

Photographs of Various Field Activities

FISCAL YEAR 1999

ENVIRONMENTAL RESTORATION PROGRAM
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Prepared by
Southwest Division, Naval Facilities Engineering Command
BRAC Program Office
San Diego, California

August 1999



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A Member of The IT Group

August 18, 1999

Ms. Bozier H. Demaree
Contracting Officer
Naval Facilities Engineering Command
Southwest Division
1220 Pacific Highway
San Diego, CA 92132-5187

Attention: Ms. Lynn Hornecker

Subject: Transmittal of the Photographs of Various Field Activities document, dated August, 1999
Contract N68711-93-D-1459, Delivery Order 065,
Removal and Remedial Actions at IRP Sites, MCAS El Toro, California
SW7534

Dear Ms. Hornecker:

Attached are five copies of the 1999 Field Activities photograph document, as requested for use by yourself and Dean Gould. This document is comprised of the photographs received from Scott Kehe (with your annotations) and the special purpose maps for the UST program, oil water separator map, aerial photograph anomaly locations map, and the IRP/aerial photograph map.

As you requested, two copies will be delivered to MCAS El Toro for Dean Gould.

If you have any questions or need additional copies of the document, please let me know.

Sincerely,

William Sedlak
Sr. Project Manager

cc: L. Holloway, SWDIV, COTR (1C/1E)
Dean Gould c/o C. Wiemert, MCAS El Toro (1C/2E)
OHM PMO File (1C/1E)
Project File, Correspondence B.01

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Maps

Installation Restoration Program Sites
Underground Storage Tank Sites
Oil/Water Separator Sites
Aerial Photograph Anomaly Sites

MCAS El Toro BRAC Cleanup Plan
Vision and Mission Statements



Vision: Maximize restoration and reuse by 1999

Mission: Fast-track remediation of MCAS El Toro to expedite reuse and protect human health and environment



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 1.

Central Soil Vapor Extraction (SVE) Treatment System
Installation Restoration Program (IRP) Site 24
Volatile Organic Compound (VOC) Source Area

System was transported from Norton Air Force Base in the summer of 1998.
System assembly was completed in late calendar year 1998.
Vapor extraction well construction activities commenced in late calendar year 1998.
System start-up and testing activities were completed in early 1999.
System operations began in May 1999.



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 2.

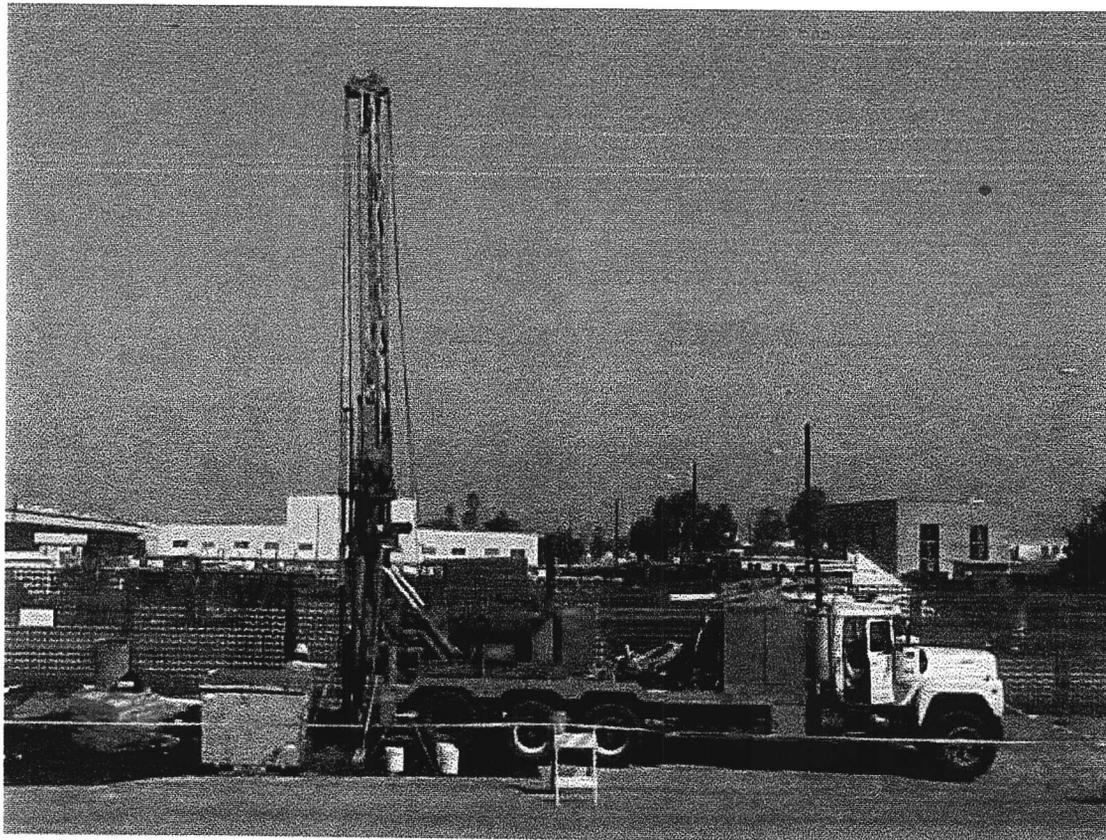
Portable Soil Vapor Extraction (SVE) Treatment Unit
At Well, 24SVE2, Adjacent to Building 297
Installation Restoration Program (IRP) Site 24
Volatile Organic Compound (VOC) Source Area

Portable units have been utilized for rebound tests and remediation at outlying well locations.



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 3.
Construction of Vapor Extraction Well, 24SVE147A, along "R" Street
Installation Restoration Program (IRP) Site 24
Volatile Organic Compound (VOC) Source Area



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 4.

Above-Ground Fuel Storage Tanks 390A and 390B at the Golf Cart Maintenance Shop
(Building 390) Were Inspected Prior to Transferring Operation of the Tanks to the
Local Redevelopment Authority in June 1999

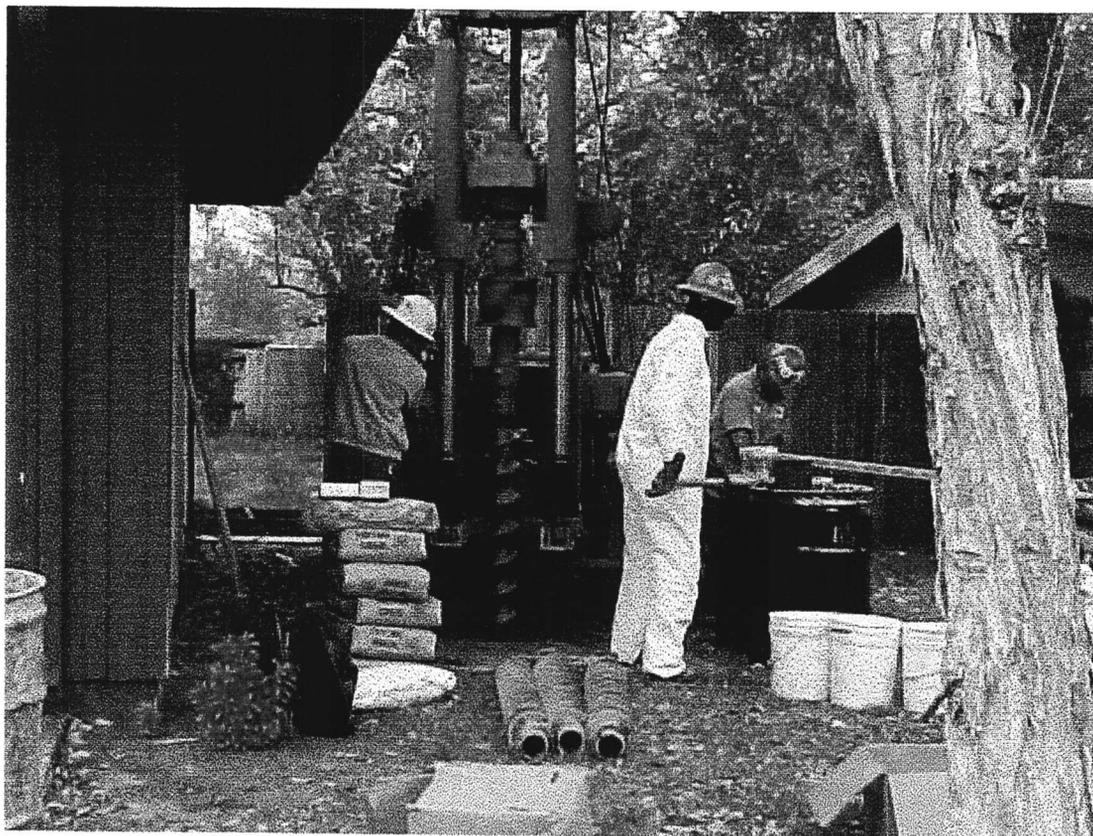


ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 5.

Site Verification Drilling at Former Underground Storage Tank (UST) Site 254
In One of the Family Housing Areas.

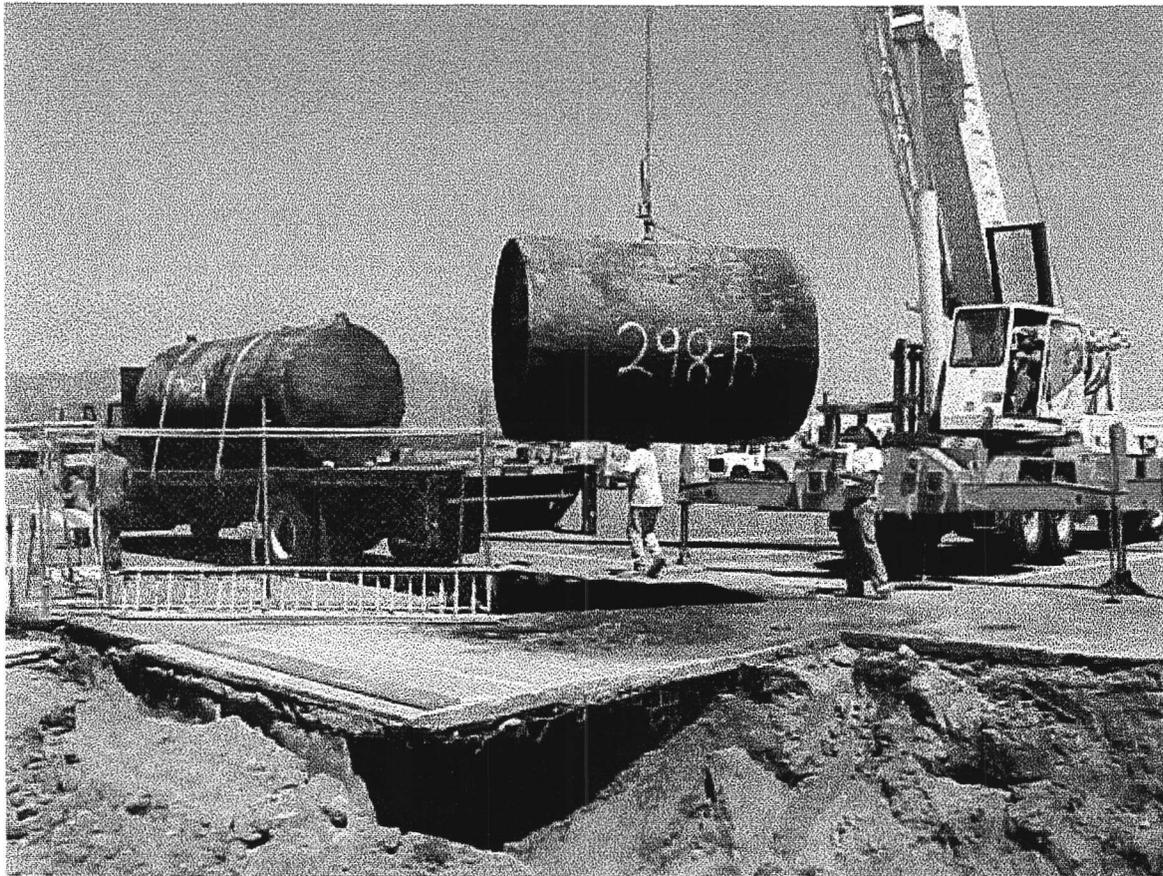
Regulatory closure through the Orange County Health Care Agency or the California Regional Water Quality Control Board has been achieved for more than 300 or the Station's 400 UST Sites as of early August 1999.



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 6.

Removal of Underground Storage Tanks (USTs) 298A and 298B
Former Fuel Dispensing Facility in the Public Works Area
July 1999



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 7.

Removal of Underground Storage Tanks (USTs) 651-1, 651-2, 651-3, and 651-4
Marine Corps Exchange Gas Station
July 1999



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 8.

Site Verification Drilling Activities at the Former Burn Pit Site – MSC B2



ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA

Photograph 9.

Closure-in-Place of Inactive Underground Storage Tank (UST) 462B near Hangar
Building 462

Closure-in-place activities, including the filling of the tank with a cement slurry, were accomplished with oversight by the Orange County Health Care Agency.

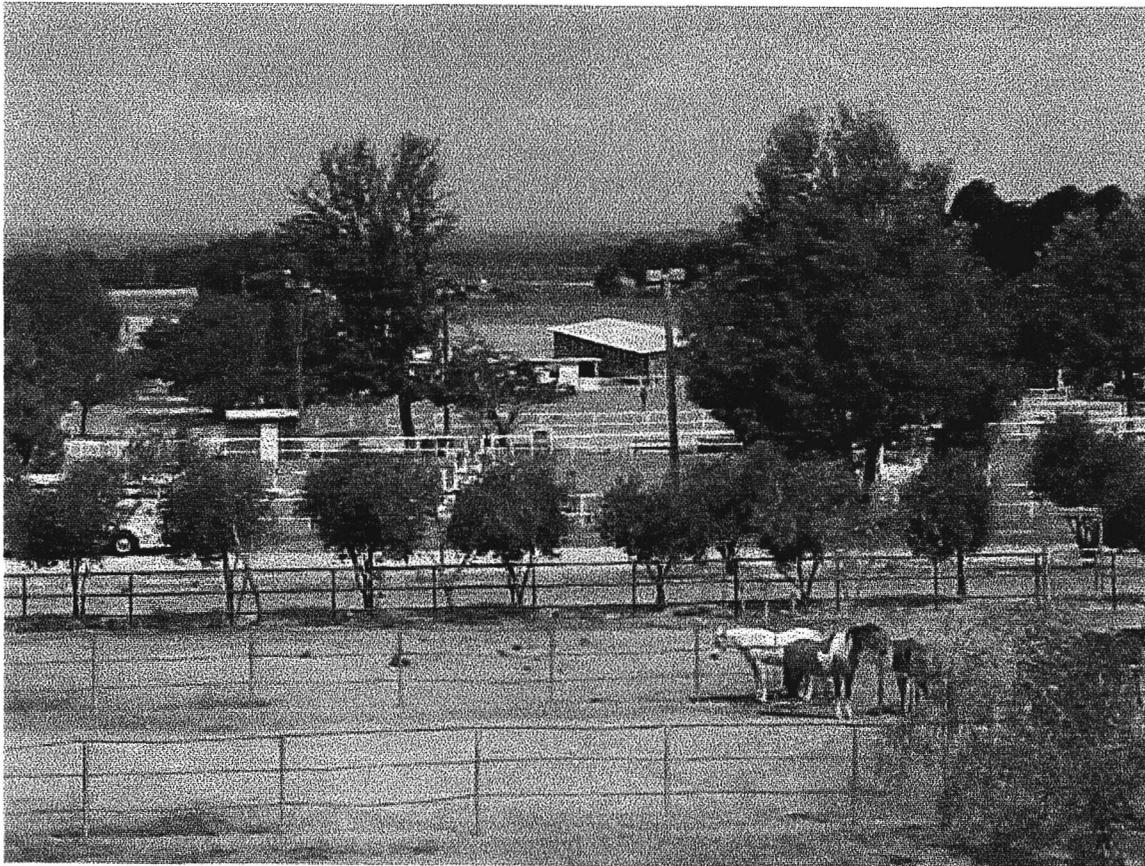
Nearby subsurface utilities and the adjacent hangar wall made excavation of the tank impractical.

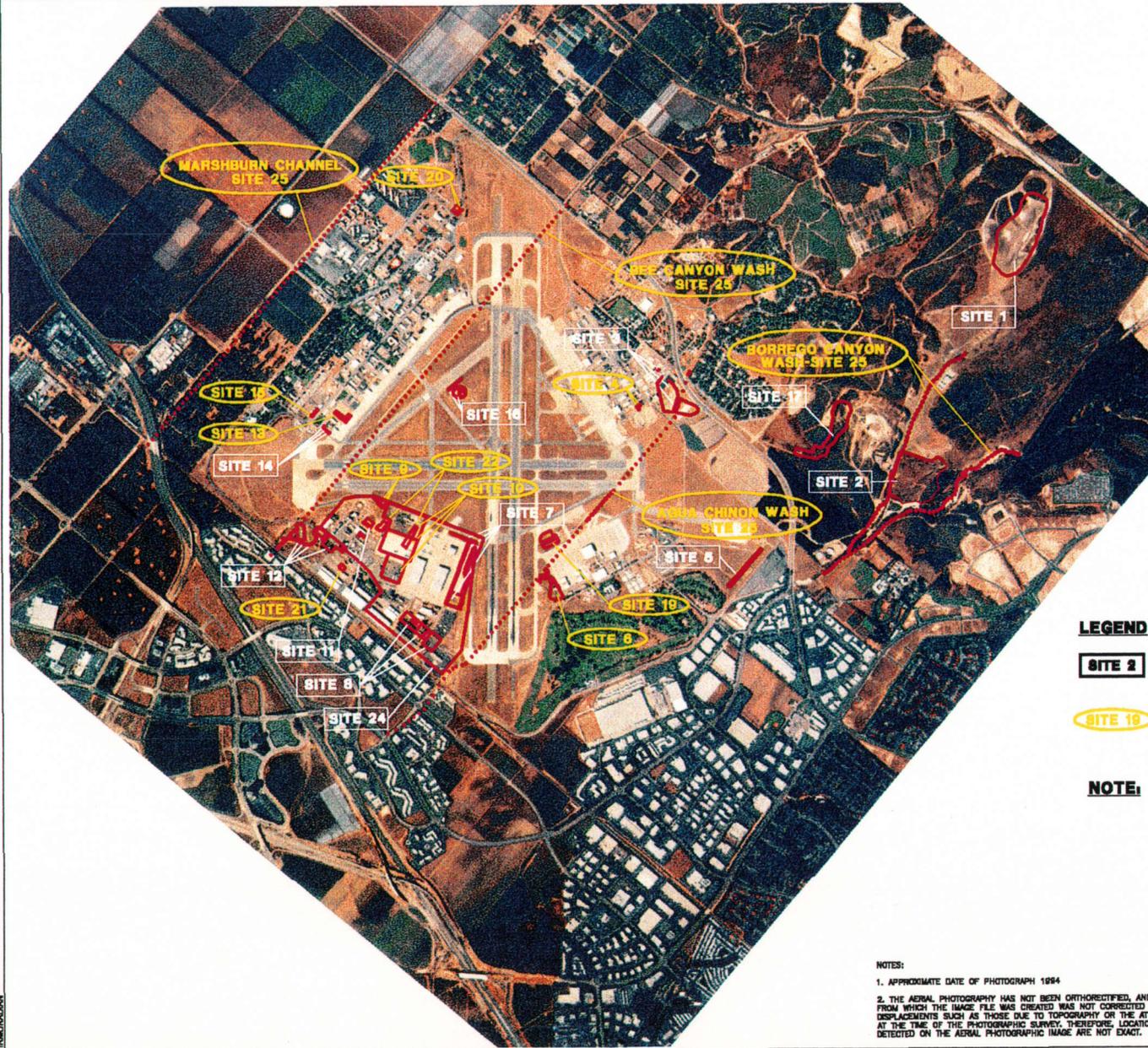


**ENVIRONMENTAL RESTORATION PROGRAM OVERVIEW – FISCAL YEAR 1999
MARINE CORPS AIR STATION, EL TORO, CALIFORNIA**

Photograph 10.
El Toro Stables.

Visual Inspections of the Environmental Locations of Concern including Aerial Photograph Anomaly Sites at the Stable Area Were Completed During the Development of the Finding of Suitability to Lease Documentation for the Stables, the Golf Course, and Five Other Parcels in May 1999





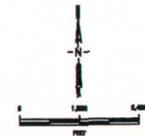
INSTALLATION RESTORATION PROGRAM SITES

- SITE DESCRIPTION
1. EOD RANGE
 2. MAGAZINE ROAD LANDFILL
 3. ORIGINAL LANDFILL
 4. PETROBRINE SPILL AREA
 5. PERMETEX LANDFILL
 6. DROP TANK DRAINAGE AREA NO. 1
 7. DROP TANK DRAINAGE AREA NO. 2
 8. DRUM STORAGE AREA
 9. CRASH CREW PIT NO. 1
 10. PETROLEUM DISPOSAL AREA
 11. TRANSFORMER STORAGE AREA
 12. SLUDGE DRYING BEDS
 13. OIL CHANGE AREA
 14. BATTERY ACID DISPOSAL AREA
 15. SUSPENDED FUEL TANKS
 16. CRASH CREW PIT NO. 2
 17. COMMUNICATION STATION LANDFILL
 18. GROUNDWATER
 19. ACER SITE
 20. HOBBY SHOP
 21. MATERIALS MANAGEMENT GROUP
 22. TACTICAL AIR FUEL DISPENSING SYSTEM
 23. VOLATILE ORGANIC COMPOUND (VOC) SOURCE AREA
 24. MAJOR DRAINAGES

LEGEND

- SITE 2** REQUIRE ACTION SITE
- SITE 19** NO FURTHER ACTION SITE
 (AS OF SEPTEMBER 1997)

NOTE: SITE 18, REGIONAL GROUNDWATER PLUME IS OFF STATION TO THE WEST.



NOTES:

1. APPROXIMATE DATE OF PHOTOGRAPH 1984
2. THE AERIAL PHOTOGRAPHY HAS NOT BEEN ORTHORECTIFIED, AND THE PHOTOGRAPH FROM WHICH THE IMAGE FILE WAS CREATED WAS NOT CORRECTED FOR PHOTOGRAMMETRIC DISPLACEMENTS SUCH AS THOSE DUE TO TOPOGRAPHY OR THE ALTITUDE OF THE AIRCRAFT AT THE TIME OF THE PHOTOGRAPHIC SURVEY. THEREFORE, LOCATIONS OF FEATURES DETECTED ON THE AERIAL PHOTOGRAPHIC IMAGE ARE NOT EXACT.

SOUTHWEST DIVISION NAVAL FACILITIES ENGINEERING COMMAND		
MCAS EL TORO, CA		
INSTALLATION RESTORATION PROGRAM (IRP) SITES		
FILE NO.	FIGURE	DATE
17486159.DWG	FIGURE	



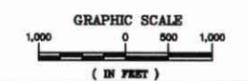
REGULATORY CLOSURES OF UNDERGROUND STORAGE TANK SITES CALENDAR YEAR TOTALS

CALENDAR YEAR	NUMBER OF REGULATORY CLOSURES
1995	9
1996	162
1997	81
1998	33
1999	18
TOTAL AS OF APRIL 1999	303

EXPLANATION:

- UNDERGROUND STORAGE TANKS (UST)
- CLOSED UNDERGROUND STORAGE TANKS

REFERENCE:
BECHTEL NATIONAL INC. DRAWING
FILE NO. 075U1703



**SOUTHWEST DIVISION
NAVAL FACILITIES ENGINEERING COMMAND**

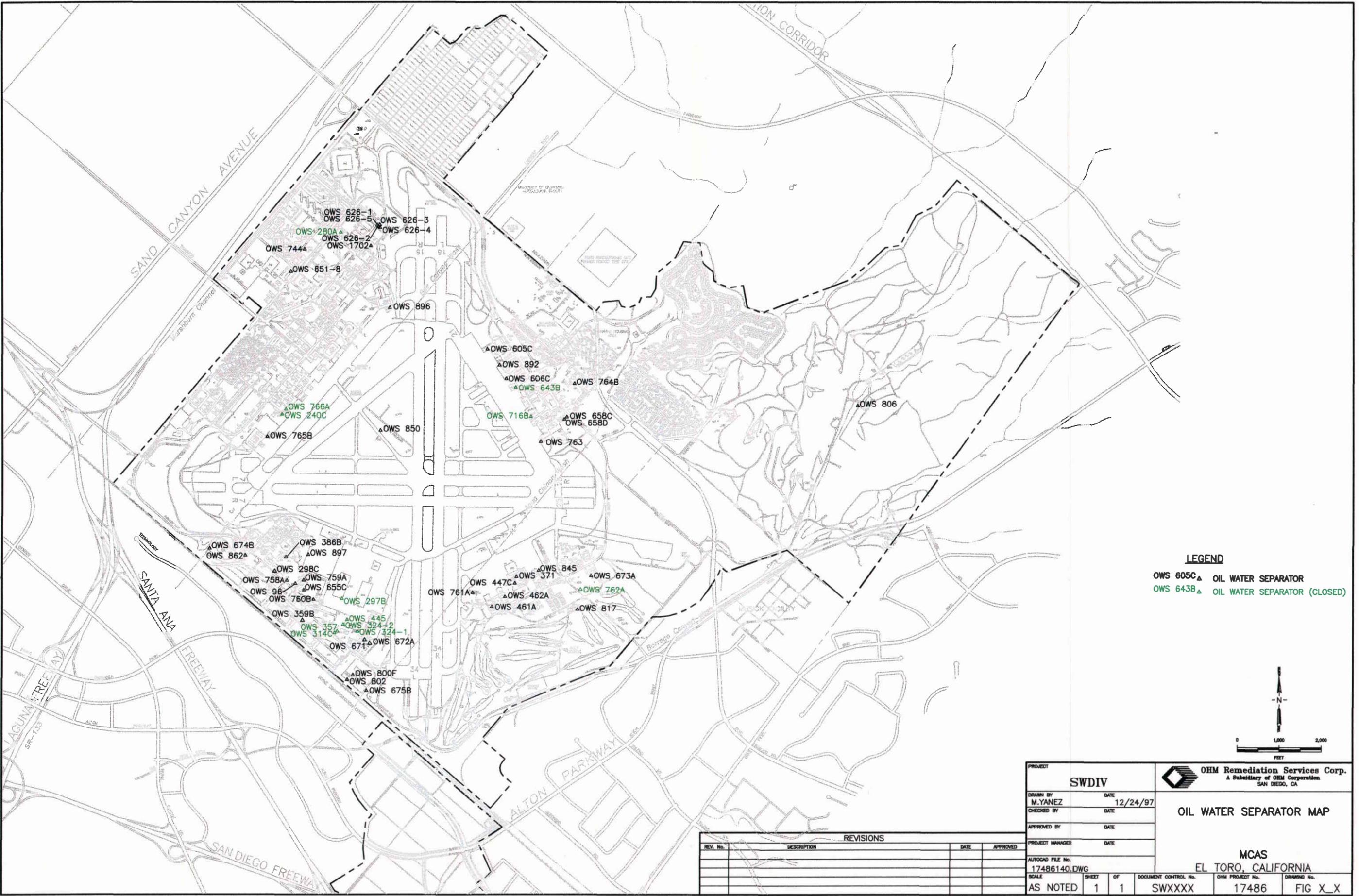
MCAS EL TORO, CA

**UNDERGROUND STORAGE TANK
PROGRAM MAP**

FILE NO.	DATE
17486166.DWG	

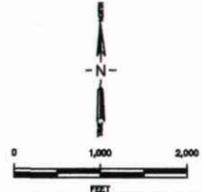
Witzel-Yanez Design 5/11/99 3:25 PM 17486166.dwg

Witzel-Yanez Design 7/27/99 4:12 PM 17486140.dwg



LEGEND

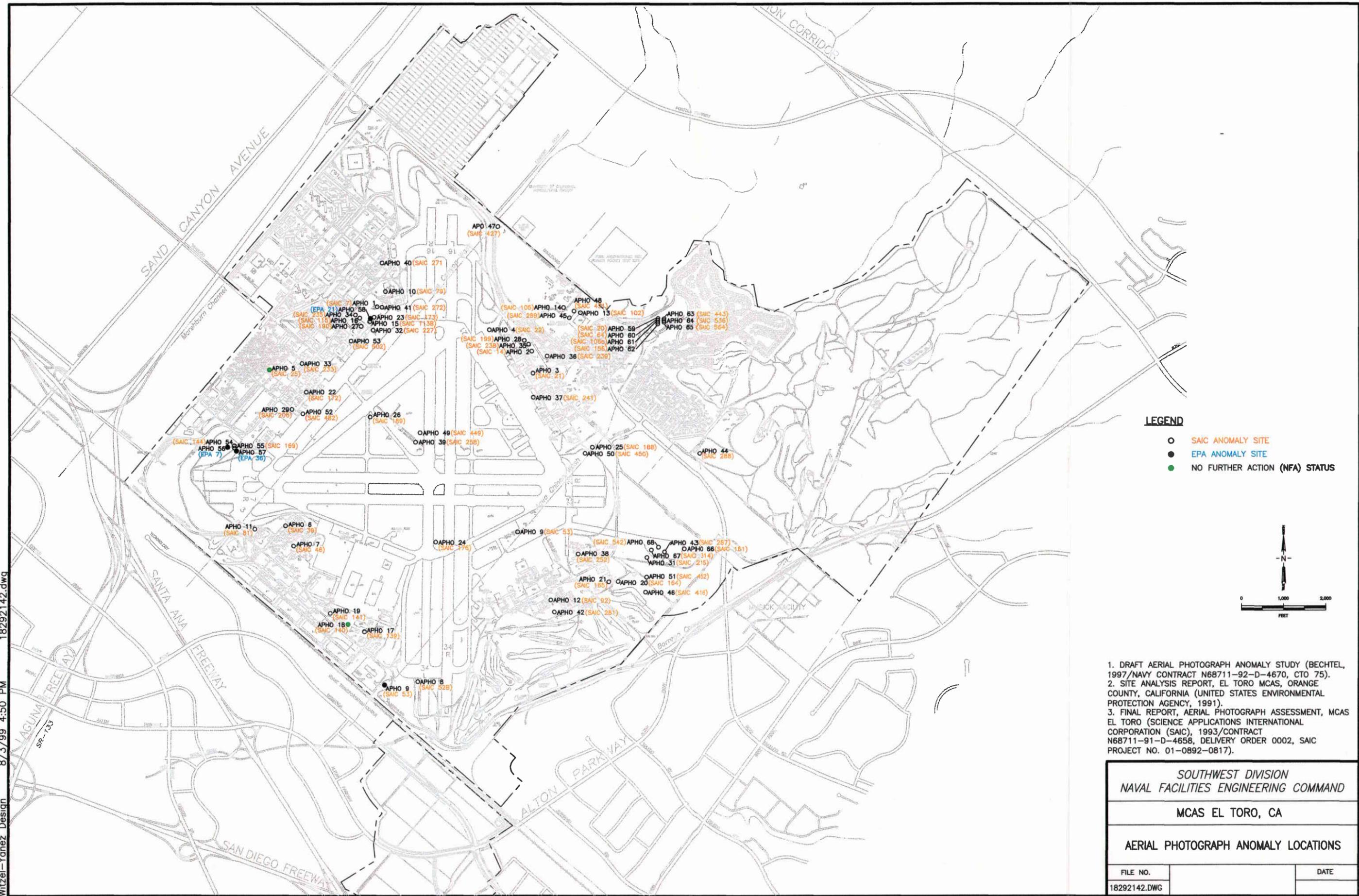
- OWS 605C ▲ OIL WATER SEPARATOR
- OWS 643B ▲ OIL WATER SEPARATOR (CLOSED)



REVISIONS			
REV. No.	DESCRIPTION	DATE	APPROVED

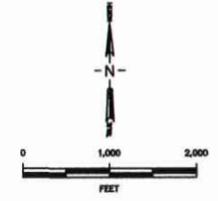
PROJECT SWDIV		 OHM Remediation Services Corp. A Subsidiary of OHM Corporation SAN DIEGO, CA	
DRAWN BY M.YANEZ	DATE 12/24/97	OIL WATER SEPARATOR MAP	
CHECKED BY	DATE		
APPROVED BY	DATE		
PROJECT MANAGER	DATE		
AUTOCAD FILE No. 17486140.DWG		MCAS EL TORO, CALIFORNIA	
SCALE AS NOTED	SHEET 1	OF 1	DOCUMENT CONTROL No. SWXXXX OHM PROJECT No. 17486 DRAWING No. FIG X_X

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LEGEND

- SAIC ANOMALY SITE
- EPA ANOMALY SITE
- NO FURTHER ACTION (NFA) STATUS



1. DRAFT AERIAL PHOTOGRAPH ANOMALY STUDY (BECHTEL, 1997/NAVY CONTRACT N68711-92-D-4670, CTO 75).
2. SITE ANALYSIS REPORT, EL TORO MCAS, ORANGE COUNTY, CALIFORNIA (UNITED STATES ENVIRONMENTAL PROTECTION AGENCY, 1991).
3. FINAL REPORT, AERIAL PHOTOGRAPH ASSESSMENT, MCAS EL TORO (SCIENCE APPLICATIONS INTERNATIONAL CORPORATION (SAIC), 1993/CONTRACT N68711-91-D-4658, DELIVERY ORDER 0002, SAIC PROJECT NO. 01-0892-0817).

SOUTHWEST DIVISION NAVAL FACILITIES ENGINEERING COMMAND		
MCAS EL TORO, CA		
AERIAL PHOTOGRAPH ANOMALY LOCATIONS		
FILE NO.		DATE
18292142.DWG		