



US Army Corps
Of Engineers
Wilmington District

PUBLIC NOTICE

Issue Date: May 16, 2007
Comment Deadline: June 15, 2007
Corps Action ID #: 2007-1577-16

The Wilmington District, Corps of Engineers (Corps) has received an application from the United States Marine Corps Air Station (MCAS) Cherry Point seeking Department of the Army authorization to impact 5.5 acres of coastal wetlands by filling and excavating activities associated with improvements to target areas at BT-11 bombing target range on Piney Island, adjacent to Neuse River, West Bay, and Pamlico Sound, near Cedar Island, Carteret County, North Carolina.

Specific plans and location information are described below and shown on the attached plans. This Public Notice and all attached plans are also available on the Wilmington District Web Site at www.saw.usace.army.mil/WETLANDS/

Applicant: Marine Corps Air Station Cherry Point
PSC Box 8002 Attn: (Robin Ferguson)
Cherry Point, North Carolina 28533

Authority

The Corps will evaluate this application and decide whether to issue, conditionally issue, or deny the proposed work pursuant to applicable procedures of Section 10 of the Rivers and Harbors Act and Section 404 of the Clean Water Act.

Location

The project site is located at 35.006, -76.458, on BT-11 bombing range/Piney Island, bordered to the west by the Neuse River, to the east by East Bay, to the north by the Pamlico Sound, and to the south by Long Bay, just west/northwest of Cedar Island, Carteret, Carteret County.

Existing Site Conditions

The BT-11 bombing range, also known as Piney Island, has been used as a bombing target since its acquisition in 1952 and is accessible only by boat or helicopter. There are currently 13 targets located on land and in water scattered throughout the large complex. The majority of the island, which is approximately 7 miles long by 2 miles wide, lies at an elevation between +/-0 to +3.0 feet above mean high water and encompasses approximately 12,500 acres (~7miles long by 2 miles wide). The upland

areas on Piney Island are man-made via the use of dredge and/or excavated material and consist of targets, roads, and a base of operations known as the Range Operations Control Center (ROCC). The ROCC is located in the southeast corner of Piney Island at Jacks Bay and is the primary point of entry. Outside of the man-made features, the rest of the range is comprised of high and low salt marsh (*Juncus roemerianus* and *Spartina alterniflora*) and open water. The underlying soil types are Lafitte Muck (frequently flooded) and Dare Muck, which both are hydric and identified as histosols.

Project Purpose

Basic: The basic purpose for improving BT-11 is to maintain its significant national importance to all branches of the military and US Coast Guard. Target improvements at the range are needed so that MCAS Cherry Point can fulfill its mandate to train and support aircrews responsible for national defense and homeland security, and to maintain mission readiness in the face of today's threats.

Overall: Proposed target improvements are essential to provide required training to the 11 squadrons based at MCAS Cherry Point and for other East Coast-based Navy squadrons. Specific need for the project falls into three areas: visibility of targets, access to targets for target replacement and maintenance, and access to the range for ordnance removal. Currently pilots have difficulty visually identifying targets prior to ordnance delivery; and range managers cannot readily access certain target areas to replace and maintain targets or remove ordnances. The proposed action would also create new target pads that would provide a stable target base to support the weight of the target, absorb the impact of ordnance, and minimize the potential for ricochet.

Project Description

The proposed action involves the removal of existing target materials, constructing target pads in the form of earthen berms, and placing new, realistic targets within the pads. Four separate target areas are proposed and are the following: TOW, which is a convoy of five vehicles in a straight line; Train, which is a simulated train; SAM, which is a simulated surface-to-air missile site with six targets placed in a wagon wheel pattern; and Truck Convoy, which is a convoy of 17 vehicles with SAM launchers. These structures will be constructed by placing fill on top of geotextile fabric, which will be laid directly over existing wetlands.

The TOW target site is located at the northern end of BT-11, approximately 2 miles north of the closest existing road, and is adjacent to East Bay. Construction fill material for the target pad will come from a wetland borrow area approximately 0.8 acres in size, and is about 40 feet from the pad site. The sandy-silt material suitable for the construction pad is approximately 4 to 6-feet deep below the surface. The first 4 to 6-feet consist of muck, or organic material, that will be placed to the side, and subsequently replaced back into the borrow area once the required 4,750 cubic yards of material has been extracted for the target berm. Once the sandy-silt material dewatered, the material will be graded to form the base of the target. A small portion of the muck will be spread

over the berm at 1.0- foot thickness as a stabilization measure and as a sub base for planting *Spartina alterniflora* and *Spartina patens*. Final dimensions of the TOW target pad, or berm, will be approximately 470 feet long by 52 feet wide by 8.0 high (5.0 feet high after settling) and will impact approximately 0.6 acres of wetlands. Construction access to the TOW target site will be limited to a 50-foot wide corridor and clearly marked to limit any potential disturbance, and precautions will be taken to reduce rutting. No fill will be transported to the site.

For the SAM, Train, and Truck Convoy targets, construction methods and access to the sites will be similar to each other. The fill material will come from the proposed simulated airstrip target and Indian Ditch mitigation sites, which are located at the terminus of the main base road and along the southern Piney Island property boundary, respectively. The construction fill will be transported to the target pad sites via temporary construction roads comprised of composite mats. High performance, composite mats will be interlocked and placed on top of the marsh to create the temporary access roads. Each mat size is 112 square feet and weighs approximately 1,000 pounds. Preliminary estimates indicate that three layers of matting are required to support construction vehicles transporting dry fill material and other heavy equipment across the marsh. Construction of each of the three target base pads are similar to the TOW site where geotextile fabric will be laid over the existing wetland elevations and fill placed on top of the fabric. Once the correct amount of fill is put down, the material will be graded to its final configuration. Also like the TOW site, the Train and Truck Convoy target base, or berms, will be approximately 470 feet long by 52 feet wide by 8.0 feet high (5.0 feet high after settling); and each target base will impact approximately 0.6 acres of wetlands and use approximately 4,750 cubic yards to construct the each base. The SAM target base contains a different configuration and will require additional fill material to construct. This wagon wheel shaped target has six spurs, or arms, extending from a circular center. The arms will be berms that are approximate 52 feet wide by 8.0 feet high (5.0 feet are settling) and will extend approximately 180 feet from the center. Approximately 16,000 cubic yards will be needed to construct the entire SAM target base and 1.9 acres of wetlands are estimated to be impacted.

After the target bases are constructed, new modular targets would be placed on the pads by helicopter. The modular targets are constructed of three-dimensional metal frame that support large, heavy sheet-metal panels. The principal advantage of the modular targets is that the panels cannot retain ordnance, because ordnance that hit the flat panels either do not penetrate the panels and fall to the ground outside the target or pass through the panels and fall to the ground inside the target frame. The panels are simply removed from the frame, are readily inspected, and then can be taken off range for recycling or disposal.

Note that the total impacts listed above are approximately 4.5 acres of wetlands. However, the applicant is requesting authorization for 5.5 acres of wetland impacts. This difference is due to the uncertainty of the fill consistency used to construct the target sites. The 4.5 acres of impacts is estimated based on the design slope for the berms of 2.5:1. If the excavated material is more fine than anticipated, the berm will require a

more reduced slope. With this uncertainty of the stability of the berms, the applicant is proposing a maximum of 5.5 acres of wetland impacts, knowing the impact amount could be much less when the design is finalized based on the consistency of the material.

MCAS Cherry Point has developed a mitigation plan to fully compensate for the maximum 5.5 acres of tidal wetland impacts. The proposed mitigation will restore 5.5 acres of coastal wetlands at two locations, the Airstrip Target and Indian Ditch. The Airstrip Target site was wetlands that had been previously filled by excavating adjacent borrow canals, and subsequently expanded by using dredge material during maintenance dredging in Jacks Bay. At the Indian Ditch site, wetlands were filled when the Indian Ditch, or Old Canal, was excavated to connect Long Bay with Turnagain Bay for boat traffic. In both areas, the mitigation plan includes the removal of the fill back to original coastal wetland elevations, or undisturbed adjacent wetland grade, and the sites replanted with coastal marsh vegetation, black needlerush and saltmeadow cordgrass. Prior to planting, the Airstrip Target area will be site prepped by ripping and plowing to loosen the soil due to long-term and potential short-term compaction. Site prep work at the Indian Ditch area is not planned since equipment accessibility will be difficult once the fill material is removed. Once excavated material is removed at the Indian Ditch, coir (coconut fiber) matting will be installed along the canal edges to aid in preventing erosion as vegetation is being established.

The total distributed mitigation acres will be the following: 3.0 acres of coastal marsh restoration at the Airstrip Target site; 2.2 acres of coastal marsh restoration and 0.6 acres of enhancement at the Indian Ditch site; and a proposed 0.3 acres of coastal marsh restoration within the 0.8 acre borrow area at the TOW Target site. The applicant proposes to monitor all mitigation sites for 5 years or until success criteria are met. Proposed success criteria for vegetation would be a density of 70 percent herbaceous plant cover after 5 years; and for hydrology, the site would be ponded, flooded, or saturated during the growing season for a duration within 10 percent of the adjacent reference wetland. For long-term protection, the applicant will incorporate the sites into the MCAS Cherry Point *Integrated Natural Resource Management Plan* that would restrict or prohibit incompatible uses that might otherwise jeopardize the objectives of the mitigation.

Other Required Authorizations

This notice and all applicable application materials are being forwarded to the appropriate State agencies for review. Water Quality Certification may be required from the North Carolina Division of Water Quality.

The applicant has not provided to the Corps, a certification statement that his/her proposed activity complies with and will be conducted in a manner that is consistent with the approved North Carolina Coastal Zone Management Program. Pursuant to 33 CFR 325.2(b)(2), the Corps can not issue a permit for the proposed work until the applicant submits such a certification to the Corps and the North Carolina Division of Coastal

Management and notifies the Corps that it concurs with the applicant's consistency certification.

Essential Fish Habitat

This notice initiates the Essential Fish Habitat (EFH) consultation requirements of the Magnuson-Stevens Fishery Conservation and Management Act. The Corps' initial determination is that the proposed project may adversely impact EFH or associated fisheries managed by the South Atlantic or Mid Atlantic Fishery Management Councils or the National Marine Fisheries Service. The proposed work will occur within coastal marsh that is adjacent to Primary Nursery Areas (PNA) and adjacent to open water that feeds into PNAs that increase the potential of impacting EFH.

Cultural Resources

The Corps has consulted the latest published version of the National Register of Historic Places and is not aware that any registered properties, or properties listed as being eligible for inclusion therein are located within the project area or will be affected by the proposed work. Presently, unknown archeological, scientific, prehistoric, or historical data may be located within the project area and/or could be affected by the proposed work.

Endangered Species

The Corps has reviewed the project area, examined all information provided by the applicant. Based on available information, the Corps has determined pursuant to the Endangered Species Act of 1973 (ESA), that the proposed project may affect the federally listed threatened or endangered West Indian Manatee, *Trichechus manatus*, species. With a previous sighting of the West Indian manatee within a BT-11 canal and other recorded sightings within the Neuse River, the potential of its presence within the Indian Ditch, or Old Canal, and/or within any of the Piney Island canal exists. Informal consultation under Section 7 of the ESA will be initiated and no permit will be issued until the consultation process is complete.

Evaluation

The decision whether to issue a permit will be based on an evaluation of the probable impacts, including cumulative impacts, of the proposed activity on the public interest. That decision will reflect the national concern for both protection and utilization of important resources. The benefit which reasonably may be expected to accrue from the proposal must be balanced against its reasonably foreseeable detriments. All factors which may be relevant to the proposal will be considered including the cumulative effects thereof; among those are conservation, economics, aesthetics, general environmental concerns, wetlands, historic properties, fish and wildlife values, flood hazards, flood plain values (in accordance with Executive Order 11988), land use, navigation, shoreline erosion and accretion, recreation, water supply and conservation, water quality, energy

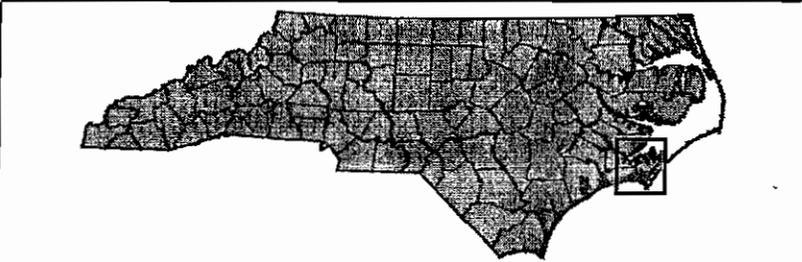
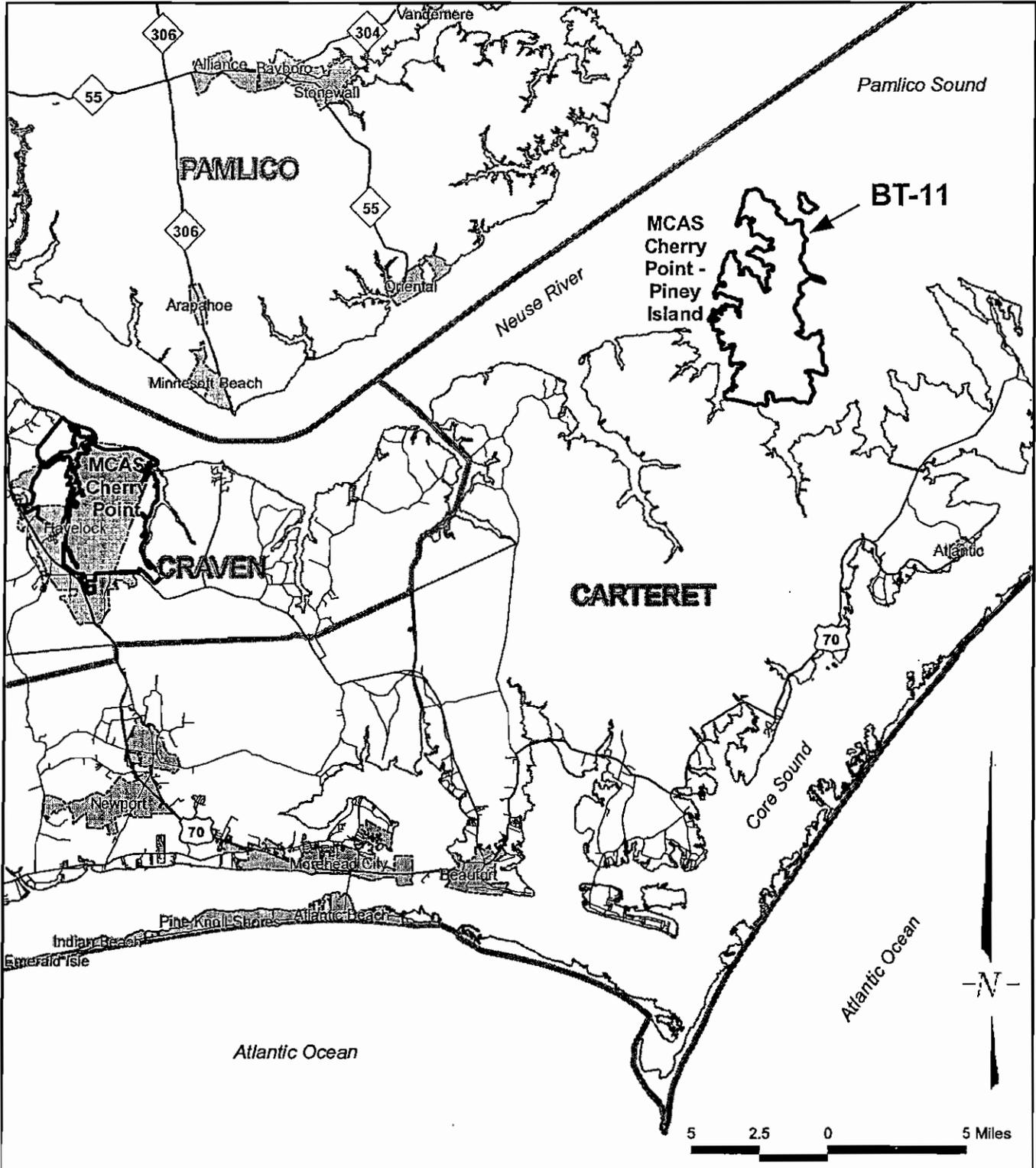
needs, safety, food and fiber production, mineral needs, considerations of property ownership, and, in general, the needs and welfare of the people. For activities involving the discharge of dredged or fill materials in waters of the United States, the evaluation of the impact of the activity on the public interest will include application of the Environmental Protection Agency's 404(b)(1) guidelines.

Commenting Information

The Corps of Engineers is soliciting comments from the public; Federal, State and local agencies and officials, including any consolidate State Viewpoint or written position of the Governor; Indian Tribes and other interested parties in order to consider and evaluate the impacts of this proposed activity. Any comments received will be considered by the Corps of Engineers to determine whether to issue, modify, condition or deny a permit for this proposal. To make this decision, comments are used to assess impacts on endangered species, historic properties, water quality, general environmental effects and the other public interest factors listed above. Comments are used in the preparation of an Environmental Assessment (EA) and/or an Environmental Impact Statement (EIS) pursuant to the National Environmental Policy Act (NEPA). Comments are also used to determine the need for a public hearing and to determine the overall public interest of the proposed activity.

Any person may request, in writing, within the comment period specified in this notice, that a public hearing be held to consider the application. Requests for public hearings shall state, with particularity, the reasons for holding a public hearing. Requests for a public hearing shall be granted, unless the District Engineer determines that the issues raised are insubstantial or there is otherwise no valid interest to be served by a hearing.

Written comments pertinent to the proposed work, as outlined above, will be received by the Corps of Engineers, Wilmington District, until 5pm, June 15, 2007. Comments should be submitted to Mr. Mickey Sugg, Post Office Box 1890, Wilmington, North Carolina 28402-1890. If you have questions, please contact Mr. Sugg at (910) 251-4811.

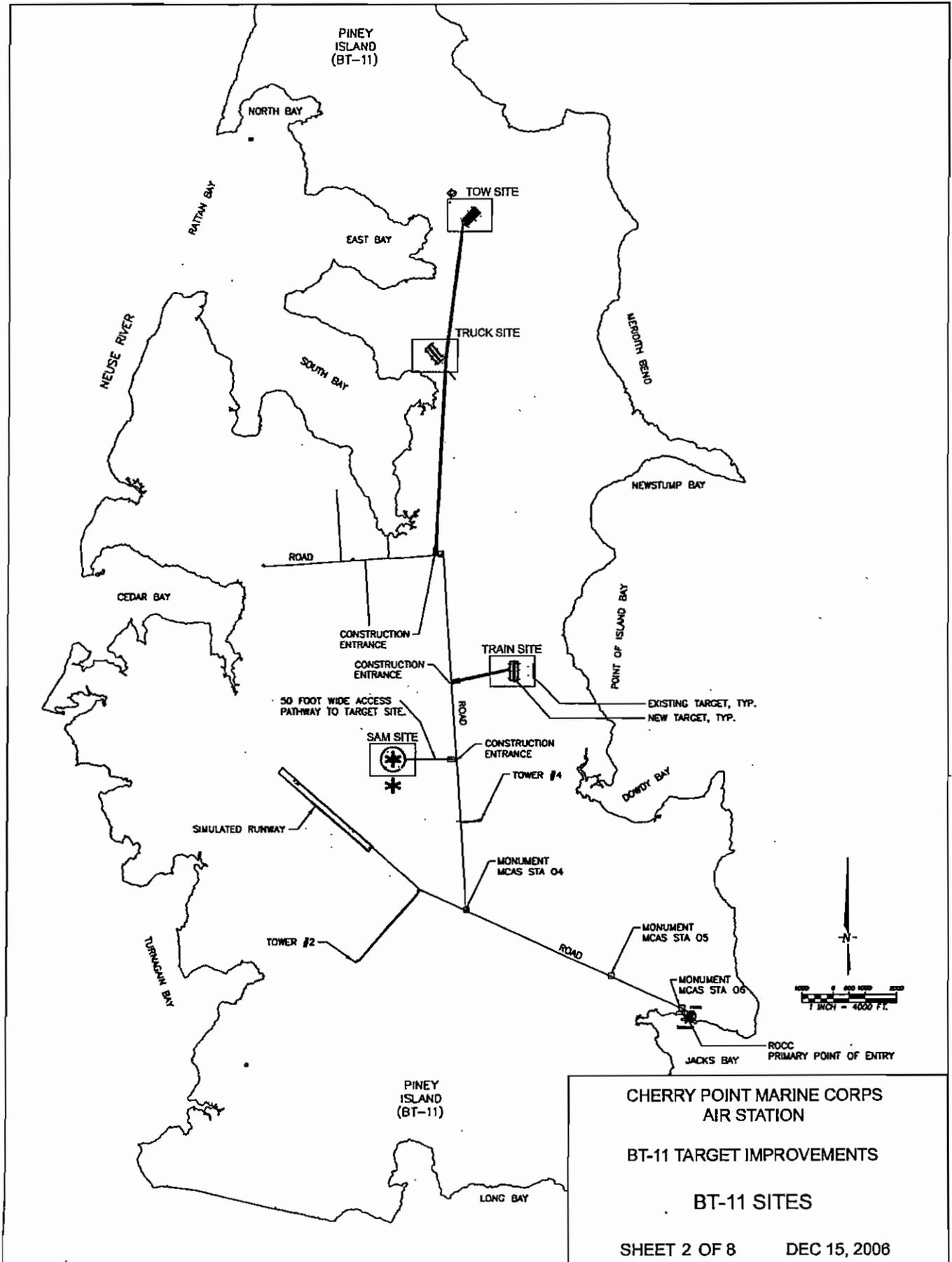


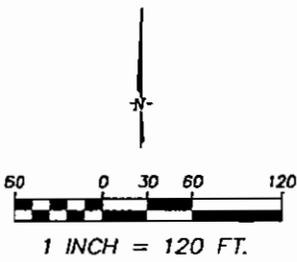
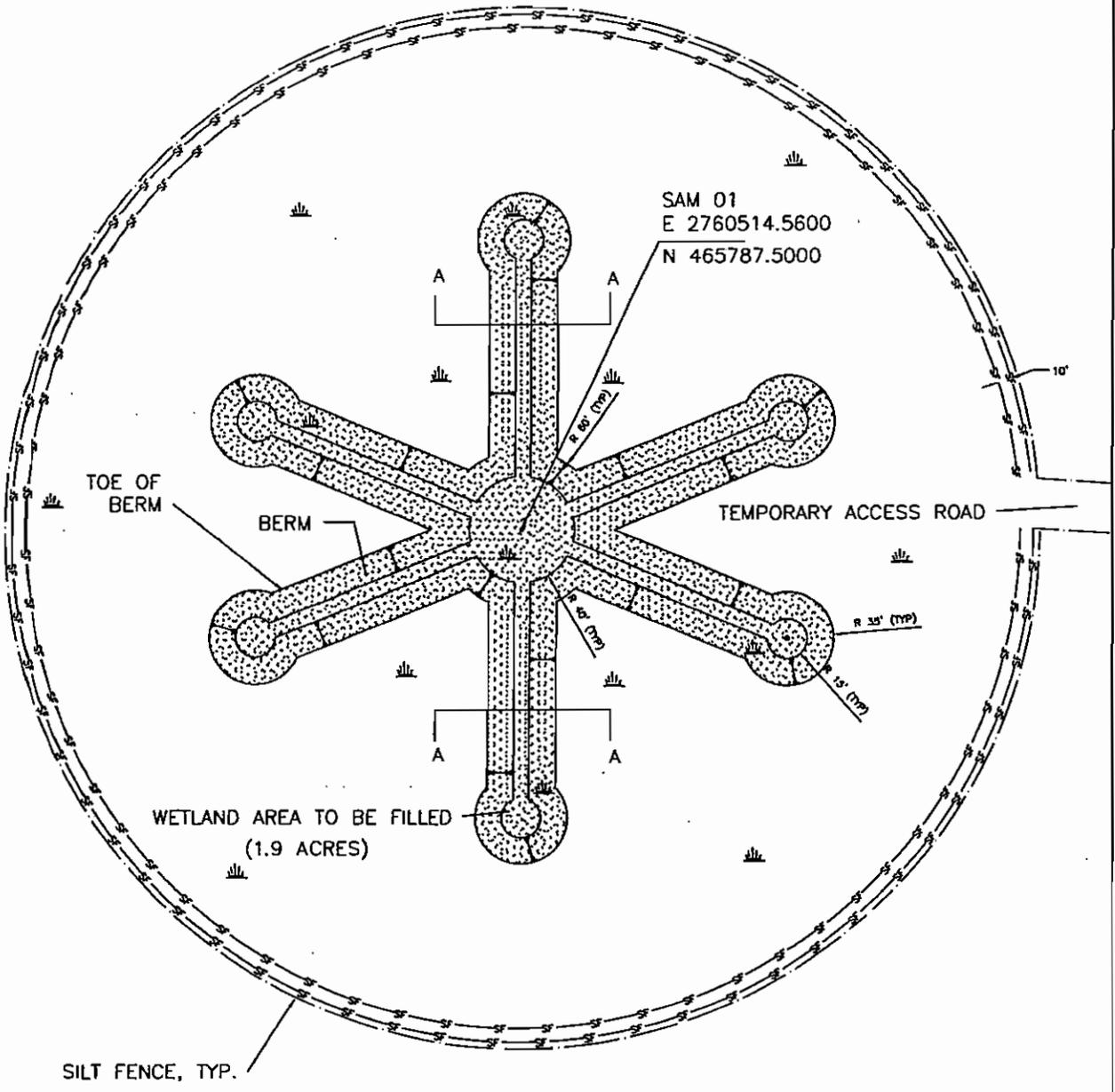
CHERRY POINT MARINE CORPS
AIR STATION

BT-11 TARGET IMPROVEMENTS

VICINITY MAP

SHEET 1 OF 8 DEC 15, 2006



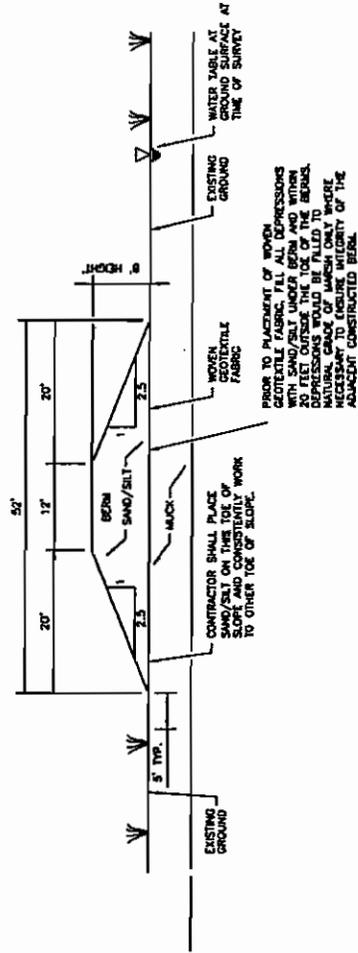


CHERRY POINT MARINE CORPS
 AIR STATION

BT-11 TARGET IMPROVEMENTS

SAM TARGET - PLAN

SHEET 3 OF 8 DEC 15, 2006



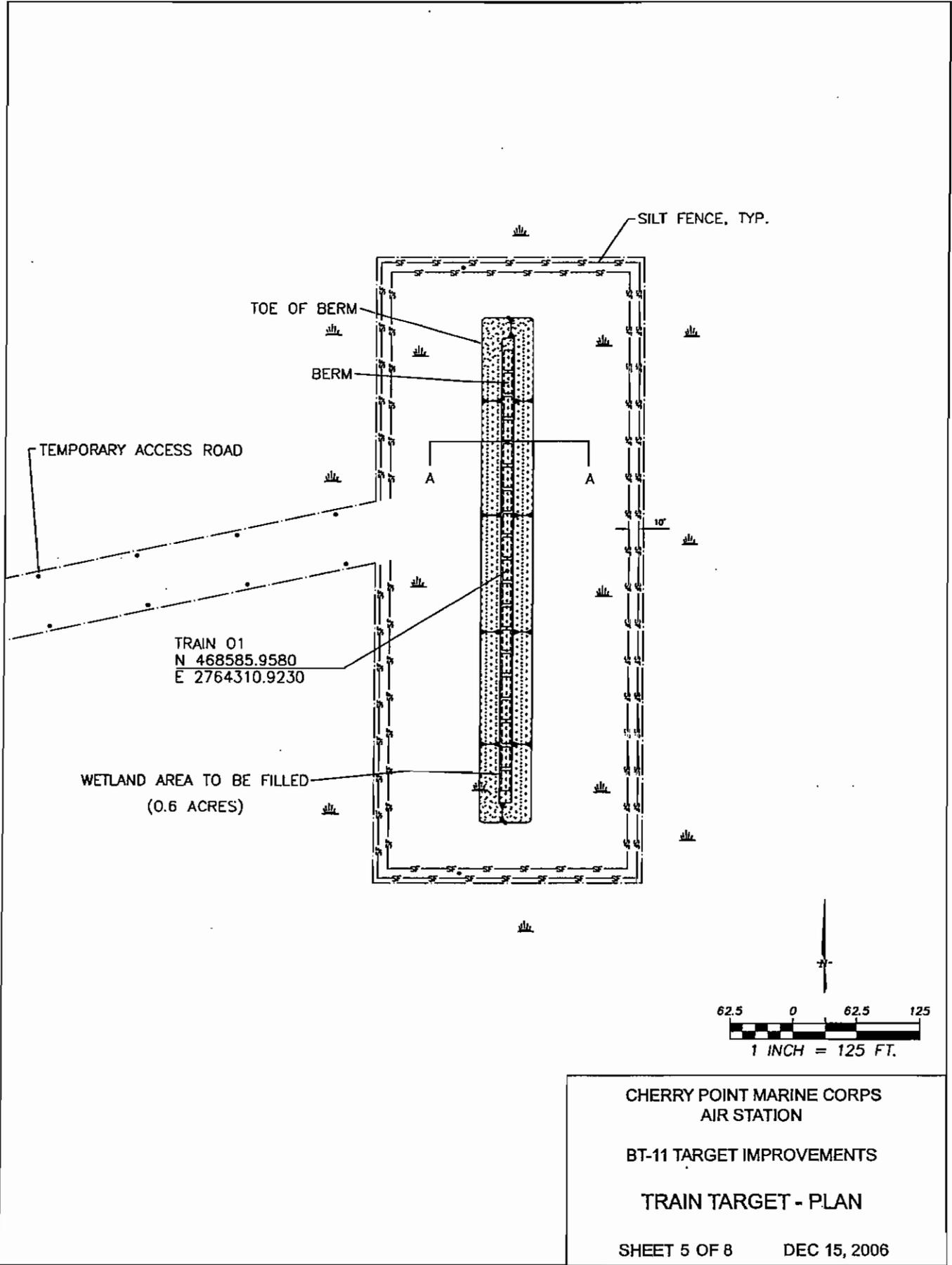
TYPICAL SECTION A-A

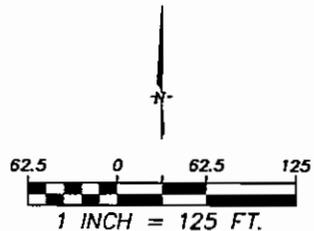
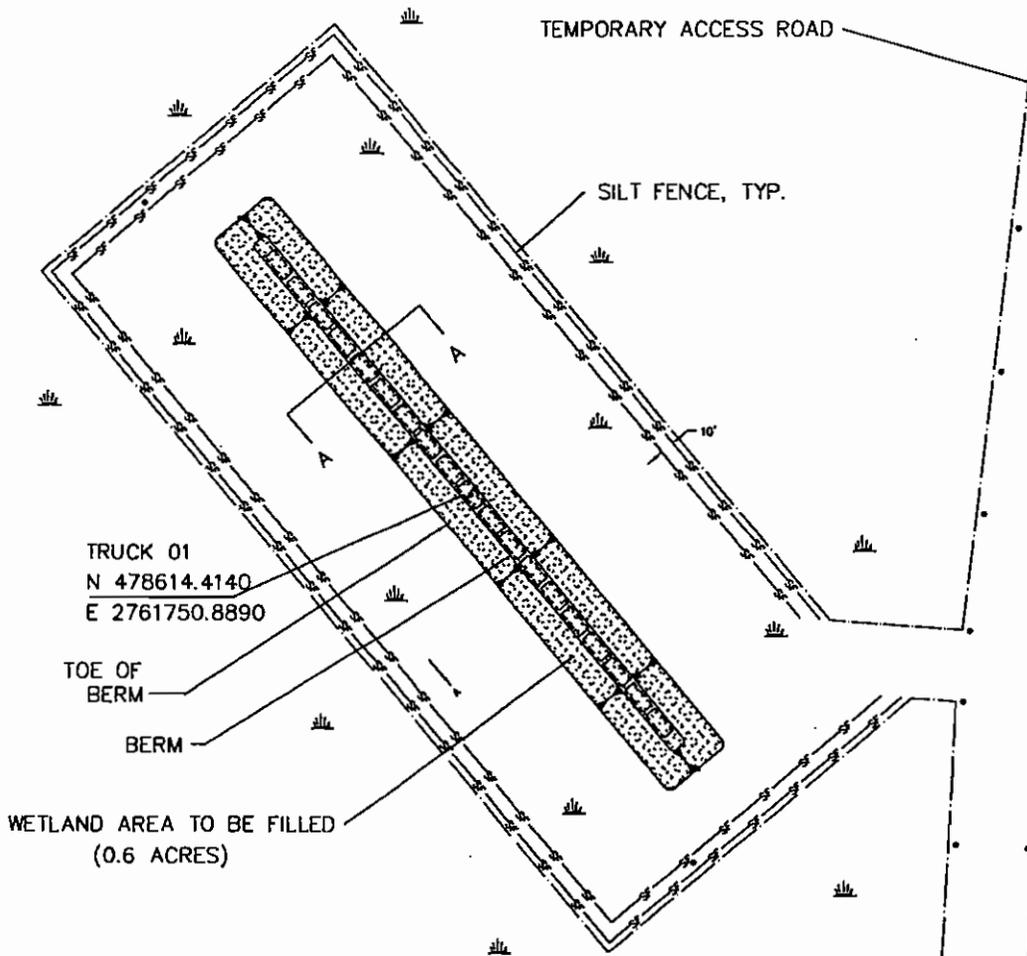
CHERRY POINT MARINE CORPS
AIR STATION

BT-11 TARGET IMPROVEMENTS

TYPICAL CROSS SECTION
SAM, TRAIN & TRUCK SITES

SHEET 4 OF 8 DEC 15, 2006



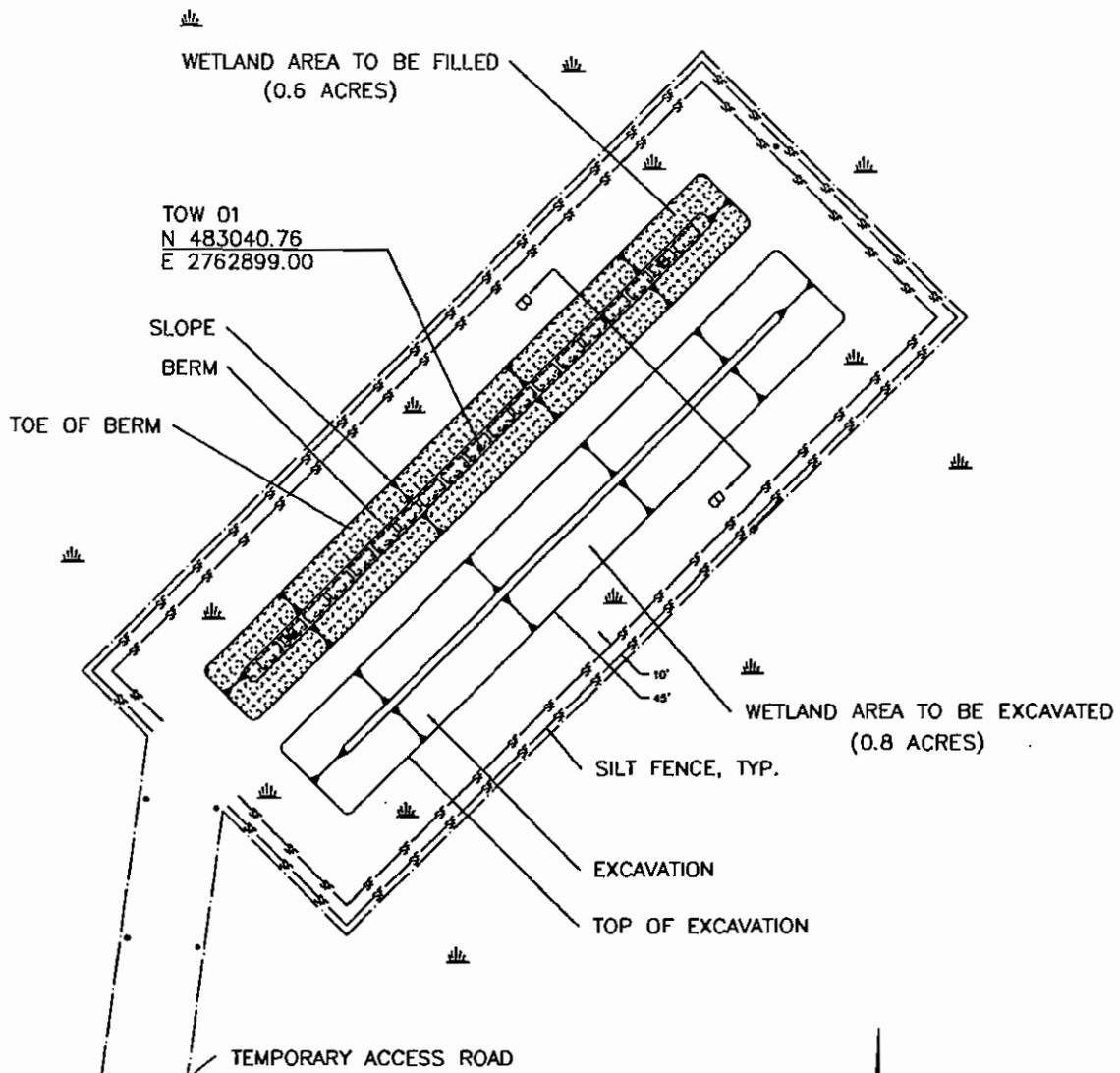


CHERRY POINT MARINE CORPS
AIR STATION

BT-11 TARGET IMPROVEMENTS

TRUCK TARGET - PLAN

SHEET 6 OF 8 DEC 15, 2006

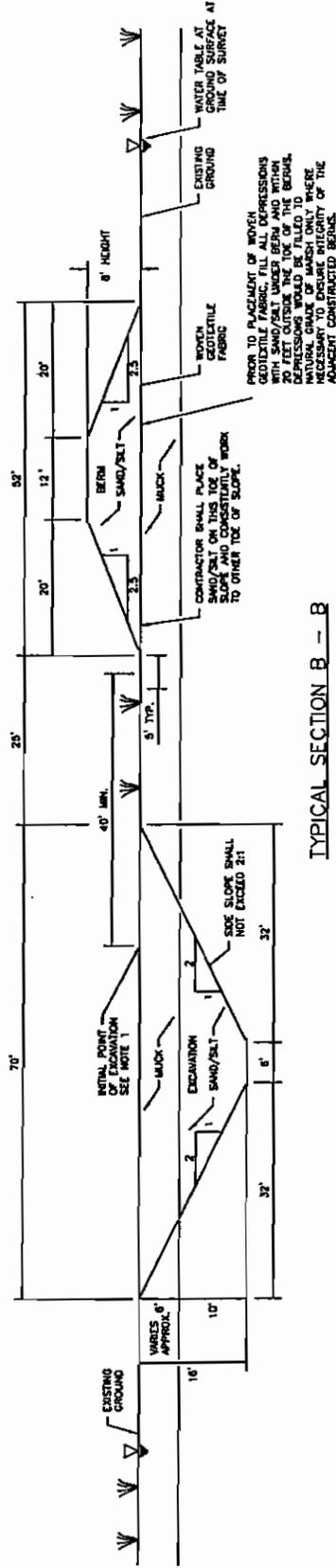


CHERRY POINT MARINE CORPS
 AIR STATION

BT-11 TARGET IMPROVEMENTS

TOW TARGET - PLAN

SHEET 7 OF 8 DEC 15, 2006



TYPICAL SECTION B - B

PRIOR TO PLACEMENT OF WOVEN GEOTEXTILE FABRIC, FILL ALL DEPRESSIONS WITH SAND/SILT UNDER BERM AND WITHIN 20 FEET OUTSIDE THE TOE OF THE BERM. MATERIALS SHALL BE FILL TO MATCH SURFACE GRADE. REPAIRS SHALL BE NECESSARY TO ENSURE INTEGRITY OF THE ADJACENT CONSTRUCTED BERMS.

CHERRY POINT MARINE CORPS
AIR STATION
BT-11 TARGET IMPROVEMENTS
TYPICAL CROSS SECTION
TOW SITE
SHEET 8 OF 8 DEC 15, 2006

Proposed Wetland Mitigation Sites

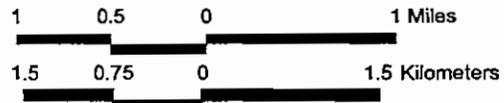
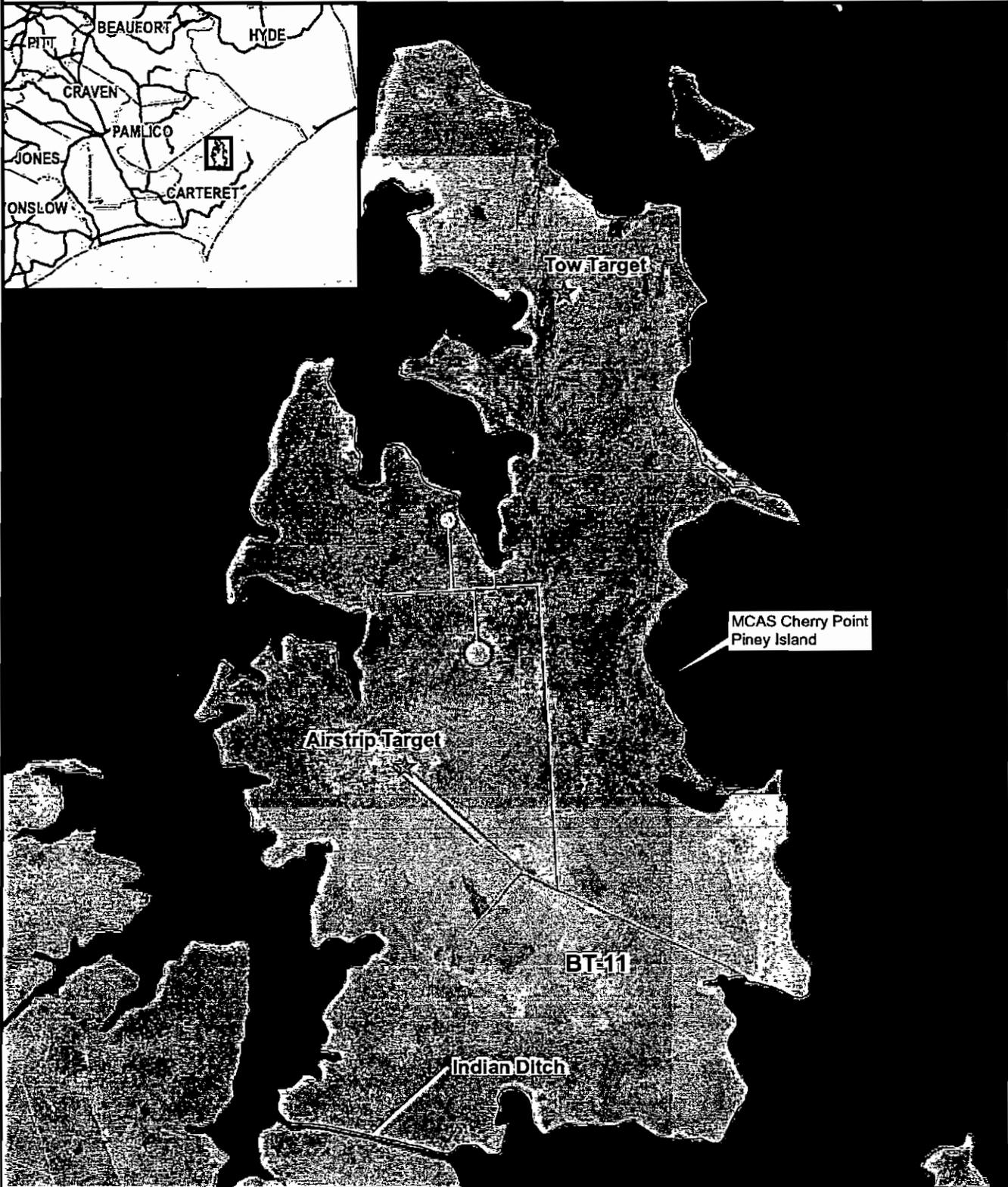
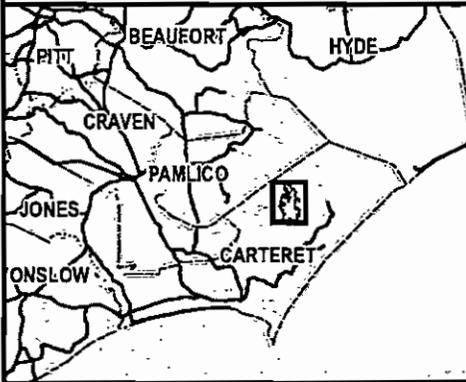


Figure 1-1

Indian Ditch (Site CA-2)
Mitigation Site

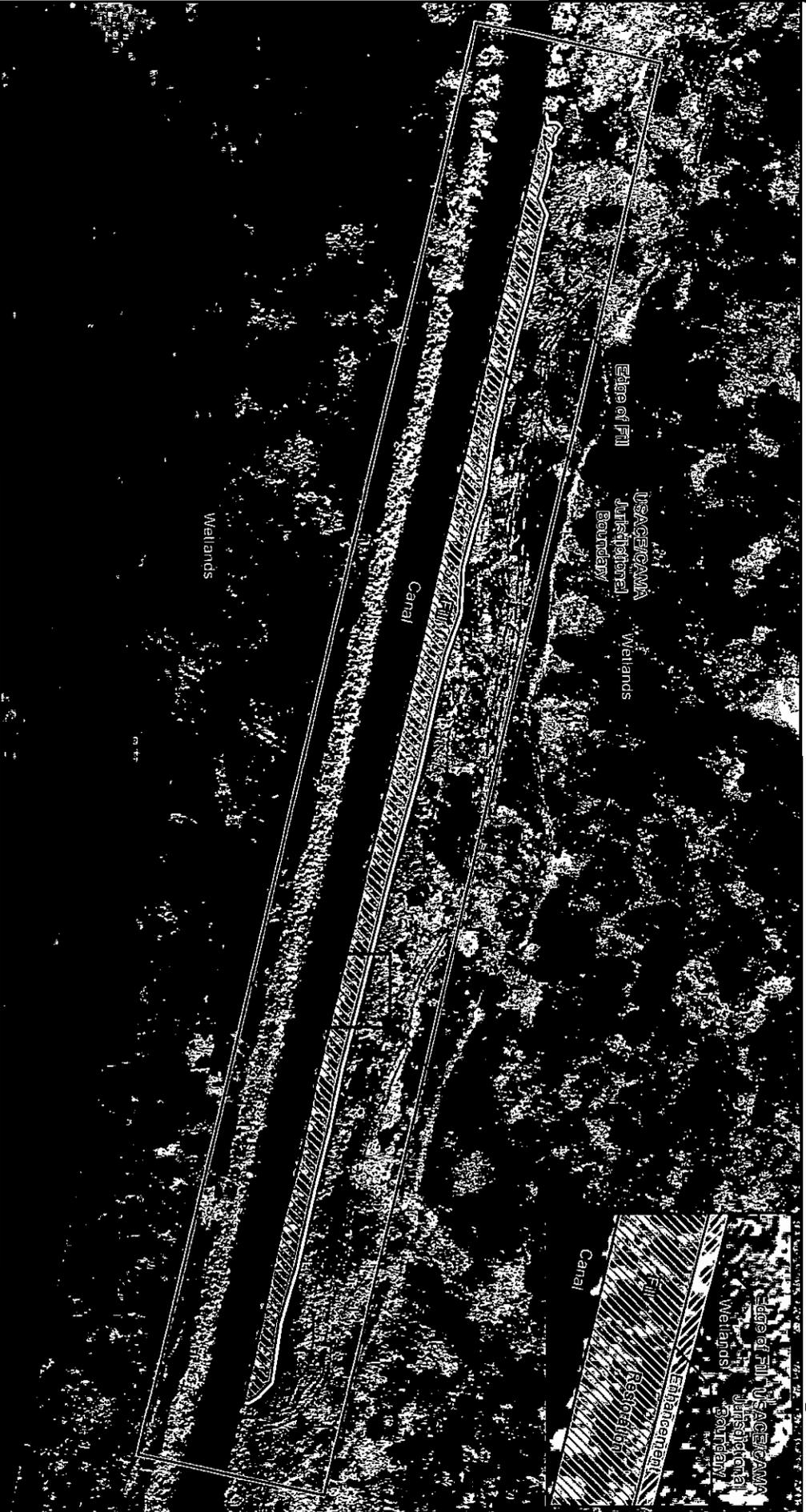


Figure 3-1

Indian Ditch Cross-Sections

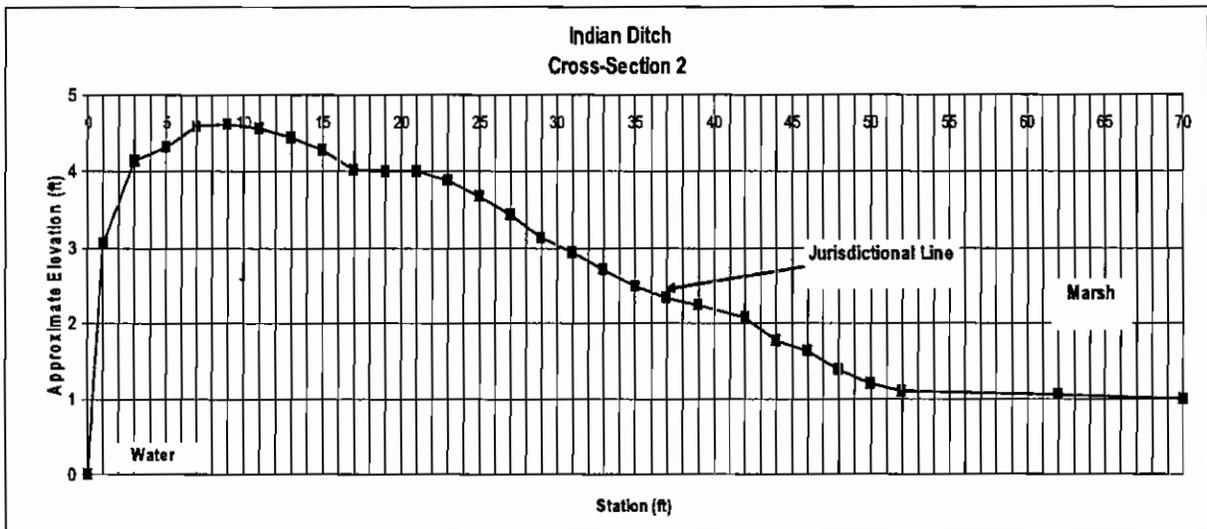
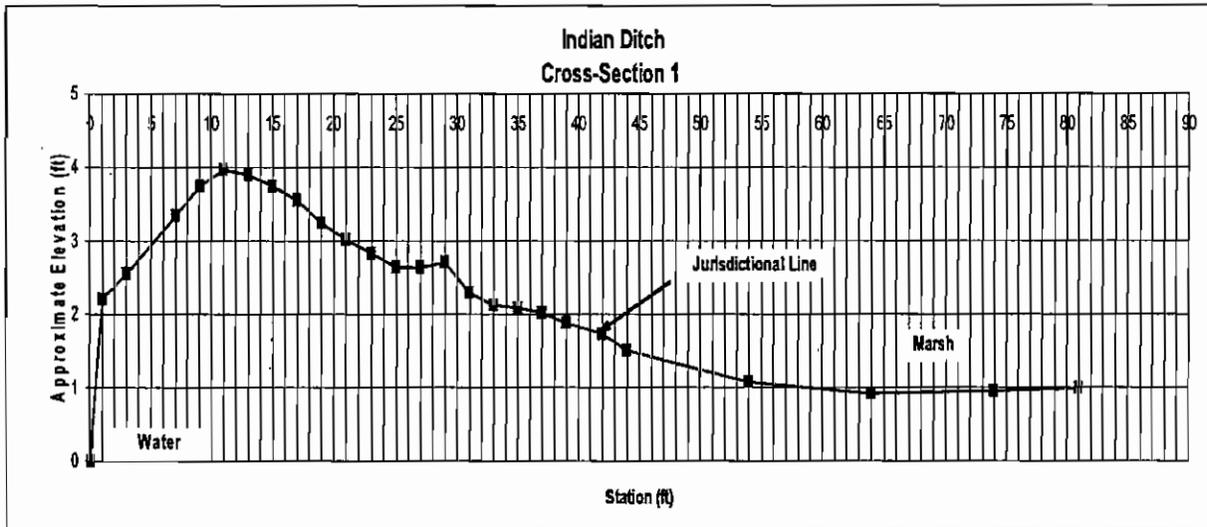


Figure 2-2

Airstrip Target (Site CA-3) Mitigation Site

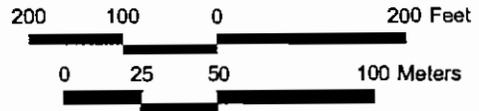
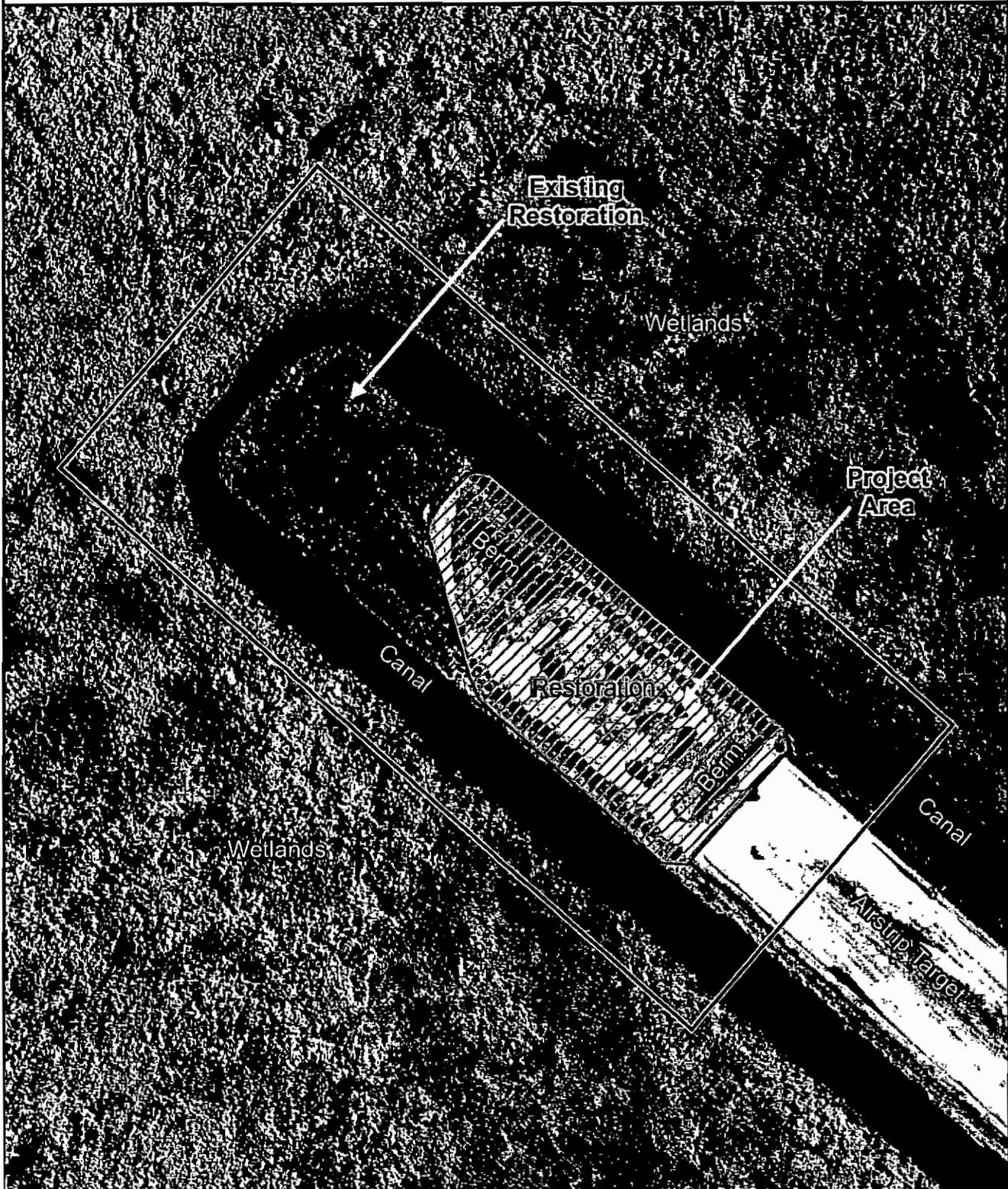
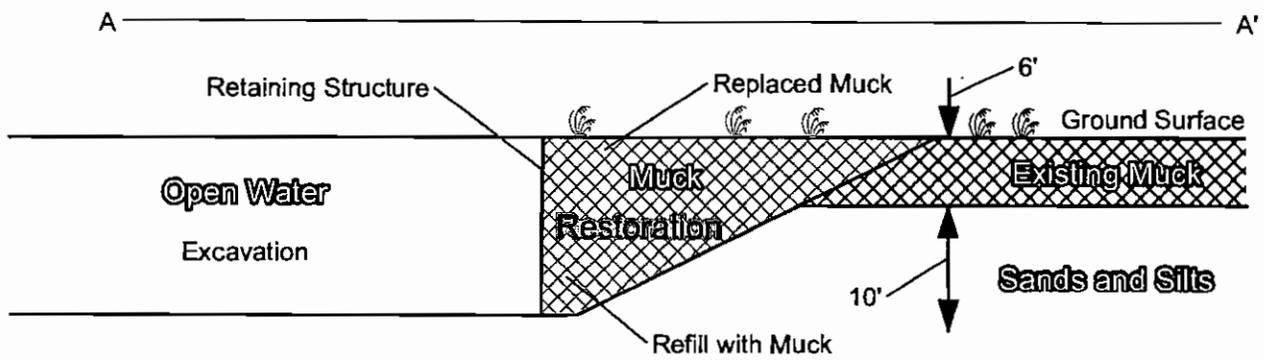
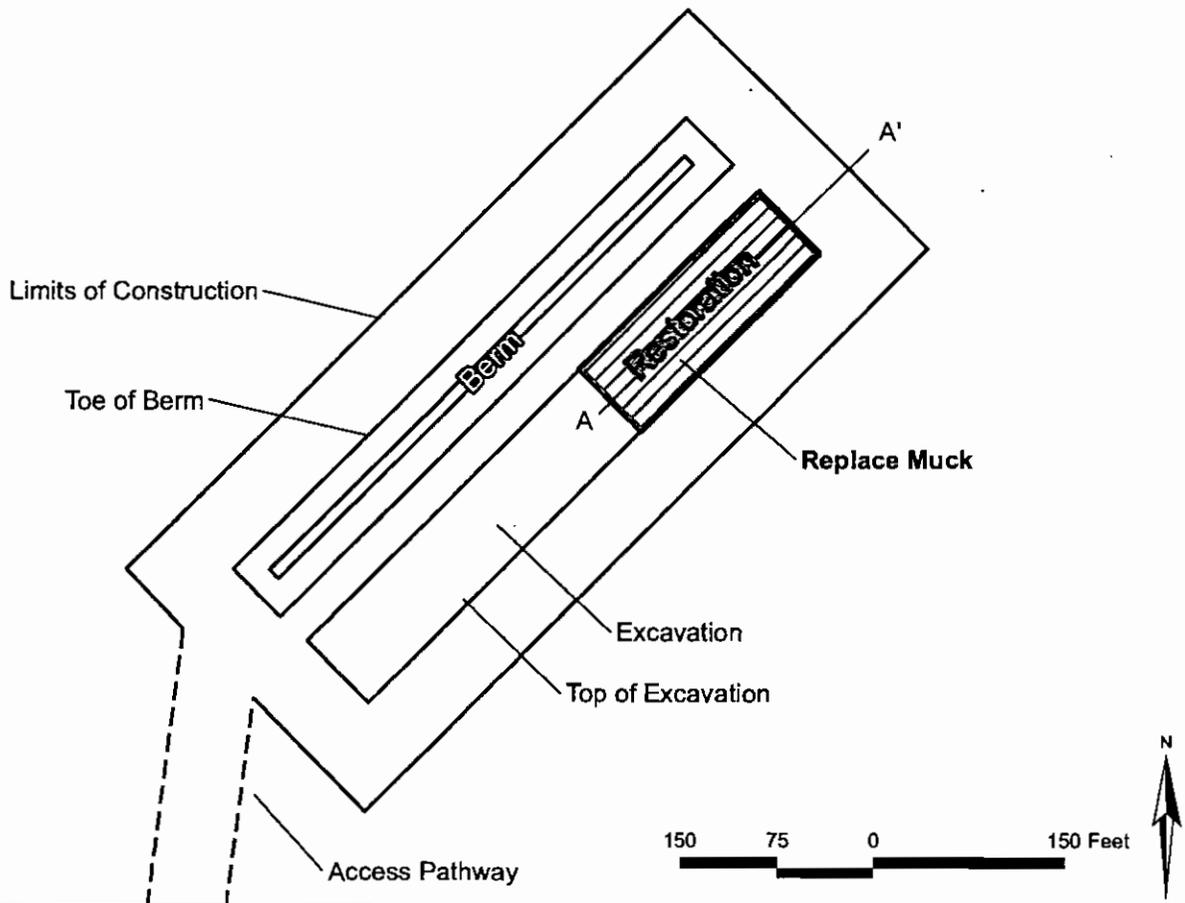


Figure 3-2

Tow Target Mitigation Site



NOT TO SCALE

Figure 3-3