issued under section 4 of the Archaeological Resources Protection Act of 1979 (93 Stat. 721; 16 U.S.C. 470aa et seq.) which shall be consistent with this Act;

(2) such items are excavated or removed after consultation with or, in the case of tribal lands, consent of the appropriate (if any) Indian tribe or Native Hawaiian organization;

(3) the ownership and right of control of the disposition of such items shall be as provided in subsections (a) and (b); and

(4) proof of consultation or consent under paragraph (2) is shown.

(d) INADVERTENT DISCOVERY OF NATIVE AMERICAN REMAINS AND OBJECTS.—(1) Any person who knows, or has reason to know, that such person has discovered Native American cultural items on Federal or tribal lands-after the date of enactment of this Act shall notify, in writing, the Secretary of the Department, or head of any other agency or instrumentality of the United States, having primary management authority with respect to Federal lands and the appropriate Indian tribe or Native Hawaiian organization with respect to tribal lands, if known or readily ascertainable, and, in the case of lands that have been selected by an Alaska Native Corporation or group organized pursuant to the Alaska Native Claims Settlement Act of 1971, the appropriate corporation or group. If the discovery occurred in connection with an activity, including (but not limited to) construction, mining, logging, and agriculture, the person shall cease the activity in the area of the discovery, make a reasonable effort to protect the items discovered before resuming such activity, and provide notice under this subsection. Following the notification under this subsection, and upon certification by the Secretary of the department or the head of any agency or instrumentality of the United States or the appropriate Indian tribe or Native Hawaiian organization that notification has been received, the activity may resume after 30 days of such certification.

(2) The disposition of and control over any cultural items excavated or removed under this subsection shall be determined as provided for in this section.

(3) If the Secretary of the Interior consents, the responsibilities (in whole or in part) under paragraphs (1) and (2) of the Secretary of any department (other than the Department of the Interior) or the head of any other agency or instrumentality may be delegated to the Secretary with respect to any land managed by such other Secretary or agency head.

(e) RELINQUISHMENT.—Nothing in this section shall prevent the governing body of an Indian tribe or Native Hawaiian organization from expressly relinquishing control over any Native American human remains, or title to or control over any funerary object, or sacred object.

SEC. 4. ILLEGAL TRAFFICKING.

(a) ILLEGAL TRAFFICKING.—Chapter 53 of title 18, United States Code, is amended by adding at the end thereof the following new section:

“ 1170. Illegal Trafficking in Native American Human Remains and Cultural Items “

(a) Whoever knowingly sells, purchases, uses for profit, or transports for sale or profit, the human remains of a Native American without the right of possession to those remains as provided in the Native American Graves Protection and Repatriation Act shall be fined in accordance with this title, or imprisoned not more than 12 months, or both, and in the case of a second or subsequent violation, be fined in accordance with this title, or imprisoned not more than 5 years, or both. “

(b) Whoever knowingly sells, purchases, uses for profit, or transports for sale or profit any Native American cultural items obtained in violation of the Native American Grave Protection and Repatriation Act shall be fined in accordance with this title, imprisoned not more than one year, or both, and in the case of a second or subsequent violation, be fined in accordance with this title, imprisoned not more than 5 years, or both.”.

(b) TABLE OF CONTENTS.—The table of contents for chapter 53 of title 18, United States

Code, is amended by adding at the end thereof the following new item: "1170. Illegal Trafficking in Native American Human Remains and Cultural Items.".

SEC. 5. INVENTORY FOR HUMAN REMAINS AND ASSOCIATED FUNERARY OBJECTS.

(a) IN GENERAL.—Each Federal agency and each museum which has possession or control over holdings or collections of Native American human remains and associated funerary objects shall compile an inventory of such items and, to the extent possible based on information possessed by such museum or Federal agency, identify the geographical and cultural affiliation of such item.

(b) REQUIREMENTS.—(1) The inventories and identifications required under subsection (a) shall be—

(A) completed in consultation with tribal government and Native Hawaiian organization officials and traditional religious leaders;

(B) completed by not later than the date that is 5 years after the date of enactment of this Act, and

(C) made available both during the time they are being conducted and afterward to a review committee established under section 8.

(2) Upon request by an Indian tribe or Native Hawaiian organization which receives or should have received notice, a museum or Federal agency shall supply additional available documentation to supplement the information required by subsection (a) of this section. The term "documentation" means a summary of existing museum or Federal agency records, including inventories or catalogues, relevant studies, or other pertinent data for the limited purpose of determining the geographical origin, cultural affiliation, and basic facts surrounding acquisition and accession of Native American human remains and associated funerary objects subject to this section. Such term does not mean, and this Act shall not be construed to be an authorization for, the initiation of new scientific studies of such remains and associated funerary objects or other means of acquiring or preserving additional scientific information from such remains and objects.

(c) EXTENSION OF TIME FOR INVENTORY.—Any museum which has made a good faith effort to carry out an inventory and identification under this section, but which has been unable to complete the process, may appeal to the Secretary for an extension of the time requirements set forth in subsection (b)(1)(B). The Secretary may extend such time requirements for any such museum upon a finding of good faith effort. An indication of good faith shall include the development of a plan to carry out the inventory and identification process.

(d) NOTIFICATION—(1) If the cultural affiliation of any particular Native American human remains or associated funerary objects is determined pursuant to this section, the Federal agency or museum concerned shall, not later than 6 months after the completion of the inventory, notify the affected Indian tribes or Native Hawaiian organizations.

(2) The notice required by paragraph (1) shall include information—

(A) which identifies each Native American human remains or associated funerary objects and the circumstances surrounding its acquisition;

(B) which lists the human remains or associated funerary objects that are clearly identifiable as to tribal origin; and

(C) which lists the Native American human remains and associated funerary objects that are not clearly identifiable as being culturally affiliated with that Indian tribe or Native Hawaiian organization, but which, given the totality of circumstances surrounding acquisition of the

remains or objects, are determined by a reasonable belief to be remains or objects culturally affiliated with the Indian tribe or Native Hawaiian organization.

(3) A copy of each notice provided under paragraph (1) Federal shall be sent to the Secretary who shall publish each Register, notice in the Federal Register.

(e) INVENTORY.—For the purposes of this section, the term "inventory" means a simple itemized list that summarizes the information called for by this section.

SEC. 6. SUMMARY FOR UNASSOCIATED FUNERARY OBJECTS, SACRED OBJECTS, AND CULTURAL PATRIMONY.

(a) IN GENERAL.—Each Federal agency or museum which has Museums. possession or control over holdings or collections of Native American unassociated funerary objects, sacred objects, or objects of cultural patrimony shall provide a written summary of such objects based upon available information held by such agency or museum. The summary shall describe the scope of the collection, kinds of objects included, reference to geographical location, means and period of acquisition and cultural affiliation, where readily ascertainable.

(b) REQUIREMENTS.— (1) The summary required under subsection (a) shall be—

(A) in lieu of an object-by-object inventory;

(B) followed by consultation with tribal government and Native Hawaiian organization officials and traditional religious leaders; and

(C) completed by not later than the date that is 3 years after the date of enactment of this Act.

(2) Upon request, Indian Tribes and Native Hawaiian organizations shall have access to records, catalogues, relevant studies or other pertinent data for the limited purposes of determining the geographic origin, cultural affiliation, and basic facts surrounding acquisition and accession of Native American objects subject to this section. Such information shall be provided in a reasonable manner to be agreed upon by all parties.

SEC. 7. REPATRIATION.

(a) REPATRIATION OF NATIVE AMERICAN HUMAN REMAINS AND OBJECTS POSSESSED OR CONTROLLED BY FEDERAL AGENCIES AND MUSEUMS.—(1) If, pursuant to section 5, the cultural affiliation of Native American human remains and associated funerary objects with a particular Indian tribe or Native Hawaiian organization is established, then the Federal agency or museum, upon the request of a known lineal descendant of the Native American or of the tribe or organization and pursuant to subsections (b) and (e) of this section, shall expeditiously return such remains and associated funerary objects.

(2) If, pursuant to section 6, the cultural affiliation with a particular Indian tribe or Native Hawaiian organization is shown with respect to unassociated funerary objects, sacred objects or objects of cultural patrimony, then the Federal agency or museum, upon the request of the Indian tribe or Native Hawaiian organization and pursuant to subsections (b), (c) and (e) of this section, shall expeditiously return such objects.

(3) The return of cultural items covered by this Act shall be in consultation with the requesting lineal descendant or tribe or organization to determine the place and manner of delivery of such items.

(4) Where cultural affiliation of Native American human remains and funerary objects has not

been established in an inventory prepared pursuant to section 5, or the summary pursuant to section 6, or where Native American human remains and funerary objects are not included upon any such inventory, then, upon request and pursuant to subsections (b) and (e) and, in the case of unassociated funerary objects, subsection (c), such Native American human remains and funerary objects shall be expeditiously returned where the requesting Indian tribe or Native Hawaiian organization can show cultural affiliation by a preponderance of the evidence based upon geographical, kinship, biological, archaeological, anthropological, linguistic, folkloric, oral traditional, historical, or other relevant information or expert opinion.

(5) Upon request and pursuant to subsections (b), (c) and (e), sacred objects and objects of cultural patrimony shall be expeditiously returned where—

(A) the requesting party is the direct lineal descendant of an individual who owned the sacred object;

(B) the requesting Indian tribe or Native Hawaiian organization can show that the object was owned or controlled by the tribe or organization; or

(C) the requesting Indian tribe or Native Hawaiian organization can show that the sacred object was owned or controlled by a member thereof, provided that in the case where a sacred object was owned by a member thereof, there are no identifiable [PUBLIC LAW 101-601—NOV. 16, 1990 104 STAT. 3055] lineal descendants of said member or the lineal descendent, upon notice, have failed to make a claim for the object under this Act.

(b) SCIENTIFIC STUDY.—If the lineal descendant, Indian tribe, or Native Hawaiian organization requests the return of culturally affiliated Native American cultural items, the Federal agency or museum shall expeditiously return such items unless such items are indispensable for completion of a specific scientific study, the outcome of which would be of major benefit to the United States. Such items shall be returned by no later than 90 days after the date on which the scientific study is completed.

(c) STANDARD OF REPATRIATION.—If a known lineal descendant or an Indian tribe or Native Hawaiian organization requests the return of Native American unassociated funerary objects, sacred objects or objects of cultural patrimony pursuant to this Act and presents evidence which, if standing alone before the introduction of evidence to the contrary, would support a finding that the Federal agency or museum did not have the right of possession, then such agency or museum shall return such objects unless it can overcome such inference and prove that it has a right of possession to the objects.

(d) SHARING OF INFORMATION BY FEDERAL AGENCIES AND MUSEUMS.—Any Federal agency or museum shall share what information it does possess regarding the object in question with the known lineal descendant, Indian tribe, or Native Hawaiian organization to assist in making a claim under this section.

(e) COMPETING CLAIMS.—Where there are multiple requests for repatriation of any cultural item and, after complying with the requirements of this Act, the Federal agency or museum cannot clearly determine which requesting party is the most appropriate claimant, the agency or museum may retain such item until the requesting parties agree upon its disposition or the dispute is otherwise resolved pursuant to the provisions of this Act or by a court of competent jurisdiction.

(f) MUSEUM OBLIGATION.—Any museum which repatriates any item in good faith pursuant to this Act shall not be liable for claims by an aggrieved party or for claims of breach of fiduciary duty, public trust, or violations of state law that are inconsistent with the provisions of this Act.

SEC. 8. REVIEW COMMITTEE.

(a) ESTABLISHMENT.—Within 120 days after the date of enactment of this Act, the Secretary shall establish a committee to monitor and review the implementation of the inventory and identification process and repatriation activities required under sections 5, 6 and 7.

(b) MEMBERSHIP—(1) The Committee established under subsection (a) shall be composed of 7 members,

(A) 3 of whom shall be appointed by the Secretary from nominations submitted by Indian tribes, Native Hawaiian organizations, and traditional Native American religious leaders with at least 2 of such persons being traditional Indian religious leaders;

(B) 3 of whom shall be appointed by the Secretary from nominations submitted by national museum organizations and scientific organizations; and

(C) 1 who shall be appointed by the Secretary from a list of persons developed and consented to by all of the members appointed pursuant to subparagraphs (A) and (B).

(2) The Secretary may not appoint Federal officers or employees to the committee.

(3) In the event vacancies shall occur, such vacancies shall be filled by the Secretary in the same manner as the original appointment within 90 days of the occurrence of such vacancy.

(4) Members of the committee established under subsection (a) shall serve without pay, but shall be reimbursed at a rate equal to the daily rate for GS-18 of the General Schedule for each day (including travel time) for which the member is actually engaged in committee business. Each member shall receive travel expenses, including per diem in lieu of subsistence, in accordance with sections 5702 and 5703 of title 5, United States Code.

(c) RESPONSIBILITIES.—The committee established under subsection a) shall be responsible for-

(1) designating one of the members of the committee as chairman;

(2) monitoring the inventory and identification process conducted under sections 5 and 6 to ensure a fair, objective consideration and assessment of all available relevant information and evidence;

(3) upon the request of any affected party, reviewing and making findings related to-

(A) the identity or cultural affiliation of cultural items, or

(B) the return of such items;

(4) facilitating the resolution of any disputes among Indian tribes, Native Hawaiian organizations, or lineal descendants and Federal agencies or museums relating to the return of such items including convening the parties to the dispute if deemed desirable;

(5) compiling an inventory of culturally unidentifiable human remains that are in the possession or control of each Federal agency and museum and recommending specific actions for developing a process for disposition of such remains;

(6) consulting with Indian tribes and Native Hawaiian organizations and museums on matters within the scope of the work of the committee affecting such tribes or organizations;

(7) consulting with the Secretary in the development of regulations to carry out this Act;

(8) performing such other related functions as the Secretary -may assign to the committee; and

(9) making recommendations, if appropriate, regarding future care of cultural items which are to be repatriated.

(d) Any records and findings made by the review committee pursuant to this Act relating to the identity or cultural affiliation of any cultural items and the return of such items may be admissible in any action brought under section 15 of this Act.

(e) RECOMMENDATIONS AND REPORT.—The committee shall make the recommendations under paragraph (c)(5) in consultation with Indian tribes and Native Hawaiian organizations and appropriate scientific and museum groups.

(f) ACCESS.—The Secretary shall ensure that the committee established under subsection (a) and the members of the committee have reasonable access to Native American cultural items under review and to associated scientific and historical documents. Regulations.

(g) DUTIES OF SECRETARY.—The Secretary shall—

(1) establish such rules and regulations for the committee as may be necessary, and [PUBLIC LAW 101-601—NOV 16, 1990 104 STAT. 3057]

(2) provide reasonable administrative and staff support necessary for the deliberations of the committee.

(h) ANNUAL REPORT.—The committee established under subsection (a) shall submit an annual report to the Congress on the progress made, and any barriers encountered, in implementing this section during the previous year.

(i) TERMINATION.—The committee established under subsection (a) shall terminate at the end of the 120-day period beginning on the day the Secretary certifies, in a report submitted to Congress, that the work of the committee has been completed.

SEC. 9. PENALTY.

(a) PENALTY.—Any museum that fails to comply with the 25 USC 3007. requirements of this Act may be assessed a civil penalty by the Secretary of the Interior pursuant to procedures established by the Secretary through regulation. A penalty assessed under this subsection shall be determined on the record after opportunity for an agency hearing. Each violation under this subsection shall be a separate offense.

(b) AMOUNT OF PENALTY.—The amount of a penalty assessed under subsection (a) shall be determined under regulations promulgated pursuant to this Act, taking into account, in addition to other factors—

(1) the archaeological, historical, or commercial value of the item involved;

(2) the damages suffered, both economic and noneconomic, by an aggrieved party, and

(3) the number of violations that have occurred.

(c) ACTIONS TO RECOVER PENALTIES.-If any museum fails to pay courts. an assessment of a civil penalty pursuant Courts. to a final order of the Secretary that has been issued under subsection (a) and not appealed or after a final judgment has been rendered on appeal of such order, the Attorney General may institute a civil action in an appropriate district court of the United States to collect the penalty. In such action, the validity and amount of such penalty shall not be subject to review.

(d) SUBPOENAS.—In hearings held pursuant to subsection (a), subpoenas may be issued for the attendance and testimony of witnesses and the production of relevant papers, books, and documents. Witnesses so summoned shall be paid the same fees and mileage that are paid to witnesses in the courts of the United States.

SEC. 10. GRANTS.

(a) INDIAN TRIBES AND NATIVE HAWAIIAN 3008. ORGANIZATIONS.—The Secretary is authorized to make grants to Indian tribes and Native Hawaiian organizations for the purpose of assisting such tribes and organizations in the repatriation of Native American cultural items.

(b) MUSEUMS.—The Secretary is authorized to make grants to museums for the purpose of assisting the museums in conducting the inventories and identification required under sections 5 and 6.

SEC. 11. SAVINGS PROVISIONS.

Nothing in this Act shall be construed to—

(1) limit the authority of any Federal agency or museum to—

(A) return or repatriate Native American cultural items to Indian tribes, Native Hawaiian organizations, or individuals, and

(B) enter into any other agreement with the consent of the culturally affiliated tribe or organization as to the disposition of, or control over, items covered by this Act;

(2) delay actions on repatriation requests that are pending on the date of enactment of this Act;

(3) deny or otherwise affect access to any court;

(4) limit any procedural or substantive right which may otherwise be secured to individuals or Indian tribes or Native Hawaiian organizations; or

(5) limit the application of any State or Federal law pertaining to theft or stolen property.

SEC. 12. SPECIAL RELATIONSHIP BETWEEN FEDERAL GOVERNMENT AND INDIAN TRIBES.

This Act reflects the unique relationship between the Federal Government and Indian tribes and Native Hawaiian organizations and should not be construed to establish a precedent with respect to any other individual, organization or foreign government.

SEC. 13. REGULATIONS.

The Secretary shall promulgate regulations to carry out this Act within 12 months of enactment. 25 USC 3012.

SEC. 14. AUTHORIZATION OF APPROPRIATIONS.

There is authorized to be appropriated such sums as may be necessary to carry out this Act. 25 USC 3013.

SEC. 15. ENFORCEMENT.

The United States district courts shall have jurisdiction over any action brought by any person alleging a violation Courts. of this Act and shall have the authority to issue such orders as may be

necessary to enforce the provisions of this Act.

Approved November 16, 1990.

Part II

Department of the Interior

Office of the Secretary

43 CFR Part 10

Native American Graves Protection and Repatriation Act Regulations; Final Rule

RIN 1024-AC07

AGENCY: Department of the Interior.

ACTION: Final rule.

SUMMARY: This final rule establishes definitions and procedures for lineal descendants, Indian tribes, Native Hawaiian organizations, museums, and Federal agencies to carry out the Native American Graves Protection and Repatriation Act of 1990. These regulations develop a systematic process for determining the rights of lineal descendants, Indian tribes, and Native Hawaiian organizations to certain Native American human remains, funerary objects, sacred objects, or objects of cultural patrimony with which they are affiliated.

EFFECTIVE DATE: This final rule will take effect on January 3, 1996.

FOR FURTHER INFORMATION CONTACT: Dr. Francis P. McManamon, Departmental Consulting Archeologist, Archeological Assistance Division, National Park Service, Box 37127, Washington DC 20013-7127. Telephone: (202) 343-4101. Fax: (202) 523-1547.

SUPPLEMENTARY INFORMATION:
Background

On November 16, 1990, President George Bush signed into law the Native American Graves Protection and Repatriation Act, hereafter referred to as the Act. The Act addresses the rights of lineal descendants, Indian tribes, and Native Hawaiian organizations to certain Native American human remains, funerary objects, sacred objects, or objects of cultural patrimony with which they are affiliated. Section 13 of the Act requires the Secretary of the Interior to publish regulations to carry out provisions of the Act.

Preparation of the Rulemaking

The proposed rule (43 CFR Part 10) for carrying out the Act was published in the Federal Register on May 28, 1993 (58 FR 31122). Public comment was invited for a 60-day period, ending on July 27, 1993. Copies of the proposed rule were sent to the chairs or chief executive officers of all Indian tribes, Alaska Native villages and corporations, Native Hawaiian organizations, national Indian organizations and advocacy groups, national scientific and museum organizations, and State and Federal agency Historic Preservation Officers and chief archeologists.

Eighty-two written comments were received representing 89 specific organizations and individuals. These included thirteen Indian tribes, ten Native American organizations, nine museums, seven universities, three national scientific and museum organizations, eleven state agencies, nineteen Federal agencies, nine other organizations, and eight individuals. Several letters represent more than one organization. Comments addressed nearly all sections and appendices of the proposed rule. All comments were fully considered when revising the proposed rule for publication as a final rulemaking.

Given the volume of comments, it is impractical to respond in detail in the preamble to every question raised or suggestion offered. Some commenters pointed out errors in spelling, syntax, and minor technical matters. Those errors were corrected and are not mentioned further in the preamble. In addition, many commenters made similar suggestions or criticisms, or repeated the same suggestion for different sections of the proposed rule. In the interest of reducing the length of the text, comments that are similar in nature are grouped and discussed in the most relevant section in the preamble. Some comments pointed out vague and unclear language. Clarifying and explanatory language was added to the rule and preamble.

List of Subjects in 43 CFR Part 10

Administrative practice and procedure, Graves, Hawaiian Natives, Historic Preservation, Indians — Claims, Indians —lands, Museums, Public lands, Reporting and record keeping requirements.

For the reasons set out in the preamble, 43 CFR Subtitle A is amended by adding Part 10 to read as follows:

PART 10—NATIVE AMERICAN GRAVES PROTECTION AND REPATRIATION REGULATIONS

Subpart A—Introduction

Sec.
10.1 Purpose and applicability.
10.2 Definitions

Subpart B—Human Remains, Funerary Objects, Sacred Objects, or Objects of Cultural Patrimony From Federal or Tribal Lands

10.3 Intentional archaeological excavations.
10.4 Inadvertent discoveries.
10.5 Consultation.
10.6 Custody.

10.7 Disposition of unclaimed human remains, funerary objects, sacred objects, or objects of cultural patrimony. [Reserved]

Subpart C—Human Remains, Funerary Objects, Sacred Objects, or Objects of Cultural Patrimony in Museums and Federal Collections
10.8 Summaries.
10.9 Inventories.
10.10 Repatriation.
10.11 Disposition of culturally unidentifiable human remains. [Reserved]
10.12 Civil penalties.
10.13 Future applicability. [Reserved]

Subpart D—General
10.14 Lineal descent and cultural affiliation.
10.15 Limitations and remedies.
10.16 Review committee.
10.17 Dispute resolution.

Appendix A to Part 10—Sample Summary.

Appendix B to Part 10—Sample Notice of Inventory Completion.

Authority: 25 U.S.C. 3001 *et seq*.

Subpart A—Introduction

Sec. 10.1 Purpose and applicability.

(a) *Purpose*. These regulations carry out provisions of the Native American Graves Protection and Repatriation Act of 1990 (Pub.L. 101-601; 25 U.S.C. 3001-3013;104 Stat. 3048-3058). These regulations develop a systematic process for determining the rights of lineal descendants and Indian tribes and Native Hawaiian organizations to certain Native American human remains, funerary objects, sacred objects, or objects of cultural patrimony with which they are affiliated.

(b) *Applicability*. (1) These regulations pertain to the identification and appropriate disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony that are:

(i) In Federal possession or control; or

(ii) In the possession or control of any institution or State or local government receiving Federal funds; or

(iii) Excavated intentionally or discovered inadvertently on Federal or tribal lands.

(2) These regulations apply to human remains, funerary objects, sacred objects, or objects of cultural patrimony which are indigenous to Alaska, Hawaii, and the continental United States, but not to territories of the United States.

(3) Throughout these regulations are decision points which determine their applicability in particular circumstances, e.g., a decision as to whether a museum "controls" human remains and cultural objects within the meaning of the regulations, or, a decision as to whether an object is a "human remain," "funerary object," "sacred object," or "object of cultural patrimony" within the meaning of the regulations. Any final determination making the Act or these regulations inapplicable

is subject to review pursuant to section 15 of the Act.

Sec. 10.2 Definitions.

In addition to the term Act, which means the Native American Graves Protection and Repatriation Act as described above, definitions used in these regulations are grouped in seven classes: Parties required to comply with these regulations; Parties with standing to make claims under these regulations; Parties responsible for implementing these regulations; Objects covered by these regulations; Cultural affiliation; Types of land covered by these regulations; and Procedures required by these regulations.

(a) *Who must comply with these regulations?* (1) *Federal agency* means any department, agency, or instrumentality of the United States. Such term does not include the Smithsonian Institution as specified in section 2 (4) of the Act.

(2) *Federal agency official* means any individual authorized by delegation of authority within a Federal agency to perform the duties relating to these regulations.

(3) *Museum* means any institution or State or local government agency (including any institution of higher learning) that has possession of, or control over, human remains, funerary objects, sacred objects, or objects of cultural patrimony and receives Federal funds.

(i) The term "*possession"* means having physical custody of human remains, funerary objects, sacred objects, or objects of cultural patrimony with a sufficient legal interest to lawfully treat the objects as part of its collection for purposes of these regulations. Generally, a museum or Federal agency would not be considered to have possession of human remains, funerary objects, sacred objects, or objects of cultural patrimony on loan from another individual, museum, or Federal agency.

(ii) The term "*control"* means having a legal interest in human remains, funerary objects, sacred objects, or objects of cultural patrimony sufficient to lawfully permit the museum or Federal agency to treat the objects as part of its collection for purposes of these regulations whether or not the human remains, funerary objects, sacred objects or objects of cultural patrimony are in the physical custody of the museum or Federal agency. Generally, a museum or Federal agency that has loaned human remains, funerary objects, sacred objects, or objects of cultural patrimony to another individual, museum, or Federal agency is considered to retain control of those human remains, funerary objects, sacred objects, or objects of cultural patrimony for purposes of these regulations.

(iii) The phrase "*receives Federal funds*" means the receipt of funds by a museum after November 16, 1990, from a Federal agency through any grant, loan, contract (other than a procurement contract), or other arrangement by which a Federal agency makes or made available to a museum aid in the form of funds. Federal funds provided for any purpose that are received by a larger entity of which the museum is a part are considered Federal funds for the purposes of these regulations. For example, if a museum is a part of a State or local government or a private university and the State or local government or private university receives Federal funds for any purpose, the museum is considered to receive Federal funds for the purpose of these regulations.

(4) *Museum official* means the individual within a museum designated as being responsible for matters relating to these regulations.

(5) *Person* means an individual, partnership, corporation, trust, institution, association, or any other private entity, or, any official, employee, agent, department, or instrumentality of the United States, or of any Indian tribe or Native Hawaiian organization, or of any State or political subdivision thereof that discovers or discovered human remains, funerary objects, sacred objects or objects of cultural patrimony on Federal or tribal lands after November 16, 1990.

(b) *Who has standing to make a claim under these regulations?*

(1) *Lineal descendant* means an individual tracing his or her ancestry directly and without interruption by means of the traditional kinship system of the appropriate Indian tribe or Native Hawaiian organization or by the common law system of descendance to a known Native American individual whose remains, funerary objects, or sacred objects are being claimed under these regulations.

(2) *Indian tribe* means any tribe, band, nation, or other organized Indian group or community of Indians, including any Alaska Native village or corporation as defined in or established by the Alaska Native Claims Settlement Act (43 U.S.C. 1601 et seq.), which is recognized as eligible for the special programs and services provided by the United States to Indians because of their status as Indians. The Secretary will distribute a list of Indian tribes for the purposes of carrying out this statute through the Departmental Consulting Archeologist.

(3)(i) *Native Hawaiian organization* means any organization that:

(A) Serves and represents the interests of Native Hawaiians;

(B) Has as a primary and stated purpose the provision of services to Native Hawaiians; and

(C) Has expertise in Native Hawaiian affairs.

(ii) The term *Native Hawaiian* means any individual who is a descendant of the aboriginal people who, prior to 1778, occupied and exercised sovereignty in the area that now constitutes the State of Hawaii. Such organizations must include the Office of Hawaiian Affairs and *Hui Malama I Na Kupuna 'O Hawai'i Nei*.

(4) *Indian tribe official* means the principal leader of an Indian tribe or Native Hawaiian organization or the individual officially designated by the governing body of an Indian tribe or Native Hawaiian organization or as otherwise provided by tribal code, policy, or established procedure as responsible for matters relating to these regulations.

(c) *Who is responsible for carrying out these regulations?*

(1) *Secretary* means the Secretary of the Interior.

(2) *Review Committee* means the advisory committee established pursuant to section 8 of the Act.

(3) *Departmental Consulting Archeologist* means the official of the Department of the Interior designated by the Secretary as responsible for the administration of matters relating to these regulations. Communications to the Departmental Consulting Archeologist should be addressed to:

Departmental Consulting Archeologist National Park Service, PO Box 37127 Washington, DC 20013-7127.

(d) *What objects are covered by these regulations?* The Act covers four types of Native American objects. The term *Native American* means of, or relating to, a tribe, people, or culture indigenous to the United States, including Alaska and Hawaii.

(1) *Human remains* means the physical remains of the body of a person of Native American ancestry. The term does not include remains or portions of remains that may reasonably be determined to have been freely given or naturally shed by the individual from whose body they were obtained, such as hair made into ropes or nets. For the purposes of determining cultural affiliation, human remains incorporated into a funerary object, sacred object, or object of cultural patrimony, as defined below, must be considered as part of that item.

(2) *Funerary objects* means items that, as part of the death rite or ceremony of a culture, are reasonably believed to have been placed intentionally at the time of death or later with or near individual human remains. Funerary objects must be identified by a preponderance of the evidence as having been removed from a specific burial site of an individual affiliated with a particular Indian tribe or Native Hawaiian organization or as being related to specific individuals or families or to

known human remains. The term burial site means any natural or prepared physical location, whether originally below, on, or above the surface of the earth, into which, as part of the death rite or ceremony of a culture, individual human remains were deposited, and includes rock cairns or pyres which do not fall within the ordinary definition of gravesite. For purposes of completing the summary requirements in Sec. 10.8 and the inventory requirements of Sec. 10.9:

(i) *Associated funerary objects* means those funerary objects for which the human remains with which they were placed intentionally are also in the possession or control of a museum or Federal agency. Associated funerary objects also means those funerary objects that were made exclusively for burial purposes or to contain human remains.

(ii) *Unassociated funerary objects* means those funerary objects for which the human remains with which they were placed intentionally are not in the possession or control of a museum or Federal agency. Objects that were displayed with individual human remains as part of a death rite or ceremony of a culture and subsequently returned or distributed according to traditional custom to living descendants or other individuals are not considered unassociated funerary objects.

(3) *Sacred objects* means items that are specific ceremonial objects needed by traditional Native American religious leaders for the practice of traditional Native American religions by their present-day adherents. While many items, from ancient pottery sherds to arrowheads, might be imbued [[Page 193]] with sacredness in the eyes of an individual, these regulations are specifically limited to objects that were devoted to a traditional Native American religious ceremony or ritual and which have religious significance or function in the continued observance or renewal of such ceremony. The term *traditional religious leader* means a person who is recognized by members of an Indian tribe or Native Hawaiian organization as:

(i) Being responsible for performing cultural duties relating to the ceremonial or religious traditions of that Indian tribe or Native Hawaiian organization, or

(ii) Exercising a leadership role in an Indian tribe or Native Hawaiian organization based on the tribe or organization's cultural, ceremonial, or religious practices.

(4) *Objects of cultural patrimony* means items having ongoing historical, traditional, or cultural importance central to the Indian tribe or Native Hawaiian organization itself, rather than property owned by an individual tribal or organization member. These objects are of such central importance that they may not be alienated, appropriated, or conveyed by any individual tribal or organization member. Such objects must have been considered inalienable by the culturally affiliated Indian tribe or Native Hawaiian organization at the time the object was separated from the group. Objects of cultural patrimony include items such as Zuni War Gods, the Confederacy Wampum Belts of the Iroquois, and other objects of similar character and significance to the Indian tribe or Native Hawaiian organization as a whole.

(e) *What is cultural affiliation?* Cultural affiliation means that there is a relationship of shared group identity which can reasonably be traced historically or prehistorically between members of a present-day Indian tribe or Native Hawaiian organization and an identifiable earlier group. Cultural affiliation is established when the preponderance of the evidence — based on geographical, kinship, biological, archeological, linguistic, folklore, oral tradition, historical evidence, or other information or expert opinion — reasonably leads to such a conclusion.

(f) *What types of lands do the excavation and discovery provisions of these regulations apply to?*

(1) *Federal lands* means any land other than tribal lands that are controlled or owned by the United States Government, including lands selected by but not yet conveyed to Alaska Native Corporations and groups organized pursuant to the Alaska Native Claims Settlement Act (43 U.S.C. 1601 et seq.). United States "control," as used in this definition, refers to those lands not owned by

the United States but in which the United States has a legal interest sufficient to permit it to apply these regulations without abrogating the otherwise existing legal rights of a person.

(2) *Tribal lands* means all lands which:

(i) Are within the exterior boundaries of any Indian reservation including, but not limited to, allotments held in trust or subject to a restriction on alienation by the United States; or

(ii) Comprise dependent Indian communities as recognized pursuant to 18 U.S.C. 1151; or

(iii) Are administered for the benefit of Native Hawaiians pursuant to the Hawaiian Homes Commission Act of 1920 and section 4 of the Hawaiian Statehood Admission Act (Pub.L. 86-3; 73 Stat. 6).

(iv) Actions authorized or required under these regulations will not apply to tribal lands to the extent that any action would result in a taking of property without compensation within the meaning of the Fifth Amendment of the United States Constitution.

(g) *What procedures are required by these regulations?*

(1) *Summary* means the written description of collections that may contain unassociated funerary objects, sacred objects, and objects of cultural patrimony required by Sec. 10.8 of these regulations.

(2) *Inventory* means the item-by-item description of human remains and associated funerary objects.

(3) *Intentional excavation* means the planned archeological removal of human remains, funerary objects, sacred objects, or objects of cultural patrimony found under or on the surface of Federal or tribal lands pursuant to section 3 (c) of the Act.

(4) *Inadvertent discovery* means the unanticipated encounter or detection of human remains, funerary objects, sacred objects, or objects of cultural patrimony found under or on the surface of Federal or tribal lands pursuant to section 3 (d) of the Act.

Subpart B—Human Remains, Funerary Objects, Sacred Objects, or Objects of Cultural Patrimony From Federal or Tribal Lands

Sec. 10.3 Intentional archaeological excavations.

(a) *General*. This section carries out section 3 (c) of the Act regarding the custody of human remains, funerary objects, sacred objects, or objects of cultural patrimony that are excavated intentionally from Federal or tribal lands after November 16, 1990.

(b) *Specific Requirements*. These regulations permit the intentional excavation of human remains, funerary objects, sacred objects, or objects of cultural patrimony from Federal or tribal lands only if:

(1) The objects are excavated or removed following the requirements of the Archaeological Resources Protection Act (ARPA) (16 U.S.C. 470aa et seq.) and its implementing regulations. Regarding private lands within the exterior boundaries of any Indian reservation, the Bureau of Indian Affairs (BIA) will serve as the issuing agency for any permits required under the Act. For BIA procedures for obtaining such permits, see 25 CFR part 262 or contact the Deputy Commissioner of Indian Affairs, Department of the Interior, Washington, DC 20240. Regarding lands administered for the benefit of Native Hawaiians pursuant to the Hawaiian Homes Commission Act, 1920, and section 4 of Pub. L. 86-3, the Department of Hawaiian Home Lands will serve as the issuing agency for any permits required under the Act, with the Hawaii State Historic Preservation Division of the Department of Land and Natural Resources acting in an advisory capacity for such issuance. Procedures and requirements for issuing permits will be consistent with those required by the ARPA and its implementing regulations;

(2) The objects are excavated after consultation with or, in the case of tribal lands, consent of, the appropriate Indian tribe or Native Hawaiian organization pursuant to Sec. 10.5;

(3) The disposition of the objects is consistent with their custody as described in Sec. 10.6; and

(4) Proof of the consultation or consent is shown to the Federal agency official or other agency official responsible for the issuance of the required permit.

(c) *Procedures.* (1) The Federal agency official must take reasonable steps to determine whether a planned activity may result in the excavation of human remains, funerary objects, sacred objects, or objects of cultural patrimony from Federal lands. Prior to issuing any approvals or permits for activities, the Federal agency official must notify in writing the Indian tribes or Native Hawaiian organizations that are likely to be culturally affiliated with any human remains, funerary objects, sacred objects, or objects of cultural patrimony that may be excavated. The Federal agency official must also notify any present-day Indian tribe which aboriginally occupied the area of the planned activity and any other Indian tribes or Native Hawaiian organizations that the Federal agency official reasonably believes are likely to have a cultural relationship to the human remains, funerary objects, sacred objects, or objects of cultural patrimony that are expected to be found. The notice must be in writing and describe the planned activity, its general location, the basis upon which it was determined that human remains, funerary objects, sacred objects, or objects of cultural patrimony may be excavated, and, the basis for determining likely custody pursuant to Sec. 10.6. The notice must also propose a time and place for meetings or consultations to further consider the activity, the Federal agency's proposed treatment of any human remains, funerary objects, sacred objects, or objects of cultural patrimony that may be excavated, and the proposed disposition of any excavated human remains, funerary objects, sacred objects, [[Page 195]] or objects of cultural patrimony. Written notification should be followed up by telephone contact if there is no response in 15 days. Consultation must be conducted pursuant to Sec. 10.5.

(2) Following consultation, the Federal agency official must complete a written plan of action (described in Sec. 10.5(e)) and execute the actions called for in it.

(3) If the planned activity is also subject to review under section 106 of the National Historic Preservation Act (16 U.S.C. 470 *et seq.*), the Federal agency official should coordinate consultation and any subsequent agreement for compliance conducted under that Act with the requirements of Sec. 10.3 (c)(2) and Sec. 10.5. Compliance with these regulations does not relieve Federal agency officials of requirements to comply with section 106 of the National Historic Preservation Act (16 U.S.C. 470 et seq.).

(4) If an Indian tribe or Native Hawaiian organization receives notice of a planned activity or otherwise becomes aware of a planned activity that may result in the excavation of human remains, funerary objects, sacred objects, or objects of cultural patrimony on tribal lands, the Indian tribe or Native Hawaiian organization may take appropriate steps to:

(i) Ensure that the human remains, funerary objects, sacred objects, or objects of cultural patrimony are excavated or removed following Sec. 10.3 (b), and

(ii) make certain that the disposition of any human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently as a result of the planned activity are carried out following Sec. 10.6.

Sec. 10.4 Inadvertent discoveries.

(a) *General*. This section carries out section 3 (d) of the Act regarding the custody of human remains, funerary objects, sacred objects, or objects of cultural patrimony that are discovered inadvertently on Federal or tribal lands after November 16, 1990.

(b) *Discovery*. Any person who knows or has reason to know that he or she has discovered inadvertently human remains, funerary objects, sacred objects, or objects of cultural patrimony on Federal or tribal lands after November 16, 1990, must provide immediate telephone notification of the inadvertent discovery, with written confirmation, to the responsible Federal agency official with respect to Federal lands, and, with respect to tribal lands, to the responsible Indian tribe official. The requirements of these regulations regarding inadvertent discoveries apply whether or not an inadvertent discovery is duly reported. If written confirmation is provided by certified mail, the return receipt constitutes evidence of the receipt of the written notification by the Federal agency official or Indian tribe official.

(c) *Ceasing activity*. If the inadvertent discovery occurred in connection with an on-going activity on Federal or tribal lands, the person, in addition to providing the notice described above, must stop the activity in the area of the inadvertent discovery and make a reasonable effort to protect the human remains, funerary objects, sacred objects, or objects of cultural patrimony discovered inadvertently.

(d) *Federal lands*. (1) As soon as possible, but no later than three (3) working days after receipt of the written confirmation of notification with respect to Federal lands described in Sec. 10.4 (b), the responsible Federal agency official must:

(i) Certify receipt of the notification;

(ii) Take immediate steps, if necessary, to further secure and protect inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony, including, as appropriate, stabilization or covering;

(iii) Notify by telephone, with written confirmation, the Indian tribes or Native Hawaiian organizations likely to be culturally affiliated with the inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony, the Indian tribe or Native Hawaiian organization which aboriginally occupied the area, and any other Indian tribe or Native Hawaiian organization that is reasonably known to have a cultural relationship to the human remains, funerary objects, sacred objects, or objects of cultural patrimony. This notification [[Page 196]] must include pertinent information as to kinds of human remains, funerary objects, sacred objects, or objects of cultural patrimony discovered inadvertently, their condition, and the circumstances of their inadvertent discovery;

(iv) Initiate consultation on the inadvertent discovery pursuant to Sec. 10.5;

(v) If the human remains, funerary objects, sacred objects, or objects of cultural patrimony must be excavated or removed, follow the requirements and procedures in Sec. 10.3 (b) of these regulations; and

(vi) Ensure that disposition of all inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony is carried out following Sec. 10.6.

(2) Resumption of activity. The activity that resulted in the inadvertent discovery may resume thirty (30) days after certification by the notified Federal agency of receipt of the written confirmation of notification of inadvertent discovery if the resumption of the activity is otherwise lawful. The activity may also resume, if otherwise lawful, at any time that a written, binding agreement is executed between the Federal agency and the affiliated Indian tribes or Native Hawaiian organizations that adopt a recovery plan for the excavation or removal of the human remains, funerary objects, sacred objects, or objects of cultural patrimony following Sec. 10.3 (b)(1) of these regulations. The disposition of all human remains, funerary objects, sacred objects, or objects of cultural patrimony must be carried out following Sec. 10.6.

(e) Tribal lands. (1) As soon as possible, but no later than three (3) working days after receipt of the written confirmation of notification with respect to Tribal lands described in Sec. 10.4 (b), the

responsible Indian tribe official may:

(i) Certify receipt of the notification;

(ii) Take immediate steps, if necessary, to further secure and protect inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony, including, as appropriate, stabilization or covering;

(iii) If the human remains, funerary objects, sacred objects, or objects of cultural patrimony must be excavated or removed, follow the requirements and procedures in Sec. 10.3 (b) of these regulations; and

(iv) Ensure that disposition of all inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony is carried out following Sec. 10.6.

(2) Resumption of Activity. The activity that resulted in the inadvertent discovery may resume if otherwise lawful after thirty (30) days of the certification of the receipt of notification by the Indian tribe or Native Hawaiian organization.

(f) *Federal agency officials*. Federal agency officials should coordinate their responsibilities under this section with their emergency discovery responsibilities under section 106 of the National Historical Preservation Act (16 U.S.C. 470 (f) *et seq*.), 36 CFR 800.11 or section 3 (a) of the Archeological and Historic Preservation Act (16 U.S.C. 469 (a-c)). Compliance with these regulations does not relieve Federal agency officials of the requirement to comply with section 106 of the National Historical Preservation Act (16 U.S.C. 470 (f) *et seq*.), 36 CFR 800.11 or section 3 (a) of the Archeological and Historic Preservation Act (16 U.S.C. 469 (a-c)).

(g) *Notification requirement in authorizations*. All Federal authorizations to carry out land use activities on Federal lands or tribal lands, including all leases and permits, must include a requirement for the holder of the authorization to notify the appropriate Federal or tribal official immediately upon the discovery of human remains, funerary objects, sacred objects, or objects of cultural patrimony pursuant to Sec. 10.4 (b) of these regulations. [60 FR 62158, Dec. 4, 1995, as amended at 62 FR 41293, Aug. 1, 1997]

Sec. 10.5 Consultation.

Consultation as part of the intentional excavation or inadvertent discovery of human remains, funerary objects, sacred objects, or objects of cultural patrimony on Federal lands must be conducted in accordance with the following requirements.

(a) *Consulting parties*. Federal agency officials must consult with known lineal descendants and Indian tribe officials:

(1) from Indian tribes on whose aboriginal lands the planned activity will occur or where the inadvertent discovery has been made; and

(2) from Indian tribes and Native Hawaiian organizations that are, or are likely to be, culturally affiliated with the human remains, funerary objects, sacred objects, or objects of cultural patrimony; and

(3) from Indian tribes and Native Hawaiian organizations that have a demonstrated cultural relationship with the human remains, funerary objects, sacred objects, or objects of cultural patrimony.

(b) *Initiation of consultation*. (1) Upon receiving notice of, or otherwise becoming aware of, an inadvertent discovery or planned activity that has resulted or may result in the intentional excavation or inadvertent discovery of human remains, funerary objects, sacred objects, or objects of cultural patrimony on Federal lands, the responsible Federal agency official must, as part of the procedures described in Sec. Sec. 10.3 and 10.4, take appropriate steps to identify the lineal descendant, Indian

tribe, or Native Hawaiian organization entitled to custody of the human remains, funerary objects, sacred objects, or objects of cultural patrimony pursuant to Sec. 10.6 and Sec. 10.14. The Federal agency official shall notify in writing:

(i) any known lineal descendants of the individual whose remains, funerary objects, sacred objects, or objects of cultural patrimony have been or are likely to be excavated intentionally or discovered inadvertently; and

(ii) the Indian tribes or Native Hawaiian organizations that are likely to be culturally affiliated with the human remains, funerary objects, sacred objects, or objects of cultural patrimony that have been or are likely to be excavated intentionally or discovered inadvertently; and

(iii) the Indian tribes which aboriginally occupied the area in which the human remains, funerary objects, sacred objects, or objects of cultural patrimony have been or are likely to be excavated intentionally or discovered inadvertently; and

(iv) the Indian tribes or Native Hawaiian organizations that have a demonstrated cultural relationship with the human remains, funerary objects, sacred objects, or objects of cultural patrimony that have been or are likely to be excavated intentionally or discovered inadvertently.

(2) The notice must propose a time and place for meetings or consultation to further consider the intentional excavation or inadvertent discovery, the Federal agency's proposed treatment of the human remains, funerary objects, sacred objects, or objects of cultural patrimony that may be excavated, and the proposed disposition of any intentionally excavated or inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony.

(3) The consultation must seek to identify traditional religious leaders who should also be consulted and seek to identify, where applicable, lineal descendants and Indian tribes or Native Hawaiian organizations affiliated with the human remains, funerary objects, sacred objects, or objects of cultural patrimony.

(c) *Provision of information*. During the consultation process, as appropriate, the Federal agency official must provide the following information in writing to the lineal descendants and the officials of Indian tribes or Native Hawaiian organizations that are or are likely to be affiliated with the human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently on Federal lands:

(1) A list of all lineal descendants and Indian tribes or Native Hawaiian organizations that are being, or have been, consulted regarding the particular human remains, funerary objects, sacred objects, or objects of cultural patrimony;

(2) An indication that additional documentation used to identify affiliation will be supplied upon request.

(d) *Requests for information*. During the consultation process, Federal agency officials must request, as appropriate, the following information from Indian tribes or Native Hawaiian organizations that are, or are likely to be, affiliated pursuant to Sec. 10.6 (a) with intentionally excavated or inadvertently discovered human remains, funerary objects, sacred objects, or objects of cultural patrimony:

(1) Name and address of the Indian tribe official to act as representative in consultations related to particular human remains, funerary objects, sacred objects, or objects of cultural patrimony;

(2) Names and appropriate methods to contact lineal descendants who should be contacted to participate in the consultation process;

(3) Recommendations on how the consultation process should be conducted; and

(4) Kinds of cultural items that the Indian tribe or Native Hawaiian organization considers likely to be unassociated funerary objects, sacred objects, or objects of cultural patrimony.

(e) *Written plan of action*. Following consultation, the Federal agency official must prepare, approve, and sign a written plan of action. A copy of this plan of action must be provided to the lineal descendants, Indian tribes and Native Hawaiian organizations involved. Lineal descendants and Indian tribe official(s) may sign the written plan of action as appropriate. At a minimum, the plan of action must comply with Sec. 10.3 (b)(1) and document the following:

(1) The kinds of objects to be considered as cultural items as defined in Sec. 10.2 (b);

(2) The specific information used to determine custody pursuant to Sec. 10.6;

(3) The planned treatment, care, and handling of human remains, funerary objects, sacred objects, or objects of cultural patrimony recovered;

(4) The planned archeological recording of the human remains, funerary objects, sacred objects, or objects of cultural patrimony recovered;

(5) The kinds of analysis planned for each kind of object;

(6) Any steps to be followed to contact Indian tribe officials at the time of intentional excavation or inadvertent discovery of specific human remains, funerary objects, sacred objects, or objects of cultural patrimony;

(7) The kind of traditional treatment, if any, to be afforded the human remains, funerary objects, sacred objects, or objects of cultural patrimony by members of the Indian tribe or Native Hawaiian organization;

(8) The nature of reports to be prepared; and

(9) The planned disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony following Sec. 10.6.

(f) *Comprehensive agreements*. Whenever possible, Federal Agencies should enter into comprehensive agreements with Indian tribes or Native Hawaiian organizations that are affiliated with human remains, funerary objects, sacred objects, or objects of cultural patrimony and have claimed, or are likely to claim, those human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently on Federal lands. These agreements should address all Federal agency land management activities that could result in the intentional excavation or inadvertent discovery of human remains, funerary objects, sacred objects, or objects of cultural patrimony. Consultation should lead to the establishment of a process for effectively carrying out the requirements of these regulations regarding standard consultation procedures, the determination of custody consistent with procedures in this section and Sec. 10.6, and the treatment and disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony. The signed agreements, or the correspondence related to the effort to reach agreements, must constitute proof of consultation as required by these regulations.

(g) *Traditional religious leaders*. The Federal agency official must be cognizant that Indian tribe officials may need to confer with traditional religious leaders prior to making recommendations. Indian tribe officials are under no obligation to reveal the identity of traditional religious leaders.

Sec. 10.6 Custody.

(a) *Priority of custody*. This section carries out section 3 (a) of the Act, subject to the limitations of Sec. 10.15, regarding the custody of human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently in Federal or tribal lands after November 16, 1990. For the purposes of this section, custody means ownership or control of human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently in Federal or tribal lands after November 16, 1990. Custody of these human remains, funerary objects, sacred objects, or objects of cultural patrimony is, with priority given in

the order listed:

(1) In the case of human remains and associated funerary objects, in the lineal descendant of the deceased individual as determined pursuant to Sec. 10.14 (b);

(2) In cases where a lineal descendant cannot be ascertained or no claim is made, and with respect to unassociated funerary objects, sacred objects, and objects of cultural patrimony:

(i) In the Indian tribe on whose tribal land the human remains, funerary objects, sacred objects, or objects of cultural patrimony were excavated intentionally or discovered inadvertently;

(ii) In the Indian tribe or Native Hawaiian organization that has the closest cultural affiliation with the human remains, funerary objects, sacred objects, or objects of cultural patrimony as determined pursuant to Sec. 10.14 (c); or

(iii) In circumstances in which the cultural affiliation of the human remains, funerary objects, sacred objects, or objects of cultural patrimony cannot be ascertained and the objects were excavated intentionally or discovered inadvertently on Federal land that is recognized by a final judgment of the Indian Claims Commission or the United States Court of Claims as the aboriginal land of an Indian tribe:

(A) In the Indian tribe aboriginally occupying the Federal land on which the human remains, funerary objects, sacred objects, or objects of cultural patrimony were excavated intentionally or discovered inadvertently, or

(B) If it can be shown by a preponderance of the evidence that a different Indian tribe or Native Hawaiian organization has a stronger cultural relationship with the human remains, funerary objects, sacred objects, or objects of cultural patrimony, in the Indian tribe or Native Hawaiian organization that has the strongest demonstrated relationship with the objects. (b) Custody of human remains, funerary objects, sacred objects, or objects of cultural patrimony and other provisions of the Act apply to all intentional excavations and inadvertent discoveries made after November 16, 1990, including those made before the effective date of these regulations.

(c) *Final notice, claims and disposition with respect to Federal lands*. Upon determination of the lineal descendant, Indian tribe, or Native Hawaiian organization that under these regulations appears to be entitled to custody of particular human remains, funerary objects, sacred objects, or objects of cultural patrimony excavated intentionally or discovered inadvertently on Federal lands, the responsible Federal agency official must, subject to the notice required herein and the limitations of Sec. 10.15, transfer custody of the objects to the lineal descendant, Indian tribe, or Native Hawaiian organization following appropriate procedures, which must respect traditional customs and practices of the affiliated Indian tribes or Native Hawaiian organizations in each instance. Prior to any such disposition by a Federal agency official, the Federal agency official must publish general notices of the proposed disposition in a newspaper of general circulation in the area in which the human remains, funerary objects, sacred objects, or objects of cultural patrimony were excavated intentionally or discovered inadvertently and, if applicable, in a newspaper of general circulation in the area(s) in which affiliated Indian tribes or Native Hawaiian organizations members now reside. The notice must provide information as to the nature and affiliation of the human remains, funerary objects, sacred objects, or objects of cultural patrimony and solicit further claims to custody. The notice must be published at least two (2) times at least a week apart, and the transfer must not take place until at least thirty (30) days after the publication of the second notice to allow time for any additional claimants to come forward. If additional claimants do come forward and the Federal agency official cannot clearly determine which claimant is entitled to custody, the Federal agency must not transfer custody of the objects until such time as the proper recipient is determined pursuant to these regulations. The Federal agency official must send a copy of the notice and information on

when and in what newspaper(s) the notice was published to the Departmental Consulting Archeologist.

Sec. 10.7 Disposition of unclaimed human remains, funerary objects, sacred objects, or objects of cultural patrimony. [Reserved]

Subpart C—Human Remains, Funerary Objects, Sacred Objects, or Objects of Cultural Patrimony in Museums and Federal Collections

Sec. 10.8 Summaries.

(a) *General*. This section carries out section 6 of the Act. Under section 6 of the Act, each museum or Federal agency that has possession or control over collections which may contain unassociated funerary objects, sacred objects, or objects of cultural patrimony must complete a summary of these collections based upon available information held by the museum or Federal agency. The purpose of the summary is to provide information about the collections to lineal descendants and culturally affiliated Indian tribes or Native Hawaiian organizations that may wish to request repatriation of such objects. The summary serves in lieu of an object-by-object inventory of these collections, although, if an inventory is available, it may be substituted. Federal agencies are responsible for ensuring that these requirements are met for all collections from their lands or generated by their actions whether the collections are held by the Federal agency or by a non-Federal institution.

(b) *Contents of summaries*. For each collection or portion of a collection, the summary must include: an estimate of the number of objects in the collection or portion of the collection; a description of the kinds of objects included; reference to the means, date(s), and location(s) in which the collection or portion of the collection was acquired, where readily ascertainable; and information relevant to identifying lineal descendants, if available, and cultural affiliation.

(c) *Completion*. Summaries must be completed not later than November 16, 1993.

(d) *Consultation*. (1) Consulting parties. Museum and Federal agency officials must consult with Indian tribe officials and traditional religious leaders:

(i) From whose tribal lands unassociated funerary objects, sacred objects, or objects of cultural patrimony originated;

(ii) That are, or are likely to be, culturally affiliated with unassociated funerary objects, sacred objects, or objects of cultural patrimony; and

(iii) From whose aboriginal lands unassociated funerary objects, sacred objects, or objects of cultural patrimony originated.

(2) Initiation of consultation. Museum and Federal agency officials must begin summary consultation no later than the completion of the summary process. Consultation may be initiated with a letter, but should be followed up by telephone or face-to-face dialogue with the appropriate Indian tribe official.

(3) Provision of information. During summary consultation, museum and Federal agency officials must provide copies of the summary to lineal descendants, when known, and to officials and traditional religious leaders representing Indian tribes or Native Hawaiian organizations that are, or are likely to be, culturally affiliated with the cultural items. A copy of the summary must also be provided to the Departmental Consulting Archeologist. Upon request by lineal descendants or Indian tribe officials, museum and Federal agency officials must provide lineal descendants, Indian tribe

officials and traditional religious leaders with access to records, catalogues, relevant studies, or other pertinent data for the limited purposes of determining the geographic origin, cultural affiliation, and basic facts surrounding acquisition and accession of objects covered by the summary. Access to this information may be requested at any time and must be provided in a reasonable manner to be agreed upon by all parties. The Review committee also must be provided access to such materials.

(4) Requests for information. During the summary consultation, museum and Federal agency officials must request, as appropriate, the following information from Indian tribes and Native Hawaiian organizations that are, or are likely to be, culturally affiliated with their collections:

(i) Name and address of the Indian tribe official to act as representative in consultations related to particular objects;

(ii) Recommendations on how the consultation process should be conducted, including:

(A) Names and appropriate methods to contact any lineal descendants, if known, of individuals whose unassociated funerary objects or sacred objects are included in the summary;

(B) Names and appropriate methods to contact any traditional religious leaders that the Indian tribe or Native Hawaiian organization thinks should be consulted regarding the collections; and

(iii) Kinds of cultural items that the Indian tribe or Native Hawaiian organization considers to be funerary objects, sacred objects, or objects of cultural patrimony.

(e) Museum and Federal agency officials must document the following information regarding unassociated funerary objects, sacred objects, and objects of cultural patrimony in their collections and must use this documentation in determining the individuals, Indian tribes, and Native Hawaiian organizations with which they are affiliated:

(1) Accession and catalogue entries;

(2) Information related to the acquisition of unassociated funerary object, sacred object, or object of cultural patrimony, including:

(i) the name of the person or organization from whom the object was obtained, if known;

(ii) The date of acquisition;

(iii) The place each object was acquired, i.e., name or number of site, county, state, and Federal agency administrative unit, if applicable; and

(iv) The means of acquisition, i.e., gift, purchase, or excavation;

(3) A description of each unassociated funerary object, sacred object, or object of cultural patrimony, including dimensions, materials, and photographic documentation, if appropriate, and the antiquity of such objects, if known;

(4) A summary of the evidence used to determine the cultural affiliation of the unassociated funerary objects, sacred objects, or objects of cultural patrimony pursuant to Sec. 10.14 of these regulations.

(f) *Notification*. Repatriation of unassociated funerary objects, sacred objects, or objects of cultural patrimony to lineal descendants, culturally affiliated Indian tribes, or Native Hawaiian organizations as determined pursuant to Sec. 10.10 (a), must not proceed prior to submission of a notice of intent to repatriate to the Departmental Consulting Archeologist, and publication of the notice of intent to repatriate in the Federal Register. The notice of intent to repatriate must describe the unassociated funerary objects, sacred objects, or objects of cultural patrimony being claimed in sufficient detail so as to enable other individuals, Indian tribes or Native Hawaiian organizations to determine their interest in the claimed objects. It must include information that identifies each claimed unassociated funerary object, sacred object, or object of cultural patrimony and the circumstances surrounding its acquisition, and describes the objects that are clearly identifiable as to cultural affiliation. It must also describe the objects that are not clearly identifiable as being

culturally affiliated with a particular Indian tribe or Native Hawaiian organization, which, given the totality of circumstances surrounding acquisition of the objects, are likely to be culturally affiliated with a particular Indian tribe or Native Hawaiian organization. The Departmental Consulting Archeologist must publish the notice of intent to repatriate in the Federal Register. Repatriation may not occur until at least thirty (30) days after publication of the notice of intent to repatriate in the Federal Register.

Sec. 10.9 Inventories.

(a) *General*. This section carries out section 5 of the Act. Under section 5 of the Act, each museum or Federal agency that has possession or control over holdings or collections of human remains and associated funerary objects must compile an inventory of such objects, and, to the fullest extent possible based on information possessed by the museum or Federal agency, must identify the geographical and cultural affiliation of each item. The purpose of the inventory is to facilitate repatriation by providing clear descriptions of human remains and associated funerary objects and establishing the cultural affiliation between these objects and present-day Indian tribes and Native Hawaiian organizations. Museums and Federal agencies are encouraged to produce inventories first on those portions of their collections for which information is readily available or about which Indian tribes or Native Hawaiian organizations have expressed special interest. Early focus on these parts of collections will result in determinations that may serve as models for other inventories. Federal agencies must ensure that these requirements are met for all collections from their lands or generated by their actions whether the collections are held by the Federal agency or by a non-Federal institution.

(b) *Consultation*—(1) *Consulting parties*. Museum and Federal agency officials must consult with:

(i) Lineal descendants of individuals whose remains and associated funerary objects are likely to be subject to the inventory provisions of these regulations; and

(ii) Indian tribe officials and traditional religious leaders:

(A) From whose tribal lands the human remains and associated funerary objects originated;

(B) That are, or are likely to be, culturally affiliated with human remains and associated funerary objects; and

(C) From whose aboriginal lands the human remains and associated funerary objects originated.

(2) *Initiation of consultation.* Museum and Federal agency officials must begin inventory consultation as early as possible, no later in the inventory process than the time at which investigation into the cultural affiliation of human remains and associated funerary objects is being conducted. Consultation may be initiated with a letter, but should be followed up by telephone or face-to-face dialogue.

(3) *Provision of information*. During inventory consultation, museums and Federal agency officials must provide the following information in writing to lineal descendants, when known, and to officials and traditional religious leaders representing Indian tribes or Native Hawaiian organizations that are, or are likely to be, culturally affiliated with the human remains and associated funerary objects.

(i) A list of all Indian tribes and Native Hawaiian organizations that are, or have been, consulted regarding the particular human remains and associated funerary objects;

(ii) A general description of the conduct of the inventory;

(iii) The projected time frame for conducting the inventory; and

(iv) An indication that additional documentation used to identify cultural affiliation will be supplied upon request.

(4) *Requests for information*. During the inventory consultation, museum and Federal agency officials must request, as appropriate, the following information from Indian tribes and Native Hawaiian organizations that are, or are likely to be, culturally affiliated with their collections:

(i) Name and address of the Indian tribe official to act as representative in consultations related to particular human remains and associated funerary objects;

(ii) Recommendations on how the consultation process should be conducted, including:

(A) Names and appropriate methods to contact any lineal descendants of individuals whose remains and associated funerary objects are or are likely to be included in the inventory; and

(B) Names and appropriate methods to contact traditional religious leaders who should be consulted regarding the human remains and associated funerary objects.

(iii) Kinds of objects that the Indian tribe or Native Hawaiian organization reasonably believes to have been made exclusively for burial purposes or to contain human remains of their ancestors.

(c) *Required information*. The following documentation must be included, if available, for all inventories completed by museum or Federal agency officials:

(1) Accession and catalogue entries, including the accession/ catalogue entries of human remains with which funerary objects were associated;

(2) Information related to the acquisition of each object, including:

(i) the name of the person or organization from whom the object was obtained, if known;

(ii) The date of acquisition,

(iii) The place each object was acquired, i.e., name or number of site, county, state, and Federal agency administrative unit, if applicable; and

(iv) The means of acquisition, i.e., gift, purchase, or excavation;

(3) A description of each set of human remains or associated funerary object, including dimensions, materials, and, if appropriate, photographic documentation, and the antiquity of such human remains or associated funerary objects, if known;

(4) A summary of the evidence, including the results of consultation, used to determine the cultural affiliation of the human remains and associated funerary objects pursuant to Sec. 10.14 of these regulations.

(d) *Documents*. Two separate documents comprise the inventory:

(1) A listing of all human remains and associated funerary objects that are identified as being culturally affiliated with one or more present-day Indian tribes or Native Hawaiian organizations. The list must indicate for each item or set of items whether cultural affiliation is clearly determined or likely based upon the preponderance of the evidence; and

(2) A listing of all culturally unidentifiable human remains and associated funerary objects for which no culturally affiliated present- day Indian tribe or Native Hawaiian organization can be determined.

(e) *Notification*. (1) If the inventory results in the identification or likely identification of the cultural affiliation of any particular human remains or associated funerary objects with one or more Indian tribes or Native Hawaiian organizations, the museum or Federal agency, not later than six (6) months after completion of the inventory, must send such Indian tribes or Native Hawaiian organizations the inventory of culturally affiliated human remains and associated funerary objects, including all information required under Sec. 10.9 (c), and a notice of inventory completion that summarizes the results of the inventory.

(2) The notice of inventory completion must summarize the contents of the inventory in sufficient detail so as to enable the recipients to determine their interest in claiming the inventoried items. It must identify each particular set of human remains or each associated funerary object and the

circumstances surrounding its acquisition, describe the human remains or associated funerary objects that are clearly identifiable as to cultural affiliation, and describe the human remains and associated funerary objects that are not clearly identifiable as being culturally affiliated with an Indian tribe or Native Hawaiian organization, but which, given the totality of circumstances surrounding acquisition of the human remains or associated objects, are identified as likely to be culturally affiliated with a particular Indian tribe or Native Hawaiian organization.

(3) If the inventory results in a determination that the human remains are of an identifiable individual, the museum or Federal agency official must convey this information to the lineal descendant of the deceased individual, [[Page 204]] if known, and to the Indian tribe or Native Hawaiian organization of which the deceased individual was culturally affiliated.

(4) The notice of inventory completion and a copy of the inventory must also be sent to the Departmental Consulting Archeologist. These submissions should be sent in both printed hard copy and electronic formats. Information on the proper format for electronic submission and suggested alternatives for museums and Federal agencies unable to meet these requirements are available from the Departmental Consulting Archeologist.

(5) Upon request by an Indian tribe or Native Hawaiian organization that has received or should have received a notice of inventory completion and a copy of the inventory as described above, a museum or Federal agency must supply additional available documentation to supplement the information provided with the notice. For these purposes, the term documentation means a summary of existing museum or Federal agency records including inventories or catalogues, relevant studies, or other pertinent data for the limited purpose of determining the geographical origin, cultural affiliation, and basic facts surrounding the acquisition and accession of human remains and associated funerary objects.

(6) If the museum or Federal agency official determines that the museum or Federal agency has possession of or control over human remains that cannot be identified as affiliated with a particular individual, Indian tribes or Native Hawaiian organizations, the museum or Federal agency must provide the Department Consulting Archeologist notice of this result and a copy of the list of culturally unidentifiable human remains and associated funerary objects. The Departmental Consulting Archeologist must make this information available to members of the Review Committee. Section 10.11 of these regulations will set forth procedures for disposition of culturally unidentifiable human remains of Native American origin. Museums or Federal agencies must retain possession of such human remains pending promulgation of Sec. 10.11 unless legally required to do otherwise, or recommended to do otherwise by the Secretary. Recommendations regarding the disposition of culturally unidentifiable human remains may be requested prior to final promulgation of Sec. 10.11.

(7) The Departmental Consulting Archeologist must publish notices of inventory completion received from museums and Federal agencies in the Federal Register.

(f) *Completion*. Inventories must be completed not later than November 16, 1995. Any museum that has made a good faith effort to complete its inventory, but which will be unable to complete the process by this deadline, may request an extension of the time requirements from the Secretary. An indication of good faith efforts must include, but not necessarily be limited to, the initiation of active consultation and documentation regarding the collections and the development of a written plan to carry out the inventory process. Minimum components of an inventory plan are: a definition of the steps required; the position titles of the persons responsible for each step; a schedule for carrying out the plan; and a proposal to obtain the requisite funding.

Sec. 10.10 Repatriation.

(a) *Unassociated funerary objects, sacred objects, and objects of cultural patrimony*—(1) *Criteria*. Upon the request of a lineal descendant, Indian tribe, or Native Hawaiian organization, a museum or Federal agency must expeditiously repatriate unassociated funerary objects, sacred objects, or objects of cultural patrimony if all the following criteria are met:

(i) The object meets the definitions established in Sec. 10.2 (d)(2)

(ii), (d)(3), or (d)(4); and (ii) The cultural affiliation of the object is established:

(A) through the summary, consultation, and notification procedures in Sec. 10.14 of these regulations; or

(B) by presentation of a preponderance of the evidence by a requesting Indian tribe or Native Hawaiian organization pursuant to section 7(c) of the Act; and

(iii) The known lineal descendant or culturally affiliated Indian tribe or Native Hawaiian organization presents evidence which, if standing alone before the introduction of evidence to the contrary, would support a finding that the museum or Federal agency does not have a right of possession to the objects as defined in Sec. 10.10 (a)(2); and

(iv) The agency or museum is unable to present evidence to the contrary proving that it does have a right of possession as defined below; and

(v) None of the specific exceptions listed in Sec. 10.10 (c) apply.

(2) *Right of possession*. For purposes of this section, "right of possession" means possession obtained with the voluntary consent of an individual or group that had authority of alienation. The original acquisition of a Native American unassociated funerary object, sacred object, or object of cultural patrimony from an Indian tribe or Native Hawaiian organization with the voluntary consent of an individual or group with authority to alienate such object is deemed to give right of possession to that object.

(3) *Notification*. Repatriation must take place within ninety (90) days of receipt of a written request for repatriation that satisfies the requirements of paragraph (a)(1) of this section from a lineal descendent or culturally affiliated Indian tribe or Native Hawaiian organization, provided that the repatriation may not occur until at least thirty (30) days after publication of the notice of intent to repatriate in the Federal Register as described in Sec. 10.8.

(b) *Human remains and associated funerary objects*—(1) *Criteria*. Upon the request of a lineal descendant, Indian tribe, or Native Hawaiian organization, a museum and Federal agency must expeditiously repatriate human remains and associated funerary objects if all of the following criteria are met:

(i) The human remains or associated funerary object meets the definitions established in Sec. 10.2 (d)(1) or (d)(2)(i); and

(ii) The affiliation of the deceased individual to known lineal descendant, present day Indian tribe, or Native Hawaiian organization:

(A) has been reasonably traced through the procedures outlined in Sec. 10.9 and Sec. 10.14 of these regulations; or

(B) has been shown by a preponderance of the evidence presented by a requesting Indian tribe or Native Hawaiian organization pursuant to section 7(c) of the Act; and

(iii) None of the specific exceptions listed in Sec. 10.10 (c) apply.

(2) *Notification*. Repatriation must take place within ninety (90) days of receipt of a written request for repatriation that satisfies the requirements of Sec. 10.10 (b)(1) from the culturally affiliated Indian tribe or Native Hawaiian organization, provided that the repatriation may not occur until at least thirty (30) days after publication of the notice of inventory completion in the Federal Register

as described in Sec. 10.9.

(c) *Exceptions.* These requirements for repatriation do not apply to:

(1) Circumstances where human remains, funerary objects, sacred objects, or objects of cultural patrimony are indispensable to the completion of a specific scientific study, the outcome of which is of major benefit to the United States. Human remains, funerary objects, sacred objects, or objects of cultural patrimony in such circumstances must be returned no later than ninety (90) days after completion of the study; or

(2) Circumstances where there are multiple requests for repatriation of human remains, funerary objects, sacred objects, or objects of cultural patrimony and the museum or Federal agency, after complying with these regulations, cannot determine by a preponderance of the evidence which requesting party is the most appropriate claimant. In such circumstances, the museum or Federal agency may retain the human remains, funerary objects, sacred objects, or objects of cultural patrimony until such time as the requesting parties mutually agree upon the appropriate recipient or the dispute is otherwise resolved pursuant to these regulations or as ordered by a court of competent jurisdiction; or

(3) Circumstances where a court of competent jurisdiction has determined that the repatriation of the human remains, funerary objects, sacred objects, or objects of cultural patrimony in the possession or control of a museum would result in a taking of property without just compensation within the meaning of the Fifth Amendment of the United States Constitution, in which event the custody of the objects must be as provided under otherwise applicable law. Nothing in these regulations must prevent a museum or Federal agency, where otherwise so authorized, or a lineal descendant, Indian tribe, or Native Hawaiian organization, from expressly relinquishing title to, right of possession of, or control over any human remains, funerary objects, sacred objects, or objects of cultural patrimony.

(4) Circumstances where the repatriation is not consistent with other repatriation limitations identified in Sec. 10.15 of these regulations.

(d) *Place and manner of repatriation*. The repatriation of human remains, funerary objects, sacred objects, or objects of cultural patrimony must be accomplished by the museum or Federal agency in consultation with the requesting lineal descendants, or culturally affiliated Indian tribe or Native Hawaiian organization, as appropriate, to determine the place and manner of the repatriation.

(e) The museum official or Federal agency official must inform the recipients of repatriations of any presently known treatment of the human remains, funerary objects, sacred objects, or objects of cultural patrimony with pesticides, preservatives, or other substances that represent a potential hazard to the objects or to persons handling the objects.

(f) Record of repatriation. (1) Museums and Federal agencies must adopt internal procedures adequate to permanently document the content and recipients of all repatriations.

(2) The museum official or Federal agency official, at the request of the Indian tribe official, may take such steps as are considered necessary pursuant to otherwise applicable law, to ensure that information of a particularly sensitive nature is not made available to the general public.

(g) *Culturally unidentifiable human remains*. If the cultural affiliation of human remains cannot be established pursuant to these regulations, the human remains must be considered culturally unidentifiable. Museum and Federal agency officials must report the inventory information regarding such human remains in their holdings to the Departmental Consulting Archeologist who will transmit this information to the Review Committee. The Review Committee is responsible for compiling an inventory of culturally unidentifiable human remains in the possession or control of each museum and Federal agency, and, for recommending to the Secretary specific actions for

disposition of such human remains.

Sec. 10.11 Disposition of culturally unidentifiable human remains. [Reserved]

Sec. 10.12 Civil penalties. [Reserved]

Sec. 10.13 Future applicability. [Reserved]

Subpart D—General

Sec. 10.14 Lineal descent and cultural affiliation.

(a) *General*. This section identifies procedures for determining lineal descent and cultural affiliation between present-day individuals and Indian tribes or Native Hawaiian organizations and human remains, funerary objects, sacred objects, or objects of cultural patrimony in museum or Federal agency collections or excavated intentionally or discovered inadvertently from Federal lands. They may also be used by Indian tribes and Native Hawaiian organizations with respect to tribal lands.

(b) *Criteria for determining lineal descent*. A lineal descendant is an individual tracing his or her ancestry directly and without interruption by means of the traditional kinship system of the appropriate Indian tribe or Native Hawaiian organization or by the common law system of descendence to a known Native American individual whose remains, funerary objects, or sacred objects are being requested under these regulations. This standard requires that the earlier person be identified as an individual whose descendants can be traced.

(c) *Criteria for determining cultural affiliation*. Cultural affiliation means a relationship of shared group identity that may be reasonably traced historically or prehistorically between a present-day Indian tribe or Native Hawaiian organization and an identifiable earlier group. All of the following requirements must be met to determine cultural affiliation between a present-day Indian tribe or Native Hawaiian organization and the human remains, funerary objects, sacred objects, or objects of cultural patrimony of an earlier group:

(1) Existence of an identifiable present-day Indian tribe or Native Hawaiian organization with standing under these regulations and the Act; and

(2) Evidence of the existence of an identifiable earlier group. Support for this requirement may include, but is not necessarily limited to evidence sufficient to:

(i) Establish the identity and cultural characteristics of the earlier group,

(ii) Document distinct patterns of material culture manufacture and distribution methods for the earlier group, or

(iii) Establish the existence of the earlier group as a biologically distinct population; and

(3) Evidence of the existence of a shared group identity that can be reasonably traced between the present-day Indian tribe or Native Hawaiian organization and the earlier group. Evidence to support this requirement must establish that a present-day Indian tribe or Native Hawaiian organization has been identified from prehistoric or historic times to the present as descending from the earlier group.

(d) A finding of cultural affiliation should be based upon an overall evaluation of the totality of the circumstances and evidence pertaining to the connection between the claimant and the material being claimed and should not be precluded solely because of some gaps in the record.

(e) *Evidence*. Evidence of a kin or cultural affiliation between a present-day individual, Indian tribe, or Native Hawaiian organization and human remains, funerary objects, sacred objects, or

objects of cultural patrimony must be established by using the following types of evidence: Geographical, kinship, biological, archeological, anthropological, linguistic, folklore, oral tradition, historical, or other relevant information or expert opinion.

(f) *Standard of proof*. Lineal descent of a present-day individual from an earlier individual and cultural affiliation of a present-day Indian tribe or Native Hawaiian organization to human remains, funerary objects, sacred objects, or objects of cultural patrimony must be established by a preponderance of the evidence. Claimants do not have to establish cultural affiliation with scientific certainty.

Sec. 10.15 Limitations and remedies.

(a) *Failure to claim prior to repatriation*. (1) Any person who fails to make a timely claim prior to the repatriation or disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony is deemed to have irrevocably waived any right to claim such items pursuant to these regulations or the Act. For these purposes, a "timely claim" means the filing of a written claim with a responsible museum or Federal agency official prior to the time the particular human remains, funerary objects, sacred objects, or objects of cultural patrimony at issue are duly repatriated or disposed of to a claimant by a museum or Federal agency pursuant to these regulations.

(2) If there is more than one (1) claimant, the human remains, funerary object, sacred object, or objects of cultural patrimony may be held by the responsible museum or Federal agency or person in possession thereof pending resolution of the claim. Any person who is in custody of such human remains, funerary objects, sacred objects, or objects of cultural patrimony and does not claim entitlement to them must place the objects in the possession of the responsible museum or Federal agency for retention until the question of custody is resolved.

(b) *Failure to claim where no repatriation or disposition has occurred. [Reserved]*

(c) *Exhaustion of remedies*. No person is considered to have exhausted his or her administrative remedies with respect to the repatriation or disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony subject to subpart B of these regulations, or, with respect to Federal lands, subpart C of these regulations, until such time as the person has filed a written claim for repatriation or disposition of the objects with the responsible museum or Federal agency and the claim has been duly denied following these regulations.

(d) *Savings provisions*. Nothing in these regulations can be construed to:

(1) Limit the authority of any museum or Federal agency to:

(i) Return or repatriate human remains, funerary objects, sacred objects, or objects of cultural patrimony to Indian tribes, Native Hawaiian organizations, or individuals; and

(ii) Enter into any other agreement with the consent of the culturally affiliated Indian tribe or Native Hawaiian organization as to the disposition of, or control over, human remains, funerary objects, sacred objects, or objects of cultural patrimony.

(2) Delay actions on repatriation requests that were pending on November 16, 1990;

(3) Deny or otherwise affect access to court;

(4) Limit any procedural or substantive right which may otherwise be secured to individuals or Indian tribes or Native Hawaiian organizations; or

(5) Limit the application of any State or Federal law pertaining to theft of stolen property.

Sec. 10.16 Review committee.

(a) *General*. The Review Committee will advise Congress and the Secretary on matters relating to these regulations and the Act, including, but not limited to, monitoring the performance of museums

and Federal agencies in carrying out their responsibilities, facilitating and making recommendations on the resolution of disputes as described further in Sec. 10.17, and compiling a record of culturally unidentifiable human remains that are in the possession or control of museums and Federal agencies and recommending actions for their disposition.

(b) *Recommendations*. Any recommendation, finding, report, or other action of the Review Committee is advisory only and not binding on any person. Any records and findings made by the Review Committee may be admissible as evidence in actions brought by persons alleging a violation of the Act.

Sec. 10.17 Dispute resolution.

(a) *Formal and informal resolutions*. Any person who wishes to contest actions taken by museums, Federal agencies, Indian tribes, or Native Hawaiian organizations with respect to the repatriation and disposition of human remains, funerary objects, sacred objects, or objects of cultural patrimony is encouraged to do so through informal negotiations to achieve a fair resolution of the matter. The Review Committee may aid in this regard as described below. In addition, the United States District Courts have jurisdiction over any action brought that alleges a violation of the Act.

(b) *Review Committee Role*. The Review Committee may facilitate the informal resolution of disputes relating to these regulations among interested parties that are not resolved by good faith negotiations. Review Committee actions may include convening meetings between parties to disputes, making advisory findings as to contested facts, and making recommendations to the disputing parties or to the Secretary as to the proper resolution of disputes consistent with these regulations and the Act.

Appendix A to Part 10—Sample Summary

The following is a generic sample and should be used as a guideline for preparation of summaries tailoring the information to the specific circumstances of each case.

Before November 17, 1993

Chairman or Other Authorized Official

Indian tribe or Native Hawaiian organization

Street

State

Dear Sir/Madame Chair:

I write to inform you of collections held by our museum which may contain unassociated funerary objects, sacred objects, or objects of cultural patrimony that are, or are likely to be, culturally affiliated with your Indian tribe or Native Hawaiian organization. This notification is required by section 6 of the Native American Graves Protection and Repatriation Act.

Our ethnographic collection includes approximately 200 items specifically identified as being manufactured or used by members of your Indian tribe or Native Hawaiian organization. These items represent various categories of material culture, including sea and land hunting, fishing, tools, household equipment, clothing, travel and transportation, personal adornment, smoking, toys, and figurines. The collection includes thirteen objects identified in our records as “medicine bags.”

Approximately half of these items were collected by John Doe during his expedition to your reservation in 1903 and accessioned by the museum that same year (see Major Museum Publication, no. 65 (1965).

Another 50 of these items were collected by Jane Roe during her expeditions to your reservation

between 1950-1960 and accessioned by the museum in 1970 (see Major Museum: no. 75 (1975). Accession information indicates that several of these items were collected from members of the Able and Baker families.

For the remaining approximately 50 items, which were obtained from various collectors between 1930 and 1980, additional collection information is not readily available.

In addition to the above mentioned items, the museum has approximately 50 ethnographic items obtained from the estate of a private collector and identified as being collected from the "northwest portion of the State."

Our archeological collection includes approximately 1,500 items recovered from ten archeological sites on your reservation and another 5,000 items from fifteen sites within the area recognized by the Indian Claims Commission as being part of your Indian tribe's aboriginal territory.

Please feel free to contact Fred Poe at (012) 345-6789 regarding the identification and potential repatriation of unassociated funerary objects, sacred objects, or objects of cultural patrimony in this collection that are, or are likely to be, culturally affiliated with your Indian tribe or Native Hawaiian organization. You are invited to review our records, catalogues, relevant studies or other pertinent data for the purpose of determining the geographic origin, cultural affiliation, and basic facts surrounding acquisition and accession of these items. We look forward to working together with you.

Sincerely,

Museum Official

Major Museum

Appendix B to Part 10—Sample Notice of Inventory Completion

The following is an example of a Notice of Inventory Completion published in the Federal Register.

National Park Service

Notice of Inventory Completion for Native American Human Remains and Associated Funerary Objects from Hancock County, ME, in the Control of the National Park Service.

AGENCY: National Park Service, Interior.

ACTION: Notice.

Notice is hereby given following provisions of the Native American Graves Protection and Repatriation Act, 25 U.S.C. 3003(d), of completion of the inventory of human remains and associated funerary objects from a site in Hancock County, ME, that are presently in the control of the National Park Service.

A detailed inventory and assessment of these human remains has been made by National Park Service curatorial staff, contracted specialists in physical anthropology and prehistoric archeology, and representatives of the Penobscot Nation, Aroostook Band of Micmac, Houlton Band of Maliseet, and the Passamaquoddy Nation, identified collectively hereafter as the Wabanaki Tribes of Maine.

The partial remains of at least seven individuals (including five adults, one subadult, and one child) were recovered in 1977 from a single grave at the Fernald Point Site (ME Site 43-24), a prehistoric shell midden on Mount Desert Island, within the boundary of Acadia National Park. A bone harpoon head, a modified beaver tooth, and several animal and fish bone fragments were found associated with the eight individuals. Radiocarbon assays indicate the burial site dates between 1035-1155 AD. The human remains and associated funerary objects have been catalogued as ACAD-5747,

5749, 5750, 5751, 5752, 5783, 5784. The partial remains of an eighth individual (an elderly male) was also recovered in 1977 from a second grave at the Fernald Point Site. No associated funerary objects were recovered with this individual. Radiocarbon assays indicate the second burial site dates between 480-680 AD. The human remains have been catalogued as ACAD-5748. The human remains and associated funerary objects of all nine individuals are currently in the possession of the University of Maine, Orono, ME.

Inventory of the human remains and associated funerary objects and review of the accompanying documentation indicates that no known individuals were identifiable. A representative of the Wabanaki Tribes of Maine has identified the Acadia National Park area as a historic gathering place for his people and stated his belief that there exists a relationship of shared group identity between these individuals and the Wabanaki Tribes of Maine. The Prehistoric Subcommittee of the Maine State Historic Preservation Office's Archaeological Advisory Committee has found it reasonable to trace a shared group identity from the Late Prehistoric Period (1000-1500 AD) inhabitants of Maine as an undivided whole to the four modern Indian tribes known collectively as the Wabanaki Tribes of Maine on the basis of geographic proximity; survivals of stone, ceramic and perishable material culture skills; and probable linguistic continuity across the Late Prehistoric/Contact Period boundary. In a 1979 article, Dr. David Sanger, the archeologist who conducted the 1977 excavations at the Fernald Point Site and uncovered the above mentioned burials, recognizes a relationship between Maine sites dating to the Ceramic Period (2,000 B.P.-1600 A.D.) and present- day Algonkian speakers generally known as Abenakis, including the Micmac, Maliseet, Passamaquoddy, Penboscot, Kennebec, and Pennacook groups.

Based on the above mentioned information, officials of the National Park Service have determined that, pursuant to 25 U.S.C. 3001 (2), there is a relationship of shared group identity which can be reasonably traced between these human remains and associated funerary objects and the Wabanaki Tribes of Maine.

This notice has been sent to officials of the Wabanaki Tribes of Maine. Representatives of any other Indian tribe which believes itself to be culturally affiliated with these human remains and associated funerary objects should contact Len Bobinchock, Acting Superintendent, Acadia National Park, P.O. Box 177, Bar Harbor, ME 04609, telephone: (207) 288-0374, before August 31, 1994. Repatriation of these human remains and associated funerary objects to the Wabanaki Tribes of Maine may begin after that date if no additional claimants come forward.

Dated: July 21, 1994

Francis P. McManamon,
Departmental Consulting Archeologist,
Chief, Archeological Assistance Division.

[Published: August 1, 1994]

George T. Frampton, Jr.,
Assistant Secretary for Fish and Wildlife and Parks.
[FR Doc. 95-29418 Filed 12-1-95; 8:45 am]
BILLING CODE 4310-70-F

Appendix 3

Architectural Assessment –Japan

Assessment and evaluation performed by Richard Siemons, NCARB

CINCPACFLT PROJECT - Japan and Okinawa

Including the following:	Yokosuka Naval Complex Misawa Naval Air Facility Sasebo, U.S. Fleet Activities Okinawa Naval Air Facility at Kadena AFB
Contact Personnel:	Karen Verkennes, Environmental Advisor. Yokosuka Naval Complex. POC for Japan and Okinawa facilities John Nylander, Public Affairs Officer, Navy - Japan. Yokosuka

Yokosuka Naval Complex - Wed., Thurs., Fri., Sat. July 7, 8, 9, 10, 1999.

Overview and introductory information pertaining to real property issues in Japan relate to the Status of Forces Agreement (SOFA). Other entities that affect real property issues consist of:

Joint Committee: U.S. representatives and Japanese representatives
Facility Committee: Makes recommendations to the joint committee
GOJ: Government of Japan

New buildings and facilities proposed for the U.S. Military in Japan are paid for by the GOJ and receive GOJ approval prior to construction. This is why the GOJ is involved in the approval process for new U.S. military construction. As a general rule, underground cultural surveys are done prior to construction; however, each installation approaches this differently, and in at least one instance (at Sasebo), the rule is not followed.

Construction Process Approval in Japan involves the city, the prefecture government, and the GOJ. (Prefecture government is similar to a U.S. state government.) Projects can and have been approved with provisions. An example is the Ikego Family Housing project, U.S. Naval Facility at Ikego, which was approved with 33 provisions. One of the provisions included the construction of a museum building, which the GOJ will ultimately use for artifact curation. The building is two years old, although it is not being used. Another provision included the archaeological excavation of land now used as a combination drainage-storm detention area and recreation area. The archaeological dig unearthed a vast number of artifacts that were later processed, packaged and stored in cave No. 440, located close to the Ikego housing project.

Some differences in U.S. mission understanding were observed during this phase of the inspection. For example, the environmental officer views the management of artifacts to be part of the U.S. mission and supports expenditures for cultural research activities, whereas the commander does not recognize this as a U.S. responsibility and directs environmental expenditures towards other types of projects. However, all agree and recognize the GOJ as the rightful owner of artifacts found on U.S. military facilities. In another instance a difference was observed with regard to the definition of significant historical properties and objects. U.S. laws and understandings generally recognize the period of 50 years as acceptance and proof of historical significance in contrast to

Japanese laws that recognize the period of 100 years as historically significant. As a result, misunderstandings are not uncommon with regard to the significance of properties and materials.

Building B-53, also referred to as the Masonic Lodge, is a candidate for demolition and also considered by some to be historically significant. The building is reported to have been constructed prior to 1869 (Cultural Resources Management Plan dated August 1998) and is possibly the oldest building at the Yokosuka Naval Complex. The building has a combination of decorative interior embellishments (in support of Masonic meetings) and a unique heavy timber roof framing system visible through the ceiling hatch.

During the inspection, we were asked to offer an opinion as to the potential use of building B-53 as a Base Cultural Heritage Center or as a candidate for immediate demolition. Although we minimally inspected and photographed the structure and site, time constraints did not allow for a thorough on-site evaluation to the extent necessary to satisfactorily respond to the queries regarding the ultimate disposition of the building. The potential for a HABS (Historical American Building Survey) study to be done and the potential for future use as a repository/exhibition space were briefly discussed but with no conclusions being reached. CEMVS personnel were asked to address this building in the final cultural resource report. Some pertinent facts are listed below for future reference.

- The structure appears to have been added to once and possibly twice over the years.

- The wood roof framing of the original structure is unique.

- A small Japanese garden, located to the rear of the building has potential for a thorough restoration and ultimate use for exhibition.

- The building is located atop a steep hill accessible to pedestrians (only) by climbing stone steps. Direct vehicle access to the building is presently non-existent and not reasonably feasible.

- The existing building contains a working kitchen and adjacent restrooms, which were added some time after the original building was constructed. The possible year for construction of the addition is 1918.

CEMVS personnel recommended that a HABS report be produced prior to demolition. The building has potential as a cultural resource for the base.

Masonic Lodge - Building B-53 - Exterior

Masonic Lodge - Building B-53 - Roof Framing

Cave - Transformer Station Room - Yokosuka, 7.8.99

A cave, identified as the transformer station room, and located behind the base recreational building, was inspected for use as a repository. Gaining entry to the facility was delayed and only after several attempts to open the main door did workers successfully enter at a remote location from the side. (At the same time, the main entrance door was unexpectedly opened from the exterior). This large cave has an interior concrete lining and a sprayed on cement type interior finish, which may contain asbestos. During the inspection, poor drainage was observed on both the interior and exterior sides of the entrance where water had formed a small pond.

Cave - Transformer Station Room Entrance

Upon entering the cave an unknown chemical odor was noticed. The interior wall and ceiling surfaces were moist in many locations as a result of water migrating through the concrete lining and finish. Mold growth and efflorescence were observed on some surfaces.

The size of the facility is perhaps two hundred feet deep. The entrance tunnel opens into a larger cavernous, bi level space and contains a smaller building enclosure and antiquated toilet facility on the upper level. The building enclosure, located in the rear of the cave, is equipped with ceiling lights, phone service, and mechanical ventilation. The wall and ceiling surfaces within the enclosure were dry and did not show signs of water infiltration.

The cave is used for housing mechanical and electrical equipment and for box storage. Some boxes appear to have moisture related damage and mold growth on the outside surfaces. The cave does not contain a fire detection system, automatic fire suppression system, or an intrusion detection system (IDS).

The cave encloses a vast amount of space, and its location on base allows for a fair amount of security. However, the disadvantages of this facility include potential environmental contamination (as evidenced from the odor), moisture infiltration, mold buildup, lack of fire detection/suppression systems, lack of an IDS, and the lack of acceptable emergency egress capability.

Cave - Transformer Station Room Interior

Cave - Transformer Station Room - Interior - Damaged Boxes

Cave 440: Ikego Family Housing Complex 7.8.99

Cave 440 currently serves as the temporary repository for a large collection of GOJ owned artifacts uncovered during the archaeological excavation of the drainage/storm detention area for the family housing complex. The collection was clean, labeled, packaged and boxed in an well-organized manner. It was reported that the collection would ultimately be housed at another location for long term curation.

Upon arrival at the facility, the entry doors were found secured with a common padlock. However, our key would not operate the lock. The lock, which our key was intended for, was lying on the entrance slab, having been cut from the door hasp. After some waiting and confusion, we were able to obtain a workable key. It was never fully explained why the original lock was forcibly removed from the door. However, this situation illustrates the importance of adequate security for a curation facility and the ease in which artifacts could have been lost at this repository.

The facility, formerly used for military purposes, consists of a man-made cave with double-lined concrete structures within. Between the first and second concrete linings, on each side, are trench drains, which intercept and divert water from the interior. The interior of the facility was found to be dry and without the presence of mold or

Cave 440 - Ikego Family Housing Complex - Entrance

moisture penetration. The finished floor material is wood, and the floor substrate is unknown although it is thought to be concrete. The facility has adequate lighting, although it is without a fire detection and suppression system and does not have an intrusion detection system (IDS). The facility is void of any mechanical temperature, ventilation, and relative humidity mechanical systems and relies on underground conditions for natural environmental control.

The distance from the entrance to the farthest point in the facility is, again, approximately two hundred feet. Because of the lack of a fire suppression system and a single entrance/exit, the facility is not adequate in terms of safe egress in the event of an emergency situation, such as fire.

Plastic, artifact bags, wood frame shelves, and a wood floor would all contribute to combustion in the event of a fire. In addition, approximately twenty five to thirty percent of the artifacts are organic in nature. Although these concerns are substantial, they could be partially mitigated by replacing the floor with concrete, and using metal shelving and metal storage cabinets to house archaeological materials.

Cave 440 - Ikego Family Housing Complex - Interior

U.S. Naval Air Facility, Atsugi
Atsugi Naval Air Station (NAS) **7.9.99**

Atsugi was originally developed as an Imperial Japanese Air Base. The facility is now used as a U.S. Naval Air Facility.

Contact Personnel: Mr. C.S. "Charlie" Sueyasu, Administrative Officer
Ms. Maria Espilondo-Murdock: Environmental Engineer - Cultural Resource Manager
Mr. Saburo Ogawa: Public Affairs Officer

Mr. Ogawa explained the history of the base and used books, brochures, and newspaper clippings pertaining to WWII to illustrate his presentation. Thereafter we visited a building referred to as the White House.

White House (Administration Bldg. 66): The building was constructed by the Japanese Imperial Navy prior to WWII and is now the Atsugi Command Headquarters for the U.S. Navy. The building is slated for demolition and replacement. The new building will house administrative offices and exhibition space. Exhibited materials will explain base history, with an emphasis on the time period immediately after WWII when the U.S. assumed occupancy. The Cultural Resource Management Plan (CRMP) for Atsugi, states that, "the building has been altered so much over the years it is difficult to recognize it as an older building." CEMVS personnel took no exception to the findings in the CRMP.

The design agent for the new facility is the U.S. Army Corps of Engineers, Japan District. CEMVS personnel questioned the design process for the facility but with no conclusions being reached.

Misawa NAF 7.12.99

Contact Personnel: Don Bosch - Director, Environmental Department
Yuko Miura- Secretary, Environmental Department
Captain Keith Denman, Commander
Takashi Nakashio, Chief, Social Education Section, Misawa City
Atsuko Izumiyama, Assistant Division Chief
Mr. Nagao, Archaeologist, Misawa City Museum of History Folk Customs

The base is managed by the U.S. Air Force, who is considered to be the landowner while the Navy is considered a tenant. As a result, the Air Force is responsible for cultural resource land management to include insuring that archaeological investigations are done prior to construction.

Archaeological excavations at the base are conducted by Japanese archaeologists through the local Board of Education (BoE). Excavations are only conducted when requested by the U.S. military.

Board of Education Archaeologist: All artifacts are intended for exhibit. Artifacts are taken to a museum where they are cleaned, conserved and exhibited. The current building was reported to be 'not good' because of a lack of space for research. The building was designed by way of a bid and competition process.

Presentation by AF Lt. Amy Komatsvzaki, Civil Environmental Engineer
And Greg Gagnuss, Environmental Flight Chief
The Japanese BoE does all archaeological work. The AF does not do curation. A U.S. Architect Engineer (AE) firm, Parsons Engineering, Inc. under contract, did the most recent Phase I survey work for the Air Force.

Summary for Misawa: The AF appears to be doing a good job regarding cultural resource management. Because the AF is the landholder, they are responsible for archaeological work being done at the proper time. Navy involvement is to coordinate with the AF and insure the archaeological work is done, when a Navy facility or program is affected.

U.S. Fleet Activities, Sasebo 7.14.99

Contact Personnel: Lt. CMDR. Mark R. Libonate, Director of Public Works
Mr. Bill Knaus, P.E. Engineering Director
Public Affairs Officer, Dave McClintock
Kazuaki Hirai, Community Relations Advisor/Official Interpreter
Jonathan Richardson, Library Technician

The commander expressed particular interest in the Headquarters building (former Japanese Imperial Navy Headquarters) and a group of buildings known as the Red Brick Warehouses. The commander indicated he needed assistance with issues involving the buildings, although he did not offer or have any specific direction in terms of how CEMVS might help.

Imperial Japanese Navy Headquarters Building Photograph

Headquarters Building. During the inspection the headquarters building was being rehabilitated following a damaging fire and was completely surrounded by a dust barrier and scaffolding. As a result, we were unable to photograph the building.

Red Brick Warehouses. The red brick warehouse buildings were constructed by the Japanese government between 1888 and the 1920's using brick imported from England. The buildings are constructed of brick bearing walls and wood frame floors and roof. The warehouse buildings are in very good condition, considering their age and one is being used as the fleet exchange. Others have received light to moderate alterations and are still being used for warehouse purposes. Lt. Cmdr Libonate reported that a local Sasebo city architectural preservation group, The Red Brick Detective Society, has publicly expressed support for the continued use and possible restoration of the red brick buildings. Many public comments made by the society have been favorable to the U.S. Navy, and as a result, Lt. Cmdr. Libonate would like to continue using the buildings. Nevertheless, funds do not exist for extensive renovation and, a practical use for all the warehouse buildings is unknown at this time.

Historical documentation pertaining to the facility has been collected and exhibited at a small base Library/Museum building. The small exhibit room contains display cases and numerous wall-hung, framed photographs. The museum also contains a photograph album filled with numerous informative photographs. The album is in immediate need of conservation.

Red Brick Warehouse Building serving a useful function as the Fleet Exchange

Sasebo Library & Museum Building

Sasebo Library & Museum Building - Display Cases. Album to left on table.

Mr. Bill Knauss, Engineering Director at Sasebo NAS, informed us that cultural resource properties found during construction operations are thrown in the trash. He related a story pertaining to a building construction project in which numerous dining plates and cups marked as the property of the Imperial Japanese Navy were found during excavation. As told by Mr. Knauss, construction was stopped for one day, and the local Japanese Government was contacted and informed of the discovery. According to Mr. Knauss, the local government was not interested in the artifacts, and the materials were subsequently thrown in the trash or scavenged the following day.

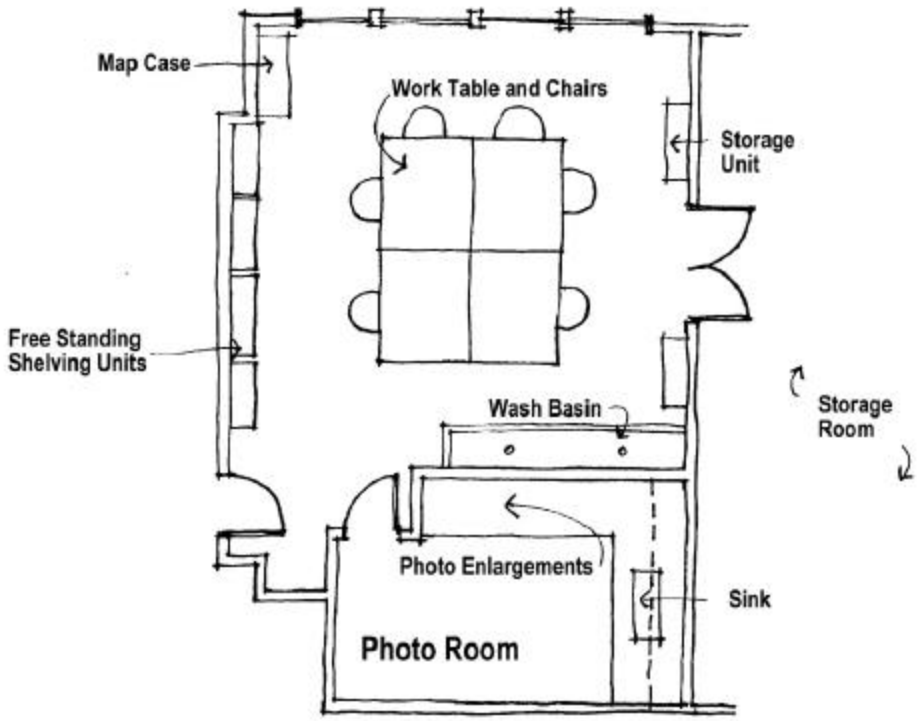
The Public Affairs Officer informed us that the local Board of Education is informed of construction projects and given an opportunity to do cultural surveys. We were also informed that the fire at the headquarters building destroyed numerous old photographs that illustrated many historically significant events at the Sasebo NAS. There is no single organization at the base that maintains or keeps a history of the facility. The widow of a former employee is thought to be the most knowledgeable person of base history. There was some discussion about the value of the widow's oral history and protecting the remaining historical photographs.

U.S. Fleet Activities, Okinawa, 7.15.99. Artifacts go to a museum that is operated by the Board of Education. Japanese laws prescribe how cultural resources are packaged and curated. A standard procedure has been developed that addresses the curation of artifacts; however, it is written in Japanese and will require translation to English for review by CEMVS.

Okinawa - Board of Education - Library and Museum Building

The library and museum building is a reinforced concrete and brick structure, constructed approximately fifteen years ago. The museum is located on the third floor and contains exhibit space, workroom, photographic enlargement room and a somewhat crowded storage room. The rooms contain numerous electrical 'add-ons' and are without an automatic fire suppression system. The Japanese Archaeologist whom we spoke to reported that more parking and research space is needed.

Okinawa **BOE Library and Museum Building**
7-16-99 **Building Age = 15 years**



Work Room
NTS

Accommodates cleaning, measuring, drawing, and recording.

Notes: **No fire suppression system. Wall mounted fire extinguishers in halls. Numerous electrical add-ons. Many wire extensions.**

Appendix 4

Architectural Assessment–Guam

Assessment and evaluation performed by Richard Siemons, NCARB

INTRODUCTION

3/27/02

At the request of the CINCPACFLT, the U.S. Army Corps of Engineers, St. Louis District MCX, assessed conditions at existing archaeological curation facilities in and around the city of Agana, Guam for potential use in the curation of U.S. Government owned archaeological collections. During the week of September 15, 1999, Rich Siemons, architect for the SLD, MCX inspected three facilities in Agana that were nominated for potential use. In each instance the facilities were reviewed for acceptability in accordance with the requirements for federal archaeological facilities as defined by 36 CFR Part 79. The three facilities were:

The Guam Museum adjunct building

The War in the Pacific Museum

The Navy Museum

The Guam Museum is composed of two separate facilities within the city of Agana. The most highly visible of the two is the Adelup Exhibit Facility located on a promontory above the Governor's Conference Area. This facility was the subject of a well-documented report titled, "Report of the Conservation Assessment of the Guam Museum," by Spencer Leineweber, FAIA, University of Hawaii Manoa, March 1998. After physical inspection of the building and grounds, and a review of the findings by Ms. Leineweber, the MCX takes no exception to the findings and refers interested parties to the 1998 report. The building was deemed unacceptable for use as a curation facility for federal archaeological collections, largely due to its location over a major fault line and relatively high likelihood of damage to a collection.

Adelup Exhibit Facility

Sited on a promontory the facility offers breathtaking views however, due to being located over a major fault line it was deemed unacceptable as a repository.

The second facility that makes up the Guam Museum is Barracks No. 6 at the Tiyan Military Relocations Area. This adjunct building initially served military needs for housing servicemen and women in transit to other overseas locations. The building was found to be structurally adequate and carefully managed by a conscientious curator. The War in the Pacific Museum building and T. Stell Newman Visitor Center is part of the War in the Pacific National Historical Park. The National Park Service operates the facility. At the time of inspection, the building was being leased from the Hiloda Corporation (located in Hong Kong) by the General Services Administration, who in-turn rented the building to the NPS. A NPS representative identified numerous problems associated with electrical power outages problems and heating, ventilating and air-conditioning concerns. The two-story reinforced concrete and CMU structure contains exhibit space on the first floor and administrative offices with some storage on the second floor.

The Navy Museum is located on NAS property in a WWII era building that is shared with a commercial warehouse enterprise. Exhibit space is well managed and cared for by a small but dedicated staff. The adjoining warehouse space is separated from the museum by a solid wall. Both the museum and warehouse enterprise share a common parking lot. The U.S. Navy does not fund this institution and it subsists solely on volunteer and outreach programs.

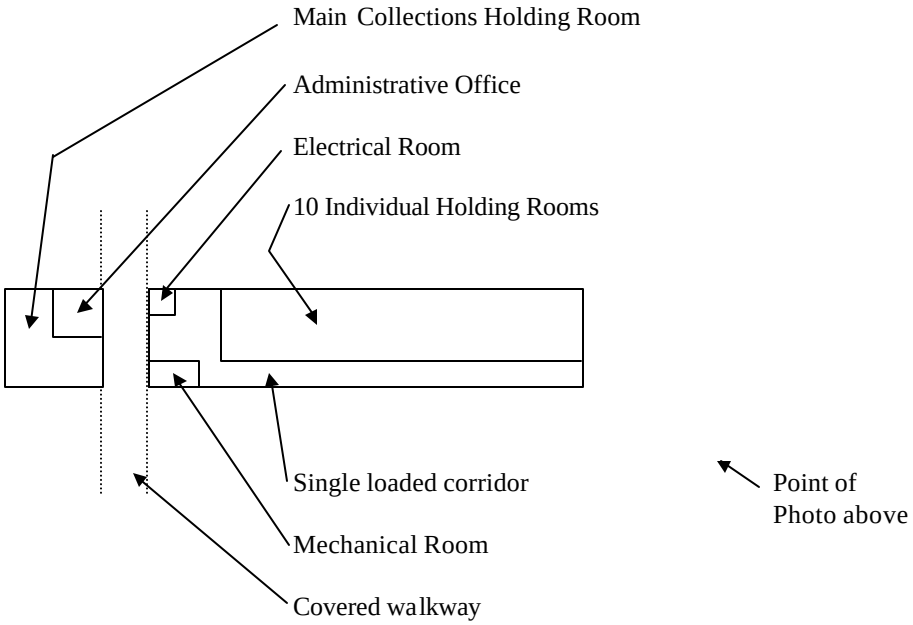
Guam Museum, Adelup Exhibit Facility, aka Adelup Governor's Complex. This building is located on a highly visible coastal position overlooking the ocean. Unfortunately, this visually striking building is unsuitable as a collections facility because it is located on a major geologic fault line and is exposed to high winds from typhoons. During our inspection, some damage to the building was visible in the form of cracks, leaking windows and rust. The building includes an exhibit room.

Guam Museum, Barracks No. 6. Located at the Tiyan Military Relocations compound this building was initially used as bachelor enlisted quarters for Navy servicemen. The two-story structure was built of reinforced concrete and designed to resist heavy winds and thunderous precipitation. It was reported that since it's initial construction, the building has withstood two major typhoons and one major earthquake (measured 8.3 on the Richter Scale) that occurred in the summer of 1993.

At the time of the inspection, the building was owned by the U. S. Government and slated to be deeded to the Government of Guam, which has been using the building as a collections holding facility since1997.

This former barracks at the Tiyan Military Relocations Area is structurally sound and is managed by a very conscientious curator.

Barracks No. 6



SCHEMATIC PLAN OF BARRACKS NO. 6
NTS

Since taking over management of Building No. 6, the Guam Museum and their able curator, (Mr. Tony Ramirez) have implemented a number of improvements to comply with standards for federal repositories, e.g. 36 CFR Part 79. For example, package unit air conditioners have been installed in individual holding rooms, an intrusion detection system installed on windows and exterior doors. Motion detectors are located in corridors. The building does not have an automatic fire suppression system although, portable fire extinguishers have been installed in each room and the building is equipped with smoke detectors, fire detectors and emergency lighting. An aggressive pest

management system was in-place during our inspection although termite damage to an unused unit kitchen was also reported to have occurred previously.

The building is in good condition and there was no evidence of a pending structural problem. General housekeeping and maintenance were being attended to on a regular basis. Flaking paint and worn carpet were found in one collections room. The building has a built-up-roof, in good condition and all roof penetrations and vents have screens to prevent insect infestation. Flashings, copings, aluminum gutters and downspouts were found in good condition.

Emergency management practices have been addressed and a fire evacuation plan was prepared and posted in a prominent location. One exterior door, at the end of a corridor, was unfortunately equipped with hardware and padlock for locking from the inside. The building is accessible to disabled users at the first floor only. An elevator does not exist.

War in the Pacific. This building was constructed in the mid-1973 of reinforced concrete and concrete masonry units. The two-story building has a small penthouse. All levels were found in a clean condition and the maintenance staff performed their duties in a conscientious manner. At the time of inspection, the first floor of the building was being used as exhibit space and the second floor, for administrative and storage purposes. The staff reported numerous problems with the heating, ventilation and air-conditioning system, mostly associated with power outages. An emergency generator is frequently used.

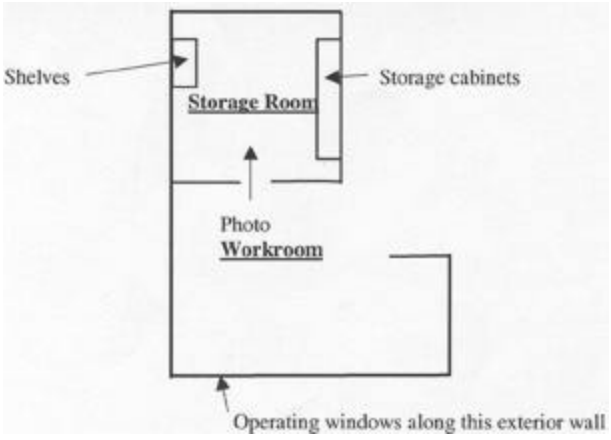
At the time of inspection, the building was owned by a Hong Kong corporation, leased to the GSA and in-turn rented by the NPS.

War in The Pacific Museum

The plenum above the ceiling redistributes air throughout the building and the fresh-air intake (installed with the initial system) has been disconnected. (This was probably an economy measure intended to save money associated with cooling outside air). Fortunately, artifact conservation activities that require chemical use do not take place in the building. On the second floor are rooms designated for collections storage and

workroom functions. The collections storage room measures 15'-6" x 33' and the dimensions of the workroom are 20'-4" x 24'-8". Both rooms contain air supply ducts but not a return air system. This workroom has operating windows that are occasionally opened for air circulation. The storage room is equipped with a portable dehumidifier and contains a temperature/humidity sensor. Air temperature fluctuations (over a 24-hour period) are generally within a 5 degree F range although occasionally this is exceeded and can vary by as much as 13.3 degrees F. Fluctuations in relative humidity are more noticeable and can vary by as much as 21%. Air circulation is marginal in both rooms.

War in the Pacific - Collections Holding Room



SCHEMATIC PLAN OF STORAGE AND WORKROOM – NTS

The building is without an automatic fire suppression system, or UV filters over the fluorescent light bulbs. The facility has ceiling mounted smoke detectors, security cameras and an intrusion detection system on all exterior door and windows. The fire alarm and security monitoring systems are both designed to alert a local security monitoring company in the case of an emergency. The second floor area can only be accessed by climbing stairs and the restroom does not comply with ADA standards. We found no signs of insect infestation.

The Navy Museum. The Navy Museum facility is located within a secure fenced yard on NAS property. The facility is operated by dedicated volunteers who maintain and exhibit a substantial collection of World War II era documents, photographs, uniforms, and weapons. An aggressive outreach program generates income.

The Navy Museum shares a building with a commercial business. Museum entrance is located to the left of palm tree. Business entrance is to the right.

The Navy Museum

The facility shares a building with a commercial business where the two organizations are separated by a common wall. If the space that is now devoted to the commercial business becomes available in the future, consideration should be given to investigating the feasibility of developing a curation facility at this location. Lead-based paint was reported to have been used on the interior of the business space.

Navy Museum - Exhibit Room

Summary: After the passage of federal regulation 36 CFR Part 79 (Curation of Federally-Owned and Administered Archeological Collections) in 1991, curators responsible for the management and preservation of collections at federal properties and repositories began evaluating how their organizations curate and conserve historic

materials and records. In many cases, agencies found they have not kept pace with the influx of their archaeological collections or with changes in industry standards and federally mandated requirements for care of historically significant materials.

Of the many repository requirements in the CFR, the most significant standards used to evaluate buildings identified in this report are:

- Meet local electrical, fire, building, health and safety codes
- Have an operational fire detection and suppression system
- Have an appropriate and operational intrusion detection and deterrent system

Few repository buildings constructed prior to1991 meet current standards and fewer still have the financial resources to make appropriate building modifications to bring them into compliance. After passage of the regulation, some institutions fell into a noncompliant category.

As a general rule the federal government is not required to adhere to local building codes when the property is federally owned. Rules of federal supremacy prevail most of the time. However, many federal agencies have adopted their own building regulations that in most instances mirror locally used and nationally recognized codes. In this way, life safety issues and federal supremacy standards are maintained.

Building codes do not require fire suppression systems for all buildings however, the CFR requires a fire suppression for all repositories. In addition to requiring a safe facility for people, the CFR addresses needs for a safe and secure building for all collections. In this regard the CFR goes beyond the requirement found in typical codes and agency regulations

The buildings and facilities reviewed in this report do not meet current federal guidelines for repositories because none has a fire suppression system although most have portable fire extinguishers. As a result, a blaze could be extinguished by a person on the scene however, a blaze in a remote location or one that occurs during off-hours, might not be extinguished and an entire collection destroyed.

At the Guam Museum Barracks No. 6, Mr. Tony Ramirez performed his curatorial duties with care and distinction. While his building does not have an automatic fire suppression system, and technically not in compliance with the CFR, it does have numerous individual rooms enclosed with fire resistant wall materials and the likelihood of a fire spreading from one room to another and destroying the entire collection, is small when compared to other facilities. The facility has minimal occupancy by people. In spite of the lack of an automatic fire suppression system, if the egress issue at this building were corrected, the facility would be a reasonably safe place to house a collection.

On the other hand the Adelup Exhibit building can never be considered a reasonable repository facility due to its location over a major geologic fault line.

Appendix 5

Architectural Assessment–Hawaii

Assessment and evaluation performed by Richard Siemons, NCARB

HAWAII

Properties and dates inspected:

Pacific Missile Range Facility (PMRF). Barking Sands Airfields (Sept. 8, 1999)

Building 416. (Pearl Harbor) (Sept. 9, 1999)

Administration Building No. 1 - Basement (Pearl Harbor) (Sept. 9, 1999)

International Archaeological Research Institute, Inc. (Contractor) (Sept. 10, 1999)

Marine Barracks Building No. 227 (Pearl Harbor) (Sept. 10, 1999)

Pacific Missile Range Facility. (PMRF)

General. The U.S. Army built the facility in mid-1940. In 1946, the U.S. Air Force assumed landholder responsibility then in 1964 the U.S. Navy assumed control.

The PMRF recognizes a responsibility to care for archaeological materials found during excavation. Duties are carried out with either Government personnel or through a contractor. It is a general policy that archaeological materials will be kept on the island upon which they are found. PMRF has no archaeological curation facilities.

There was discussion regarding a small amount of human remains being held at PMRF and the quantity (3 to 12 CF) does not justify the need for a separate building. Old sand dunes are assumed to be native Hawaiian burial grounds.

Meeting summary: A small amount of archaeological material exists at the PMRF and it should not be permanently removed from the island. Some materials have been curated at the Bishop Museum in Honolulu. Research is not in demand at the PMRF and few people know the materials exist. The island environment subjects building materials to continuous salt-water corrosion and this affects the type of housing for archaeological materials. Metal buildings and containers have been used in the past but they are temporary. The economics of constructing suitable facilities prevents alternative solutions.

Building No. 416. Pearl Harbor Naval Base.

Building No. 416 - Rear

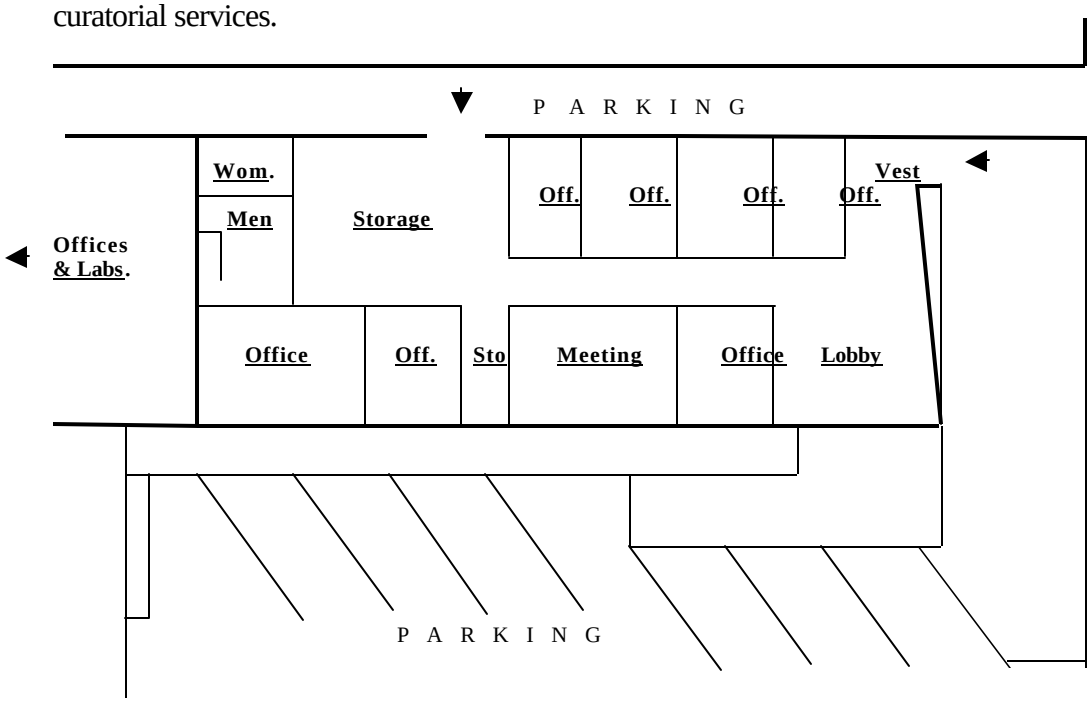
Building No. 416 was originally a magazine used for the storage of ammunition. The facility was constructed of reinforced concrete columns, CMU walls, concrete floors with a steel truss and wood deck roof system. During the time of inspection, space within the building was available for limited use as a curation facility.

Building No. 416 is structurally sound and appears to have been altered numerous times. The interior has an eight-foot wide, double loaded center corridor with individual adjacent rooms. Each room is equipped with a package air-conditioning unit, fluorescent ceiling lights and exterior walls furred out and finished.
In some cases, building improvements conflict with one another such as the fourteen roof skylights and acoustical tile ceiling. The ACT blocks the natural light afforded by the skylights.

At the time of inspection, the building was not equipped with an automatic fire suppression system although wall mounted fire extinguishers had been installed. The building is equipped with a freestanding (Duracool) walk-in environmental chamber that is appealing as a storage mechanism for some types of archaeological materials.

Judging from the appearance and age of the floor, it is likely that the tile surface is an asbestos containing material. It is recommended that the chemical composition of the floor tile be ascertained. The inspection also uncovered serious paint flaking on some wall surfaces. It is recommended that laboratory tests be done to determine if lead paint exists.

International Archaeological Research Institute, Inc. (IARI)
IARI is a private contractor who has completed archaeological work on U.S. Navy collections and has been considered a source for repository services. As a result, the corporation's building in Honolulu was reviewed as a potential source for future curatorial services.



Schematic Floor Plan - IARI
NTS

Front Side - IARI

The two-story IARI building was found clean and well-maintained. The first floor is dedicated to offices and general storage and the second floor is divided into and rented as residential apartments. The building is without a central heating/cooling system. Air-conditioning is supplied with package window units. The building does not have an automatic fire-extinguishing system although wall mounted portable fire extinguishers were present. The building was not equipped with fire or smoke alarms. Windows are fixed, non-operational and security screens supplement those on the side, not facing the street.

Masonry tile walls and fixed windows with security screens offer protection from break-ins. Package window air-conditioning units are used extensively to regulate temperature. The building does not have an intrusion detection system.

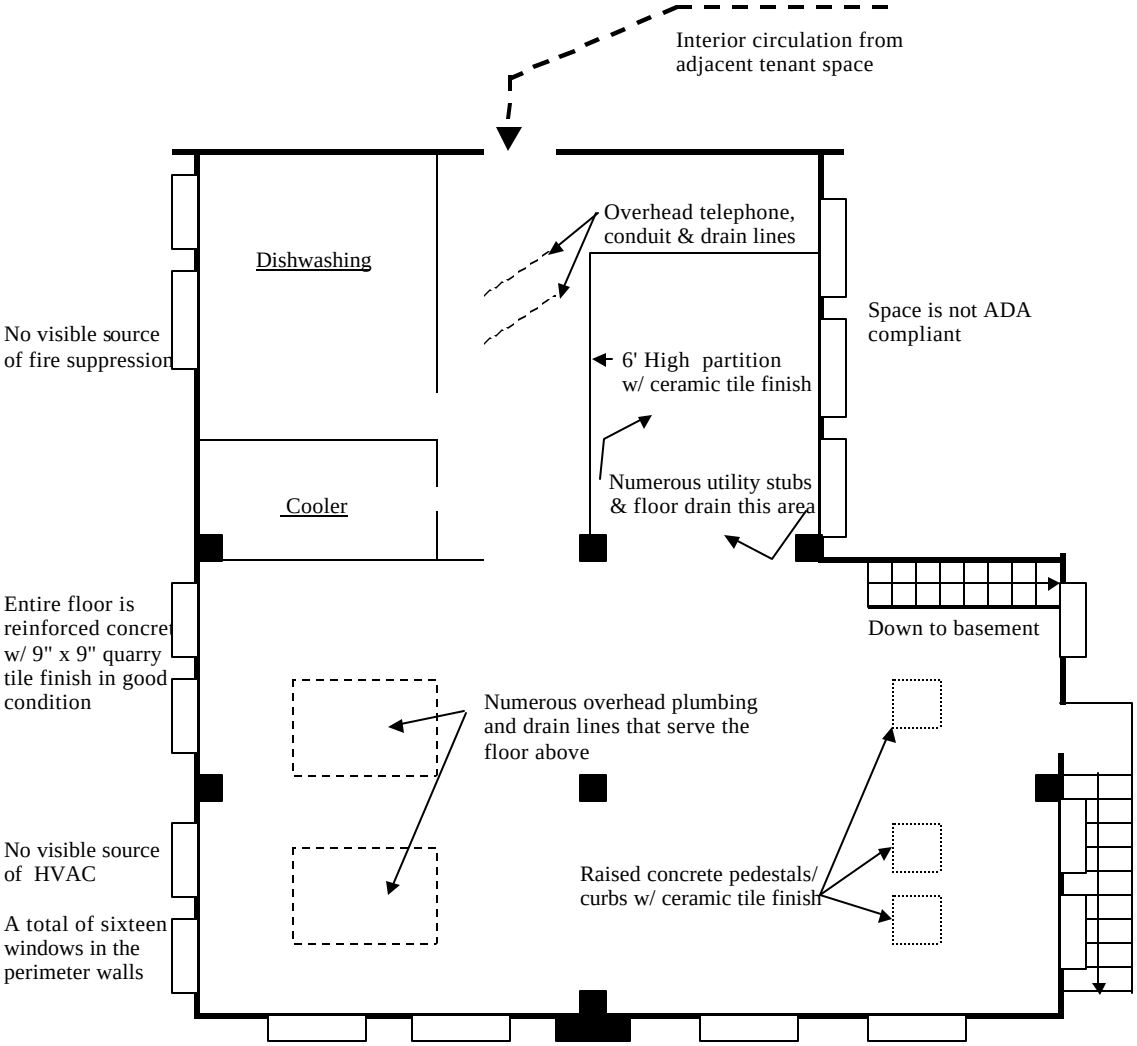
Side View - IARI

Limited storage space was available in the IARI facility.

Storage Room - IARI

Marine Barracks Building No. 221. Pearl Harbor Naval Base

This space is located on the second floor of a three story, reinforced concrete building. The building was reported as being listed on the National Register of Historic Places. The space is accessed directly by an exterior stair or by traveling through a corridor and another tenants space. There were no visible signs of any type of heating, ventilating and air-conditioning system in the room. The building is not equipped with an intrusion detection system or an automatic fire suppression system. Numerous drain lines serving the users in the building penetrate the ceiling. The room has many large windows that emit natural light harmful archaeological materials.



Second Floor Space - Building No. 221
NTS

The space on the second floor has numerous windows that emit light damaging to archaeological collections. Blocking up windows is out of the question due to the buildings contribution to the NRHP.

Building No. 221 - Front View

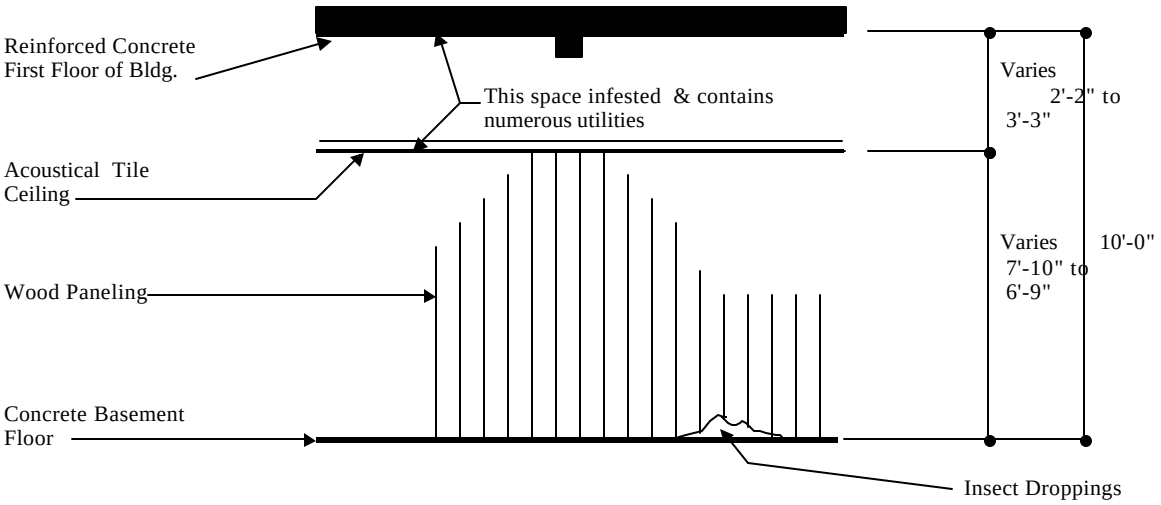
Large windows and numerous overhead utility lines are disadvantages to this room.

Building No. 221 - Second Floor Interior

Administration Building No. 1 (Basement). Pearl Harbor Naval Base

A plaque mounted on the face of this building identifies it as the location of significant code-breaking accomplishments during WW II. The basement space is accessed by either of two stair entrances from the exterior. During the inspection, the elevator was not accessible and an assumption made that it was inoperable.

The basement walls are reinforced concrete as is the structural ceiling above the suspended acoustical tile. Numerous insect wings and active spiders occupied the space between the concrete and ACT ceiling. The basement is without an automatic fire suppression system although, wall mounted portable extinguishers had been installed. Within this lower level are numerous individual rooms of varying sizes, many with wood paneling and acoustical tile ceilings. Insect droppings (believed to be termites) were visible on the floor below wood wall surfaces.



Section Thru Basement Space - Administration Building No. 1
NTS

HVAC needs are supplied with a forced air system however, during the inspection, the system did not operate and the air was noticeably stale. Numerous utility conduits including ductwork, telephone, water pipes, voice and data wiring that serve the floors above are located in the basement.

Summary: After the passage of federal regulation 36 CFR Part 79 (Curation of Federally-Owned and Administered Archeological Collections) in 1991, curators responsible for the management and preservation of collections at federal properties and repositories began evaluating how their organizations curate and conserve historic materials and records. In many cases, agencies found they have not kept pace with the influx of their archaeological collections or with changes in industry standards and federally mandated requirements for care of historically significant materials.

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Buildings surveyed in Hawaii do not meet federal repository requirements and none has an automatic fire suppression system. However, Administration Building No.1 has potential and is worth further comment. This space is located in the basement of a historically significant structure. Unfortunately, access to the space was limited to using the exterior stairs and even though the building is equipped with an elevator, it was not operational and consequently, the space is not accessible to people. The lack of an operating elevator is a severe drawback for the entire building but one that can be remedied.

Building No. 1 did not have an automatic fire suppression system in the basement and the presence of insect infestation was obvious. Given the historical significance of this building, the addition of sprinkler system would be a worthy investment for protection of the building as well as protection of an archaeological collection. The insect problem can be corrected with proper housekeeping and professional extermination.