



## **TABLES**



*Department of the Navy BRAC Program Management Office*

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**Table 4-1. Active, Closed, No Further Action, and Transferred IR Sites**

IRP Site ID	IR Site Name	Dates of Operation	Historic Description	Contaminants of Concern	Current Phase of Remedial or Corrective Action
<b>SWMU SITES IN THE IRP</b>					
SWMU 2	Building IA-7 Burn Pit	1940s to present	Former burn pit (1969-1973) where fuel oil and napalm were burned in a shallow pit area located south of Building IA-7 as part of fire training operations. Currently the only fire station in operation within the Inland Area.	Volatiles, petroleum hydrocarbons	In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is planned.
SWMU 5	Buildings IA-12 & 269	Building IA-12: 1940s to 1997 Building 269: 1976 to 1995	Building IA-12 housed the locomotive repair shop (heavy equipment shop) and a 6,000-gallon waste oil UST (removed 11/04/93) that was used to store waste oil generated from locomotives. Building 269 is a covered, concrete pad and sump that was used for railcar steam cleaning.	Volatiles, petroleum hydrocarbons	In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is planned.
SWMU 7	Buildings IA-15 & IA-16	Building IA-15: mid-1940s to late 1990s Building IA-16: 1940s to 1970s	Building IA-15 was used as an automotive repair shop, metals shop, machine shop, weld shop, forge shop, offices, and tool storage. Building IA-16 was used as a paint shop, where both oil- and lead-based paints were applied.	Volatiles, petroleum hydrocarbons	In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is planned.
SWMU 18	Building IA-51	1940s to 1970s	Steam-cleaning facility for locomotives, trucks, and other vehicles.	Volatiles, petroleum hydrocarbons	In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is planned.



Table 4-1. Active, Closed, No Further Action, and Transferred IR Sites

IRP Site ID	IR Site Name	Dates of Operation	Historic Description	Contaminants of Concern	Current Phase of Remedial or Corrective Action
<b>ACTIVE IR SITES</b>					
Site 13	Burn Area	1940s to 1974	Used for the destruction of live ordnance by open burning in large, excavated trenches and natural gullies. The area was also briefly used as a firefighting training area, where napalm and fuel oil were ignited and then extinguished by firefighters. The area also may have been used for target practice using .50 caliber machine guns.	Volatiles, metals, petroleum hydrocarbons, perchlorate	The RI Phase has been re-initiated for groundwater sampling for perchlorate. A final SAP for groundwater sampling was prepared April 17, 2005. Two out of four quarters of groundwater sampling has been completed with perchlorate concentrations <1.0 µg/L. Two additional rounds of perchlorate analysis are required. This site is also being evaluated under the MMRP (see Section 4.5.8).
Site 22	Building 7SH5 and Magazine Area	1957 to mid-1990s	From 1957 through the mid-1970s, Building 7SH5 was used as an environmental and vibration testing area for missile components. From the mid-1970s through the mid-1990s, maintenance operations were conducted on the site, including paint stripping, cleaning, and painting missile wings and fins. The Magazine Area is currently being investigated for arsenic contamination. The Magazine Area is composed of 530 acres of grasslands that includes an array of more than 250 bunkers (or magazines) built in 1944 that the Navy formerly used to store munitions. Herbicides containing arsenic were thought to have been applied around the Magazine Area to kill vegetation.	Volatiles, metals (especially arsenic in the Magazine Area), petroleum hydrocarbons	A Final SAP dated November 2, 2005 was prepared for arsenic investigation at Seal Creek and the Southwest Fence Line around the Magazine Area (Tetra Tech 2005). Field work was completed in December 2005. A draft RI is scheduled for June 2006.



**Table 4-1. Active, Closed, No Further Action, and Transferred IR Sites**

IRP Site ID	IR Site Name	Dates of Operation	Historic Description	Contaminants of Concern	Current Phase of Remedial or Corrective Action
Site 27	Buildings IA-20 & IA-36	1964 to mid-1990s	<p>Building IA-20 housed a chemical laboratory and materials testing laboratory. The laboratory was used primarily to test oils and hydraulic fluids and to develop new weapons test methods. The materials testing laboratory evaluated the structural integrity and dynamics of ordnance casings, shells, and missiles.</p> <p>Building IA-36 is a former boiler house and the location of a 10,000-gallon diesel UST that was removed on April 15, 1997.</p>	Oils, volatile and semi-volatile organic compounds, pesticides (chlordane) used for termite control	Site 27 is in the pre-ROD phase. Draft ROD expected July 2006.
Site 29	Building IA-25 SWMU 13	Mid-1940s to mid-1980s	<p>Building IA-25 was reportedly used to manufacture and test military explosives. The building also included a paint spray booth for repainting components. The building was renovated significantly for rework of explosives in the late 1970s.</p> <p>SWMU 13 consists of a septic tank, storm drain outfall, sanitary sewer line, and leach field northeast of Building IA-25.</p>	Metals, pesticides, semi-volatiles	Draft FS was completed in 2003 and will be updated to include groundwater contamination issue (Tetra Tech 2003c). RI for groundwater will be initiated based on FS findings.
<b>CLOSED IR SITE</b>					
Site 17	Building IA-24	1950s to 1988	Buildings IA-24, IA-24A, and IA-24B were used for forklift maintenance and battery recharging. An asphalt parking lot for forklift storage, located next to IA-24, was used as a surface to steam-clean forklifts and batteries in order to remove oil and grease. A sump for disposal of battery acid was also rumored to be present in the area. Two diesel USTs were formerly located at the site; both tanks were removed and replaced with aboveground tanks in 1997.	Metals, petroleum hydrocarbons	The Site 17 NFA ROD was signed by the Navy (June 15, 2005), EPA (September 30, 2005), DTSC (January 24, 2006), and RWQCB (February 1, 2006). This site will be moved to the inactive IR site list.



Table 4-1. Active, Closed, No Further Action, and Transferred IR Sites

IRP Site ID	IR Site Name	Dates of Operation	Historic Description	Contaminants of Concern	Current Phase of Remedial or Corrective Action
<b>NO FURTHER ACTION IR SITES</b>					
Site 14	Kinne Boulevard Wells	1928 to 1960s	A well bore at one of the former well sites yielded a strong chemical odor. No samples were analyzed and no attempt was made to check the two other wells. Based upon the chemical odor, it was decided that these wells were unusable. The strong odor may have been attributable to the disposal of contaminated fuel oil and other chemicals when the wells were originally closed. The wells were investigated and determined to not require remedial action.	Petroleum hydrocarbons	The wells were closed and sealed in accordance with CCCHSD requirements (PRC 1995). The Navy submitted a letter to the DTSC on July 7, 1995 requesting site closure (DoN 1995). The request for closure has not received regulatory concurrence (CDM 2003).
Site 15	Railroad Classification Yard	Unknown	Two unbroken vials of the insecticide/rodenticide methyl bromide were found in 1982 along the embankment of the railroad classification yard (Ecology and Environment 1983). The vials were removed and disposed. The vials had been used starting in 1954 to control ground squirrel populations.	Methyl bromide	Determination of NFA in IAS (Ecology and Environment 1982). No regulatory concurrence received.
Site 20	Old Homestead, Seal Creek	Unknown	A gully filled with debris was found during the 1982 IAS located on the banks of Seal Creek (Mt. Diablo Creek). The IAS team determined that no hazardous waste had been disposed of in this area.	Debris	Determination of NFA in IAS (Ecology and Environment 1982). No regulatory concurrence received.
<b>SITES MOVED TO THE MMRP</b>					
Site 16	Black Pit at Red Rock	Unknown	A pit approximately 15 ft-long, 10 ft-wide, and 5-ft deep was observed during the 1982 IAS (Ecology and Environment 1983) between the Red Rock Disposal Area and a clean fill borrow area. The color of the soil in the pit was very deep black. Analysis of the site found chemicals that were indicative of the use of the site for disposal of wastes generated at NAVWPNSTA Seal Beach Det Concord.	Non-munitions trash and debris, possible ordnance disposal	This site is currently being evaluated under the MMRP (see Section 4.5.3).



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IRP Site ID	IR Site Name	Dates of Operation	Historic Description	Contaminants of Concern	Current Phase of Remedial or Corrective Action
Site 19	Seal Creek	1950s to 1983	Although there was no evidence of direct discharge of wastes to Seal Creek (Mt. Diablo Creek), trash and rubble disposal at the creek's bank was noted during the IAS in 1982 (Ecology and Environment 1983)	Debris and miscellaneous inert solid wastes. Explosives and explosives residues.	This site is currently being evaluated under the MMRP (see Section 4.5.4).
Site 23A	Inland Area Explosive Ordnance Disposal	1940s to 1959	The EOD conducted controlled explosions in the hills behind Building 5AT58.	Explosives and explosives residues	This site is currently being evaluated under the MMRP (see Section 4.5.6).
Site 23B	Eagles Nest EOD	1959 to 1970s	This area, located near a eucalyptus grove, was used for approximately 12 years for controlled explosions.	Explosives and explosives residues	This site is currently being evaluated under the MMRP (see Section 4.5.7).
Site 24B	Aircraft Firing Range	1944 to 1946	Building IA-56 at the old airfield was used as an aircraft target range for the bore sighting of wing guns (Ecology and Environment 1983).	Explosives and explosives residues	This site, referred to as the Bore Sighting Range, is currently being evaluated under the MMRP (see Section 4.5.9).
<b>SITE MOVED TO THE UST PROGRAM</b>					
Site 21	Building 97 Fuel Tanks	Tanks removed 12/9/90	JP-5 rocket fuel was stored in underground tanks at Building 97. There was no indication of that any fuel spills or leaks had ever occurred.	Petroleum hydrocarbons	Transferred to UST Program (see Section 4.4.1). CCCHSD determination of NFA for USTs 97 on 02/21/95 (CCCHSD 1995b). RWQCB review and closure still required.
<b>SITE REQUIRING A FUTURE PA</b>					
Site 24A	Pistol Firing Range	1950s to 2005	Site 24A is a former pistol range located near Building IA-57 In approximately 1978, high lead levels were observed in soil. The lead-containing berm was re-capped to cover the lead. The type of metallic lead was not thought to cause a threat to groundwater (Ecology and Environment 1983). Ammunition found at the site ranged from small arms caliber to .50-caliber.	Lead	The site was an active pistol range until January 2005. The operational closure of the pistol range is pending.



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Notes:

CCCHSD = Contra Costa County Health Services Department  
DTSC = Department of Toxic Substance Control  
EPA = Environmental Protection Agency  
EOD = Explosives Ordinance Detail  
FS = Feasibility study  
IAS = Initial Assessment Study  
IR = Installation Restoration  
IRP = Installation Restoration Program  
µg/L = micrograms per liter

MMRP = Military Munitions Response Program  
NAVWPNSTA = Naval Weapons Station  
NFA = No Further Action  
RI = Remedial Investigation  
ROD = Record of Decision  
RWQCB = Regional Water Quality Control Board  
SAP = Sampling and Analysis Plan  
SWMU = Solid Waste Management Unit  
UST = Underground Storage Tank



Table 4-2. Solid Waste Management Units

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
1	Administrative Area Bldg IA-6 (Boiler House demolished in 1997)	A 1987 release of 1,900 gallons of diesel from overflowing UST IA-6 resulting in contaminated soils and groundwater. A 1989 hydrogeologic investigation found free-floating petroleum product and indicated need for oil/water separator and groundwater treatment. A 1996 soil excavation and recommendation of groundwater monitoring. The 1997 RFA Confirmation Study reported no evidence of any nonpetroleum hazardous constituents in soil. VOCs detected in groundwater not attributable to site.	1992 RFA High Priority recommendation for RFI. 1997 RFA Confirmation Study: Petroleum hydrocarbon contamination addressed under UST Program. 1997 RFA Confirmation Study: Recommended groundwater investigation under CERCLA (IR Program) for SWMUs 2, 5, 7, and 18 to determine source of VOCs detected in groundwater at SWMU 1. SCAPS investigation of UST IA-6 recommended NFA (DoN 2005a).	No regulatory concurrence received.
2	Administrative Area Bldgs IA-7, 114, 416 (Shallow Burn Pit South of the Firehouse)	Fire Station (IA-7), fire station storage (114 and 416). The 1992 RFA documented release of napalm burning and residue dumping into nearby creek. The 1997 RFA Confirmation Study reported hydrocarbons in soils and groundwater, but did not suspect site soils to be source of groundwater contamination.	1992 RFA High Priority recommendation for RFI. 1997 RFA Confirmation Study: Recommended groundwater investigation under CERCLA (IR Program). Currently in the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is also scheduled.	Investigation under IRP in progress.



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<b>SWMU</b>	<b>Location</b>	<b>Environmental Findings</b>	<b>Status</b>	<b>Regulatory Concurrence Received</b>
3	Administrative Area Bldg IA-8 (Explosives Ordnance Disposal Detachment)	The 1992 RFA noted occasional painting activities at the facility generated used paint spray cans.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
4	Administrative Area Bldg IA-10 (Print Shop)	The 1992 RFA reported that the print shop used Activator in copy machine that became hazardous waste (DTSC 1992). No history of release at site (DTSC 1992).	1992 RFA: NFA recommended. CCCHSD: NFA for UST IA-10	NFA recommended by DTSC (DTSC 1992).  CCCHSD – NFA for UST IA-10 on 03/18/97 (CCCHSD 1997g).
5	Administrative Area Bldgs IA-12 and 269 (Locomotive Repair Shop)	Locomotive and railroad maintenance building (IA-12) and locomotive steam cleaning pad (269). The 1992 RFA recommended further action because of visible oil and/or hazardous waste stains. The 1997 RFA Confirmation Study detected hydrocarbons in sporadic soil samples, and hydrocarbons and low concentrations of VOCs in groundwater.	1992 RFA Medium Priority recommendation for RFI. 1997 RFA Confirmation Study: Recommended groundwater investigation under CERCLA (IR Program).  In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is also scheduled.	Investigation under IRP in progress.



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<b>SWMU</b>	<b>Location</b>	<b>Environmental Findings</b>	<b>Status</b>	<b>Regulatory Concurrence Received</b>
6	Administrative Area Bldg IA-15 (Automotive Vehicle Maintenance Division)	The 1992 RFA noted: building includes paint, auto, machine, electrical, and pest control shops. Hazardous waste generated by paint shop includes solvents, used spray cans and paint. Auto shop serves as hazardous waste satellite accumulation point for oil filters, oil, antifreeze, and paint spray cans. Machine shop is accumulation point for used paint spray cans and rags. Hazardous waste generated by electrical shop includes solvents and lubricants. Pest control shop used methyl bromide and poison bait in the 1960s and 1970s to control rodents.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
7	Administrative Area Bldgs 189 and IA-16 (Public Works Shop)	Paint shop and vehicle dispatch building (IA-16) and paint storage building (189). The 1992 RFA recommended further action because of small spills related to paint operations and because facility serves as a satellite accumulation area for waste paints and thinners. The 1997 RFA Confirmation Study reported hydrocarbon and VOC contamination in groundwater (not related to paint handling operations) and did not find soil contamination at the site.	1992 RFA suspected of having had releases. Recommended for low priority RFI. 1997 RFA Confirmation Study: Recommended SWMU 7 soils for NFA under RCRA and further groundwater investigation under CERCLA (IR Program). In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is also scheduled.	Investigation under IRP in progress.
8	Inland Area Bldg IA-20 (Chemical Laboratory)	Chemical laboratory for testing the hydraulic fluids for guided missiles (Building IA-20). The 1992 RFA noted: Hazardous wastes generated include acids, bases, Freon 113, denatured alcohol, mineral spirits, and oil.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
9	Inland Area Bldg IA-21 (Material Test Laboratory)	WQEC material test laboratory located at Building IA-21. The 1992 RFA noted: Hazardous wastes generated includes hydraulic test fluids. Low-level radioactive wastes were also handled.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).



**Table 4-2. Solid Waste Management Units**

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
10	Inland Area Bldg IA-21A (Evaluation Laboratory)	Building IA-21 was an evaluation laboratory that did electronic testing on microcircuit components. The 1992 RFA noted: the building served as a hazardous waste satellite accumulation point for chemical, oil, paint spray cans, coolant, and rags.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
11	Inland Area Bldg IA-22 (Photography Laboratory)	The WQEC photography laboratory was located in Building IA-55. The 1992 RFA noted: about one gallon of hazardous waste was generated per week. The hazardous waste generated was silver contained in waste photographic processing fluids. Silver was reclaimed and the waste was discharged into the sewer system.	1992 RFA: No corrective action needed; however, permitting of silver recovery unit required.  Silver recovery unit at IA-22 permitted under Hazardous Waste Facility Permit (DTSC 1993).	NFA recommended by DTSC (DTSC 1992).  Hazardous waste unit (silver recovery unit) at IA-22 certified closed by DTSC on February 8, 1999 (DTSC 2003).
12	Inland Area Bldg IA-24 (Forklift Maintenance Building)	The 1992 RFA noted: Hazardous generated in Building IA-24 included used oil, absorbent materials soaked with oil, used paint spray cans, and batteries. The site was used as a satellite accumulation area for these wastes. Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported low concentration of VOCs. Manganese and thallium levels exceeding regulatory criteria, but no human or environmental exposure pathways.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI.  1997 RFA Confirmation Study: NFA recommended.  1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997). NFA recommended.	No regulatory concurrence received.



**Table 4-2. Solid Waste Management Units**

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
13	Inland Area Bldg IA-25 (Missile Component Maintenance)	Building IA-25 housed a missile component maintenance operation until 1988. The 1992 RFA noted: spray paint cans and solvents were among the hazardous wastes generated. Building IA-25 had a sink and sanitary sewer system that drained into a septic tank. The 1997 RFA Confirmation Study reported oil and grease found in vicinity of storm drain. Hazardous waste concentration of TCE found in septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended for septic tanks. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997). NFA recommended. Recommended further investigation under CERCLA for Building IA-25. Evaluation being done as IR Site 29.	Draft FS was completed in 2003 for Building IA-25 (IR Site 29) and will be updated to include groundwater contamination issue. Remedial Investigation for groundwater will be initiated.
14	Inland Area Bldg IA-27 (Carpenter Shop)	Building IA-27 used to house a carpenter shop. 1992 RFA noted: Carpentry works often used paints and thinners. Building IA-27 had a sink and sanitary sewer system that drained into a septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action. 1997 RFA Confirmation Study reported generally low concentrations of nickel in soil. Septic tank sewer water removed for off-site disposal.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended for septic tanks. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997). NFA recommended.	No regulatory concurrence received.
15	Runway Area Bldg IA-45 (Paint Storage)	The 1992 RFA suspected that an onsite septic tank might have released hazardous waste. The 1997 RFA Confirmation Study reported that a very limited quantity of the site soils had elevated metal concentrations and there is no pathway for human or environmental exposure to the contamination. It was determined that a septic tank/leach field was not located at Building IA-45.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended.	No regulatory concurrence received.



Table 4-2. Solid Waste Management Units

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
16	Administrative Area Bldgs IA-46 and 150 (Public Works Maintenance Storage)	Public Works maintenance storage (IA-46) and storage shed (150). The 1992 RFA suspected releases of mercury vapors due to crushing of fluorescent tubes and/or releases of friable asbestos during packing operations. The 1997 Corrective Action Study documented excavation of pesticide (DDT and chlordane) contaminated soils.	1992 RFA suspected of having releases of mercury to air. Recommended for low priority RFI. 1997 RFA Confirmation Study: NFA recommended for septic tanks. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997). NFA recommended. 2002 Closure of RCRA Part B Permitted Facility Building IA-46 (CKY 2002).	No regulatory concurrence received for Building 150. DTSC approved RCRA Part B closure on June 27, 2003 (DTSC 2003).
17	Inland Area Bldg IA-50 (Rail/Truck Transfer Depot)	The 1992 RFA noted: Building IA-50 was once used as a transfer station for ordnance materials. Hazardous wastes generated included used paint spray cans. Building IA-50 had a sink and sanitary sewer system that drained into a septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported potentially harmful concentrations of hazardous materials were not detected in the septic tank or leach field.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997): NFA recommended.	No regulatory concurrence received.



**Table 4-2. Solid Waste Management Units**

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
18	Administrative Area Bldg IA-51 (Auto Maintenance Facility)	Steam clean facility. The 1992 RFA documented a release of oil waste into the sump. The 1997 RFA Confirmation Study reported sporadic detections of hydrocarbon-contaminated soil. Hydrocarbon-contaminated groundwater was also detected, but does not appear to be related to site soil contamination.	1992 RFA High Priority recommendation for RFI. 1997 RFA Confirmation Study: Recommended groundwater investigation under CERCLA (IR Program). In the FS Phase. A draft final FS report dated April 22, 2005 (Tetra Tech 2005) was prepared based on the results of the RI. A treatability study is also scheduled.	Investigation under IRP in progress.
19	Administrative Area Bldg IA-54 (Electric Substation)	The 1992 RFA noted that the facility houses the electrical transformer that contains no PCBs and has no history of releases.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
20	Inland Area Bldg IA-55 (Ordnance Operations Building)	Building IA-55 was an office building where tools were issued and supplies recovered. The 1992 RFA noted that hazardous wastes generated include paint spray cans and adhesives. The building served as one of the hazardous waste satellite accumulation points for used paint spray cans. Building IA-55 had a sink and sanitary sewer system that drained into a septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported low concentration of VOCs. Manganese and thallium levels exceeding regulatory criteria, but no human or environmental exposure pathways.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997): NFA recommended.	No regulatory concurrence received.
21	Inland Area Bldg IA-58 (X-Ray Building)	Building IA-58 once housed the WQEC Scientific and Engineering Division X-ray facility. The 1992 RFA reports no radiological wastes were produced. Hazardous wastes produced at the site include film developers, fixers, and starters due to their silver content. The building served as one of the hazardous waste satellite accumulation points for film developers and used paint spray cans.	1992 RFA: NFA recommended. 2002 Closure of RCRA Part B Permitted Facility Building IA-46 (CKY 2002).	NFA recommended by DTSC (DTSC 1992). DTSC approved RCRA Part B closure on June 27, 2003 (DTSC 2003).



**Table 4-2. Solid Waste Management Units**

SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
22	Inland Area Bldg 81 (Ordnance Maintenance and Test Building)	The WQEC ordnance maintenance and test building was located at Building 81. The 1992 RFA reports there was a hazardous waste satellite accumulation point for used paint spray cans on the south of the building. Building 81 had a sink and sanitary sewer system that drained into a septic tank. The 1997 RFA Confirmation Study reported potentially harmful concentrations of hazardous materials were not detected in the septic tank for leach field.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended.	No regulatory concurrence received.
23	Inland Area Bldg 87 (Storage Building)	Building 87 was a storage building for inert materials. The 1992 RFA reports that hazardous wastes generated at the site included used paint spray cans, oil, and solvents. Building 87 had a sink and sanitary sewer system that drained into a septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported potentially harmful concentrations of hazardous materials were not detected in the septic tank or leach field.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997). NFA recommended.	No regulatory concurrence received.
24	Inland Area Bldg 93 (Guided Missile Division)	The 1992 RFA reports that Building 93 was one of the biggest generators of hazardous wastes at the base. The wastes included paint spray cans, solvents, and adhesives. Wastes generated were stored at a satellite accumulation point at Building 429. Building 93 had a sink and sanitary sewer system that drained into a septic tank. Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported potentially harmful concentrations of hazardous materials were not detected in the septic tank or leach field.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997): NFA recommended.	No regulatory concurrence received.



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SWMU	Location	Environmental Findings	Status	Regulatory Concurrence Received
25	Inland Area Bldg 97 (Ordnance Assembly Building)	Building 97 was an ordnance assembly building for the Guided Missile Department. The 1992 RFA reports that hazardous wastes generated at the site included paint spray cans, oily rags, solvents, and adhesives. Three USTs (Tanks #97B, 97C, and 97D) were located near Building 97 – these USTs were removed in 1990. Building 97 had a sink and sanitary sewer system that drained into a septic tank. The 1997 RFA Confirmation Study reported potentially harmful concentrations of hazardous materials were not detected in the septic tank or leach field.	1992 RFA suspected of having releases to septic tanks. Recommended for medium priority RFI. 1997 RFA Confirmation Study: NFA recommended.	No regulatory concurrence received.
26	Inland Area Bldg 178 (Navy Exchange Service Station)	Building 178 is former gas station. The 1992 RFA reports that hazardous wastes generated at the site included used oil, oil filters, and oily rags. Three USTs (Tanks #178A, 178B, and 178C) were located at Building 178 but were removed in 1991.	1992 RFA High Priority recommendation for RFI. Investigated and remediated under CLEAN I CTOs 109 and 238; groundwater monitoring under CLEAN II CTO 89. CCCHSD and RWQCB closure for USTs	CCCHSD determination of NFA for USTs 178 on 05/28/98 (CCCHSD 1998a).  RWQCB closure granted 12/23/1999 (RWQCB 1999a).
27	Administrative Area Bldg 193 (Auto Hobby Shop)	Auto hobby shop with car wash area on east side of building. The 1992 RFA reported facility generated hazardous wastes including antifreeze, used oil, oil filters, and paint spray cans, and indicated no history of releases.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
28	Inland Area Bldg 263 (Ordnance Maintenance)	Building 263 operations included quality assurance and some renovations of ordnance. The 1992 RFA reports hazardous wastes generated included used paint spray cans, solvents, and adhesives.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
29	Inland Area Bldg 429 (Hazardous Waste Accumulation Shed)	Building 429 is a shed behind Building 93 (SWMU #24) that served as a hazardous waste accumulation point. The 1992 RFA reports Building 429 was used store hazardous wastes in drums and containers until delivery to Building 433. Wastes included paint spray cans, solvents, and adhesives.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).



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<b>SWMU</b>	<b>Location</b>	<b>Environmental Findings</b>	<b>Status</b>	<b>Regulatory Concurrence Received</b>
30	North of Runway Area (UNOCAL Corporation Oil Pipeline Site)	UNOCAL pipeline. Documented release of crude oil on November 22, 1989. The 1992 RFA reports that while a contractor was grinding on the pipeline, a pinhole was accidentally made, releasing approximately 2 to 3 barrels of oil. A 1990 investigation indicated vadose zone soils and groundwater had been impacted. Approximately 1,900 cubic yards of contaminated soil were excavated. Further investigation activities underway by UNOCAL under RWQCB direction.	1992 RFA High Priority recommendation for RFI.	Investigation continuing.
31	Near main entrance of Inland Area	SWMU #31 consists of a diesel fuel leak near the main entrance to Inland Area. The 1992 RFA reports that a commercial semi-tractor leaked approximately 35 gallons of diesel fuel onto the pavement near the main entrance in November 1990. The spill was contained on the blacktop and cleaned up.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
32	Inland Area UST 5AT	The 1992 RFA reports that an abandoned tank (#17) installed by a previous land owner to store heating oil was located. The tank was excavated in November 1990.	1992 RFA: NFA recommended.	NFA recommended by DTSC (DTSC 1992).
33	Site 6LC98 UST Magazine Boiler	Building 6LC98 housed the boiler that provided heating in the Magazine building. The 1992 RFA reports that the site was found to have diesel fuel oil contamination in November 1990. The leaking UST 6LC98 was removed in January 1991.	1992 RFA High Priority recommendation for RFI.	CCCHSD – Determination of NFA on 6/1/95 (CCCHSD 1995d).
51	Runway Area Bldg IA-56	In 1993 and 1994, a septic tank investigation reported detection of hazardous materials in septic tank water. The 1997 RFA Confirmation Study reported no hazardous materials detected at harmful concentrations.	1997 RFA Confirmation Study: NFA recommended.	No regulatory concurrence received.
52	Inland Area Bldg 7SH-5	Consists of septic tank and leach field in the vicinity of IR Site 22. The 1997 RFA Confirmation Study reports arsenic and lead detected in surface soil samples. Arsenic and lead did not originate from the SWMU septic tank.	1997 RFA Confirmation Study: NFA recommended for septic tank and leach field. Arsenic being evaluated as IR Site 22 investigation.	No regulatory concurrence received for septic tank and leach field. Arsenic and lead investigation continuing at IR Site 22 (see Table 4-1).



**Table 4-2. Solid Waste Management Units**

<b>SWMU</b>	<b>Location</b>	<b>Environmental Findings</b>	<b>Status</b>	<b>Regulatory Concurrence Received</b>
53	Inland Area Bldg 7SH-14	Septic tank and leach field. The 1997 RFA Confirmation Study reported no harmful concentrations of hazardous materials detected.	1997 RFA Confirmation Study: NFA recommended for septic tank and leach field.	No regulatory concurrence received.
54	Inland Area Bldg 79	Septic tank waste was removed in 1997 under a RCRA Corrective Action. The 1997 RFA Confirmation Study reported no harmful concentrations of hazardous materials detected.	1997 RFA Confirmation Study: NFA recommended for septic tank and leach field. 1997 RCRA Corrective Action for septic tank waste (CH2M Hill 1997): NFA recommended.	No regulatory concurrence received.

Notes:

RFA (DTSC, June 1992)

RFA Confirmation Study (PRC, August 1997)

Bldg(s) = Building(s)

CCCHSD = Contra Costa County Health Services Department

CERCLA = Comprehensive Environmental Response, Compensation, and Liability Act

DTSC = Department of Toxic Substance Control

FS = Feasibility Study

IR = Installation Restoration

IRP = Installation Restoration Program

NFA = No Further Action

RCRA = Resource Conservation and Recovery Act

RWQCB = Regional Water Quality Control Board

RFA = RCRA Facility Assessment

RFI = RCRA Facility Investigation

SCAPS = Site Characterization and Analysis Penetrometer System

SWMU = Solid Waste Management Unit

VOCs = volatile organic compounds

UST = Underground Storage Tank

TPH = Total Petroleum Hydrocarbon

WQEC = Weapons Quality Engineering Center



Table 4-3. Underground/Aboveground Storage Tanks

Location	Tank	Tank Capacity (gallons)	Tank Contents	Date Removed	Status	Regulatory Concurrence Received
Administrative Area Bldg 522	UST 523 T-1	12,000	Gasoline	Not Removed	USTs empty and out of service: Three tanks formerly used for vehicle fueling station and 2 for locomotive fueling.	A closure report is pending. The tanks are in temporary closure status until the possibility of their future use is determined.
	UST 524 T-2	12,000	Gasoline			
	UST 525 T-3	12,000	Diesel			
	UST 526 T-4	12,000	Diesel			
	UST 527 T-5	12,000	Diesel			
Administrative Area Bldg 178	UST 178A	12,000	Gasoline	10/31/91	Closed	CCCHSD determination of NFA for USTs 178 on 05/28/98 (CCCHSD 1998a). RWQCB closure granted 12/23/1999 (RWQCB 1999a).
	UST 178B	12,000	Gasoline			
	UST 178C	12,000	Gasoline			
	UST 178D	280	Waste oil			
Inland Area Bldg 87	UST 87	6,500	Diesel	03/19/97	Closed	CCCHSD determination of NFA for UST 87 on 02/13/98 (CCCHSD 1998b). RWQCB closure granted 10/6/05 (RWQCB 2005a).
	AST 87			2004	AST cleaned and removed.	
Inland Area Bldg IA-55	UST IA-55	550	Diesel	02/10/97	Closed	CCCHSD determination of NFA for UST IA-55 on 04/17/97 (CCCHSD 1997a). RWQCB closure on 11/18/05 (RWQCB 2005b).
	AST IA-55			2004	AST cleaned and removed in.	
Inland Area Bldg 96	UST 96	6,500	Diesel	02/10/97	Closed	CCCHSD determination of NFA for UST 96 on 02/13/98 (CCCHSD 1998c). RWQCB closure on 10/24/05 (RWQCB 2005c).
	AST 96			2004	AST cleaned and removed.	
Inland Area Bldg 7SH5	UST 7SH5	1,000	Diesel	01/28/97	Closed	CCCHSD determination of NFA for UST 7SH5 on 04/8/97 (CCCHSD 1997b). RWQCB closure on 10/26/05 (RWQCB 2005d).
	AST 7SH5	1,000		2004	AST cleaned and removed.	



**Table 4-3. Underground/Aboveground Storage Tanks**

Location	Tank	Tank Capacity (gallons)	Tank Contents	Date Removed	Status	Regulatory Concurrence Received
Inland Area Bldg IA-58	UST IA-58	1,000	Diesel	04/15/97	Closed	CCCHSD determination of NFA for UST IA-58 on 02/13/98 (CCCHSD 1998d). RWQCB closure granted on 11/7/05 (RWQCB 2005e).
Inland Area Bldg IA-35	UST IA-35	1,000	Diesel	11/08/90	RWQCB Closed	Closure granted for UST IA-35 by the RWQCB on 12/23/99 (RWQCB 1999b).
Inland Area Bldg 7SH4	UST 7SH4	1,000	Diesel	01/27/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST 7SH4 on 04/9/97 (CCCHSD 1997d).
	AST 7SH4	1,000		2004	AST cleaned and removed.	
Inland Area Bldg 7SH14	UST 7SH14	3,500	Diesel	01/28/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST 7SH14 on 04/17/97 (CCCHSD 1997d).
	AST 7SH14	1,000		2004	AST cleaned and removed.	
Inland Area Bldg 5AT	UST 5AT	280	Diesel	11/5/90-03/1/91	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST 5AT on 09/19/94 (CCCHSD 1994a).
Inland Area Bldg 79	UST 79	550	Diesel	11/08/90	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST 79 on 02/21/95 (CCCHSD 1995a).
Inland Area Bldg 97	UST 97A UST 97B UST 97C UST 97D	2,000 2,500 2,500 2,500	Diesel JP-5 Fuel JP-5 Fuel JP-5 Fuel	12/9/90	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for USTs 97 on 02/21/95 (CCCHSD 1995b).
	AST 97			2004	AST cleaned and removed.	
Administrative Area Bldg 395	UST 395	3,000	Diesel	02/21/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST 395 on 03/18/97 (CCCHSD 1997e).



Table 4-3. Underground/Aboveground Storage Tanks

Location	Tank	Tank Capacity (gallons)	Tank Contents	Date Removed	Status	Regulatory Concurrence Received																																																																			
Administrative Area Bldg IA-1	UST IA-1A	300	Diesel Gasoline	02/26/97	IA-1A – CCCHSD NFA; no additional approvals necessary. IA-1B – CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST IA-1 on 3/18/97 (CCCHSD 1997f). CCCHSD determination of NFA for UST IA-1B on 02/21/95 (CCCHSD 1995c).																																																																			
	UST IA-1B	280		11/08/90			Administrative Area Bldg IA-10	AST IA-1C	500	Diesel Propane	Not Removed	AST IA-1C empty and out of service, but not removed. AST IA-1 in use.		AST IA-1	1,000	Not Removed	Administrative Area Bldg IA-10	UST IA-10	2,100	Diesel	02/21/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-10 on 03/18/97 (CCCHSD 1997g).	Administrative Area Bldg IA-18	UST IA-18	500	Diesel	11/08/90	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-18 on 09/19/94 (CCCHSD 1994b).	Inland Area Bldg IA-19	UST IA-19	1,417	Diesel Diesel	02/04/93	IA-19 – CCCHSD NFA; RWQCB review and closure still required. IA-19A – CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-19 on 11/30/93 (CCCHSD 1993). CCCHSD determination of NFA for UST IA-19A on 09/7/05 (CCCHSD 2005a).	UST IA-19A	1,850	07/28/04	Inland Area Bldg 6LC98	UST 6LC98	1,000	Diesel	03/08/93	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST 6LC98 on 06/1/95 (CCCHSD 1995d).	Inland Area Bldg IA-36	UST IA-36	10,000	Diesel	04/15/97	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST IA-36 on 02/13/98 (CCCHSD 1998e).	Administrative Area Bldg IA-12	UST IA-12A	6,000	Waste oil	11/04/93	UST closed by DTSC	DTSC acknowledgement of RCRA closure for UST IA-12a on 03/21/95 (DTSC 1995).	AST IA-12B	550	Engine oil Engine oil Engine oil Hydraulic oil Used oil Used oil	2004	ASTs have been cleaned and removed.		AST IA-12C	550	AST IA-12D	550	AST IA-12E	2,000
Administrative Area Bldg IA-10	AST IA-1C	500	Diesel Propane	Not Removed	AST IA-1C empty and out of service, but not removed. AST IA-1 in use.																																																																				
	AST IA-1	1,000		Not Removed			Administrative Area Bldg IA-10	UST IA-10	2,100	Diesel	02/21/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-10 on 03/18/97 (CCCHSD 1997g).	Administrative Area Bldg IA-18	UST IA-18	500	Diesel	11/08/90	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-18 on 09/19/94 (CCCHSD 1994b).	Inland Area Bldg IA-19	UST IA-19	1,417	Diesel Diesel	02/04/93	IA-19 – CCCHSD NFA; RWQCB review and closure still required. IA-19A – CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-19 on 11/30/93 (CCCHSD 1993). CCCHSD determination of NFA for UST IA-19A on 09/7/05 (CCCHSD 2005a).	UST IA-19A	1,850	07/28/04	Inland Area Bldg 6LC98	UST 6LC98	1,000	Diesel	03/08/93	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST 6LC98 on 06/1/95 (CCCHSD 1995d).	Inland Area Bldg IA-36	UST IA-36	10,000	Diesel	04/15/97	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST IA-36 on 02/13/98 (CCCHSD 1998e).	Administrative Area Bldg IA-12	UST IA-12A	6,000	Waste oil	11/04/93	UST closed by DTSC	DTSC acknowledgement of RCRA closure for UST IA-12a on 03/21/95 (DTSC 1995).	AST IA-12B	550	Engine oil Engine oil Engine oil Hydraulic oil Used oil Used oil		2004	ASTs have been cleaned and removed.		AST IA-12C	550	AST IA-12D	550	AST IA-12E					2,000	AST IA-12F	600	AST IA-12G	600	
Administrative Area Bldg IA-10	UST IA-10	2,100	Diesel	02/21/97	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-10 on 03/18/97 (CCCHSD 1997g).																																																																			
Administrative Area Bldg IA-18	UST IA-18	500	Diesel	11/08/90	CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-18 on 09/19/94 (CCCHSD 1994b).																																																																			
Inland Area Bldg IA-19	UST IA-19	1,417	Diesel Diesel	02/04/93	IA-19 – CCCHSD NFA; RWQCB review and closure still required. IA-19A – CCCHSD NFA; no additional approvals necessary.	CCCHSD determination of NFA for UST IA-19 on 11/30/93 (CCCHSD 1993). CCCHSD determination of NFA for UST IA-19A on 09/7/05 (CCCHSD 2005a).																																																																			
	UST IA-19A	1,850		07/28/04			Inland Area Bldg 6LC98	UST 6LC98	1,000	Diesel	03/08/93	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST 6LC98 on 06/1/95 (CCCHSD 1995d).	Inland Area Bldg IA-36	UST IA-36	10,000	Diesel	04/15/97	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST IA-36 on 02/13/98 (CCCHSD 1998e).	Administrative Area Bldg IA-12	UST IA-12A	6,000	Waste oil	11/04/93	UST closed by DTSC	DTSC acknowledgement of RCRA closure for UST IA-12a on 03/21/95 (DTSC 1995).	AST IA-12B	550	Engine oil Engine oil Engine oil Hydraulic oil Used oil Used oil	2004	ASTs have been cleaned and removed.		AST IA-12C	550	AST IA-12D	550	AST IA-12E	2,000	AST IA-12F	600	AST IA-12G	600																														
Inland Area Bldg 6LC98	UST 6LC98	1,000	Diesel	03/08/93	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST 6LC98 on 06/1/95 (CCCHSD 1995d).																																																																			
Inland Area Bldg IA-36	UST IA-36	10,000	Diesel	04/15/97	CCCHSD NFA; RWQCB review and closure still required.	CCCHSD determination of NFA for UST IA-36 on 02/13/98 (CCCHSD 1998e).																																																																			
Administrative Area Bldg IA-12	UST IA-12A	6,000	Waste oil	11/04/93	UST closed by DTSC	DTSC acknowledgement of RCRA closure for UST IA-12a on 03/21/95 (DTSC 1995).																																																																			
	AST IA-12B	550	Engine oil Engine oil Engine oil Hydraulic oil Used oil Used oil	2004	ASTs have been cleaned and removed.																																																																				
	AST IA-12C	550																																																																							
	AST IA-12D	550																																																																							
	AST IA-12E	2,000																																																																							
	AST IA-12F	600																																																																							
AST IA-12G	600																																																																								



Table 4-3. Underground/Aboveground Storage Tanks

Location	Tank	Tank Capacity (gallons)	Tank Contents	Date Removed	Status	Regulatory Concurrence Received
Administrative Area Bldg IA-6	UST IA-6	10,000	Diesel	06/29/89	Site investigation complete. SCAPS report recommends NFA (DoN 2005a).	No agency concurrence received.
Inland Area Bldg 83	UST 83	6,500	Diesel	03/19/97	Site investigation complete. SCAPS report recommends NFA (DoN 2005b).	No agency concurrence received.
	AST 83	Unknown	Unknown	Not Removed	Unknown	Unknown
Inland Area Bldg 86	UST 86A	2,500	Diesel	03/19/97	Site investigation complete. SCAPS report recommends NFA (DoN 2005c).	No agency concurrence received.
	UST 86B	2,500	Diesel			
Administrative Area Bldg IA-17	UST IA-17A UST IA-17B UST IA-17C UST IA-17D	10,000 (total)	Gasoline Gasoline Gasoline Diesel	01/19/99	Site investigation ongoing. SCAPS report recommends additional site investigations (DoN 2004a)	Site investigation ongoing.
Inland Area Bldg IA-24	UST IA-24A	2,000	Diesel	2/10/97	Site investigation complete. SCAPS report recommends NFA (DoN 2004b).	No agency concurrence received.
	AST IA-24			2004	AST cleaned and removed.	
Administrative Area Bldg 262	AST 262	500	Propane	Not Removed	AST still in use.	
Administrative Area Bldg IA-4	AST IA-4B	500	Diesel	Not Removed	AST empty and out of service, not removed due to overhead power lines.	
Administrative Area Bldg IA-7	AST IA-7	1,000	Propane	Not Removed	AST in use.	
Administrative Area Bldg IA-15	AST IA-15B	1,000	Used oil	2004	AST cleaned and removed.	



Table 4-3. Underground/Aboveground Storage Tanks

Location	Tank	Tank Capacity (gallons)	Tank Contents	Date Removed	Status	Regulatory Concurrence Received
Runway Area Bldg IA-56	AST IA-56B	275	Diesel	2004	AST cleaned and removed.	

Notes:

AST = Aboveground Storage Tank

Bldg. = Building

CCCHSD = Contra Costa County Health Services Department

DTSC = Department of Toxic Substance Control

NFA = No Further Action

RWQCB = Regional Water Quality Control Board

SCAPS = Site Characterization and Analysis Penetrometer System

UST = Underground Storage Tank



**Table 4-4. Munitions and Explosives of Concern Areas**

<b>Area of Concern</b>	<b>Years of Operation</b>	<b>Recommendation</b>
Borrow/Dredge Fill Area	1970s to 1980s	No Further Action
Railroad Siding Excavations	1940s to 1970s	Site Inspection
Red Rock Disposal Area	Unknown	No Further Action
Burn Area Near HE 58	1966 to 1978	Site Inspection
Disposal Area – Seal Creek	1950s to 1983	No Further Action
Inland Area EOD	1940s to 1959	No Further Action
Eagle's Nest EOD Area	1959 to 1970s	Site Inspection
Former Inland Burn Area	1940s to 1970s	Site Inspection
Bore Sighting Range	1944 to 1946	No Further Action

Notes:

EOD = Explosive Ordnance Detail



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pad @ 152	Admin. Area	134	None	0	6/18/1990
Pad @ 152	Admin. Area	130	761086840	0	6/18/1990
Pad @ 152	Admin. Area	131	761079261	0	6/18/1990
Pad @ 152	Admin. Area	132	761036838	0	6/18/1990
Pad @ 152	Admin. Area	133	None	0	6/18/1990
Pad @ 152	Admin. Area	135	None	0	6/18/1990
Pole 52 @ 152	Admin. Area	346	G42944265	0	6/29/1990
Pole 52 @ 152	Admin. Area	347	G42765365K	0	6/29/1990
Pole 52 @ 152	Admin. Area	348	J769697K770AA	0	6/29/1990
Pad @ 159	Admin. Area	121	None	29	6/20/1990
Pad @ 159	Admin. Area	122	None	27	6/20/1990
Pad @ 159	Admin. Area	123	None	0	6/20/1990
Pad @ 159	Admin. Area	118	317088	0	6/20/1990
Pad @ 159	Admin. Area	120	317091	0	6/20/1990
Pad @ 159	Admin. Area	119	317089	0	6/20/1990
Pole 69B @ 190	Admin. Area	361	RR101182R60	26	7/2/1990
Pole 75A @ 245	Admin. Area	421	138872	3	6/27/1990
Pole 75A @ 245	Admin. Area	423	138873	3	6/27/1990
Pole 75A @ 245	Admin. Area	422	138871	3	6/27/1990
Pole 65 @ 249, 748	Admin. Area	471	K464389K71AA	<1	1/15/1999
123C @ 262	Admin. Area	86	38711	0	6/27/1990
123C @ 262	Admin. Area	87	38710	0	6/27/1990
Pad @ 395, 396	Admin. Area	489	198221	NA	NA
Pad @ 409 & IA-1	Admin. Area	104	N225391YFTA	0	6/29/1990
Pad @ 409	Admin. Area	105	None	2	6/29/1990
Pad @ 409	Admin. Area	106	None	4	6/29/1990
Pad @ 409	Admin. Area	107	None	16	6/29/1990
Pad @ 409	Admin. Area	108	None	0	6/29/1990
Pad @ 409	Admin. Area	109	None	0	6/29/1990
Pad @ 409	Admin. Area	110	None	0	6/29/1990
Pole 9 @ 409	Admin. Area	354	J826156	0	6/27/1990
Pad @ 409, IA-1	Admin. Area	103	N331522YGTA	0	6/29/1990
Pad @ 409, IA-1	Admin. Area	102	N325432YFTA	0	6/29/1990
Pole 234 @ 423	Admin. Area	355	M3620	0	5/12/1993
Pad @ 435	Admin. Area	128	None	0	6/20/1990



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pad @ 435	Admin. Area	124	H551270K88A	25	6/20/1990
Pad @ 435	Admin. Area	125	H553618K68A	25	6/20/1990
Pad @ 435	Admin. Area	127	None	0	6/20/1990
Pad @ 435	Admin. Area	129	None	0	6/20/1990
Pad @ 435	Admin. Area	126	H55364_K68A	25	6/20/1990
Pad @ E98	Admin. Area	229	89J499030	0	6/21/1990
Pole 22 @ E98	Admin. Area	356	60040	5	7/2/1990
Pole 22 @ E98	Admin. Area	357	60020	4	7/2/1990
Pole 22 @ E98	Admin. Area	350	060024	4	7/2/1990
Pole 123A @ IA-2	Admin. Area	84	6179284	13	6/27/1990
Pole 90B @ IA-3	Admin. Area	416	264468	0	6/29/1990
Pole 90B @ IA-3	Admin. Area	417	281435	0	6/27/1990
Pole 90B @ IA-3	Admin. Area	415	265815	0	6/29/1990
Pole 36 @ IA-5	Admin. Area	443	92A482884	0	1/1/1992
Pole 36 @ IA-5	Admin. Area	444	92A440207	0	1/1/1992
Pole 36 @ IA-5	Admin. Area	445	92A482883	0	1/1/1992
Pole 226 @ IA-6	Admin. Area	38	ESC 83821	1	6/20/1990
Pole 226 @ IA-6	Admin. Area	38	None	1	6/20/1990
Pole 226 @ IA-6	Admin. Area	36	None	2	6/20/1990
Pole 227 A @ IA-7	Admin. Area	35	N725299YDX	0	6/20/1990
Pole 227 A @ IA-7	Admin. Area	34	N725309YDX	0	6/20/1990
Pole 227 A @ IA-7	Admin. Area	33	N725302YDX	2	6/20/1990
Pole 281 A @ IA-8	Admin. Area	28	60265	0	6/20/1990
Pole 281 A @ IA-8	Admin. Area	29	60267	0	6/20/1990
Pole 281 A @ IA-8	Admin. Area	27	60266	0	6/20/1990
Pad @ IA-10	Admin. Area	112	L9D2162	11	6/20/1990
Pad @ IA-10	Admin. Area	113	L9D2161	11	6/20/1990
Pad @ IA-10	Admin. Area	114	M9D1439	10	6/20/1990
Pad @ IA-10	Admin. Area	115	None	10	6/20/1990
Pad @ IA-10	Admin. Area	116	None	0	6/20/1990
Pad @ IA-10	Admin. Area	117	None	11	6/20/1990
Pad @ IA-11	Admin. Area	101	PVH0696	0	6/29/1990
Pole A224 @ IA-13	Admin. Area	32	81A3015	0	6/20/1990
Pole A224 @ IA-13	Admin. Area	31	81A30E14	0	6/20/1990
Pole A224 @ IA-13	Admin. Area	30	81A371716	0	6/20/1990



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pad @ IA-15	Admin. Area	222	None	28	6/18/1990
Pad @ IA-15	Admin. Area	223	None	38	6/21/1990
Pad @ IA-15	Admin. Area	224	None	37	6/18/1990
Pad @ IA-15	Admin. Area	225	None	0	6/19/1990
Pad @ IA-15	Admin. Area	227	None	0	6/18/1990
Pad @ IA-15	Admin. Area	226	None	0	6/19/1990
Pad @ IA-18	Admin. Area	111	PPF0264	0	6/20/1990
Pad @ IA-18	Admin. Area	487	239943393	NA	NA
Pad @ IA-18	Admin. Area	488	920504A1	NA	NA
Pole 27, 27A @ IA-18C&D	Admin. Area	153	None	6	6/23/1990
Pole 27, 27A @ IA-18C&D	Admin. Area	157	None	7	6/23/1990
Pole 27, 27A @ IA-18C&D	Admin. Area	154	197759	7	6/23/1990
Behind IA-38	Admin. Area	349	79A162356	3	6/29/1990
IA-46	Admin. Area	375	None	0	7/2/1998
IA-46	Admin. Area	10	81V2323	2	6/20/1990
IA-46	Admin. Area	228	POD0335	0	6/21/1990
IA-46	Admin. Area	474	71047	0	12/15/1998
IA-46	Admin. Area	477	92A490790	0	12/15/1998
IA-46	Admin. Area	79	766218	1	6/27/1990
IA-46	Admin. Area	78	766216	14	6/27/1990
IA-46	Admin. Area	80	766217	1	6/27/1990
IA-46	Admin. Area	395	None	0	7/2/1990
IA-46	Admin. Area	394	None	0	7/2/1990
IA-46	Admin. Area	475	71039	0	12/15/1998
IA-46	Admin. Area	476	71037	0	12/15/1998
IA-46	Admin. Area	465	617930	1	12/15/1998
IA-46	Admin. Area	478	110928	0	12/15/1998
IA-46	Admin. Area	141	301895	0	6/18/1990
IA-46	Admin. Area	396	None	0	7/2/1990
IA-46	Admin. Area	469	9647315	8	12/15/1998
IA-46	Admin. Area	470	K464388K71AA	0	12/15/1998
Pole 37 @ IA-48	Admin. Area	457	810931	0	12/15/1998
Pad @ IA-52/IA-38	Admin. Area	263	TC4	4	6/21/1990
Pad @ IA-52/IA-38	Admin. Area	264	TC5	2	6/21/1990



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pad @ IA-52/IA-38	Admin. Area	265	TC3	3	6/21/1990
Pad @ IA-52	Admin. Area	260	533660	8	6/21/1990
Pad @ IA-52	Admin. Area	262	533676	6	6/21/1990
Pad @ IA-52	Admin. Area	266	None	0	6/29/1990
Pad @ IA-52	Admin. Area	267	None	3	6/29/1990
Pad @ IA-52	Admin. Area	268	None	3	6/29/1990
Pad @ IA-52	Admin. Area	269	None	0	6/21/1990
Pad @ IA-52	Admin. Area	261	533662	8	6/21/1990
Pad @ IA-52	Admin. Area	270	None	0	6/21/1990
Pad @ IA-52	Admin. Area	271	None	0	6/21/1990
IA-54	Admin. Area	272	7851174B	0	6/21/1990
IA-54	Admin. Area	273	8751174A	0	6/21/1990
Pad @ Kinne	Admin. Area	75	None	2	6/27/1990
Pad @ Kinne	Admin. Area	17	D318116	16	3/27/1999
Pad @ Kinne	Admin. Area	19	D318115	13	3/27/1999
Pad @ Kinne	Admin. Area	18	D318114	16	3/27/1999
Pad @ Kinne	Admin. Area	257	D318836	31	6/21/1990
Pad @ Kinne	Admin. Area	258	D318835	30	6/21/1990
Pad @ Kinne	Admin. Area	259	D318834	31	6/21/1990
Pad @ Kinne	Admin. Area	76	None	13	6/27/1990
Pad @ Kinne	Admin. Area	77	None	14	6/27/1990
9 <sup>th</sup> Wildon	Admin. Area	236	458912	0	6/21/1990
9 <sup>th</sup> Wildon	Admin. Area	484	W199662	0	12/15/1998
9 <sup>th</sup> O St.	Admin. Area	483	IF18977	NA	NA
11 <sup>th</sup> O St,	Admin. Area	482	819930	0	11/20/1998
"S" ST	Admin. Area	459	P318364yvb	0	12/15/1998
Pole 1	Admin. Area	51	3629683	2	5/12/1993
Pole 1	Admin. Area	52	4932468	0	6/27/1990
Pole 2	Admin. Area	100	RR10118R60	27	6/20/1990
Post 7	Admin. Area	1	69269	7	6/20/1990
Pole 8	Admin. Area	39	69274	3	6/29/1990
Pole 10	Admin. Area	358	319594	0	7/2/1990
RBS 10	Admin. Area	97	84V5373	0	6/20/1990
Pole 16	Admin. Area	46	142191	9	6/27/1990
Pole 17A	Admin. Area	490	4279214	<1	12/12/1998
Pole 20	Admin. Area	45	69267	2	6/25/1990



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pole 25	Admin. Area	53	69270	3	6/27/1990
Pole 31	Admin. Area	54	80V5868	0	6/27/1990
Pole 34	Admin. Area	353	J826155	3	6/27/1990
Pole 40	Admin. Area	56	295343	0	6/21/1990
Pole 41	Admin. Area	57	69268	3	6/27/1990
Pole 41	Admin. Area	486	427925	NA	NA
Pole 44	Admin. Area	65	68694	0	6/25/1990
Pole 45A	Admin. Area	63	NO79051YDSA	0	6/25/1990
Pole 45A	Admin. Area	64	NO79052YDSA	0	6/25/1990
Pole 45A	Admin. Area	62	NO79050YDSA	0	6/27/1990
Pole 55	Admin. Area	67	68617	0	6/25/1990
Pole 69	Admin. Area	419	61SF653	10	6/27/1990
Pole 69C & D	Admin. Area	362	UE2657	0	7/2/1990
Pole 69C & D	Admin. Area	363	YP2946	0	7/2/1990
Pole 69C & D	Admin. Area	364	387168	0	7/2/1990
Pole 75	Admin. Area	420	60SJ2367	10	6/27/1990
Pole 79	Admin. Area	74	68614	1	6/27/1990
Pole 80C	Admin. Area	424	G16652064K	21	6/27/1990
Pole 82	Admin. Area	425	G16651964K	2	6/27/1990
Pole 84	Admin. Area	179	618K838	5	6/23/1990
Pole 86	Admin. Area	139	None	0	6/18/1990
Pole 87	Admin. Area	200	6179287	0	6/18/1990
Pole 104	Admin. Area	59	69278	4	6/27/1990
Pole 116	Admin. Area	42	69282	1	6/27/1990
Pole 129	Admin. Area	44	69275	3	6/27/1990
Pole A140	Admin. Area	40	69270	2	6/29/1990
Pole A151	Admin. Area	41	69273	2	6/29/1990
Pole 170	Admin. Area	61	157244	11	6/29/1990
174	Admin. Area	499	1088078	0	11/21/1998
Pole 181	Admin. Area	60	157242	10	6/29/1990
Pole 213	Admin. Area	493	87B0601	0	11/27/1998
Pole A221	Admin. Area	58	MO93185YLMA	0	6/26/1990
Pole A230	Admin. Area	93	MAI7873	7	6/25/1990
Pole A239	Admin. Area	91	EAL4963	6	6/27/1990
Pole A247	Admin. Area	68	NA	25	6/25/1990
Pole 295	Admin. Area	99	K512659K72A	0	6/20/1990



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pole 295C	Admin. Area	485	9854246	2	12/12/1998
Pole 458	Admin. Area	491	92A490791	0	11/21/1998
Pole 503	Admin. Area	149	M986662YMRA	0	6/23/1990
Pole 564	Admin. Area	82	72AL283	0	6/27/1990
Pole 654	Admin. Area	9	69283	2	6/20/1990
Pole 774	Admin. Area	481	M145086YBNA	<1	1/16/1999
Pole 960	Admin. Area	414	M107545YLMA	0	6/29/1990
PGE Pole	Admin. Area	88	88A320984	0	6/25/1990
Main Sub	Admin. Area	533	4550000A011	0	1/1/1998
NA	Admin. Area	450	7639473	NA	NA
Pad	Admin. Area	16	P590039	0	6/20/1990
Clash Yard	Admin. Area	96	None	0	6/27/1990
Clash Yard	Admin. Area	95	None	0	6/27/1990
Clash Yard	Admin. Area	94	None	0	6/27/1990
Pole 972 @ IA-56	Runway Area	432	G18806965Y	0	9/25/1990
Pad @ Airport	Runway Area	492	CO0516961	0	11/27/98
Pole @ IA-22	Inland Area	480	464391K71AA	NA	12/12/98
Pole 69C & D	Inland Area	70	387168	NA	7/2/90
Pole 816	Inland Area	3	G17446965K	4	6/20/90
Pole 816	Inland Area	5	G17446865K	4	6/20/90
Pad @ 98	Inland Area	15	N655240	NA	6/20/90
Pole 35	Inland Area	11	N386806YKTA	NA	6/20/90
Pad @ IA-24	Inland Area	12	3384743	23	6/20/90
Pad @IA-24	Inland Area	13	3415370	17	6/20/90
Pad @IA-24	Inland Area	14	3162871	29	6/20/90
Pole 816	Inland Area	4	G17446765K	4	6/20/90
NA	Inland Area	98	79VEO17090	NA	6/20/90
Pole 620	Inland Area	90	D94272159K	NA	6/27/90
Pole 49G	Inland Area	89	N21057281A	NA	6/27/90
Pole 228	Inland Area	69	69261	NA	6/27/90
Pole 45A	Inland Area	62	NO79050YDSA	NA	6/27/90
NA	Inland Area	66	68616	NA	6/18/90
Pole 228	Inland Area	71	69263	NA	6/27/90
Pad & Pole 232	Inland Area	72	74I809009	NA	6/27/90
Pad & Pole 232	Inland Area	73	74G778001	25	6/27/90
Pole 226	Inland Area	37	None	1	6/20/90



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pole 813, 813A	Inland Area	7	7444399	7	5/14/93
Pole 813, 813A	Inland Area	8	7440401	8	5/15/93
Pole 503	Inland Area	92	3861662	45	5/14/93
Pad @ IA-24	Inland Area	23	R20314	NA	6/20/90
Pad @ IA-24	Inland Area	24	R20315	NA	6/20/90
Pad @ IA-24	Inland Area	25	R20316	NA	6/20/90
Pole 737	Inland Area	26	386884	2	6/20/90
Pad @ IA-25	Inland Area	464	93-008-01	NA	12/15/98
Pole 252C	Inland Area	47	66222	NA	6/21/90
Pole 252C	Inland Area	48	66223	NA	6/27/90
Pole 252C	Inland Area	49	66224	NA	6/29/90
Pole 252A	Inland Area	50	62462A69	5	6/25/90
Pole 82A	Inland Area	466	BJ3171010	NA	12/15/98
Pad @93	Inland Area	472	95J891313	NA	12/15/98
Pole 803	Inland Area	473	69265	2	12/15/98
Pad @ 86	Inland Area	255	None	NA	6/21/90
Pad @ 86	Inland Area	256	None	NA	6/21/90
Pad @ 86	Inland Area	253	None	NA	6/21/90
Pad @ 86	Inland Area	252	None	NA	6/21/90
Pad @ 93	Inland Area	245	72516	NA	6/18/90
Pole by IA-55	Inland Area	197	9729145	NA	5/14/93
Pad @ 168	Inland Area	221	P494261TZC	NA	7/2/90
Pad @ 86	Inland Area	254	None	NA	6/21/90
Pad @ IA-27	Inland Area	244	None	NA	6/21/90
Pad @ 93	Inland Area	246	72515	NA	6/21/90
Pad @ 86	Inland Area	247	69259	10	6/21/90
Pad @ 86	Inland Area	248	68124	8	6/18/90
Pad @ 86	Inland Area	249	68125	9	6/18/90
Pad @ 86	Inland Area	250	68123	8	6/21/90
Pad @ 86	Inland Area	251	None	NA	6/21/90
Pole 914	Inland Area	479	285323	NA	12/12/98
Pad @ IA-58	Inland Area	332	782N37504	NA	6/29/90
Pad @ IA-58	Inland Area	329	None	NA	6/29/90
Pad @ IA-58	Inland Area	331	782N3750	NA	6/29/90
Pad @ IA-58	Inland Area	333	None	NA	6/29/90
Pad @ IA-58	Inland Area	334	None	NA	6/29/90



**Table 4-5. Polychlorinated Biphenyl Survey Summary**

Location		Transformer Number	Serial Number	PCB Concentration (ppm)	Last Test Date
Pad @ IA-58	Inland Area	335	None	NA	6/29/90
Pad @ IA-58	Inland Area	336	782N37503	2	6/29/90
Pad @ IA-58	Inland Area	330	None	NA	6/29/90
Pad @ IA-58	Inland Area	243	M341107YJWA	NA	6/29/90
Airport Hill	Inland Area	81	336897	1	6/27/90
Pad @ IA-27	Inland Area	239	59SL2805	10	6/21/90
Pad @ IA-27	Inland Area	240	59SK1403	31	6/21/90
Pad @ IA-27	Inland Area	241	59SK1396	32	6/21/90
Pad @ IA-27	Inland Area	242	None	NA	6/21/90
Pad @ IA-24	Inland Area	235	None	NA	6/18/90
Pad @ IA-58	Inland Area	323	766208	5	6/29/90
Pad @ IA-24	Inland Area	234	None	NA	6/18/90
Pad @ I-58	Inland Area	328	None	NA	6/29/90
Pad @ IA-27	Inland Area	243	None	NA	6/21/90
Pad @ IA-15	Inland Area	226	None	NA	6/19/90
Pole by IA-55	Inland Area	196	9729141	NA	5/14/93
Pole 813, 813A	Inland Area	6	7444404	8	5/14/93
Pad @ IA-15	Inland Area	225	None	NA	6/19/90
Pad @ IA-15	Inland Area	227	None	NA	6/18/90
Pad @ IA-24	Inland Area	230	None	NA	6/21/90
Pad @ IA-24	Inland Area	231	None	NA	6/21/90
Pad @ IA-24	Inland Area	232	None	NA	6/21/90
Pad @ IA-24	Inland Area	233	None	NA	6/21/90
Pole by IA-55	Inland Area	198	9729131	NA	5/14/93

Sources: CDM 2003; PCB Tested Equipment in the Inland Area, NWSSB DET Concord, 1999

Notes:

Admin. = Administration

NA = not available

PCB = polychlorinated biphenyl

ppm = parts per million



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
152	Gymnasium	1966	12,867	Admin. Area	Yes	1999 2002b	Yes	18 homogeneous areas (including pipe installation, tar sealant, coving mastic, floor tile, grout).	1999: two locations low friable, remaining locations non-friable. 2002: All locations non-friable (two low friable locations abated).
155	Navy Exchange Patio Snack Bar	1964	960	Admin. Area	Yes	2002a	No		
156	Baseball Field	1964	Unknown	Admin. Area	NA				
159	Recreation Center	1966	8,344	Admin. Area	Yes	1999 2002b	Yes	15 homogeneous areas (including insulation, coving mastic, grout, cinder block and mortar, floor tile).	1999: two high friable, remaining locations low and non-friable. 2002: seven friable, remaining locations non-friable.
161	Parade Ground – Drill Field	1945	Unknown	Admin. Area	NA				
178	Navy Exchange Gas Station	1969	1,664	Admin. Area	Yes	2002a	No		
185	Administrative Office	1970	1,295	Admin. Area	Yes	1999 2002b	Yes	10 homogeneous areas (including roofing, grout, floor tile, coving, mastic, cinder block and mortar).	1999: All locations non-friable. 2000: All locations non-friable.
186	Navy Reserves Administration Building	1972	2,681	Admin. Area	Yes	1999 2002b	Yes	10 homogeneous areas (including roofing, grout, fire door, floor tile, coving mastic, cinder block and mortar).	1999: All locations non-friable. 2002: All locations non-friable.
187	Former USMC Barracks	1972	10,724	Admin. Area	Yes	2002a	Yes	Pipe enclosure, pipe lagging, floor tile, fire doors.	Transite friable, all other materials non-friable.



Table 4-6. Asbestos-Containing Materials Survey Summary

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
190	Pool Bath House	1971	668	Admin. Area	Yes	2002a	No		
245A-D	Two Story Fourplex Unit (2 bedroom)	1947	7,056	Admin. Area	Yes	2002a	Yes	Drywall, linoleum, floor tile, transite vent pipes, thermal system insulation debris, fire doors, air cell, boiler system gaskets.	Non-friable
245E, F	Community Mess	1947	4,086	Admin. Area	Yes	2002a	Yes	Drywall, linoleum, floor tile, transite vent pipes, thermal system insulation debris, fire doors, air cell, boiler system gaskets	Transite friable, all other materials non-friable
252	Navy Exchange Warehouse/Public Works Storage	1972	1,308	Admin. Area	Yes	2002a	Yes	Vinyl floor tile, mastic, drywall	Non-friable
253	USMC Storage	1972	1,640	Admin. Area	Yes	2002a	No		
254	USMC Troop Storage	1972	960	Admin. Area	Yes	2002a	No		
256	Morale, Welfare, and Recreation Storage	1973	1,480	Admin. Area	Yes	2002a	No		
264	Morale, Welfare, and Recreation Outdoor Gear Issue Building	1974	224	Admin. Area	Yes	2002a	No		
272	Picnic Grounds	1976	Unknown	Admin. Area	NA				
395	Barracks Administration Building	1981	9,530	Admin. Area	Yes	2002a	Yes	Vinyl floor tile, stair tread, mastic.	Non-friable
396	Navy Barracks	1981	11,210	Admin. Area	Yes	2002a	Yes	Vinyl floor tile, mastic.	Non-friable



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
397	Navy Barracks	1981	21,609	Admin. Area	Yes	2002a	Yes	Vinyl tile, mastic.	Non-friable
398	Navy Barracks	1981	2,748	Admin. Area	Yes	2002a	Yes	Vinyl floor tile, leveling compound.	Friable and non-friable
409	Chapel	1980	2,004	Admin. Area	Yes	2002a	Yes	Flooring, vinyl floor tile, mastic.	All locations non-friable.
433	Storage	1987	1,800	Admin. Area	Yes	2002a	Yes	Fire door.	Non-friable
435	Racquetball Courts	1989	1,080	Admin. Area	Yes	1999 2002b	Yes	7 homogeneous areas (including, coving mastic, fire door, roofing).	1999: All locations non-friable. 2002: All locations non-friable.
E-98	Admin. Office	1953	10,710	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe insulation 1989: Pipe insulation, transite panels, floor tile, debris under building.	1988: Pipe insulation friable. 1989: Pipe insulation and debris under building friable, transite panels and floor tiles non-friable. 2002: Pipe insulation and debris under building friable, transite panels abated and floor tiles non-friable.
IA-3	Pump House	1945	320	Admin. Area	No				
IA-5	Station Theater & FISC Warehouse	1945	11,364	Admin. Area	Yes	2002a	Yes	Window putty, transite panels, drywall, vinyl floor tile.	Non-friable
IA-18	Dental Clinic/Dispensary	1945	9,921	Admin. Area	Yes	1999 2002b	Yes	26 homogeneous areas (including pipe insulation, sheet rock, tar paper, mortar, grout, roofing, sheet flooring).	1999: 2 moderate friable, remaining locations low and non-friable. 2002: 24 friable, remaining locations non friable.



Table 4-6. Asbestos-Containing Materials Survey Summary

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
IA-18A	Admin. Offices	1945	7,868	Admin. Area	Yes	1988 1989 1999 2002b	Yes	1988: None. 1989: Pipe insulation. 1999: 13 homogeneous areas (including pipe insulation, sheetrock, coving mastic, floor tile, grout).	1989: Pipe insulation friable. 1999: four moderate friable, remaining locations non-friable. 2002: five friable, remaining locations non-friable.
IA-18C	Admin. Offices	1945	8,558	Admin. Area	Yes	1989 1999 2002b	Yes	1989: Ceiling material, pipe insulation, floor tile, transite panels. 1999: 18 homogeneous areas (including debris, sheetrock, coving mastic, grout, roofing, floor tile).	1989: Ceiling and pipe insulation friable, tiles and panels non-friable. 1999: Low to non-friable locations. 2002: 26 friable, remaining locations non friable.
IA-18D	Human Resources Office and Credit Union	1945	6,203	Admin. Area	Yes	1988 1989 1999 2002b	Yes	1988: None. 1989: Pipe insulation, pipe elbow/joint insulation, floor tile. 1999: 19 homogeneous areas (including pipe insulation and fittings, transite, coving mastic, floor tiles, roofing).	1989: Pipe insulation and pipe elbow/joint insulation friable, floor tile non-friable. 1999: three moderate friable, one low friable, remaining location non-friable. 2002: four friable, remaining locations non-friable.
IA-59	Tennis Court	1957	Unknown	Admin. Area	NA				
IA-60	Sports Field	1957	Unknown	Admin. Area	NA				



Table 4-6. Asbestos-Containing Materials Survey Summary

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
IA-18B	Admin. Offices	1945	7,376	Admin. Area	Yes	1988 1989 1999 2002b	Yes	1988: Pipe and joint insulation. 1989: Pipe and joint insulation. 1999: 16 homogeneous areas (including pipe and fitting insulation, transite, floor tile, grout, fire door, roofing).	1988: Pipe and joint insulation friable. 1989: Pipe and joint insulation friable. 1999: Two high friable, four moderate friable, seven low friable, remaining locations non-friable. 2002: 18 friable, remaining locations non-friable.
193	Auto Hobby Shop	1971	3,900	Admin. Area	Yes	2002a	No		
265	Morale, Welfare, and Recreation Garage	1974	1,092	Admin. Area	Yes	2002a	No		
IA-10	Admin. Building	1945	39,416	Admin. Area	Yes	1999 2002b	Yes	40 homogeneous areas (including vent duct insulation, glazing undercoat, grout, coving mastic, floor tile, roofing, tar sealant).	1999: one high friable, one low friable, remaining locations non-friable. 2002: 2 friable, remaining locations non-friable.
150	Public Works Maintenance Storage Shed	1963	288	Admin. Area	No				
IA-46	Public Works Maintenance Storage	1952	17,136	Admin. Area	Yes	2002a	Yes	Transite panel.	Non-friable.



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
262	ROICC Public Works Admin. Office Building	1959	3,242	Admin. Area	Yes	1999 2002b	Yes	12 homogeneous areas (including sheetrock, pipe insulation, flooring, roofing, transite panels).	1999: one high, one moderate friable, remaining locations low to non-friable. 2002: All locations non-friable (high location abated, moderate location re-accessed as non-friable, low locations abated or re-assessed as non-friable).
401	Miscellaneous Personal Weather Shelter	1981	32	Admin. Area	No				
IA-1	Command Administration Building	1945	11,095	Admin. Area	Yes	1999 2002b	Yes	27 homogeneous areas (including coving mastic, floor tile, grout, transite, tar sealant, sheetrock, ceiling tile, pipe and fitting insulation).	1999: five high friable, two moderate friable, remaining locations are low and non-friable. 2002: eight friable, remaining locations are non-friable.
IA-2	Security Pass and ID Office	1951	1,920	Admin. Area	Yes	1999 2002b	Yes	12 homogeneous areas (including roofing, roofing sealer, sheet flooring, coving mastic).	1999: one moderate friable, remaining locations non-friable. 2002: one friable, remaining locations non-friable.
IA-4	Switch Gear House	1967	1,000	Admin. Area	No				
IA-54	Generator Area	1988	Unknown	Admin. Area	No				
114	Fire Station Storage	1946	574	Admin. Area	No				



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
116	Time Clock Shed	1946	140	Admin. Area	No				
189	Paint Storage Building	1970	288	Admin. Area	No				
269	Locomotive Steam Cleaning Pad	Unknown	Unknown	Admin. Area	No				
416	Fire Station Storage	1946	500	Admin. Area	No				
423	Metal Garage – Explosive Ordnance Disposal Storage	1984	1,500	Admin. Area	No				
511	Fossil Fuel Heating Plant	1994	241	Admin. Area	No				
522	Fueling Station	1945	1,100	Admin. Area	Yes	2002a	No		
IA-7	Inland Fire Station	1945	6,333	Admin. Area	Yes	1988 1989 1999 2002b	Yes	1988: Pipe insulation. 1989: Pipe insulation, roof sealant. 1999: 12 homogeneous areas (including pipe and fitting insulation, surfacing, grout, coving mastic, floor tile, roofing).	1988: Pipe insulation friable. 1989: Pipe insulation friable, roof sealant non-friable. 1999: Three high friable, two moderate friable, five low friable, remaining locations non-friable. 2002: nine friable, remaining locations non-friable.



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
IA-8	Explosive Ordnance Disposal Offices	1945	2,159	Admin. Area	Yes	1988 1989 2002b	Yes	Pipe insulation and floor tile.	1988: Pipe insulation friable, floor tile non-friable. 1989: Pipe insulation friable, floor tile non-friable. 2002: Pipe insulation abated, floor tile non-friable.
IA-11	FISC Admin Building	1945	7,910	Admin. Area	Yes	1989 2002b	Yes	Pipe and joint insulation, vault ceiling, roof sealant, transite panel, floor tile.	1989: Insulation and ceiling friable, sealant, transite, floor tile non-friable. 2002: Insulation and ceiling friable, sealant, transite, floor tile non-friable.
IA-12	Locomotive and Railroad Maintenance	1945	16,715	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe and joint insulation. 1989: Pipe and joint insulation, floor tile, transite panels.	1988: Insulation friable. 1989: Insulation friable, floor tile, transite non-friable. 2002: Insulation and transite abated, floor tile non-friable.
IA-13	Pump House	1945	99	Admin. Area	No				



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
IA-15	Admin. Offices and Vehicle Maintenance	1945	34,240	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe insulation. 1989: Pipe insulation, floor tile, transite panels.	1988: Pipe insulation friable. 1989: Pipe insulation friable, floor tile non-friable. 2002: 2 friable (pipe insulation), floor tile non-friable.
IA-16	Paint Shop and Vehicle Dispatch	1945	5,528	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe and joint insulation. 1989: Pipe and joint insulation, floor tile, roof, sealant.	1988: Pipe and joint insulation friable. 1989: Pipe and joint insulation friable, floor tile, roof and sealant non-friable. 2002: four friable, remaining locations non-friable.
IA-37	Public Works Shop	1947	5,123	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe insulation. 1989: Pipe insulation, floor tile, roof.	1988: Pipe insulation friable. 1989: Pipe insulation friable, roof non-friable. 2002: Pipe insulation abated, all remaining locations non-friable.
IA-38	Public Works Shop Stores	1947	11,002	Admin. Area	Yes	1988 1989 2002b	Yes	1988: Pipe and joint insulation. 1989: Pipe and joint insulation, roof.	1988: Pipe insulation friable. 1989: Pipe insulation friable, roof non-friable. 2002: Pipe insulation abated, roof non-friable.



**Table 4-6. Asbestos-Containing Materials Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	ACM Survey Performed ? (1)	Asbestos Survey Report (2)	ACM Found?	Location of ACM	Condition of ACM
IA-43	Public Works Part Storehouse	1947	2,058	Admin. Area	Yes	2002a	Yes	Drywall, fire doors.	Non-friable
IA-48	Vehicle Storage Shed	1952	12,190	Admin. Area	No				
IA-49	Storage	1952	4,186	Admin. Area	Yes	2002a	Yes	Fire door.	Non-friable
IA-51	Steam Clean Facility	1975	1,865	Admin. Area	Yes	2002a	Yes	Window putty	Non-friable
IA-52	Electronic Shop	1953	3,356	Admin. Area	Yes	2002a	Yes	Window putty, vinyl floor tile, mastic	Non-friable
IA-45	Pump House	Unknown	Unknown	Runway Area	No				
IA-56	Forklift Training Building	1954	1,200	Runway Area	No				

Notes:

(1) ACM Survey Performed?

Garages and other buildings not intended for long term human occupancy were excluded from the 2002 ACM survey.  
 Housing units 221 and 222 were assumed to be demolished when planning the 2002 ACM survey; therefore, the units were not included in the survey.  
 Housing units 147 and 249 were inadvertently not included in the list of housing units to be surveyed for ACM.

(2) ACM Survey Reports

1998: Inventory of Friable Asbestos-Containing Materials for the Naval Weapons Station at Concord, California. Pacific Environmental Services, Inc., February 1988.  
 1989: Draft Asbestos Survey and Assessment Naval Weapons Station Concord, Concord, California. IT Corporation, April 1989.  
 1996: Asbestos Management Plan, Miscellaneous Housing Naval Weapons Station – Concord, Concord, California. Department of the Navy, May 1996.  
 1999: Asbestos, Environmental, and Lead Pre-Demolishment Survey, Concord Naval Weapons Station. SSPORTS Environmental Detachment, 1999.  
 2000: Naval Weapons Station, Seal Beach Detachment Concord Asbestos Survey of Selected Facilities and Buildings, Ameritac, Inc., 2000.  
 2002a: Asbestos Survey Report for Inland Area Naval Weapons Station Seal Beach Detachment Concord. Brown & Caldwell, 2002.  
 2002b: Asbestos Condition Assessment – Concord Naval Weapons Station. CDM Federal Programs Inc., 2002.

Admin. = Administration

ACM = Asbestos Containing Materials

FISC = Fleet Industrial Supply Center

NA = not applicable

ROICC = Resident Officer in Charge of Construction



**Table 4-7. Lead-Based Paint Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	LBP Survey Performed? (1)	LBP Survey Report (2)	LBP Hazard Found?	Location of LBP Hazard
152	Gymnasium	1966	12,867	Admin. Area	No			
155	Navy Exchange Patio Snack Bar	1964	960	Admin. Area	No			
156	Baseball Field	1964	Unknown	Admin. Area	NA			
159	Recreation Center	1966	8,344	Admin. Area	No			
161	Parade Ground – Drill Field	1945	Unknown	Admin. Area	NA			
178	Navy Exchange Gas Station	1969	1,664	Admin. Area	No			
185	Administrative Office	1970	1,295	Admin. Area	No			
186	Navy Reserves Administration Building	1972	2,681	Admin. Area	No			
187	Former USMC Barracks	1972	10,724	Admin. Area	No			
190	Pool Bath House	1971	668	Admin. Area	No			
245A-D	Two-story Fourplex Unit (2 bedroom)	1947	7,056	Admin. Area	Yes	1996	Yes	Lead in paint (interior and exterior) and lead in soil (foundation at 245B >400 ppm)
245E, F	Community Mess	1947	4,086	Admin. Area	No			
252	Navy Exchange Warehouse/Public Works Storage	1972	1,308	Admin. Area	No			
253	USMC Storage	1972	1,640	Admin. Area	No			
254	USMC Troop Storage	1972	960	Admin. Area	No			
256	Morale, Welfare, and Recreation Storage	1973	1,480	Admin. Area	No			
264	Morale, Welfare, and Recreation Outdoor Gear Issue Building	1974	224	Admin. Area	No			
272	Picnic Grounds	1976	Unknown	Admin. Area	NA			
395	Barracks Administration Building	1981	9,530	Admin. Area	No			
396	Navy Barracks	1981	11,210	Admin. Area	No			



**Table 4-7. Lead-Based Paint Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	LBP Survey Performed? (1)	LBP Survey Report (2)	LBP Hazard Found?	Location of LBP Hazard
397	Navy Barracks	1981	21,609	Admin. Area	No			
398	Navy Barracks	1981	2,748	Admin. Area	No			
409	Chapel	1980	2,004	Admin. Area	No			
433	Storage	1987	1,800	Admin. Area	No			
435	Racquetball Courts	1989	1,080	Admin. Area	No			
E-98	Administrative Office	1953	10,710	Admin. Area	No			
IA-3	Pump House	1945	320	Admin. Area	No			
IA-5	Station Theater & FISC Warehouse	1945	11,364	Admin. Area	No			
IA-18	Dental Clinic/Dispensary	1945	9,921	Admin. Area	No			
IA-18A	Administrative Offices	1945	7,868	Admin. Area	No			
IA-18C	Administrative Offices	1945	8,558	Admin. Area	No			
IA-18D	Human Resources Office and Credit Union	1945	6,203	Admin. Area	No			
IA-59	Tennis Court	1957	Unknown	Admin. Area	NA			
IA-60	Sports Field	1957	Unknown	Admin. Area	NA			
IA-18B	Administrative Offices	1945	7,376	Admin. Area	No			
193	Auto Hobby Shop	1971	3,900	Admin. Area	No			
265	Morale, Welfare, and Recreation Garage	1974	1,092	Admin. Area	No			
IA-10	Administration Building	1945	39,416	Admin. Area	No			
150	Public Works Maintenance Storage Shed	1963	288	Admin. Area	No			
IA-46	Public Works Maintenance Storage	1952	17,136	Admin. Area	No			
262	ROICC Public Works Administrative Office Building	1959	3,242	Admin. Area	No			
401	Miscellaneous Personal Weather Shelter	1981	32	Admin. Area	No			



**Table 4-7. Lead-Based Paint Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	LBP Survey Performed? (1)	LBP Survey Report (2)	LBP Hazard Found?	Location of LBP Hazard
IA-1	Command Administration Building	1945	11,095	Admin. Area	No			
IA-2	Security Pass and ID Office	1951	1,920	Admin. Area	No			
IA-4	Switch Gear House	1967	1,000	Admin. Area	No			
IA-54	Generator Area	1988	Unknown	Admin. Area	No			
114	Fire Station Storage	1946	574	Admin. Area	No			
116	Time Clock Shed	1946	140	Admin. Area	No			
189	Paint Storage Building	1970	288	Admin. Area	No			
269	Locomotive Steam Cleaning Pad	Unknown	Unknown	Admin. Area	No			
416	Fire Station Storage	1946	500	Admin. Area	No			
423	Metal Garage – Explosive Ordnance Disposal Storage	1984	1,500	Admin. Area	No			
511	Fossil Fuel Heating Plant	1994	241	Admin. Area	No			
522	Fueling Station	1945	1,100	Admin. Area	No			
IA-7	Inland Fire Station	1945	6,333	Admin. Area	No			
IA-8	Explosive Ordnance Disposal Offices	1945	2,159	Admin. Area	No			
IA-11	FISC Admin Building	1945	7,910	Admin. Area	No			
IA-12	Locomotive and Railroad Maintenance	1945	16,715	Admin. Area	No			
IA-13	Pump House	1945	99	Admin. Area	No			
IA-15	Administrative Offices and Vehicle Maintenance	1945	34,240	Admin. Area	No			
IA-16	Paint Shop and Vehicle Dispatch	1945	5,528	Admin. Area	No			
IA-37	Public Works Shop	1947	5,123	Admin. Area	No			
IA-38	Public Works Shop Stores	1947	11,002	Admin. Area	No			



**Table 4-7. Lead-Based Paint Survey Summary**

Building Number	Building Description	Year Built	Area (square feet)	Building Location	LBP Survey Performed? (1)	LBP Survey Report (2)	LBP Hazard Found?	Location of LBP Hazard
IA-43	Public Works Part Storehouse	1947	2,058	Admin. Area	No			
IA-48	Vehicle Storage Shed	1952	12,190	Admin. Area	No			
IA-49	Storage	1952	4,186	Admin. Area	No			
IA-51	Steam Clean Facility	1975	1,865	Admin. Area	No			
IA-52	Electronic Shop	1953	3,356	Admin. Area	No			
IA-45	Pump House	Unknown	Unknown	Runway Area	No			
IA-56	Forklift Training Building	1954	1,200	Runway Area	No			

Notes:

(1) LBP Survey Performed?

Nonresidential buildings were excluded from the 2002 LBP survey.

Housing units 221 and 222 were assumed to be demolished when planning the 2002 LBP survey; therefore, the units were not included in the survey.

(2) LBP Survey Report Date

1996: Lead Management Plan (1944 Housing, Miscellaneous Housing, Playgrounds) and Lead Activity Summary for Naval Weapons Station Concord. DoN, June and August.

1997: Asbestos, Environmental, and Lead Pre-Demolishment Survey – Concord Navy Weapons Station. SSPORTS Environmental Detachment, June.

2002: Lead Based Paint Inspection and Risk Assessment for Naval Weapons Station Seal Beach Detachment Concord. Aurora Industrial Hygiene LL, December.

Admin. = Administration

LBP = lead-based paint

NA = not applicable

ppm = parts per million

µg/ft<sup>2</sup> = micrograms per square foot

ROICC = Resident Officer in Charge of Construction

USMC = United States Marine Corps



Table 4-8. Wetland Classification and Jurisdictional Likelihood

Jurisdictional Likelihood	Community Type	Acres	Description
P	PEM1A	1.4	Palustrine Emergent Persistent Temporally Flooded
L	PEM1B	0.02	Palustrine Emergent Persistent Saturated
L	PEM1C	16	Palustrine Emergent Persistent Seasonally Flooded
L	PEM1Ch	1.7	Palustrine Emergent Persistent Seasonally Flooded, diked
N	PSS1A	2.5	Palustrine Scrub-Shrub Broad Leaved Deciduous Temporally Flooded
N	PSS1B	0.6	Palustrine Scrub-Shrub Broad Leaved Deciduous Saturated
N	PSS1C	13	Palustrine Scrub-Shrub Broad Leaved Deciduous Seasonally Flooded
N	PSS1Ch	0.09	Palustrine Scrub-Shrub Broad Leaved Deciduous Seasonally Flooded, diked
P	PUBFh	3.2	Palustrine Unconsolidated Bottom Semi-permanently Flooded, diked
N	PUBHx	5.8	Palustrine Unconsolidated Bottom Permanently Flooded, excavated
N	PUSAh	1.1	Palustrine Unconsolidated Shore Temporally Flooded, diked
N	PUSC	0.01	Palustrine Unconsolidated Shore Seasonally Flooded
P	PUSCh	0.44	Palustrine Unconsolidated Shore Seasonally Flooded, diked

Source: Concord INRMP (Tetra Tech 2002)

Notes:

L = Likely Jurisdictional

P = Potentially Jurisdictional

N = Not Likely Jurisdictional



**Table 4-9. Vegetation Communities**

<b>Vegetation Community</b>	<b>Area (acres)</b>
Grasslands	4,815
Urban and Industrial Areas	364
Anthropogenic (Cultivated) Areas	161
Riparian Areas	150
Valley Oak Woodland	60
Marshlands	4

Sources: DoN 1999, Concord INRMP (Tetra Tech 2002)



**Table 4-10. Rare, Threatened, and Endangered Species**

Common Name	Scientific Name	Seasonal Status	Listing Status
<b>BIRDS</b>			
Cooper's hawk	<i>Accipiter cooperii</i>	m, w	CSC/MBTA
Western burrowing owl	<i>Athene cunicularia hypugaea</i>	w	FSC/ FBCC/ CSC/MBTA
Golden eagle	<i>Aquila chrysaetos</i>	r	FBCC/CFP/MBTA
Short-eared owl	<i>Asio flammeus</i>	m, w	FBCC/CSC/MBTA
Northern harrier	<i>Circus cyaneus</i>	r	CSC/MBTA
Yellow warbler	<i>Dendroica petechia brewsteri</i>	m	CSC/MBTA
California horned lark	<i>Eremophila alpestris actia</i>	r	CSC/MBTA
Loggerhead shrike	<i>Lanius ludovicianus</i>	r	FSC/FBCC/CSC/MBTA
Suisun song sparrow	<i>Melospiza melodia maxillaris</i>	r	FSC/ FBCC/CSC/ MBTA
<b>AMPHIBIANS</b>			
California tiger salamander	<i>Ambystoma californiense</i>	r	FT/CSC
California red-legged frog	<i>Rana aurora draytoni</i>	r	FT/CSC
<b>REPTILES</b>			
Western pond turtle	<i>Clemmys marmorata marmorata</i>	r	CSC

Sources: DoN 1999, Concord INRMP (Tetra Tech 2002); MBTA (50 CFR Section 10.13)

Notes:

- CFP= California Fully Protected Species
- CSC = California Species of Concern
- FBCC= Federal Birds of Conservation Concern
- FSC = Federal Species of Concern
- FT = Federal Threatened
- m = spring or fall migration period
- MBTA = Migratory Bird Treaty Act
- r = year round resident
- w = winter resident



Table 4-11. Potentially Occurring Rare, Threatened, and Endangered Species

Common Name	Scientific Name	General Habitat	Legal Status
<b>MAMMALS</b>			
Pallid bat	<i>Antrozous pallidus</i>	Variety of habitats from desert to coniferous forest; most closely associated with oak woodland, yellow pine, redwood, and giant sequoia habitats.	CSC
*Townsend's western big eared bat	<i>Corynorhinus townsendii townsendii</i>	Caves, tunnels, mines, and dark attics of abandoned buildings.	CSC
Greater western mastiff bat	<i>Eumops perotis californicus</i>	Woodlands, coastal scrub, chaparral, grasslands.	FSC/CSC
San Joaquin kit fox	<i>Vulpes macrotis mutica</i>	Saltbrush scrub, grassland, oak, savanna, and freshwater scrub.	FE/ST
Yuma myotis	<i>Myotis yumanensis</i>	Open forests and woodlands near bodies of water.	FSC/CSC
<b>BIRDS</b>			
Sharp-shinned hawk	<i>Accipiter striatus</i>	Nests in young, mixed coniferous/deciduous forests.	CSC/MBTA
Tricolored blackbird	<i>Agelaius tricolor</i>	Nests in emergent marsh vegetation.	CSC/BCC/MBTA
Grasshopper sparrow	<i>Ammodramus savannarum</i>	Open fields, grasslands.	FSC/MBTA
Tule white-fronted goose	<i>Asner albifrons elgasi</i>	Winters in marshes and agricultural fields.	CSC//MBTA
Ferruginous hawk	<i>Buteo regalis</i>	Open terrain in plains and foothills where ground squirrels and other prey are available.	CSC/MBTA
*Swainson's hawk	<i>Buteo swainsoni</i>	Open grasslands with trees for nesting such as oak, walnut, and willows.	ST/BCC/MBTA
White-tailed kite	<i>Elanus leucurus</i>	Low foothills or valley areas with valley or live oaks, riparian areas, and marshes near open grassland for foraging.	SFP/MBTA
Merlin	<i>Falco columbarius</i>	Breed in open country (e.g., open coniferous woodland, prairie) and winter in open woodland, grasslands, cultivated fields, marshes, estuaries, and sea coasts.	CSC/MBTA
Prairie falcon	<i>Falco mexicanus</i>	Nests on cliffs or escarpments, usually overlooking dry, open terrain or uplands.	CSC/BCC/MBTA



Table 4-11. Potentially Occurring Rare, Threatened, and Endangered Species

Common Name	Scientific Name	General Habitat	Legal Status
<b>BIRDS (continued)</b>			
American peregrine falcon	<i>Falco peregrinus anatum</i>	Nests and roosts in high cliffs, usually adjacent to lakes, rivers, or marshes.	SE/SFP/BCC/MBTA
Saltmarsh common yellowthroat	<i>Geothlypis trichas sinuosa</i>	Freshwater marshes in summer and brackish marshes in fall and winter.	CSC/BCC/MBTA
Western least bittern	<i>Ixobrychus exilis hesperis</i>	Marshes along pond edges, where tules and rushes can provide cover.	CSC/MBTA
Osprey	<i>Pandion haliaetus</i>	Nests in snags, trees, utility poles near ocean, large lakes or rivers with abundant fish populations.	CSC/MBTA
Double-crested cormorant	<i>Phalacrocorax auritus</i>	Rocky coastlines, beaches, inland ponds, and lakes; needs open water for foraging, and nests in riparian forests .	CSC/MBTA
White-faced ibis	<i>Plegadis chihi</i> (rookery site)	Freshwater marshes with tules, cattails, and rushes.	CSC/MBTA
<b>FISH</b>			
Tidewater goby	<i>Eucyclogobius newberryi</i>	Shallow waters of bays and estuaries in lower streams and reaches, in coastal streams and lagoons.	FE/CSC
River lamprey	<i>Lampetra ayresi</i>	Spawn in freshwater streams that are tributaries to San Francisco Bay.	CSC
Steelhead trout (Northern California ESU)	<i>Oncorhynchus mykiss</i>	Spawn and hatch in freshwater in small, cold-water, gravel-beaded tributaries.	FT
Sacramento splittail	<i>Pogonichthys macrolepidotus</i>	Slow moving rivers, dead-end sloughs, require flooded vegetation.	CSC
Longfin smelt	<i>Sprinchus thaleichthys</i>	Spawn in freshwater streams, larval rearing habitat in Suisun Bay.	CSC
<b>REPTILES</b>			
*Silvery legless lizard	<i>Anniella pulchra pulchra</i>	Loose soil for burrowing or thick duff or leaf litter on beaches, sandy washes, and in woodland chaparral and riparian areas.	CSC
*Alameda whipsnake	<i>Masticophis lateralis euryxanthus</i>	Coastal scrub, chaparral, grassland with rocky outcrops.	FT/ST



**Table 4-11. Potentially Occurring Rare, Threatened, and Endangered Species**

Common Name	Scientific Name	General Habitat	Legal Status
San Joaquin whipsnake	<i>Masticophis flagellum ruddocki</i>	Open, dry, vegetative associations with little or no tree cover; valley foothill grassland and saltbush scrub.	CSC
Coast (California) horned lizard	<i>Phrynosoma coronatum (frontale)</i>	Grasslands, brushlands, woodlands, and open coniferous forest with sandy loose soil.	CSC
*Giant garter snake	<i>Thamnophis gigas</i>	Riparian habitat with permanent water (streams and sloughs with mud bottoms) or temporary waters.	FT/ST
<b>AMPHIBIANS</b>			
*Foothill yellow-legged frog	<i>Rana boylei</i>	Creeks or rivers in woodland, forest, chaparral.	CSC
Western spadefoot	<i>Scaphiopus hammondi</i>	Shallow streams with riffles and seasonal wetlands, such as vernal pools in annual grassland and oak woodland.	CSC
<b>INVERTEBRATES</b>			
*Longhorn fairy shrimp	<i>Branchinecta longiantenna</i>	Small, clear pools in sandstone rock outcrops of clear to moderated turbid clay or grass-bottomed pools.	FE
*Vernal pool fairy shrimp	<i>Branchinecta lynchi</i>	Vernal pools.	FT
*Midvalley fairy shrimp	<i>Branchinecta mesovallensis</i>	Vernal pools, seasonal wetlands.	FSC
San Bruno elfin butterfly	<i>Callophrys mossii bayensis</i>	Colonies of this species are found on Mt. Diablo near its larval food plant stonecrop.	FE
Valley elderberry longhorn beetle	<i>Desmocerus californicus dimorphus</i>	Riparian and oak savanna with elderberry shrubs – host plant.	FT
Delta green ground beetle	<i>Elaphrus viridus</i>	Sparsely vegetated edges of vernal lakes and pools; occur up to 250 feet from pools.	FT



Table 4-11. Potentially Occurring Rare, Threatened, and Endangered Species

Common Name	Scientific Name	General Habitat	Legal Status
<b>INVERTEBRATES (continued)</b>			
Bay checkerspot butterfly	<i>Euphydryas editha bayensis</i>	Native grasslands on outcrops of serpentine soil; California plantain and owl's clover are host plants.	FT
Vernal pool tadpole shrimp	<i>Lepidurus packardii</i>	Vernal pools, swales and stock ponds, backhoe ruts, ditches.	FE
<b>PLANTS</b>			
Large-flowered fiddleneck	<i>Amsinckia grandiflora</i>	Oak woodland, valley foothill grassland.	FE/SE/1B (no take species)
Pallid manzanita	<i>Arctostaphylos pallid</i>	Broadleafed upland forest, chaparral, oak woodland.	FT/SE/1B
Suisun marsh aster	<i>Aster lentus</i>	Brackish and freshwater marshes and swamps.	FSC/1B
Congdon's tarplant	<i>Centromadia parryi</i> ssp. <i>congdonii</i>	Annual grassland, on lower slopes, flats and swales, sometime alkaline or saline.	FSC/1B
Hospital Canyon larkspur	<i>Delphinium californicum</i> ssp. <i>interius</i>	Openings in chaparral and mesic oak woodland.	FSC/1B
*Recurved larkspur	<i>Delphinium recurvatum</i>	Subalkaline soils in annual grassland, saltbush scrub, oak woodland, vernal pools.	FSC/1B
Delta button-celery	<i>Eryngium racemosum</i>	Riparian scrub, vernal pools.	FSC/SE/1B
Diamond-petaled California poppy	<i>Eschscholzia rhombipetala</i>	Grassland, chenopod scrub, on clay soils, where grass cover is sparse.	FSC/1B
*Diablo helianthella	<i>Helianthella castanea</i>	Riparian woodland, valley foothill grassland, chaparral, broadleafed upland forest.	FSC/1B
*Brewer's western flax	<i>Hesperolinon breweri</i>	Serpentine slopes in chaparral and grassland	FSC/1B
Santa Cruz tarplant	<i>Holocarpha macrodenia</i>	Coastal scrub, coastal dunes, openings in oak woodlands with sand or gravelly soil.	FT/SE/1B
Contra Costa goldfields	<i>Lasthenia conjugens</i>	Moist grasslands, vernal pools, cismontane woodlands, alkaline playas.	FE/1B no take species
Mason's lilaeopsis	<i>Lilaeopsis masonii</i>	Brackish and freshwater marshes and swamps.	FSC/SR/1B



**Table 4-11. Potentially Occurring Rare, Threatened, and Endangered Species**

Common Name	Scientific Name	General Habitat	Legal Status
<b>PLANT SPECIES THAT ARE ONLY CNPS LISTED AND INCLUDED IN ECCP HCP/NCCP</b>			
*Mount Diablo manzanita	<i>Arctostaphylos auriculata</i>	Chaparral in canyons and on slopes of sandstone (490-1650 ft)	1B
*Brittlescale	<i>Atriplex depressa</i>	Alkali grassland, alkali meadow, alkali scrub, chenopod scrub, playas, valley and foothill grassland on alkaline or clay soils below 660 ft	1B
*Big tarplant	<i>Blepharizonia plumose</i> ssp. <i>plumosa</i>	Annual grassland on dry hills and plains 50-1,500 ft	1B
*Mount Diablo fairy lantern	<i>Calochortus pulchellus</i>	On wooded brushy slopes of chaparral, oak woodland, riparian woodland, valley and foothill grassland	1B
*Round-leaved filaree	<i>Erodium macrophyllum</i>	Open sites, dry grassland, and shrublands	1B
*Showy madia	<i>Madia radiata</i>	Oak woodland, grassland, slopes below 3,000 ft	1B

Sources: CNDDDB 2005; USFWS 2006; CNPS 2006; Concord INRMP (Tetra Tech 2002); Draft ECCP HCP/NCCP (Jones & Stokes 2005); MBTA (50 CFR Section 10.13)

Notes:

**Federal Status**

BCC = USFWS Birds of Conservation Concern  
 ESU = Evolutionarily Significant Unit  
 FE = Federal Endangered  
 FT = Federal Threatened  
 FSC = Federal Species of Concern  
 MBTA = Migratory Bird Treaty Act  
 USFWS = United States Fish & Wildlife Service

**State/CDFG Status**

SE = State Endangered  
 ST = State Threatened  
 SR = State Rare  
 CSC = CDFG Special Species of Concern  
 SFP = Fully Protected

**CNPS Status**

1B= Rare in California and Elsewhere

**Draft ECCP HCP/NCCP**

\*= Covered Species Under Draft ECCP HCP/NCCP



**Table 4-12. Cultural Resource Surveys and Evaluation Reports**

NWIC Number	Year	Report	Conducted by
S-6704	1984	Concord BART Park/Ride Parking Area Archaeological Reconnaissance. Holman and Associates	Holman, M.
S-10268	1988	Cultural Resources Evaluations for the Pittsburg-Antioch Alternatives Analysis, Contra Costa County, California	Chavez, D. and S.B. Woodbridge
S-11405	1990	Letter report to Alex Pascual, City of Concord. Regarding a field survey for the Willow Pass Road Safety Improvements, Project No. 204. Dated January 5, 1990	Ananian, B. H.
S-12111	1990	Cultural Resources Evaluations for the Pittsburg-Antioch BART Extension Project - Phase 1A and Phase 1B, Contra Costa County, California. David Chavez and Associates	Chavez, D., and J. M. Hupman
S-13416	1989	Mt. Diablo Creek Flood Control and Stream Stabilization Plan Archeological Survey Report, Naval Weapons Station Concord, Contra Costa County, California	William Self & Associates
S-15500	1993	Cultural Resources Overview Naval Weapons Station Concord, Contra Costa County, California	Self, W., G. Matson, C. Wills, N. Dyer, and A. Samuelson. William Self & Associates
S-18327	1995	Cultural Resource Evaluation for the Concord Naval Weapons Station Project, County of Contra Costa.	Cartier, R., and L. Eckert Archaeological Resource Management
S-18439	1996	Archaeological Inventory of a Portion of NWS Concord and an Archaeological Assessment and Field Condition Review of CA-CCo-680. Warehouse Site and Associated Access Roads, Naval Weapons Station, Concord, Contra Costa County, California.	Busby, C. I., D. M. Garaventa, S. A. Guedon, and M. E. Tannam Basin Research Associates
S-21131	1996	Archaeological Inventory: Proposed Warehouse Locations D-F, G North, and G South, Naval Weapons Station, Concord, Contra Costa County, California	Busby, C. I., D. M. Garaventa, S. A. Guedon, and M. E. Tannam Basin Research Associates
S-21133	1997	Three Supplemental Areas: Containerization Project, Naval Weapons Station Concord, Contra Costa County, California	Basin Research Associates, Inc.
S-xxxxxx	1998	Inventory and Evaluation of National Register Eligibility of Cold War Era and Selected Other Buildings and Structures, Weapons Station Seal Beach, Detachment Concord, Contra Costa County, California	JRP Historical Consulting Services

Notes:

\* All of the above reports are on file at the Northwest Information Center located at Sonoma State University, Rohnert Park, California

BART = Bay Area Rapid Transit

NWS = Naval Weapons Station