



*LOS ANGELES DISTRICT
U.S. ARMY CORPS OF ENGINEERS*

**DEPARTMENT OF THE ARMY REGIONAL GENERAL PERMIT (RGP) NUMBER 46
FOR
OCEAN OUTLET MAINTENANCE OPERATIONS IN ORANGE COUNTY**

PERMITTEE: County of Orange Public Facilities and Resources Department

PERMIT NUMBER: Regional General Permit No. 46 (Corps File No. 200200543-CJF)

ISSUING OFFICE: Los Angeles District

ISSUANCE DATE: November 24, 2003

Note: The term "you" and its derivatives, as used in this permit, means the permittee, also herein referred to as "County." The term "this office" refers to the Los Angeles District office of the Corps of Engineers, which has jurisdiction over the permitted activity, or the appropriate official of this office acting under the authority of the commanding officer.

After you receive written approval that your project complies with the terms and conditions of this RGP from this office, you are authorized to perform work in accordance with the General Conditions and any project-specific conditions specified below.

PROJECT DESCRIPTION: This permit authorizes Orange County Public Facilities and Resources Department (County) to perform semi-annual, site-specific, routine, maintenance operations as described in the enclosed excerpts from the County's Ocean Outlets Maintenance Manual (dated September 22, 2003) at each of the following eight (8) outlet facilities: Segunda Deshecha (M02); Prima Deshecha, aka Poche Beach (M01); Capistrano Beach Outlets 1 and 2; North Doheny Creek; Salt Creek (K01); Santa Ana River (E01); and Talbert Channel (D02). It is anticipated that special circumstances may arise requiring maintenance activities not described in the public notice or evaluated in this environmental assessment. If need for non-covered activities occurs, separate permit applications would be processed.

PROJECT LOCATION: Eight ocean outlets tributary to the Pacific Ocean in Orange County, California as described in Table 1.

Table 1. Location of Ocean Outlets

Ocean Outlet	UTM Coordinates *
Segunda Deshecha (M02), city of San Clemente	N3699312.64983m and E441181.58985m
Prima Deshecha, aka Poche Beach (M01), border between San Clemente and Dana Point	N3700372.32867m and E440032.15557m
Capistrano Beach Outlet 1, San Clemente	N3701793.38000m and E438050.44095m
Capistrano Beach Outlet 2, San Clemente	N3702005.52216m and E437804.89499m
North Doheny Creek, Dana Point	N3702738.96476m and E435966.87161m
Salt Creek (K01), Dana Point	N3704918.57353m and E432707.52344m
Santa Ana River (E01), Huntington Beach	N3721597.94804m and E411190.98695m
Talbert Channel (D02), Huntington Beach	N3731773.10317m and E410836.29934m

*UTM Coordinates are all in Zone 11
 (Source: PCR Services Corporation)

PERMIT CONDITIONS OF THIS RGP:

1. **Time Period Covered:** The time limit for completing work authorized by this RGP ends on **November 24, 2008**. Generally, semi-annual (i.e., twice yearly) maintenance operations for each outlet are covered by this RGP. Time extensions or reauthorizations of this RGP will be considered if compliance with the prior notification and annual post-project reporting requirements on the part of the County is satisfied.
2. **Notification/Communication:**
 - a. **Timing.** The County shall notify all necessary regulatory agencies of their work plans at any outlet at least 30 days prior to starting work and shall not begin the activity until notified by this office that the activity may proceed under this RGP with any site-specific special conditions imposed by this office.
 - i. A notice-to-proceed (NTP) letter or e-mail from the Corps shall be required prior to the County’s commencing any work in waters of the United States.
 - ii. For any projects occurring at the Santa Ana River and Talbert Channel, the County shall notify the FWS (Carlsbad Office) via a copy of the notification request letter addressed to the Corps at least 30 days prior to starting work.
 - b. **Content of Notification.** The notification should be in writing and include the following information:
 - i. The name, address and telephone number of the County’s designated point of contact;
 - ii. The location of the proposed project in detail, including the identification of the

- waterbody(ies);
 - iii. A brief, but clear, description of the project area's existing conditions, including any sensitive resources that may be affected, and anticipated impacts resulting from the proposed work (amount of dredge or fill material, removal of significant vegetation, loss of habitat, etc.). Include a summary of report(s) from the approved biologist site inspections and description of any deviation in procedure from the activities described for the particular outlet in the County's Maintenance Manual (dated September 22, 2003); and
 - iv. A proposed schedule of work.
- c. **Special Emergency Procedures.** This office recognizes there may be situations where imminent threats to life or property, such as a large storm event or flood, occur and the County has not received a notice to proceed from this office. Under an emergency situation that would constitute an imminent threat to life or property, the County would be required to give 24-hour notice to the Corps before starting work. Emergency authorization will only be granted if the necessary maintenance activities needed to resolve the situation are similar to those outlined in the RGP and the use of emergency procedures is deemed appropriate by the regulatory agencies. It is not the intention of this office to imply that one allows such threat to life or property result in actual loss. If the County proceeds without such notice from this office, the County must ensure that prior notice of such a unilateral decision to proceed is made to this office by telephone, facsimile, e-mail, delivered written notice or other alternative means.
3. **Authorized Work:** Any work authorized by this RGP must be the minimum necessary to alleviate the maintenance need and should not exceed design specifications of the particular ocean outlet. The term "routine maintenance operations" or "maintenance operations" shall refer to the site-specific activities, including excavation, outlet contouring, riprap retrieval and replacement, and placement of excavated material on beach, as described in the County's Maintenance Manual, dated September 22, 2003. Minor deviations from the maintenance manual may be authorized under the RGP, on a case-by-case basis. Routine maintenance operations are limited to two times per year per ocean outlet for the duration of the RGP. Authorized maintenance operations may occur once in the fall to prepare for the rainy season, and once in the spring after the rainy season to prepare for the summer beach recreation. In the event that additional maintenance of an outlet is required, the County would request permission from the Corps to perform the work and allow it to be authorized under the RGP. If the request to work under RGP No. 46 were denied, the County shall apply for a separate permit.
4. **Seasonal Restrictions:** Seasonal restrictions shall be imposed as follows to avoid and minimize impacts to sensitive species, including any federally or state-listed endangered or threatened species and the federally managed fish species, California grunion (*Leuresthes tenuis*).
- a. All maintenance operations shall be completed within the non-breeding season for migratory birds, October 1 – February 28, of any given year, unless otherwise approved by the Corps.
 - b. Proposed work within the time period of March 1 – 15 or September 15 – 30 may be completed only with written approval from the Corps, and if a qualified biological monitor

has determined that no sensitive species are present at the site(s). Approval from the Corps, in coordination with the USFWS, NOAA Fisheries, and CDFG is required before any work within the breeding or grunion spawning seasons shall be performed.

- c. In the event that maintenance operations are requested to extend beyond March 1 through August (the grunion spawning season), the County shall refrain from work until the Corps has notified and coordinated with NOAA Fisheries (Long Beach, CA) to ensure that impacts to California grunion are minimized to the greatest extent possible. After any issues with potential grunion impacts are resolved and/or mitigated, then the Corps may issue a Notice to Proceed letter to the County.
5. **Access to Site:** You must allow representatives from this office and other agencies to inspect the authorized activity at any time deemed necessary to ensure the project is being or has been accomplished in accordance with the terms and conditions of this RGP.
 6. **Water Quality Certification:** The California State Water Resources Control Board issued a technically conditioned water quality certification for RGP 46 on November 19, 2003. The permittee must comply with the conditions specified in that certification as special conditions to this RGP.
 7. **Coastal Zone Management Act (CZMA):** The California Coastal Commission issued a coastal development permit (No. 5-02-031) on August 1, 2003 for the ocean outlet maintenance program authorized by RGP No. 46.
 8. **Endangered Species:** No activity is authorized under this RGP that is likely to jeopardize the continued existence of a threatened or endangered species or destroy or adversely modify designated critical habitat as identified under the Federal Endangered Species Act (ESA). Authorization of an activity by the RGP does NOT authorize the "take" of a listed threatened or endangered species, as defined under the Federal ESA. The County shall notify this office if any listed or proposed species or designated or proposed critical habitat might be affected by or is in the vicinity of the project. The County shall not begin work on the activity until notified by this office that the requirements of the ESA have been satisfied and the activity is authorized. In all circumstances, the County should, if aware of the potential presence of listed or proposed species or designated or proposed critical habitat, make considerable efforts to contact this office and/or personnel at FWS and/or NOAA Fisheries.
 9. **Historic Properties:** Impacts to historic properties listed, proposed for listing, or potentially eligible for listing in the National Register of Historic Places will be avoided to the maximum extent practicable. If such resources are impacted because of actions authorized under this RGP, you shall provide a full report of the action and the impacts incurred by the resource to this office within 45 days after completion of the action. The Corps, the SHPO and/or the Advisory Council for Historic Preservation will then jointly make a determination as to appropriate procedures and/or mitigation to be addressed. If you discover any previously unknown historic or archeological remains while accomplishing the activity authorized by this RGP, you must immediately notify this office of what you have found. We will initiate the Federal and State coordination required to determine if the remains warrant a recovery effort or if the site is eligible for listing in the National Register of Historic Places.

10. **Erosion and Siltation Controls:** When performing any dredging or excavation activity in or near the outlets, all excavated material shall be distributed on an adjacent beach above the mean high water mark. Every effort must be made to ensure any material dredged or excavated from Waters of the United States is not likely to be washed back into any Waters of the United States.
11. **Equipment:** Vehicles shall not be driven or equipment operated in waters of the United States on-site, except as necessary to complete the proposed project. The County shall ensure that all vehicle maintenance, staging, storage, and dispensing of fuel occur in designated upland areas, located in such a manner as to prevent any runoff from entering waters of the United States.
12. **Suitable Material:** No discharge of dredged or fill material may consist of unsuitable material (e.g., trash, debris, car bodies, asphalt, etc.) and material discharged must be free from toxic pollutants in toxic amounts. (See Section 307 of the Clean Water Act (CWA))
13. **Aquatic Life Movements:** No activity may substantially disrupt the movement of those species of aquatic life indigenous to the water body, including those species that normally migrate through the area.
14. **Spawning Areas:** Discharges in spawning areas during spawning seasons must be avoided to the maximum extent practicable. Seasonal restrictions are discussed above in Special Condition 6.
15. **Waterfowl Breeding Areas:** Discharges into breeding areas for migratory waterfowl must be avoided to the maximum extent practicable. Seasonal restrictions are discussed above in Special Condition 6.
16. **Navigation:** The permitted activity shall not interfere with the right of the public to free navigation on all navigable waters of the United States. The permittee understands and agrees that, if future operations by the United States require the removal, relocation, cessation, or other alteration, of the structure or work herein authorized, or if, in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the permittee will be required, upon due notice from the Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.
17. **Compensatory Mitigation:** In the case that the Corps requires compensatory mitigation to offset impacts within the Santa Ana River and Talbert Channel, the County may use its credits with the Santa Ana Arundo Mitigation Bank. If the Corps determines that compensatory mitigation to offset impacts at any of the other five outlets is necessary, the County shall submit to this office a conceptual mitigation plan for the Corps's written approval prior to the Corps issuance of the NTP. The Corps' NTP shall include as Permit Special Conditions any specific compensatory mitigation requirements. Additionally, if upon review of an annual report (Condition 18) the Corps determines that compensatory mitigation is required to offset the impacts that occurred during the previous reporting year, the Corps shall require the County to implement mitigation. In such cases, the County shall submit to this office a conceptual mitigation plan for the Corps' written approval within

30 days of Corps notification that mitigation is required.

18. **Reports:** The County shall submit an annual written report to this office by February 1 of the following year. The report shall summarize all maintenance activities that were conducted at all eight ocean outlets throughout the year under this RGP, whether they were routine or emergency activities. The reports will include written documentation and photographs of all work performed under the RGP during the prior year. Any data collected, such as water quality samples and terrestrial or aquatic sensitive species surveys, will also be included in the annual report. **Providing this report is mandatory.** These reports enable us to track the use of this RGP to verify that the minimal effects determination is being met as required by Section 404(e) of the CWA. Failure to provide timely annual reports is non-compliance with the General Conditions of this RGP and would be considered a violation (33 CFR Part 326.4(d)). **Furthermore, failure to provide these annual post-activity reports will jeopardize the possibility of reauthorizing this permit when it expires.** At a minimum, the Report shall include the following information.

- a. The name, address, and telephone number of:
 - i. The County's Point of Contact
 - ii. The County's agent (if appropriate)

- b. Full description of the activities conducted during the previous year, including:
 - i. Description of each maintenance event per each ocean outlet; note any deviations from maintenance operations described in County's Ocean Outlet Maintenance Manual, dated September 22, 2003;
 - ii. Size and description of project area (include maps or drawings showing the areal and lineal extent of the project, and pre- and post-construction photographs)
 - iii. Information on receiving waterbody impacted including:
 - (1) Name of waterbody
 - (2) Type of receiving waterbody (e.g., river/streambed, lake/reservoir, ocean/estuary/bay, riparian area, wetland type, etc.)
 - (3) Temporary/permanent adverse impact(s) in acres/cubic yards/linear feet
 - (4) Other mitigation steps (to avoid, minimize)
 - (5) Compensatory mitigation in acres/cubic yards/linear feet

 - iv. Information on federally listed or proposed endangered species, designated or proposed critical habitat, Essential Fish Habitat, and federally managed fish species (notification must be provided to FWS and/or NOAA Fisheries as appropriate) including:
 - a) Temporary/permanent adverse impacts
 - b) Mitigation steps (to avoid, minimize)
 - c) Compensatory mitigation

Further Information:

1. **Congressional Authorities:** Activities conducted under this RGP are authorized pursuant to:
 - (X) Section 10 of the River and Harbor Act of 1899 (33 U.S.C. 403).
 - (X) Section 404 of the Clean Water Act (33 U.S.C. 1344).

2. **Limits of this authorization:**
 - a. This permit does not obviate the need to obtain other Federal, State, or local authorizations required by law.
 - b. This permit does not grant any property rights or exclusive privileges.
 - c. This permit does not authorize any injury to the property or rights of others.
 - d. This permit does not authorize interference with any existing or proposed Federal project.

3. **Limits of Federal Liability:** In issuing this permit, the Federal Government does not assume any liability for the following:
 - a. Damages to the permitted project or uses thereof as a result of other permitted or unpermitted activities or from natural causes.
 - b. Damages to the permitted project or uses thereof as a result of current or future activities undertaken by or on behalf of the United States in the public interest.
 - c. Damages to persons, property, or to other permitted or unpermitted activities or structures caused by the activity authorized by this permit.
 - d. Design or construction deficiencies associated with the permitted work.
 - e. Damage claims associated with any future modification, suspension, or revocation of this permit.

4. **Reliance on Applicant's Data:** The determination of this office that issuance of this permit is not contrary to the public interest was made in reliance on the information you provided.
5. **Extensions.** Permit Condition 1 establishes a time limit for the completion of the activity authorized by this RGP. Unless there are circumstances requiring either a prompt completion of the authorized activity or a reevaluation of the public interest decision, the Corps will normally give you favorable consideration to a request for an extension of this time limit.
6. **Reevaluation:** This office may reevaluate its decision on this permit at any time the circumstances warrant. Circumstances that could require a reevaluation include, but are not limited to, the following:
 - a. You fail to comply with the terms and conditions of this permit.
 - b. The information provided by you in support of your permit application proves to have been false, incomplete, or inaccurate. See Item 4 above.
 - c. Significant new information surfaces which this office did not consider in reaching the original public interest decision.

Such a reevaluation may result in a determination that it is appropriate to use the suspension, modification, and revocation procedures contained in 33 CFR 325.7 or enforcement procedures such as those contained in 33 CFR 326.4 and 326.5. The referenced enforcement procedures provide for the issuance of an administrative order requiring you to comply with the terms and conditions of your permit and for the initiation of legal action where appropriate. You will be required to pay for any corrective measures ordered by this office, and if you fail to comply with such directive, this office may, in certain situations (such as those specified in 33 CFR 209.170), accomplish the corrective measures by contract or otherwise and bill you for the cost.

Your signature below, as permittee, indicates that you accept and agree to comply with the terms and conditions of this Regional General Permit.

James A. Miller
PERMITTEE
JAMES A. MILLER
ENGINEERING MANAGER
ENGINEERING & PERMIT SERVICES DIVISION

12.4.03
DATE

This permit becomes effective when the Federal official, designated to act for the Secretary of the Army, has signed below.

Mark Durham
Aaron Allen, Ph.D.
Acting Chief, Regulatory Branch

11 Dec 2003
DATE

OCEAN OUTLET MAINTENANCE GUIDELINE SUMMARY TABLE

Ocean outlet name, city location, & UTM Coordinates [Zone 11]	Maintenance description and type of equipment to be used	Outlet type & dimension (feet)	Purpose and criteria that triggers maintenance activity	Excavation area (acres)	Fill or disposal area (acres)	Volume of excavated material (CY)	Construction schedule & duration (days)	Other Requirements
Segunda Deschecha (M02), San Clemente (N3699312.64983m E441181.58985m)	Retrieve and re-establish displaced rock materials used for channel outlet's revetment; dispose excavated sediments to adjacent beach above MHHW; bulldozer and backhoe.	Concrete trapezoidal channel outlet w/ reinforced concrete box, concrete wings and rock revetment (25ft[length] x 4ft[depth] x 16ft[width]).	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 4 ft design depth to maintain hydraulic capacity. Spring: Re-establish outlet channel to as-built location; prepare beach area for recreational use after April 15.	0.060	0.021	26+4	bi-annual (fall/spring) approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Report Coordinate maintenance with grunion runs.
Prima Deschecha-Pocho Beach (M01), Dana Point (N3700372.32876m E440032.15557m)	Excavate and re-establish channel outlet's shape and alignment; dispose excavated sediments to adjacent beach above MHHW; bulldozer and backhoe.	Concrete trapezoidal channel outlet w/ rock revetment (115ft[length] x 5ft[depth] x 50ft[width])	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 5 ft design depth to maintain hydraulic capacity. Spring: Re-establish outlet channel to as-built location; prepare beach area for recreational use after April 15. Summer: As needed, re-establish outlet channel to as-built location when stream course meanders over the beach southward towards existing private recreational facilities.	0.312	0.575	1,384+140	bi-annual (fall/spring); approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Report Coordinate maintenance with grunion runs.
Capistrano Beach Outlet #1, Dana Point (N3701793.3800m E438050.44095m)	Excavate and re-establish channel outlet's shape and alignment; dispose excavated sediments to adjacent beach above MHHW; Backhoe and front loader.	Soft bottom trapezoidal ditch; (105ft[length] x 5ft[depth] x 10ft[width])	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 5 ft design depth to maintain hydraulic capacity. Spring: Re-establish outlet channel to as-built location; prepare beach area for recreational use after April 15.	0.069	0.230	369+40	bi-annual (fall/spring); approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Reports Coordinate maintenance with grunion runs.

Ocean outlet name, city, & UTM Coordinates [Zone 11]	Maintenance description and type of equipment to be used	Outlet type & dimension (feet)	Purpose and criteria that triggers maintenance activity	Excavation area (acres)	Fill or disposal area (acres)	Volume of excavated material (CY)	Construction schedule & duration (days)	Other requirements
Capistrano Beach Outlet #2, Dana Point [N3702005.52215m E437804.89499m]	Excavate and re-establish channel outlet's shape and alignment; dispose excavated sediments to adjacent beach above MHHW; Backhoe and front loader.	Soft bottom trapezoidal ditch (80ft[length] x 5ft[depth] x 10ft[width])	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 5 ft design depth to maintain hydraulic capacity Spring: Re-establish outlet channel to as-built location; prepare beach area for recreational use after April 15	0.075	0.243	370+-40	bi-annual (fall/spring); approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Report Coordinate maintenance with grunion runs.
North Doheny Creek at State Beach, Doheny [N3702738.967476m E435966.67161m]	Construct temporary sand berm to close out channel outlet and divert ponded water to local sanitary sewer system (summer); excavate and re-establish channel outlet's shape and alignment (winter); dispose excavated sediments to adjacent beach above MHHW; bulldozer and front loader.	Soft bottom trapezoidal ditch Berm dimensions: 12ft (top width);	Fall: Maintain flood control capacity; remove the diversion berm from ditch before October 15 th each year. Spring: Maintenance for public recreation, health and safety; one week before spring break install berm across existing drainage ditch.	0.034	0.129	194+-20	bi-annual (fall/spring); approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Report Coordinate maintenance with grunion runs.
Sail Creek (K01), Dana Point [N3704918.57353m E432707.52344m]	Retrieve and re-establish blown-out rock materials used for channel outlet's revetment; remove accumulated sediments on the outlet's apron; dispose excavated sediments to adjacent beach above MHHW; front loader.	RCB culvert outlet [12ft(height) x 14ft(length)] w/ concrete apron and rock revetment	Spring: Protection of Outlet Structure: restore the rock protection when scour hole observed at the end of the outlet structure	0.421	0.297	111+-10	Annually each May approximately one day per maintenance event	Submit Pre-construction Notification & Monitoring Report. Coordinate maintenance with grunion runs.
Santa Ana River (E01), Huntington Beach [N3721597.94804m E41190.98695m]	Excavate accumulated sediments to re-establish channel outlet's shape and alignment; retrieve and re-establish displaced rock materials used for channel outlet's revetment; dispose excavated sediments to adjacent beach above MHHW; bulldozer, front loader, and articulating dump truck.	Trapezoidal channel outlet w/ rock revetment levees [1000ft (length) x 22.5ft (height) x 450 ft (width)]; soft-bottom upstream and concrete-lined downstream of PCH bridge	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 22.5 ft design depth to maintain hydraulic capacity. Spring/Summer: Re-establish tidal flow by excavating 5ft deep notch through shoal	8.783	4.2525	7,300+-730	bi-annual (fall/spring); approximately one week per maintenance event	Submit Pre-maintenance Notification & Monitoring Report. Coordinate maintenance with grunion runs.
Talbert Channel Outlet (D02), Huntington Beach [N3731773.10317m E410836.29934m]	Excavate accumulated sediments (shoals) to re-establish channel outlet's shape and alignment; dispose excavated sediments to adjacent beach above MHHW; bulldozer, front loader, and articulating dump truck.	Trapezoid soft-bottom channel outlet w/ rock revetment levees downstream/beachside [1000ft (length) x 10ft (height) x 150ft (width)]	Fall: Remove any accumulated sediment in the outlet before October 15 th to the 10 ft design depth to maintain hydraulic capacity. Spring/Summer: Maintain	2.990	8.255	7,300+-730	bi-annual (fall/spring); approximately one week per maintenance event	Submit Pre-maintenance Notification & Monitoring Report. Coordinate maintenance

Ocean outlet name, city, & UTM Coordinates (Zone 11)	Maintenance description and type of equipment to be used	Outlet type & dimension (feet)	Purpose and criteria that triggers maintenance activity	Excavation area (acres)	Fill or disposal area (acres)	Volume of excavated material (CY)	Construction schedule & duration (days)	Other requirements
			tidal flow: remove shoal in the channel observed to block tidal flow to 10 ft design depth. As required for least term habitat management: remove any shoal blocking tidal flows within seven (7) days of observation.					with grunion runs. Work shall coincide with low tide events to minimize sediment in marsh.

GENERAL NOTES

1. BOUNDARY LINES ARE PREPARED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TRUE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - 4.65 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (NOS) TIDAL DATUM SHEET PUBLICATION DATE 04/17/89.
3. AERIAL PHOTOGRAPH DATE SEPTEMBER 1979.
4. GENERAL MAINTENANCE CONSISTS OF RE-ESTABLISHING THE OUTLET CHANNEL.
5. SEDIMENT TO BE REMOVED SEMI-ANNUALLY IN FALL AND SPRING.
6. ALL EQUIPMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA 0.060 ACRES
 DISPOSAL AREA 0.021 ACRES

LEGEND

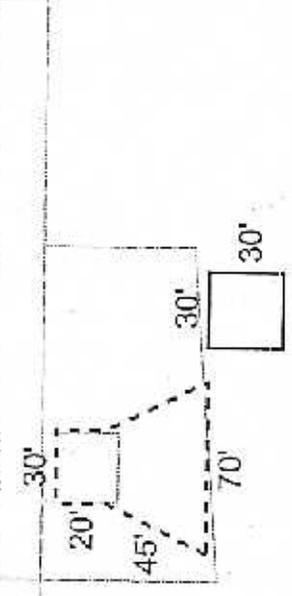
MEAN HIGH WATER LINE SURVEYED 10/22/01

--- BOUNDARY
 - - - EXCAVATION
 ——— DISPOSAL



1 inch equals 50 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
SEGUNDA DESPACHA AJULET - M02 401 CERTIFICATION WORK LIMITS	
DESIGNED BY: BLS/SH	CHECKED: C & K
DATE: SEPTEMBER 28, 2002	1 OF 2



GENERAL NOTES

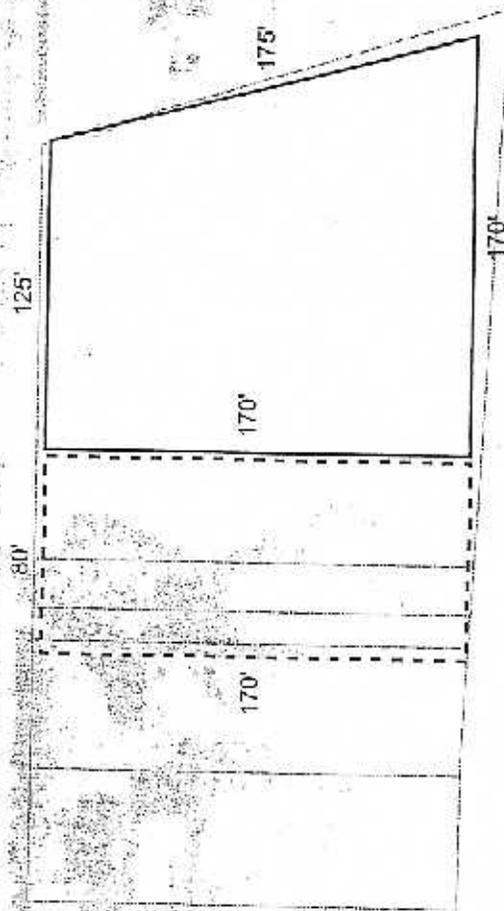
1. BOUNDARY LINES ARE DISPLAYED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TRUE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - 4.65 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (NOS) TIDAL DATUM SHEET PUBLICATION DATE 07/17/09
3. AERIAL PHOTOGRAPH DATE SEPTEMBER 1999.
4. GENERAL MAINTENANCE CONSISTS OF RE-ESTABLISHING THE OUTLET CHANNEL.
5. SEDIMENT TO BE REMOVED SEMI ANNUALLY IN FALL AND SPRING.
6. ALL SEDIMENT SHALL BE SPREAD ON ADJACENT BEACHES ACCORDING TO LOCAL HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA: 0.312 ACRES
 DISPOSAL AREA: 0.576 ACRES

LEGEND

- MEAN HIGH WATER LINE SURVEYED (2000/01)
- BOUNDARY
- EXCAVATION
- DEPOSIT



1 inch equals 50 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESEARCH DEPT. OPERATIONS & MAINTENANCE	
PRIMA DESHECHA OUTLET - M01 401 CERTIFICATION WORK LIMITS	
DESIGNED: (BY) G. B. SMITH	DRAWN: G. B. R.
DATE: SEPTEMBER 26, 2002	SHEET: 2 OF 8

GENERAL NOTES

1. BOUNDARY LINES ARE DISPLAYED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TIDE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - +65 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (U.S.) TIDAL DATUM SHEET PUBLICATION DATE 07/17/89.
3. AERIAL PHOTOGRAPHY DATE SEPTEMBER 1997.
4. GENERAL MAINTENANCE SCHEDULES OF RE-ESTABLISHING THE OUTLET CHANNEL.
5. SEDIMENT TO BE REMOVED ERM ANNUALLY IN FALL AND SPRING.
6. ALL SEDIMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA 0.069 ACRES
 DISPOSAL AREA 0.230 ACRES

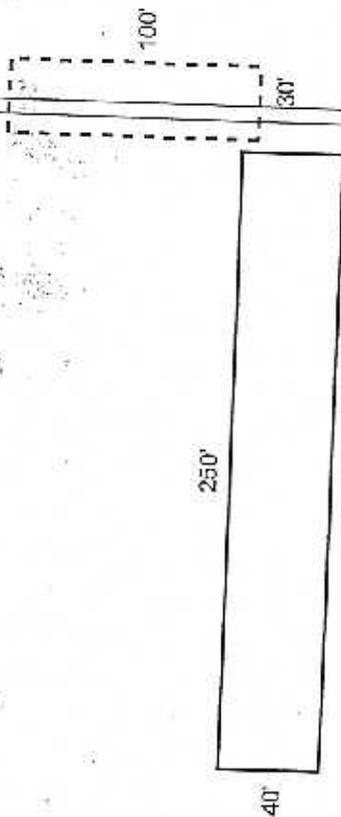
LEGEND

- MEAN HIGH WATER LINE SURVEYED 1/15/01
- BOUNDARY
- 6'x30' DRAINAGE BASEMENT
- EXCAVATION
- DEPOSIT



1 inch equals 50 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
CAPSTRAND BEACH OUTLET #1 401 CERTIFICATION WORK LIMITS	
DRAWN BY: TEST BISH	CHECKED: G. G. R.
DATE: SEPTEMBER 26, 2002	SHEET: 3 OF 4



BOUNDARY LINES ARE SHOWN FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TRUE LOCATION OF BOUNDARY.

2. MEAN HIGH WATER LINE - 405 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (NOS) TIDE GAUGE SHEET PUBLICATION DATE 07/17/89

3. AERIAL PHOTOGRAPH DATE SEPTEMBER 1999

4. GENERAL MAINTENANCE CONSISTS OF RE-ESTABLISHING THE OUTLET CHANNEL

5. SEDIMENT TO BE REMOVED SEMIANNUALLY IN FALL AND SPRING

6. ALL SEDIMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE

EARTHWORK QUANTITIES

EXCAVATION AREA: 0.076 ACRES

DEPOSIT AREA: 0.243 ACRES

LEGEND

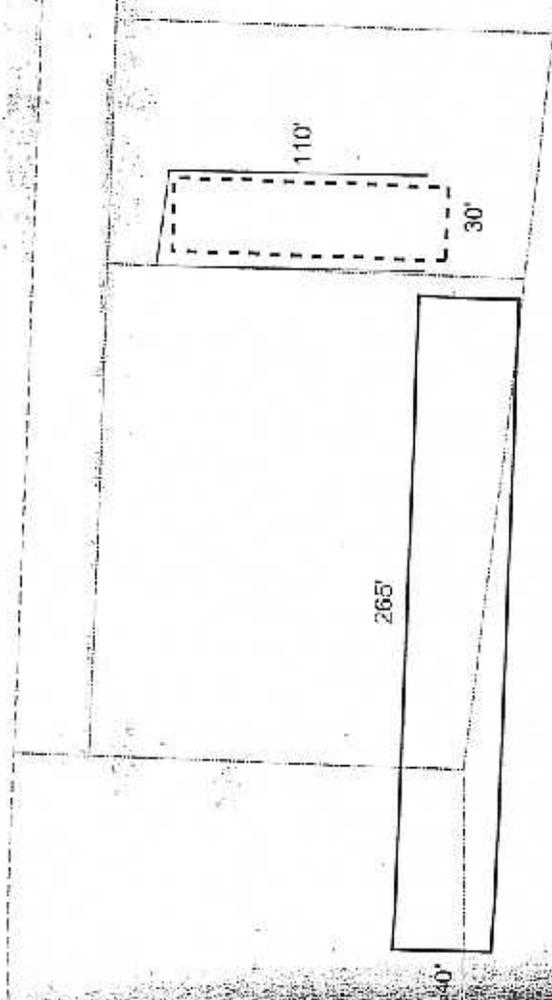
MEAN HIGH WATER LINE SURVEYED 10/29/01

BOUNDARY

TEMPORARY FENCE AROUND DRAINAGE

EXCAVATION

DEPOSIT



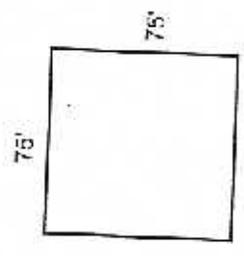
COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
CAPESTRAND BEACH OUTLET #2 401 CERTIFICATION WORK LIMITS	
ISSUED: FROY SL-0111	DESIGNED: G. G. K.
DATE: SEPTEMBER 25, 2002	1 OF 6

GENERAL NOTES

1. BOUNDARY LINES ARE DISPLAYED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TRUE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - 4.65 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SURVEY (NOS) TIDAL DATUM SHEET PUBLICATION DATE 07/17/89.
3. AERIAL PHOTOGRAPH DATE: SEPTEMBER 1999.
4. GENERAL MAINTENANCE CONSISTS OF INSTALLING A BERM ACROSS THE DITCH ABOVE THE ORDINARY HIGH WATER LINE IN THE SPRING AND REMOVING THE BERM IN THE FALL.
5. THE SAND LEGS FOR THE BERM SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.
6. ALL SEDIMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA: 0.034 ACRES
 DISPOSAL AREA: 0.23 ACRES



LEGEND

- MEAN HIGH WATER LINE SURVEYED (NWS/01)
- BOUNDARY
- EXCAVATION
- DEPOSIT



1 inch equals 50 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
NORTH DORNEY CREEK OUTLET 401 CERTIFICATION WORK LIMITS	
PROJECT NO. 03-002	DATE: SEPTEMBER 2002
DATE: SEPTEMBER 2002	SHEET 5 OF 6

GENERAL NOTES

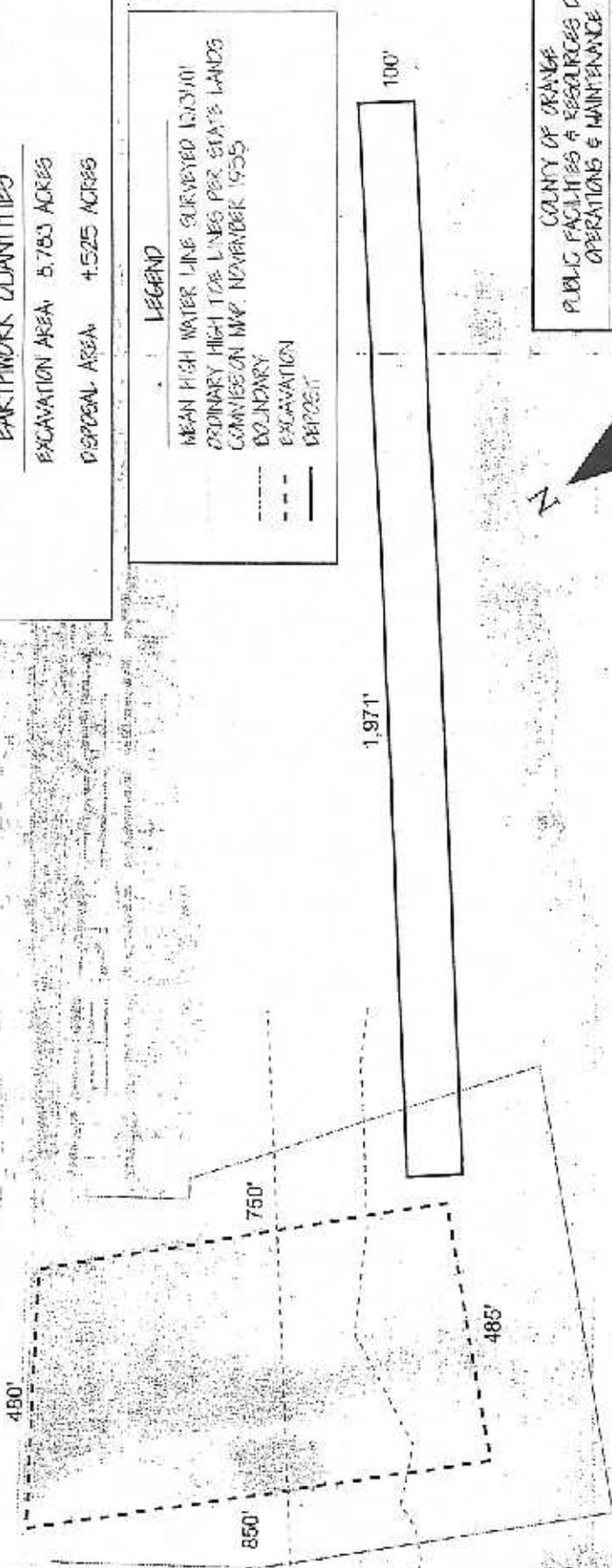
1. BOUNDARY LINES ARE DISPLAYED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TITLE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - 465 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (NOS) TIDE GAUGE 5-BB-1 PUBLICATION DATE 07/17/89.
3. AERIAL PHOTOGRAPH DATE SEPTEMBER 1990.
4. GENERAL MAINTENANCE CONSISTS OF RE-ESTABLISHING THE OUTLET CHANNEL.
5. SEGMENT SHALL BE REMOVED PERIODICALLY TO MAINTAIN TIDAL FLOW AND FLOOD CONTROL CAPACITY.
6. ALL SEGMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA 5,783 ACRES
 DISPOSAL AREA 4,525 ACRES

LEGEND

- MEAN HIGH WATER LINE SURVEYED 10/31/01
- ORDINARY HIGH TIDE LINES PER STATE LANDS COMMISSION MAY NOVEMBER 1995
- BOUNDARY
- EXCAVATION
- DISPOST



1 inch equals 200 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
SANTA ANA RIVER OUTLET - E01 401 CERTIFICATION WORK LIMITS	
DESIGNED BY: TERRY ELBERT	CHECKED BY: G. S. K.
DATE: SEPTEMBER 28, 2002	7 OF 8

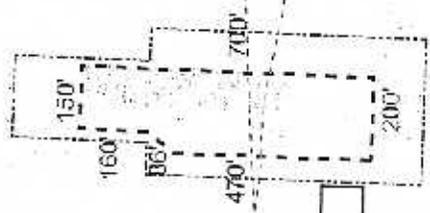
GENERAL NOTES

1. BOUNDARY LINES ARE DISPLAYED FOR VISUAL PURPOSES ONLY AND MAY NOT REFLECT THE ACTUAL TRUE LOCATION OF BOUNDARY.
2. MEAN HIGH WATER LINE - 465 FEET ABOVE MEAN LOWER LOW WATER LINE PER NATIONAL OCEAN SERVICE (USE) TIDAL DATUM SHEET PUBLICATION DATE 3/11/789.
3. AERIAL PHOTOGRAPH DATE SEPTEMBER 1999.
4. GENERAL MAINTENANCE CONSISTS OF RE-ESTABLISHING THE OUTLET CHANNEL.
5. SEDIMENT TO BE REMOVED SEMI-ANNUALLY IN FALL AND SPRING.
6. SAND BAGS BLOCKING TIDAL FLOW SHALL BE REMOVED WITHIN SEVEN (7) DAYS.
7. ALL SEDIMENT SHALL BE SPREAD ON ADJACENT BEACHES ABOVE ORDINARY HIGH WATER LINE.

EARTHWORK QUANTITIES

EXCAVATION AREA	2.990 ACRES
DISPOSAL AREA	9.256 ACRES

4.032



LEGEND

—	MEAN HIGH WATER LINE SURVEYED 12/5/00
- - -	ORDINARY HIGH TIDE LINES PER STATE LANDS COMMISSION MAP NOVEMBER 1955
---	BOUNDARY
---	EXCAVATION
---	DEPOSIT



1 inch equals 300 feet

COUNTY OF ORANGE PUBLIC FACILITIES & RESOURCES DEPT. OPERATIONS & MAINTENANCE	
TALBERT CHANNEL OUTLET - 002 401 CERTIFICATION WORK LIMITS	
DESIGNED BY: 04-861H	CHECKED: 06 K
DATE: SEPTEMBER 26, 2002	A OF 5