



NAVAL AIR STATION NORTH ISLAND

Fact Sheet No. 12

April 2001

NAS North Island Restoration Advisory Board

The U.S. Navy sponsors regularly scheduled public meetings to discuss the Naval Air Station (NAS) North Island cleanup activities with the residents and other interested community members of Coronado and the surrounding area. The NAS North Island Restoration Advisory Board (RAB) serves as a focal point for the exchange of information about environmental restoration activities between the Navy and the local community. The RAB brings together community members who reflect diverse interests within the local community, providing opportunities for direct communication between the Navy's cleanup team and the regulatory agencies.

The NAS North Island RAB has been meeting regularly since its inception in 1994. Environmental support staff are available to provide information support to the RAB, so a technical background is not required for membership. Members are expected to serve as a liaison to the community and be available to meet with various community members and groups.

In 1997, NAS North Island and Naval Amphibious Base (NAB) Coronado were operationally consolidated into a single administrative command. Since the consolidation, NAB Coronado site cleanup activities have been incorporated into the NAS North Island RAB, thus creating one RAB for both bases. This fact sheet is one of several community outreach activities underway to reach an audience that is interested in environmental cleanup activities at both NAS North Island and NAB Coronado.

This fact sheet will tell you about . . .

- The investigation of hazardous waste contamination and environmental restoration at Naval Air Station (NAS) North Island
- The status of the Navy Installation Restoration Program for environmental cleanup at NAS North Island
- The role of the U.S. Navy and California Department of Toxic Substances Control
- The U.S. Navy's next step in cleanup activities
- How you can obtain more information and become more involved in Station cleanup activities

Introduction

This is one in a series of fact sheets to inform you of the investigation of hazardous waste contamination and environmental restoration at NAS North Island. NAS North Island is a 2,830-acre base located primarily within the city of Coronado on the San Diego Bay peninsula (see Figure 1). NAS North Island is surrounded by water on its northern, western, and southern borders. Land uses to the east of NAS North Island include Navy-related industries, residential, commercial, and other industrial uses.

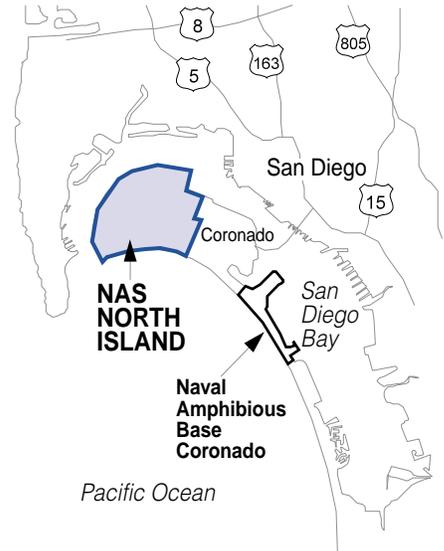


Figure 1 Vicinity Map

Currently, the RAB meets quarterly at the Coronado Library to review and comment on documents and plans relating to ongoing environmental cleanup projects at the Station.

All RAB meetings are open to the public. To find out more about becoming a Restoration Advisory Board member, or simply to hear about what's going on at NAS North Island and NAB Coronado, please attend the next RAB meeting.

Date: May 17, 2001

Time: 6:30 p.m.

Place: Winn Room

Coronado Public Library
640 Orange Avenue
Coronado, CA

The NAS North Island RAB is actively looking for new members. Membership priority is given to community members who are affected by site cleanup programs. A Restoration Advisory Board membership application is included with this fact sheet.

Site History

Since 1917, NAS North Island has supported aviation activities of the Naval Operating Forces. During the operation and maintenance of aircraft at NAS North Island, hazardous wastes have been generated. These wastes include paint, used oil, scrap metal, solvents, and contaminated rinsewater. Such wastes were commonly disposed of on-site or through the storm drain system to the San Diego Bay. In 1972, the Navy constructed a treatment plant to treat industrial wastewater before discharge to the sanitary sewer system.

Chemical wastes such as solvents, acids, and paint residues were previously disposed of at an on-site chemical waste disposal area until the mid-1970s. Trash and other solid wastes were disposed of at the Spanish Bight Landfill (until the mid-1940s) and at the golf course disposal area (until 1965). Solid and hazardous wastes are now managed through the Navy Public Works Center and disposed of at appropriate off-site disposal facilities.

These past hazardous waste disposal practices have resulted in areas of hazardous waste contamination at NAS North Island. The Navy is currently conducting investigations to determine the extent of contamination and evaluate various cleanup methods.

Cleanup Program

The U.S. Navy is investigating hazardous waste contamination at NAS North Island as part of its Installation Restoration Program (IR Program). The IR Program, initially established by the Department of Defense in 1980, is the Navy's environmental cleanup program that has been designed to meet the requirements of federal law. Through the IR Program, the Navy is evaluating and cleaning up disposal sites where past Navy practices have resulted in contamination of soil and/or groundwater. Figure 2 shows the steps in the Navy's IR Program.

Throughout the various steps of the IR Program, response actions such as the removal of wastes or other materials may be required at any time. These "removal actions," are necessary if it is determined that there is a potential threat to human health or the environment that needs to be promptly addressed.

At NAS North Island, the IR Program investigation is being conducted under the Corrective Action Order issued by the California Environmental Protection Agency, Department of Toxic Substances Control (DTSC) to the Navy Public Works Center on May 30, 1997. The requirements of the Corrective Action Order are implemented through the terms of the Federal Facility Site Remediation Agreement.

The purpose of the Federal Facility Site Remediation Agreement is to address releases of hazardous wastes at the Station. The primary objective of the IR Program and the Agreement is to protect human health and the environment by effective investigation and cleanup of hazardous waste sites.

In addition, NAS North Island and DTSC—with technical and regulatory support from another state agency, the California Regional Water Quality Control Board (RWQCB)—are committed to establishing an ongoing, two-way communication process that provides information to the public and responds to questions and concerns in an effective and timely manner.

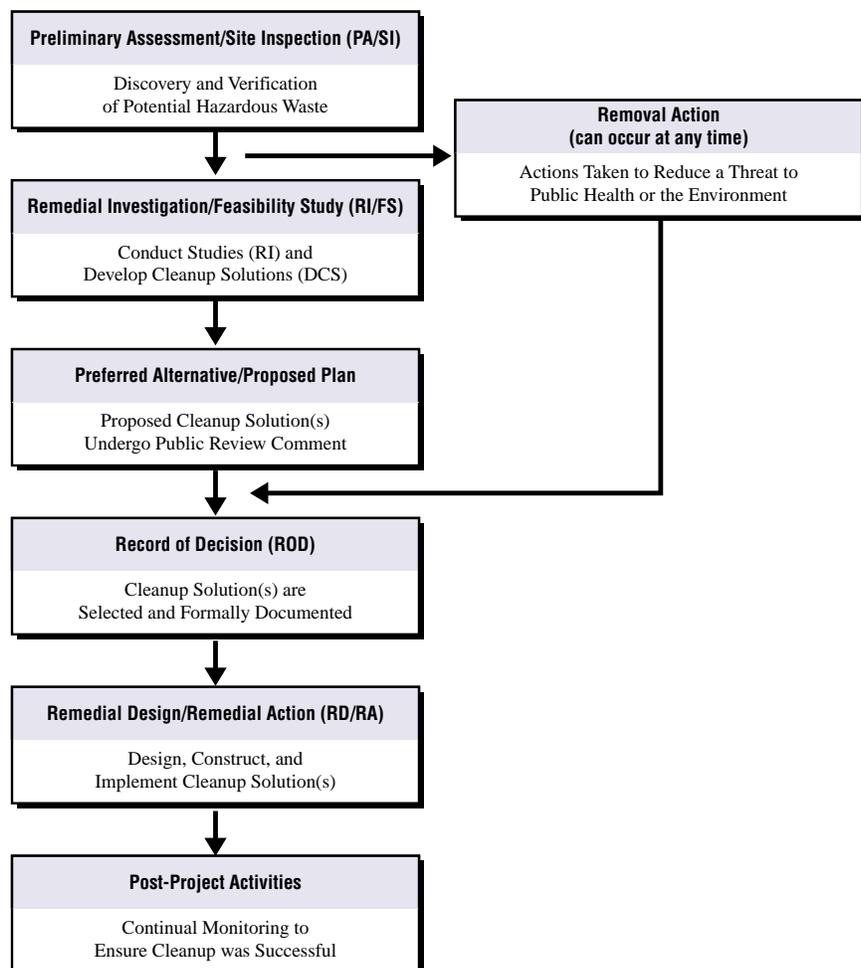


Figure 2 IR Program Process

IR Program Sites

The following are brief descriptions of the IR Program sites at NAS North Island. Specific site locations are shown on Figure 3. Refer to Figure 2 for explanation of the IR Program steps (presented in **bold type** below).

Site 1, Shoreline Sediments

Site 1 consists of shoreline sediments (solid materials such as sand and silt that have settled out) in the areas of storm drain outfalls that are known to have carried industrial hazardous wastes to the Pacific Ocean and San Diego Bay between 1917 and 1972. Wastes discharged through these outfalls included caustics, detergents, paint strippers and residues, metal cleaners, solvents, oils, and plating wastes.

Outfalls 1–8 and 16

A **Remedial Investigation** was performed in 1996 to study surface and subsurface sediment near these outfalls. The results were compared against several sets of data, including two National Oceanic and Atmospheric Administration sediment guidelines. Several chemicals were detected at elevated levels in the sediment samples. Human health risks at Outfall 16 are being reevaluated. Outfalls 1-8 have received no further action status.

Outfalls 9–15

A **Removal Action** was performed at Outfalls 9-15, which took advantage of military construction for the homeporting of the U.S.S. John C. Stennis, a NIMITZ-class aircraft carrier. The construction project consisted of dredging the carrier turning basin and constructing a 13.4-acre fill area behind a rock dike. The dredged-fill sediments from the turning basin, deemed unsuitable for ocean disposal, were placed within the fill area and on top of the Outfalls 9-15 sediment. This area became a “confined disposal facility.” The dredging and disposal were overseen by the U.S. Army Corps of Engineers and the California RWQCB, whose concern is preventing contaminants from reaching San Diego Bay. The confined disposal facility is currently being monitored per landfill post-closure monitoring requirements. Monitoring is a protec-

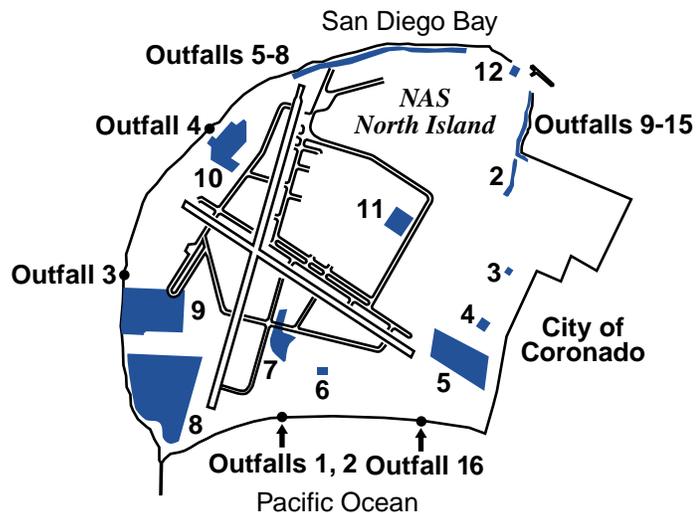


Figure 3 Site Locations at NAS North Island

- | | |
|--|---------------------------------------|
| 1. Shoreline Sediments (Outfalls 1-16) | 7. Building 39, Runoff Catchment Area |
| 2. Old Spanish Bight Landfill | 8. Weapons Center Bombing Range |
| 3. Golf Course Chemical Rinse Area | 9. Chemical Waste Disposal Area |
| 4. Public Works Salvage Yard | 10. DRMO Property Disposal Area |
| 5. Golf Course Garbage Disposal Area | 11. IWTP Storage Area |
| 6. Heritage Park Public Works Salvage Yard | 12. Buried Gasoline Supply Pipe Leak |

tive measure that alerts the Department of Defense and DTSC of contamination leaving the contaminated area.

Site 2, Old Spanish Bight Landfill

This site originally consisted of a disposal area on the slope of the bluff overlooking the northern end of the Spanish Bight. It operated from approximately 1917 to 1945, when it was replaced by the Golf Course Garbage Disposal Area (Site 5), at the southern end of the Spanish Bight. It is assumed that solid waste materials from the NAS North Island administrative and industrial operations, interspersed with small quantities of liquid hazardous wastes, were disposed of at this site. The hazardous materials may have included oils, solvents, acids, caustics, paints, metal sludges, various cleaning chemicals, and low-level radioactive-contaminated metals. A general trash incinerator operated at the south end of the site from approximately 1938 to the mid-1940s.

Various field investigations have been performed at Site 2. A **Site Inspection** was concluded in 1997. A **Removal Action** was completed to install a cap over exposed landfill ash and construct an engineered slope to

prevent erosion, surface runoff, and airborne emissions. This has reduced the risk to human health and the environment at this area of Site 2. In addition, a **Removal Action** was completed in 1998 to remove small areas of detected low-level radioactive material.

Site 3, Golf Course Chemical Rinse Area

This site is a 1-acre area located at the golf course grounds maintenance building. The building was used between 1961 and 1980 for disposal of rinsewater containing golf course chemicals such as diluted herbicides, pesticides, and fertilizers. A **Site Inspection** at Site 3 was concluded in 1997. Field investigations and soil sampling showed that low levels of chlorinated pesticides existed in the golf course grounds maintenance yard. Because the levels were below federal and state levels requiring cleanup, this site has been recommended for no further action.

Site 4, Public Works Salvage Yard

This site is adjacent to the golf course and north of the driving range. It covers approximately 3 acres of unpaved surface. From 1967 to 1976, equipment and materials associated with the

Public Works Department were stored in the area, including electrical transformers containing polychlorinated biphenyls (PCBs). In 1978, the transformers were removed and disposed of off-site. One of the transformers was reported to be leaking. In 1995, soils containing elevated levels of PCBs were removed and “solvent washed” to reduce PCBs to within regulatory levels. Soils with low levels of PCBs (levels not requiring removal) were covered with a layer of solvent-washed soil and capped in place with a 2-foot-thick layer of clean soil. Quarterly groundwater monitoring is being conducted to determine if contaminants are leaching from the soil to the groundwater.

Site 5, Golf Course Garbage Disposal Area

From the mid-1940s to 1965, this site operated as a solid waste disposal site at NAS North Island. In the 1940s, chemical wastes that were not discharged to the drain system or the chemical waste disposal area at Site 9 may have been disposed of at this landfill. Wastes reportedly were burned periodically for volume reduction. A maximum of 30 acres were involved in waste disposal operations. The site was minimally regraded in the early 1980s during construction of the present golf course. Hazardous materials reported to have been disposed of

at this site include oils, solvents, acids, caustics, paints, heavy metal sludges, asbestos, and sandblasting residue.

A **Remedial Investigation** was recently completed at Site 5. This site was divided into two areas for study. Unit 1 is the inactive landfill and Unit 2 is an area of soil and groundwater contaminated with volatile organic compounds (VOCs—chemicals that volatilize, or evaporate readily, in the air). Soil and groundwater at Unit 1 contained metals and low levels of PCBs. Unit 1 was recommended for groundwater monitoring and surface maintenance. DTSC is currently reviewing groundwater monitoring results to determine future cleanup action.

A study concerning the cleanup of the site through natural breakdown of chemical contaminants has been completed at Site 5, Unit 2. The study indicated that the contaminants of concern would naturally degrade, but removal of contaminants in higher concentrations would speed the process. This removal is currently being conducted through *in situ* chemical oxidation.

Site 6, Seaview Heritage Public Works Salvage Yard

Starting in the 1940s, this site was used by the Public Works Center to store excess materials from construction projects, including electrical transformers containing PCBs. In 1965, storage at Site 6 was terminated. Fill material was imported, and sod was planted in association with development of recreation activities and the present-day Seaview Heritage Park. A **Remedial Investigation** was conducted in 1995. Soil and groundwater sampling were performed to determine PCB concentrations at this site. A **Removal Action** in 1995 excavated PCB-contaminated soil and transported it to an off-site disposal facility. Additional clean fill was imported and sod re-planted. The site was restored and is used as a park. No further action is recommended for Site 6.

Site 7, Building 39 Runoff Catchment Area

This site consists of approximately 15 to 20 acres surrounding Building 39

in the southwest portion of the Station. Past waste disposal practices included spillage as well as surface disposal of waste oils and fluids, sandblast grit, solvents, detergents, and other cleaning agents. Fire-fighting training was also conducted at Site 7 using flammable liquids, typically spent jet fuel. Training was confined to a concrete pad and in 1980 additional paving was provided around the area to control runoff.

A **Site Inspection** was concluded in 1997. Contaminants of concern included petroleum and chlorinated hydrocarbons in the soil, sediment and groundwater, and heavy metals in the soil. The levels of contaminants detected, however, were below federal and state levels requiring cleanup. Sandblast grit was removed as a general house-keeping measure, and Site 7 has been recommended for no further action.

Site 8, Weapons Center Bombing Range

This site is within the restricted Weapons Center located at the southwest corner of NAS North Island. From 1917 to 1927, prior to Navy acquisition of this property, the Army used the area as an artillery and aerial bombing range. The quantity of unexploded ordnance is unknown; however, no reportable incidents from buried ordnance have ever been documented. Ordnance sweeps were conducted at Site 8 prior to construction activities. The potential threat to human health and the environment was determined to be minimal, due to the nature of the material, and its location in a high-security area with restricted access. Because Site 8 is within a restricted, active weapons center, investigations are deferred until the weapons center becomes inactive and investigations/remedial actions are warranted. At that time, institutional controls will be evaluated.

Site 9, Chemical Waste Disposal Area

This site is a 38-acre parcel that operated as a waste disposal area from the 1940s to the late 1970s. It consisted of several waste disposal operations: a shallow pit used for disposal of liquid wastes from portable tanks; four parallel trenches, each containing different types of wastes (solvents,

Public Involvement

The public has the opportunity and is invited to participate in the IR Program process at NAS North Island. The RAB (see front page) is one vehicle for public involvement. The RAB has provided input on actions at NAS North Island IR Program Sites 1, 2, 4, 5, 6, 9, 10, and 11. The 1999 Community Relations Plan for NAS North Island guides the public involvement activities of the program and establishes two-way communication between the Navy and the community surrounding NAS North Island regarding environmental cleanup activities. The Plan will be updated in 2002. There will be additional opportunities for the public's participation in community interviews that will be conducted to help develop the updated Plan. Please plan to attend the May 17, 2001 RAB meeting for NAS North Island for further information (see cover page).

caustics, acids, and semisynthetics consisting of ceramic and metallic compounds); a low-level radioactive material storage yard; and a large unimproved area used for burying drums containing unidentified wastes.

A **Remedial Investigation** is being conducted to specifically identify contaminated areas at Site 9. A **Removal Action** was completed in 1998 for a small area containing low-level radioactive materials. An additional **Removal Action** is being conducted to reduce the levels of VOCs in the soil by extracting vapors from the soil and treating them on site.

Site 10, Defense Reutilization and Marketing Office (DRMO) Property Disposal Area

Since the 1940s, surplus materials related to aircraft operation and maintenance activities (e.g., electrical equipment and communication gear) were hand sorted and separated at Site 10. Aircraft were dismantled to salvage reusable parts, and the remaining parts were reduced to scrap for sale off-site. Prior to the 1970s, an unpaved area within Site 10 was used for destruction of classified electronic components, storage of scrap metals, and draining of residual fluids from electrical transformers. From 1943 through the mid-1960s, a smelter was in operation at Site 10 to melt aluminum scrap. Slag generated by the smelter was disposed of at the shoreline near the salvage yard.

Results of a recent **Remedial Investigation** at Site 10 showed PCBs and heavy metals contamination in soils and local groundwater. Further studies detected low-level radioactivity of aircraft debris occurring within the PCB-contaminated soils. In 1995, a **Time-Critical Removal Action** was conducted to excavate PCB-contaminated soils. The PCB-contaminated soils and radioactive soils were segregated and both containerized and taken off-site for disposal. Also in 1995, smelter slag deposited along the shoreline near Site 10 was found to exhibit low-level radioactivity. An **Emergency Removal Action** resulted in the excavation of 20,000 cubic feet of slag and sediment, which was containerized in bins and disposed of at a

low-level radioactive waste repository. A **Remedial Investigation Report** is being prepared and scheduled for completion in July 2001.

Site 11, Industrial Waste Treatment Plant (IWTP) Complex

At the IWTP, constructed in 1972, industrial waste surface impoundments were used as part of the waste treatment plant. Paints, solvents, oils, chromic acids, and other wastes were placed in the impoundments. The use of surface impoundments was phased out between 1987 and 1988 in compliance with the California Toxic Pits Cleanup Act because they did not meet current standards. Four additional surface impoundments at the Oily Waste Treatment Plant (OWTP), adjacent to the IWTP, are also no longer in use.

A **Site Characterization Report** and **Engineering Feasibility Study** were completed in 1995 and 1997, respectively. Results generally suggested that soils and groundwater beneath the IWTP and OWTP impoundments were contaminated with VOCs and metals. Consequently, a **Non-Time-Critical Removal Action** involving soil vapor extraction and air sparging to remove VOCs from the soil was completed at Site 11. An estimated 4,500 pounds of contaminants were removed from the vadose zone, and air sparging was shown to be effective in reducing VOC concentrations in the groundwater. A baseline human health risk assessment was completed to assess potential impacts from site contaminants on human health if no remedial actions are taken.

A **Focused Feasibility Study/Corrective Measures Study** is being developed for the site and addresses the soil and groundwater contamination due to past use of the IWTP and OWTP facilities. A modified cap to comply with Resource Conservation & Recovery Act regulations is planned for the site.

Site 12, Buried Gasoline Supply Pipe Leak Area

In the 1950s, a buried pipeline supplied a fueling station that consisted of four aboveground tanks and four underground tanks. A major leak in the pipeline was discovered when high tide brought gasoline to the surface, releasing hydrocarbon fumes. Recovery wells were installed to pump out the gasoline. A cleanup activity was completed in the 1950s. In 1995, DTSC relinquished regulatory control of Site 12 because it did not have regulatory authority over petroleum products. In 1996, the California RWQCB announced that no further action was necessary. A **Site Inspection** was concluded in 1997. Site 12 is now used as a parking lot.

Information Repository

An information repository—a publicly accessible location where IR Program-related documents and information are available—was established in 1994 for NAS North Island at the Coronado Public Library, located at 640 Orange Avenue in the City of Coronado. The library hours are as follows:

Monday-Thursday, 10 a.m.-9 p.m.

Friday-Saturday: 10 a.m.-6 p.m.

Sunday: 1 p.m.-5 p.m.

For More Information

For more information on the Installation Restoration Program underway at NAS North Island, or to find out more about the Restoration Advisory Board, please contact:

John Locke
Navy Region Southwest
Environmental Department—N4512.JL
33000 Nixie Way, Bldg. 50, Suite 326
San Diego, CA 92147-5110
(619) 524-6405
e-mail: locke.john.b@asw.cnrsw.navy.mil

Marsha Mingay
Public Participation Supervisor
Department of Toxic Substances Control
5796 Corporate Avenue
Cypress, CA 90630
(714) 484-5416
e-mail: mmingay@dtsc.ca.gov

Also visit the Navy's Web Sites, <http://nel.navy.mil> and <http://www.efdsw.navfac.navy.mil/pages/Envrnmntl.htm>

John Locke
Navy Region Southwest
Environmental Department–N4512.JL
33000 Nixie Way, Bldg. 50, Suite 326
San Diego, CA 92147-5110

Inside:

*Information on Restoration Advisory Board Meeting
May 17, 2001, 6:30 p.m.
Winn Room, Coronado Public Library, Coronado, CA*



MAILING LIST

If you did not receive this fact sheet in the mail, then you are not on our mailing list. If you wish to be placed on the mailing list, please complete this form, clip, and mail to: **John Locke, Navy Region Southwest, Environmental Department–N4512.JL, 33000 Nixie Way, Bldg. 50, Suite 326, San Diego, CA 92147-5110, (619) 524-6405, e-mail: locke.john.b@asw.cnrsw.navy.mil**

Name _____

City _____ State _____ Zip _____

Phone () _____

Affiliation (optional) _____

E-mail address _____