

**Meeting of the Central Valley Flood Protection Board  
October 25, 2019**

**Staff Report for Permit No. 19301  
Agenda Item No. 5C**

**Pescadero Reclamation District 2058  
Levee Critical Repairs Project, San Joaquin County**

**1.0 – ITEM**

Consider approval of Permit No. 19301. (Attachment A)

**2.0 - APPLICANT**

Pescadero Reclamation District 2058 (Pescadero RD 2058)

**3.0 – PROJECT LOCATION**

The proposed project site is located approximately 1.7 miles downstream of Interstate 5 on the left (south) bank levee of Paradise Cut. Paradise Cut is located approximately 5.4 miles north-east of the City of Tracy.  
(Paradise Cut, San Joaquin County, Attachment B)

**4.0 – PROJECT DESCRIPTION**

Pescadero RD 2058 proposes to repair the left (south) bank levee of Paradise Cut between Levee Mile (LM) 4.0 and LM 4.69 by adding material to the landside levee slope.

**5.0 – AUTHORITY OF THE BOARD**

California Water Code § 8534, 8590 – 8610.5, and 8700 – 8710

California Code of Regulations, Title 23, Division 1 (Title 23):

- § 6, Need for a Permit
- § 13.3, Consent Calendar
- § 112, Streams Regulated and Nonpermissible Work Periods
- § 120, Levees

## **6.0 - PROJECT ANALYSIS**

The proposed project involves levee repair to the left (south) bank levee of Paradise Cut between LM 4.0 and 4.69. The crown road repair work is limited between LM 4.0 and LM 4.43 and erosion repair is limited between LM 4.43 and 4.69. The waterside of the levee between LM 4.43 and LM 4.69 has been eroding over time and has encroached into the levee prism. RD 2058 has been monitoring the erosion site since 2008-2009. This slow-progressing erosion, most likely caused by tidal fluctuations interfacing with the poor levee materials, is now producing sloughing at the waterside levee toe. The waterside of the levee and channel is considered critical habitat for riparian brush rabbit. Because of that, the landside repairs were a preferred alternative to waterside repairs.

The engineering design for this project involves reestablishing the full width and section of the levee at its base and crown on the landward side to match the adopted USACE design grade. Appropriate fill material will be acquired from the designated borrow/spoils area. The erosion site repairs will roughly extend the existing landside levee toe out approximately 40 feet to the south of its current location.

The fully buttressed section of the levee is 920 feet. On each end of this section, the reinforced levee section will be gradually tapered back into the existing levee slope for approximately 350 feet west and approximately 100 feet east. Buttressing and reinforcing the levee section will require the acquisition of private land. Working with the California Department of Water Resources (DWR) and the State's Real Estate Services Division (RESO), RD 2058 will acquire approximately eighty-five hundredths (0.85) of an acre from the adjacent property owner, Parcel 22, Lot 12, APN 213-19-002 that will extend the existing Sacramento and San Joaquin Drainage District easement to 15 feet beyond the proposed levee toe. In addition, and on the same property, a temporary Construction Right-of-Entry of approximately one and a half (1.5) acres will be required to support construction.

The construction required to rebuild the levee section will be accomplished using 10-wheel (14 cubic yard) dump trucks, bulldozers, road graders, excavators, front end loaders, compactors, a water truck, and a fuel truck. Fill material will be moved onto the

slope, in controlled lifts, where it will be compacted to approved standards. Water will be used to achieve designed compaction and dust control. The finished slope of the levee will be graded to the adopted USACE design profile. Hydro-seeding and geotextile fabric will be used to protect the new levee slope from erosion.

Temporary haul roads and access areas required for the circulation of trucks and construction equipment will be established at the work site and at the borrow/spoils site for the duration of the project. These temporary features will be removed at the completion of the project. The engineering design for the project requires approximately 19,000 CY of fill material.

The repair design follows the Rural Levee Repair Guidelines (RLRG) that were developed through a multi-agency collaboration that included representatives from the U.S. Army Corps of Engineers (USACE), the Board, DWR, local maintaining agencies, subject matter experts, and interested parties. RLRG was developed in response to the needs identified in the 2012 Central Valley Flood Protection Plan to develop a common, consistent set of rural levee repair guidelines to help local maintaining agencies plan, design, and construct levee repairs efficiently and effectively.

### **6.1 – Hydraulic Analysis**

Adding materials to the landside levee slope does not change the hydraulics of the levee system and as such a hydraulic analysis was not required.

### **6.2 – Geotechnical Analysis**

This levee repair mitigates the known waterside levee erosion by widening the levee prism landward. There are no known geotechnical issues in the project area, therefore a geotechnical analysis was not required.

## **7.0 – AGENCY COMMENTS AND ENDORSEMENTS**

The comments and endorsements associated with this project, from all pertinent agencies, are shown below:

- RD 2058 is the applicant and local maintaining agency for Paradise Cut levees.

- USACE 33 U.S.C. 408 permission letter has been received for this application. The USACE Sacramento District Engineer approves the request to alter the Federal flood risk reduction project, subject to conditions. The letter is incorporated into the permit as Exhibit A.

## **8.0 – CEQA ANALYSIS**

The Board, as a responsible agency under CEQA, has reviewed the Initial Study/Mitigated Negative Declaration (IS/MND) (SCH No. 2017112055, January 2018), and Mitigation Monitoring and Reporting Program for the Pescadero Reclamation District 2058 Levee Critical Repairs Project, prepared by the lead agency, Pescadero RD 2058. These documents, including project design, may be viewed or downloaded from the Board website at: <http://www.cvpfb.ca.gov/events/October-2019-regular-business-meeting/> under a link for this agenda item. The documents are also available for review in hard copy at the Board and Pescadero RD 2058 offices.

Pescadero RD 2058 determined that the Pescadero Reclamation District 2058 Levee Critical Repairs Project would not have a significant effect on the environment and filed a Notice of Determination with the San Joaquin County Clerk on October 24, 2017. Pescadero RD 2058 made revisions to the project and/or incorporated mandatory mitigation measures into the project plans to avoid or mitigate such impacts to a point where no significant adverse impacts will occur. These mitigation measures are included in Pescadero RD 2058's IS/MND and address impacts to air quality, biological resources, cultural resources, hazards and hazardous materials, and transportation/traffic. The mitigation measures are further described in Pescadero RD 2058's adopted IS/MND.

The Board, as a responsible agency, is responsible for mitigating and avoiding only the direct and indirect environmental effects of those parts of the project which it decides to carry out, finance, or approve (CEQA Guidelines § 15096(g); Public Resources Code § 21002.1(d)). The Board's responsibility under CEQA is limited to imposing conditions or mitigation related to effects on the State Plan of Flood Control.

In accordance with CEQA Guidelines § 15096, Board staff independently reviewed Pescadero RD 2058's IS/MND, and finds the environmental documents prepared by the lead agency adequately address hydrology impacts, including potential flood risk, for the Board's approval of Permit No. 19301 to authorize work to repair critical levee erosion of the Unit 1 Paradise Cut left (south) bank levee, which is within the Board's responsibility as it relates to effects on the State's flood control system.

In accordance with CEQA Guidelines § 15096(f) and (g), staff recommends that the Board make responsible agency findings that approval of Permit No. 19301 will not result in any significant adverse impacts related to flood risk. The project will not adversely impact the State Plan of Flood Control; therefore, no additional mitigation measures within the Board's jurisdiction are required.

The documents and other materials which constitute the record of the Board's proceedings in this matter are in the custody of the Executive Officer, Central Valley Flood Protection Board, 3310 El Camino Ave., Suite 170, Sacramento, California 95821.

### **9.0 – CA WATER CODE SECTION 8610.5 AND OTHER CONSIDERATIONS**

California Water Code, Section 8610.5 (c) provides that the Board shall consider all the following matters, if applicable:

1. Evidence that the Board admits into its record from any party, state or local public agency, or nongovernmental organization with expertise in flood or flood plain management:

Staff requests that the Board consider this staff report and its attachments or references and any evidence submitted to it prior to or during the hearing.

2. The best available science that relates to the scientific issues presented by the executive officer, legal counsel, the Department of Water Resources or other parties that raise credible scientific issues.

The proposed project has been designed using the criteria given in RLRG. RLRG establishes the basis for certain rural levee repairs to mitigate known hazards and improve flood protection in an affected region. RLRG guidelines adhere to current industry standards and methods and are the most updated guidelines in relation to rural levee repair.

3. Effects of the decision on the entire State Plan of Flood Control (SPFC).

The proposed project improves the SPFC by addressing a known waterside erosion site.

4. Effects of reasonably projected future events, including, but not limited to, changes in hydrology, climate, and development within the applicable watershed:

The added landside material is expected to withstand the changes in hydrology, climate, and development within the watershed. Therefore, it is not anticipated there will be any effects to the proposed project from reasonably projected future events.

#### **10.0 – STAFF RECOMMENDATION**

Staff recommends that the Board:

**Adopt:**

- The CEQA findings: The Board, acting as a responsible agency under CEQA, has independently reviewed and considered the environmental documents prepared for the project. Approving Permit No. 19301 would not result in any significant adverse impacts related to flood risk and no additional mitigation measures within the Board's jurisdiction are required; and,

**Approve:**

- Encroachment Permit No. 19301 in substantially the form provided in Attachment A; and

**Direct:**

- The Executive Officer to take the necessary actions to execute the permit and file a CEQA Notice of Determination with the State Clearinghouse.

#### **11.0 – LIST OF ATTACHMENTS**

- A. Draft Permit No. 19301
- B. Location Maps and Photos
- C. Project Drawings

**Reviewers:**

Design Review:	Deb Biswas, Engineer, Permitting Section
Environmental Review:	Itzia Rivera, Senior Environmental Scientist
Document Review:	Gary W. Lemon, P.E., Permitting Section Chief
	Yiguo Liang, P.E., Operations Branch Chief
	Michael C. Wright, P.E., Chief Engineer
Legal Review:	Sarah Backus, Staff Counsel

**DRAFT**

STATE OF CALIFORNIA  
THE RESOURCES AGENCY  
**THE CENTRAL VALLEY FLOOD PROTECTION BOARD**

**PERMIT NO. 19301 BD**

**This Permit is issued to:**

Pescadero Reclamation 2058  
3650 Canal Boulevard  
Tracy, California 95304

To repair the left (south) bank levee of Paradise Cut between Levee Mile (LM) 4.0 to LM 4.69 by adding suitable material to the landside levee slope.

The project is located approximately 1.7 miles downstream of Interstate 5 on the left (south) bank levee of Paradise Cut, at 37.78761°N 121.35079°W, Reclamation District 2058, Paradise Cut, San Joaquin County.

**NOTE:** Special Conditions have been incorporated herein which may place limitations on and/or require modification of your proposed project as described above.

**(SEAL)**

Dated: \_\_\_\_\_

\_\_\_\_\_  
Executive Officer

**GENERAL CONDITIONS:**

**ONE:** This permit is issued under the provisions of Sections 8700 – 8723 of the Water Code.

**TWO:** Only work described in the subject application is authorized hereby.

**THREE:** This permit does not grant a right to use or construct works on land owned by the Sacramento and San Joaquin Drainage District or on any other land.

**FOUR:** The approved work shall be accomplished under the direction and supervision of the State Department of Water Resources, and the permittee shall conform to all requirements of the Department and The Central Valley Flood Protection Board.

**FIVE:** Unless the work herein contemplated shall have been commenced within one year after issuance of this permit, the Board reserves the right to change any conditions in this permit as may be consistent with current flood control standards and policies of The Central Valley Flood Protection Board.



**SIX:** This permit shall remain in effect until revoked. In the event any conditions in this permit are not complied with, it may be revoked on 15 days' notice.

**SEVEN:** It is understood and agreed to by the permittee that the start of any work under this permit shall constitute an acceptance of the conditions in this permit and an agreement to perform work in accordance therewith.

**EIGHT:** This permit does not establish any precedent with respect to any other application received by The Central Valley Flood Protection Board.

**NINE:** The permittee shall, when required by law, secure the written order or consent from all other public agencies having jurisdiction.

**TEN:** The permittee is responsible for all personal liability and property damage which may arise out of failure on the permittee's part to perform the obligations under this permit. If any claim of liability is made against the State of California, or any departments thereof, the United States of America, a local district or other maintaining agencies and the officers, agents or employees thereof, the permittee shall defend and shall hold each of them harmless from each claim.

**ELEVEN:** The permittee shall exercise reasonable care to operate and maintain any work authorized herein to preclude injury to or damage to any works necessary to any plan of flood control adopted by the Board or the Legislature, or interfere with the successful execution, functioning or operation of any plan of flood control adopted by the Board or the Legislature.

**TWELVE:** Should any of the work not conform to the conditions of this permit, the permittee, upon order of The Central Valley Flood Protection Board, shall in the manner prescribed by the Board be responsible for the cost and expense to remove, alter, relocate, or reconstruct all or any part of the work herein approved.

#### **SPECIAL CONDITIONS FOR PERMIT NO. 19301 BD**

#### **LIABILITY AND INDEMNIFICATION**

**THIRTEEN:** The permittee shall defend, indemnify, and hold harmless the Central Valley Flood Protection Board (Board) and the State of California, including its agencies or departments thereof, including but not limited to, any and all boards, commissions, officers, agents, employees, and representatives (Indemnitees), against any and all claims, liabilities, charges, losses, expenses, and costs including the State's attorneys' fees (Liabilities), that may arise from, or by reason of: (1) any action or inaction by the Indemnitees in connection with the issuance or denial of any permit, lease, or other entitlement; (2) as a result of approvals or authorizations given by the Board to the permittee pursuant to, or as a result of, permittee's permit application; (3) provisions of the issued permit or lease, provisions of CEQA, an environmental document certified or adopted by the Board related to the permit application, or any other regulations, requirements, or programs by the State, except for any such Liabilities caused solely by the gross negligence or intentional acts of the State or its officers, agents, and employees.

**FOURTEEN:** Permittee shall reimburse the Board in full for all reasonable costs and attorneys' fees, including, but not limited to, those charged to it by the California Office of Attorney General, that the Board incurs in connection with the defense of any action brought against the Board challenging this permit or any other matter related to this permit or the work performed by the State in its issuance of this permit. In addition, the permittee shall reimburse the Board for any court costs and reasonable attorneys' fees that the Board/Indemnitees may be required by a court to pay as a result of such action. The permittee may participate in the defense of the action, but its participation shall not relieve it of its obligations under the conditions of this permit.

**FIFTEEN:** The Board and Department of Water Resources shall not be held liable for any damages to the permitted encroachment(s) resulting from releases of water from reservoirs, flood fight, operation, maintenance, inspection, or emergency repair.

## AGENCY CONDITIONS

SIXTEEN: All work approved by this permit shall be in accordance with the submitted drawings and specifications dated January 4, 2017, except as modified by special permit conditions herein. No further work, other than that approved by this permit, shall be done in the area without prior approval of the Board.

SEVENTEEN: Permittee shall pay to the Board, an inspection fee(s) to cover inspection cost(s), including staff and/or consultant time and expenses, for any inspections before, during, post-construction, and regularly thereafter as deemed necessary by the Board.

EIGHTEEN: In the event that levee erosion injurious to the adopted plan of flood control occurs at or adjacent to the permitted encroachment(s), the permittee shall repair the eroded area and propose measures, to be approved by the Board, to prevent further erosion.

NINETEEN: The permittee shall be responsible for the repair of any damages to the project levee, or other flood control facilities due to construction, operation, or maintenance of the proposed project.

TWENTY: The permittee shall comply with all conditions set forth in the letter from the Department of the Army (U.S. Army Corps of Engineers, Sacramento District) dated October 17, 2019, which is attached to this permit as Exhibit A and is incorporated by reference.

TWENTY-ONE: The permittee must acquire appropriate property rights prior to the construction of the project.

## PRE-CONSTRUCTION

TWENTY-TWO: Upon receipt of a signed copy of the issued permit the permittee shall contact the Board by telephone at (916) 574-0609 to schedule a preconstruction conference with the inspector that is assigned to your project. Failure to do so at least 10 working days prior to start of work may result in a delay of the project.

## CONSTRUCTION

TWENTY-THREE: No construction work of any kind shall be done during the flood season from November 1 to July 15 without prior approval of the Board. Failure to submit a Time Variance Request to the Board at least 10 working days prior to November 1 may result in a delay of the project.

TWENTY-FOUR: The levee embankment shall be designed and constructed in accordance with the Department of Army, Engineering Manual 1110-2-1913.

TWENTY-FIVE: Prior to placement of fill against the levee slope and within 10 feet of the levee toe, all surface vegetation shall be removed to a depth of 6 inches. Organic soil and roots larger than 1-1/2 inches in diameter shall be removed to a depth of 3 feet.

TWENTY-SIX: Any excavations made in the levee section or within 10 feet of the levee toes shall be backfilled in 4- to 6-inch layers with impervious material with 20 percent or more passing the No. 200 sieve, a plasticity index of 8 or more, and a liquid limit of less than 50 and free of lumps or stones exceeding 3 inches in greatest dimension, vegetative matter, or other unsatisfactory material. Backfill material shall be compacted in 4- to 6-inch layers to a minimum of 90 percent relative compaction as measured by the current ASTM D1557 standard.

## **POST-CONSTRUCTION**

TWENTY-SEVEN: All debris generated by this project shall be properly disposed of outside the Project Works.

TWENTY-EIGHT: The project levee shall be restored to at least the condition that existed prior to commencement of work.

TWENTY-NINE: Upon completion of the project, compaction tests by a certified soils laboratory will be required to verify compaction of backfill within the levee section or within 10 feet of the levee toe.

THIRTY: Upon completion of the project, the permittee shall submit as-constructed drawings to the Board.

## **OPERATIONS AND MAINTENANCE**

THIRTY-ONE: The permittee shall maintain the permitted encroachment(s) and the Project Works within the utilized area in the manner required and as requested by the authorized representative of the Board, the Department of Water Resources, or any other agency responsible for maintenance and shall, at all times, allow officials from these agencies to access the levee, levee slope, and any adjacent areas as necessary for flood control.

THIRTY-TWO: The permitted encroachment(s) shall not interfere with the operation and maintenance of the flood control project. If the permitted encroachment(s) are determined by any agency responsible for operation or maintenance of the flood control project to interfere, the permittee shall be required, at permittee's cost and expense, to modify or remove the permitted encroachment(s) within 30-days of being notified in writing by the Board. In the event of an emergency a shorter timeframe may be required. If the permittee does not comply, the Board, or a designated agency or company authorized by the Board, may modify or remove the encroachment(s) at the permittee's expense.

## **END OF CONDITIONS**



DEPARTMENT OF THE ARMY  
U.S. ARMY CORPS OF ENGINEERS, SACRAMENTO DISTRICT  
1325 J STREET  
SACRAMENTO, CA 95814-2922

408 Permission Section (19301)

17 Oct 2019

Ms. Leslie M. Gallagher  
Executive Officer  
Central Valley Flood Protection Board  
3310 El Camino Avenue, Room 170  
Sacramento, CA 95821

Dear Ms. Gallagher:

We have reviewed permit application number 19301 submitted by the Reclamation District (RD) 2058 to alter the Lower San Joaquin River and Tributaries Project, authorized by the Flood Control Act of 1944, Public Law 534, 78<sup>th</sup> Congress, Second Session. These plans include the rehabilitation of the south bank levee of Paradise Cut at Unit 1 Levee Mile (LM) 4.00 to LM 4.43 and the repair of a levee critical erosion site at LM 4.43 to LM 4.69 by adding borrow material to the landside levee slope. Approximately 26,000 cubic yards of material will be removed from Tom Paine Slough, near the El Rancho Road bridge to be used as borrow material. All work would occur on the landside of the levee. The proposed work from LM 4.00 to LM 4.43 includes restoring the levee crown and landslide slope to meet original design specifications which is consistent with maintenance activities prescribed by the Standard Operation and Maintenance Manual for the Lower San Joaquin River Levees, Lower San Joaquin River and Tributaries Project, California; therefore this action does not require review or approval pursuant to Section 14 of the Rivers and Harbors Act of 1899, 33 U.S.C. § 408 (Section 408). The proposed work from LM 4.43 to LM 4.69 includes an alteration to the federal project beyond the original design and requires review and approval under Section 408. This Section 408 letter of permission only includes the proposed levee erosion repair from LM 4.43 to LM 4.69. The project site is located at: 37.787615 °N 121.350785°W NAD83 within San Joaquin County, CA.

The Sacramento District (Corps) has reviewed this application and determined that the alteration will not be injurious to the public interest and will not impair the usefulness of the project works. Pursuant to Section 408, the District Engineering Division Chief approves the request to alter the Federal flood risk reduction project subject to the following conditions:



Engineering Conditions:

- a. That the alteration must not interfere with the integrity or hydraulic capacity of the flood risk management project; easement access; or maintenance, inspection, and flood fighting procedures.
- b. That no temporary staging, stockpiles of materials, temporary buildings, or equipment can remain on the levee or in the floodway during flood season unless approved in writing by the Central Valley Flood Protection Board.
- c. That excavations and drilling must meet federal, state, and local criteria, Corps standards, and Office of Safety and Occupational Health standards.
- d. That the requester is responsible for removal and disposal of trees or brush cleared during construction. The removal and disposal must be to areas outside the limits of the federal project easement.
- e. That the requester is responsible for protecting the levee from being damaged by construction vehicles, equipment, construction activities, and storage of materials.
- f. That areas disturbed during construction or other work associated with an alteration must be restored to pre-construction conditions once the work is complete.
- g. That any damage caused by removal or modification of any alteration would need to be repaired as part of the removal or modification activity.
- h. Final Slope Grades. The landside slope of the proposed levee must be graded to a 4H:1V or flatter with transition zones as steep as 3H:1V.
- i. Temporary Minimum Slope Requirements. Excavate all temporary construction slopes no steeper than 2H:1V in the levee embankment and within 15 feet of either toe of the embankment. All excavations must also meet Federal, State, local, and OSHA requirements.
- j. Levee Fill. Import Levee Fill criteria is as follows:
  - i. Plasticity index between 8% and 25% and liquid limit less than 50%.
  - ii. Minimum fines content of 20% and 100% of the soil passing the 3 inch sieve.

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- iii. Fill must be free of deleterious materials and construction debris.
- k. Placement and Compaction. Compact fill in accordance with the following:
  - i. Spread and place fill in 4- to 6-inch thick loose lifts.
  - ii. Within 4 feet of structures spread and place fill in 4-inch-thick loose lifts and compact with hand operated equipment.
  - iii. Compact to greater than or equal to 95% of the maximum density at moisture contents between +2 and -3 percent of optimum moisture content obtained from ASTM D698 (*USACE preferred method*).
  - iv. Alternate Method: Compact to greater than or equal to 90% of the maximum density at moisture contents between -1 and +4 percent of optimum moisture content obtained from ASTM D1557.
- l. This permission only authorizes you, the requester, to undertake the activity described herein under the authority provided in Section 14 of the Rivers and Harbors Act of 1899, as amended (33 USC § 408). This permission does not obviate the need to obtain other federal, state, or local authorizations required by law. This permission does not grant any property rights or exclusive privileges, and you must have appropriate real estate instruments in place prior to construction and/or installation.
- m. That all real property interests and other rights (easements, permits, licenses, acquisitions, etc.) necessary for the construction, operation, maintenance, occupation, or use of the proposed alteration as well as for operation, maintenance, occupation, or use of the federal project (levee and channel) are acquired prior to construction. An approval under Section 408 does not grant property rights or exclusive privileges.

Environmental Conditions:

- n. That if you discover any previously unknown historic properties (36 CFR § 800.13) while accomplishing the activity authorized by this Section 408 permission, you shall immediately notify the Corps of what you have found. The Corps will initiate any necessary Federal and State coordination to ensure continued compliance with the National Historic Preservation Act.
- o. To ensure your project complies with the Federal Endangered Species Act, you shall implement all of the incidental take minimization measures issued by the

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San Joaquin Council of Governments in the enclosed document dated April 4, 2019 (Enclosure 1), and further identified in the enclosed U.S. Fish and Wildlife Service letter (08ESMF00-2019-F-2002, dated May 23, 2019; Enclosure 2). If you are unable to implement any of the measures, you must immediately notify the Corps, prior to initiating the work, so the Corps may reinstate consultation as appropriate, in accordance with the Federal Endangered Species Act.

- p. That you shall comply with all the conditions in the enclosed U.S. Fish and Wildlife Service (USFWS) Biological Opinion (08ESMF00-2019-F-1080-1, dated March 27, 2019; Enclosure 3). This Section 408 permission does not authorize you to take a listed species, in particular riparian brush rabbit (*Sylvilagus bachmani riparius*), or adversely modify designated critical habitat. In order to legally take a listed species, you must have separate authorization under the Endangered Species Act (e.g., an Endangered Species Act Section 10 permit, or a Biological Opinion under Endangered Species Act Section 7, with "incidental take" provisions with which you must comply). The enclosed Biological Opinion contains mandatory terms and conditions to implement the reasonable and prudent measures that are associated with "incidental take" that is also specified in the Biological Opinion. Your authorization under this Section 408 permission is conditioned upon your compliance with all of the mandatory terms and conditions associated with "incidental take" of the enclosed Biological Opinion, which terms and conditions are incorporated by reference in this permission. Failure to comply with the terms and conditions associated with the incidental take statement of the Biological Opinion, where a take of the listed species occurs, would constitute an unauthorized take, and it would also constitute non-compliance with your Section 408 permission.

Based on the information provided, no Section 10 or Section 404 permit is needed. This Section 408 letter of permission does not serve as authorization for any work that affects navigable capacity of waters of the United States or that involves the discharge of dredge or fill material into waters of the United States.



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A Copy of this letter is being furnished to Mr. Don Rasmussen, Chief, Flood Project Integrity and Inspection Branch, 3310 El Camino Avenue, Suite 200, Sacramento, CA 95821. For any questions regarding this permission, please contact Kimberlee Leonard by phone at (916) 557-7183 or by email at *Kimberlee.K.Leonard@usace.army.mil*.

Sincerely,

A handwritten signature in cursive script, reading "Rick L. Poeppelman".

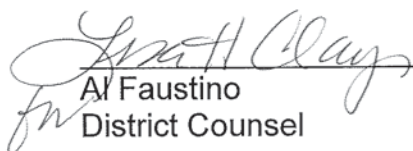
Rick L. Poeppelman, P.E.  
Chief, Engineering Division  
Levee Safety Officer

Enclosures



CERTIFICATION OF LEGAL REVIEW FOR THE  
33 U.S.C. SECTION 408 LETTER OF PERMISSION FOR  
CENTRAL VALLEY FLOOD PROTECTION BOARD  
ENCROACHMENT PERMIT No. 19301  
TO MODIFY THE LOWER SAN JOAQUIN RIVER AND TRIBUTARIES PROJECT

The 33 U.S.C. Section 408 letter of permission, including the *Section 408 Summary of Findings and Determination of Categorical Exclusion, 408 Permission (No. 19301), Central Valley Flood Protection Board, for the Reclamation District 2058 Levee Critical Repairs, San Joaquin County, California*, approving Central Valley Flood Protection Board Encroachment Permit No. 19301 to modify the San Joaquin River and Tributaries Project, has been fully reviewed by the Office of Counsel, Sacramento District, U.S. Army Corps of Engineers and is approved as legally sufficient and policy compliant, with the exception of the real estate review and certification required in EC 1165-2-216, para. 7.c(5)(i).

  
Al Faustino  
District Counsel

10/8/2019  
Date



**CENTRAL VALLEY FLOOD  
PROTECTION BOARD**

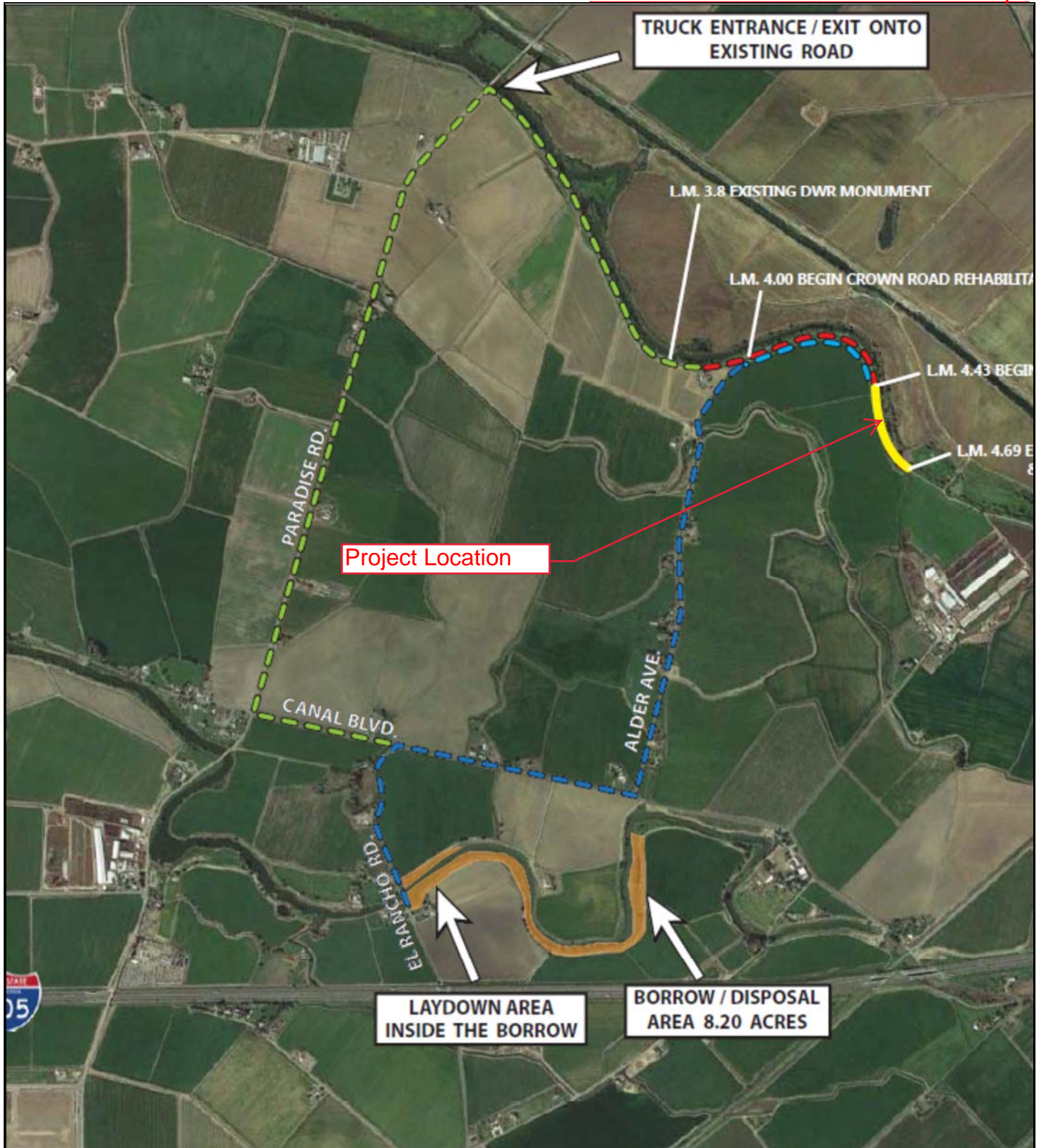
**Source: GoogleEarth**



**Application 19301**

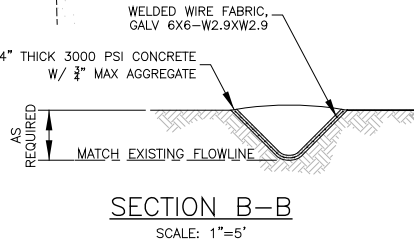
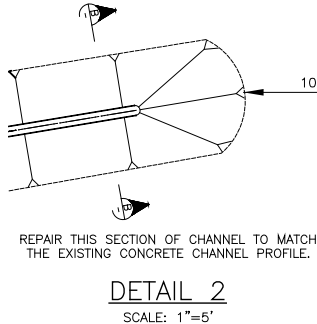
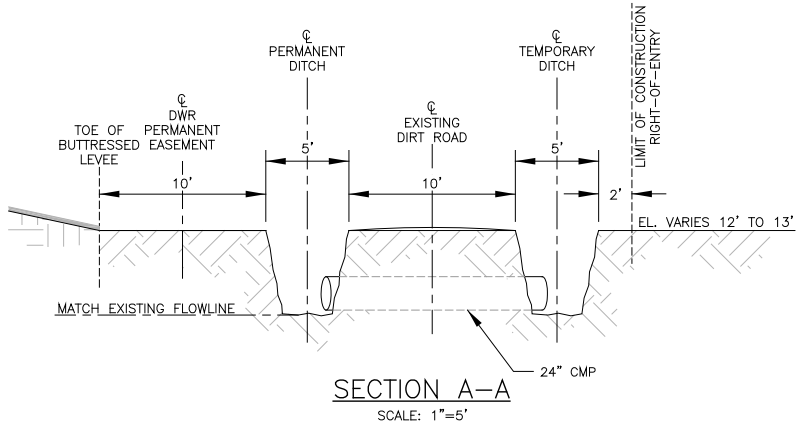
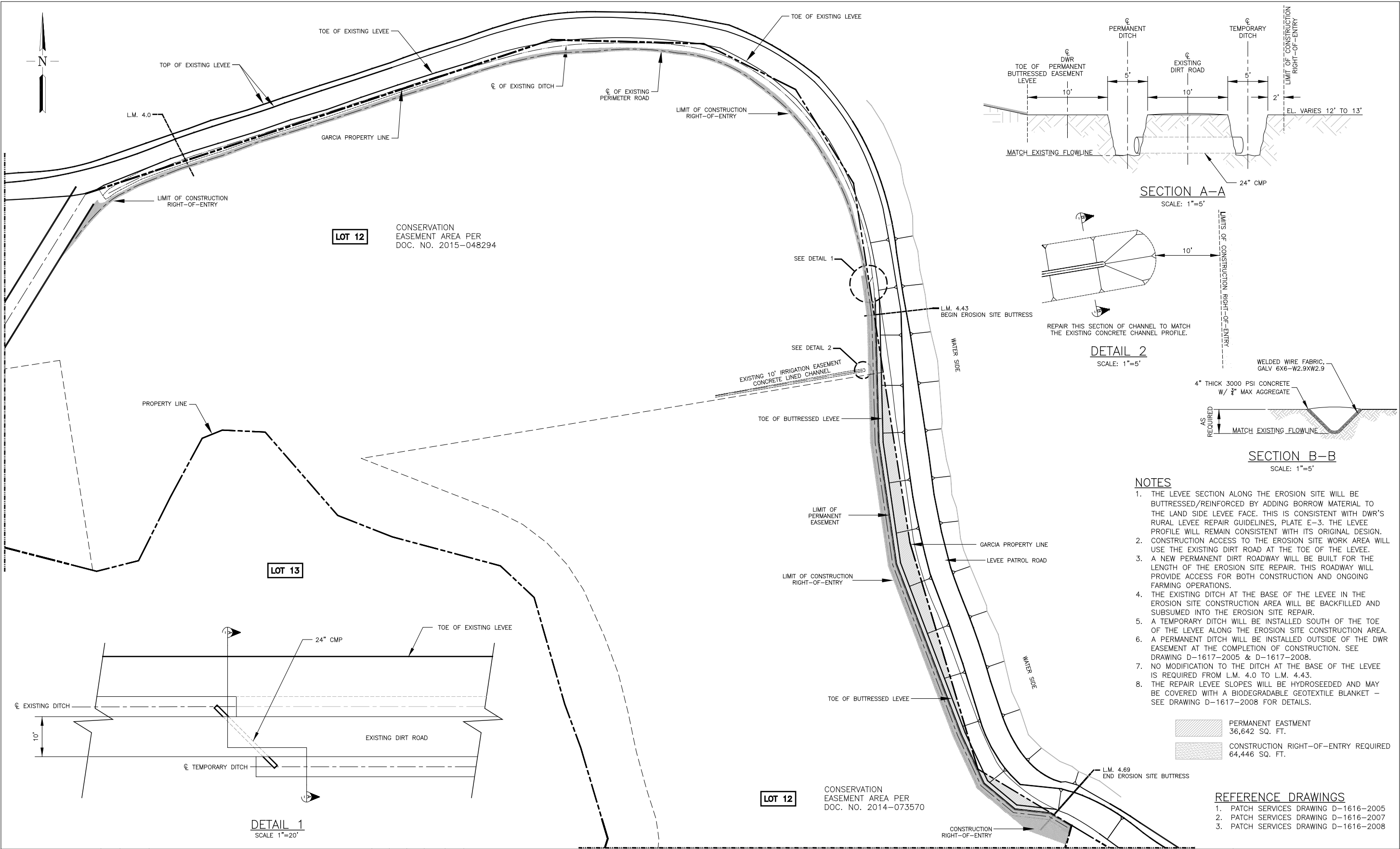


**Project Vicinity Map**





 <p><b>CENTRAL VALLEY FLOOD PROTECTION BOARD</b></p>	Source: Permit Application	
	Application 19301	
	Project Location Map	



- NOTES**
- 1. THE LEVEE SECTION ALONG THE EROSION SITE WILL BE BUTTRESSED/REINFORCED BY ADDING BORROW MATERIAL TO THE LAND SIDE LEVEE FACE. THIS IS CONSISTENT WITH DWR'S RURAL LEVEE REPAIR GUIDELINES, PLATE E-3. THE LEVEE PROFILE WILL REMAIN CONSISTENT WITH ITS ORIGINAL DESIGN.
  - 2. CONSTRUCTION ACCESS TO THE EROSION SITE WORK AREA WILL USE THE EXISTING DIRT ROAD AT THE TOE OF THE LEVEE.
  - 3. A NEW PERMANENT DIRT ROADWAY WILL BE BUILT FOR THE LENGTH OF THE EROSION SITE REPAIR. THIS ROADWAY WILL PROVIDE ACCESS FOR BOTH CONSTRUCTION AND ONGOING FARMING OPERATIONS.
  - 4. THE EXISTING DITCH AT THE BASE OF THE LEVEE IN THE EROSION SITE CONSTRUCTION AREA WILL BE BACKFILLED AND SUBSUMED INTO THE EROSION SITE REPAIR.
  - 5. A TEMPORARY DITCH WILL BE INSTALLED SOUTH OF THE TOE OF THE LEVEE ALONG THE EROSION SITE CONSTRUCTION AREA.
  - 6. A PERMANENT DITCH WILL BE INSTALLED OUTSIDE OF THE DWR EASEMENT AT THE COMPLETION OF CONSTRUCTION. SEE DRAWING D-1617-2005 & D-1617-2008.
  - 7. NO MODIFICATION TO THE DITCH AT THE BASE OF THE LEVEE IS REQUIRED FROM L.M. 4.0 TO L.M. 4.43.
  - 8. THE REPAIR LEVEE SLOPES WILL BE HYDROSEEDING AND MAY BE COVERED WITH A BIODEGRADABLE GEOTEXTILE BLANKET - SEE DRAWING D-1617-2008 FOR DETAILS.

PERMANENT EASTMENT	36,642 SQ. FT.
CONSTRUCTION RIGHT-OF-ENTRY REQUIRED	64,446 SQ. FT.

- REFERENCE DRAWINGS**
- 1. PATCH SERVICES DRAWING D-1616-2005
  - 2. PATCH SERVICES DRAWING D-1616-2007
  - 3. PATCH SERVICES DRAWING D-1616-2008

THIS DRAWING WAS PREPARED BY PATCH SERVICES FOR A SPECIFIC PROJECT, TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT. REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH PATCH SERVICES AND PATCH'S CLIENT IS GRANTED.

REV	DATE	DESCRIPTION	DWYR BY	CHK BY	ENGR BY	PROJECT ENGR	APPROV BY
02-03-17		GENERAL REVISION					

**PATCH SERVICES**

CALIFORNIA \* ENGINEERING \* TEXAS

333 SUNSET AVE. SUITE: 150  
SUISUN CITY, CA 94585  
PHONE: 707-425-4949  
FAX: 707-425-4553

21175 TOMBALL PARKWAY SUITE: #308  
HOUSTON, TX 77070  
PHONE: 281-330-1466  
FAX: 832-698-2835

PESCADERO RECLAMATION DISTRICT  
RD 2058

**EROSION SITE  
AREA PLAN**

SCALE: 1"=100'

JOB NO: 1617

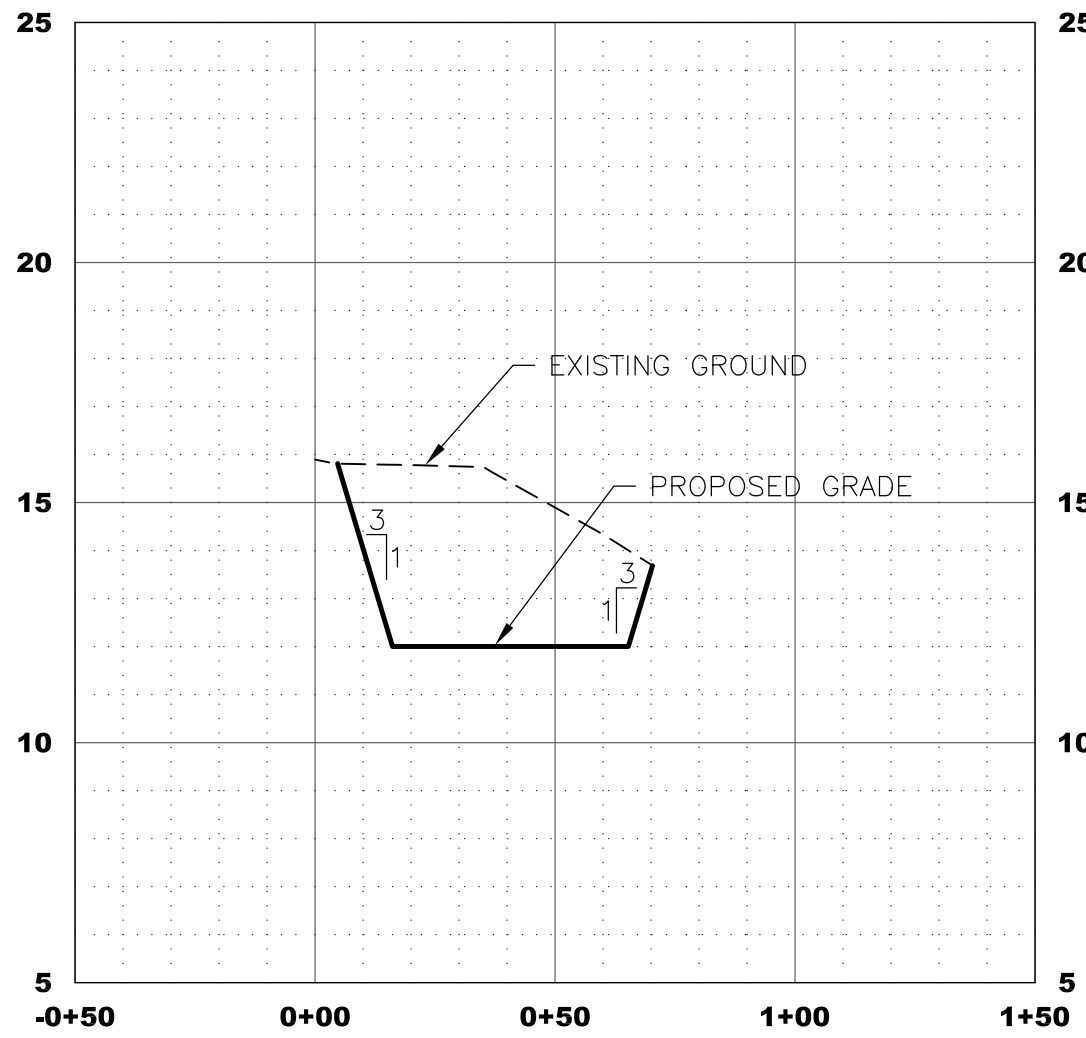
DATE: 01-04-17

DRAWN BY: CM

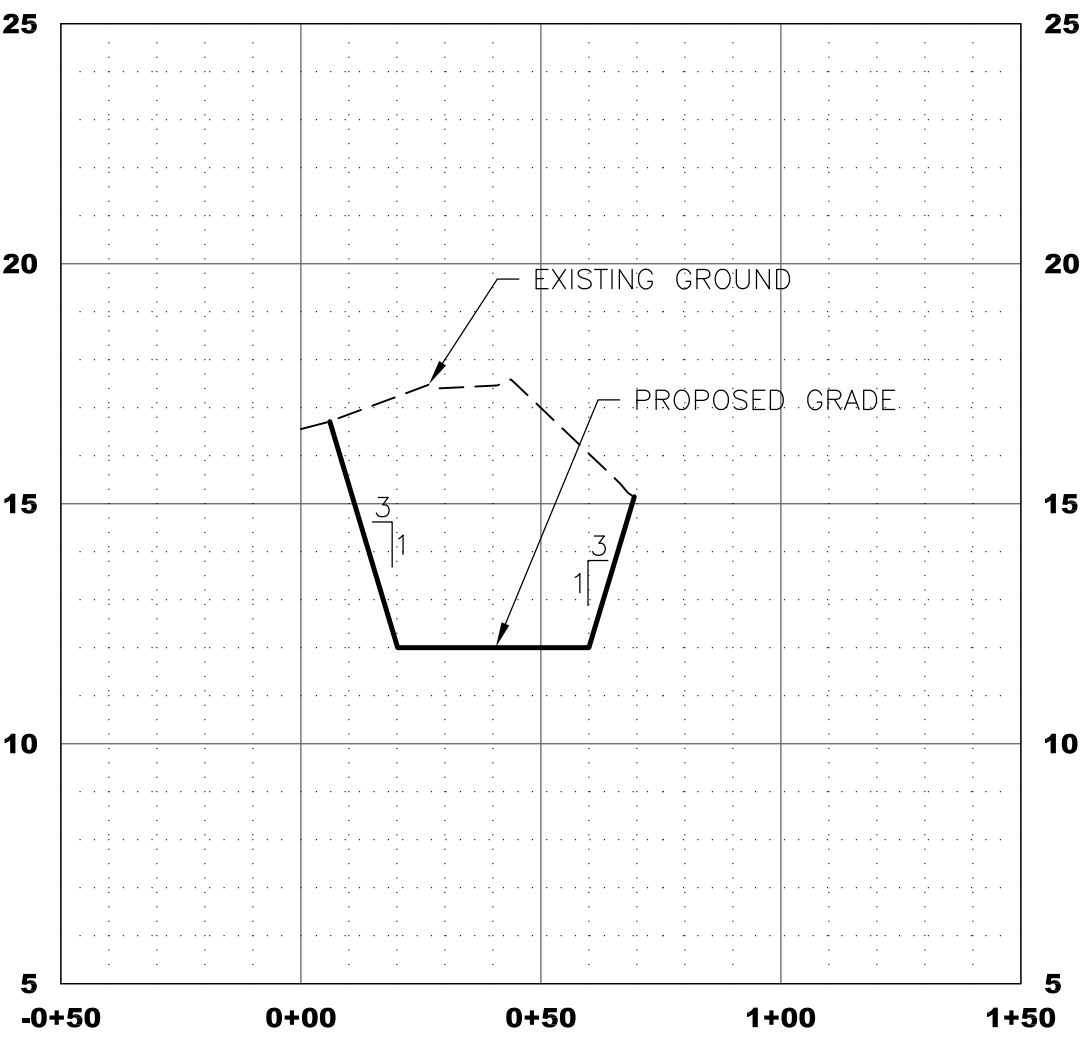
CHECKED BY: CJP

DRAWING NUMBER	SHEET NUMBER	REV
D-1617-2004	1 OF 2	A

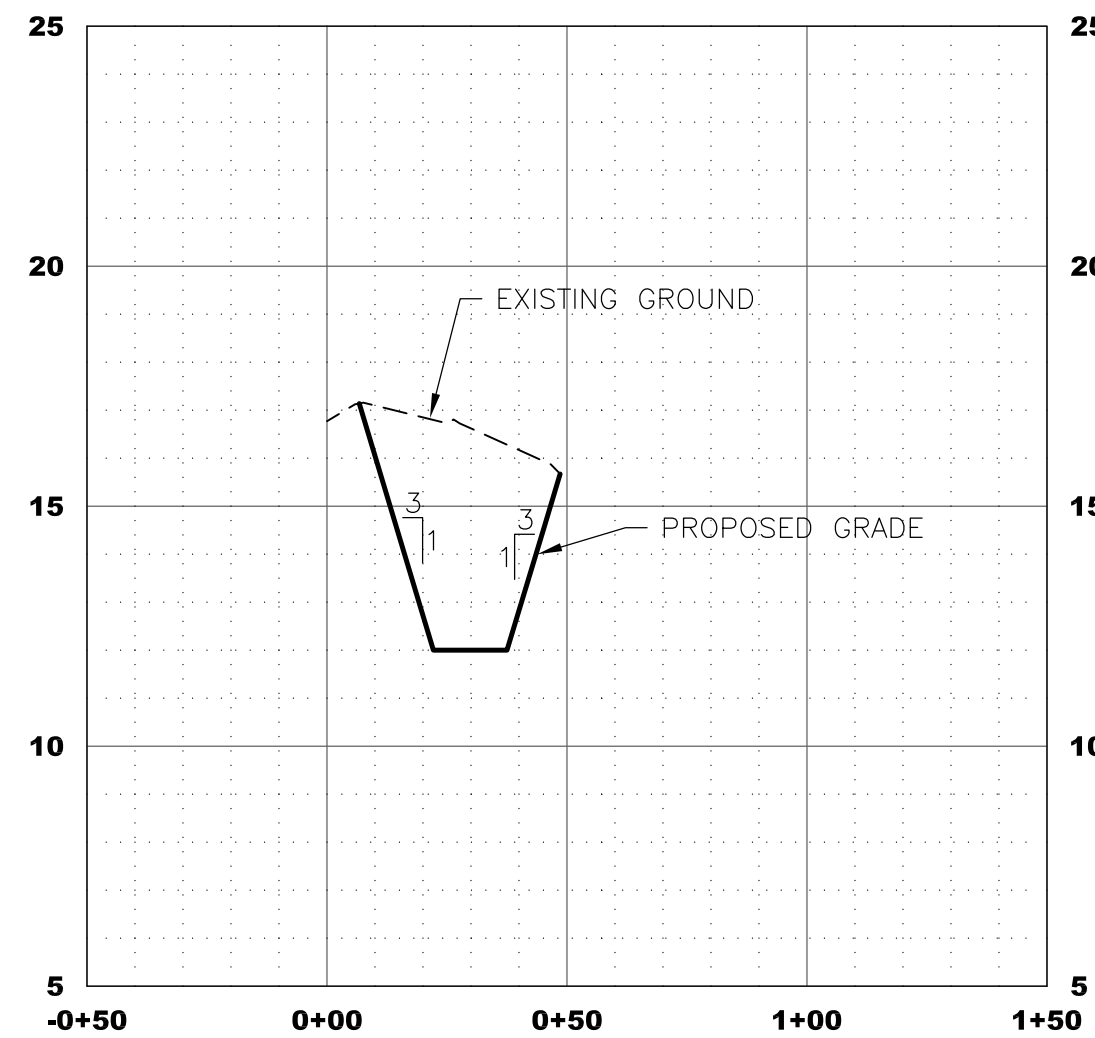




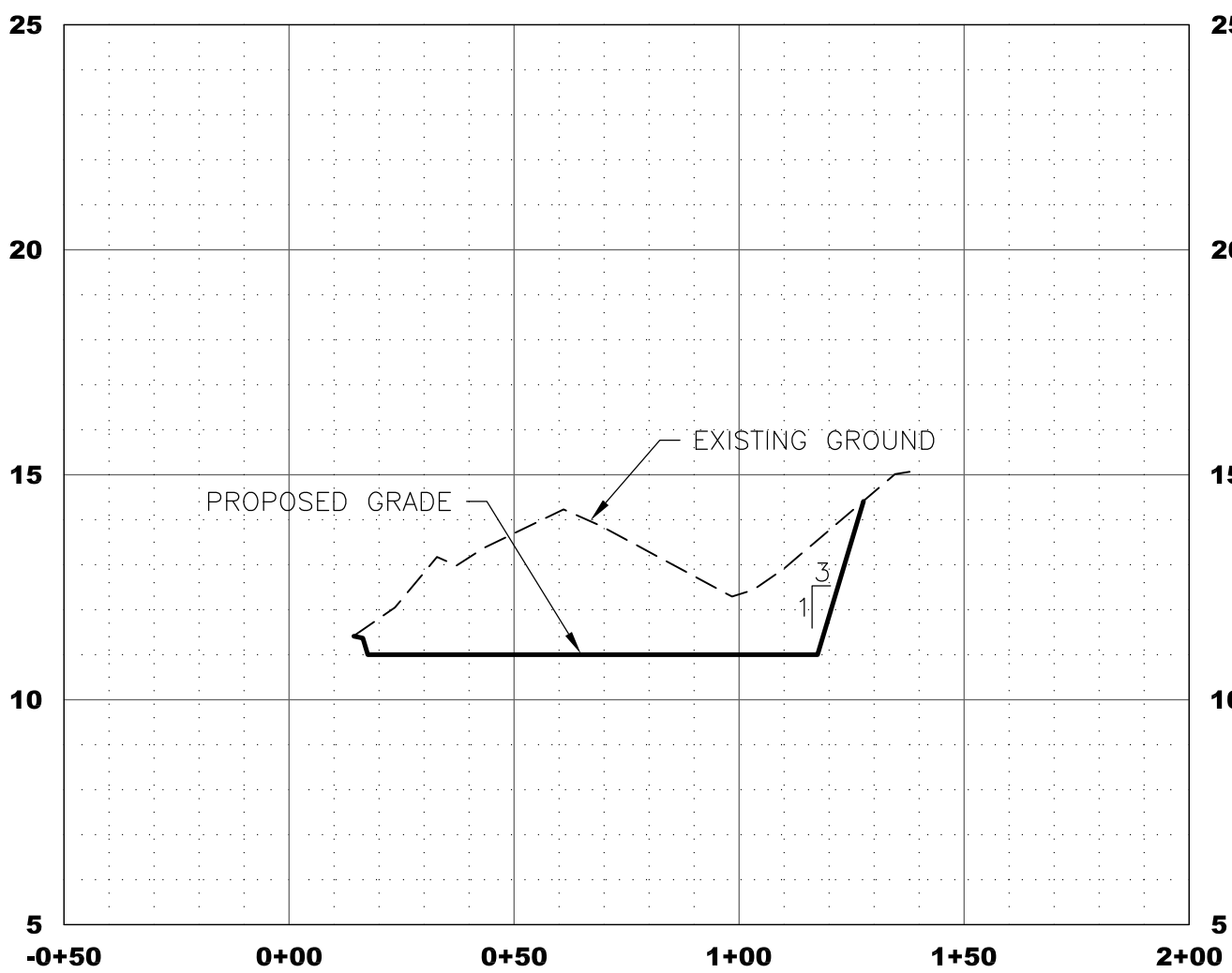
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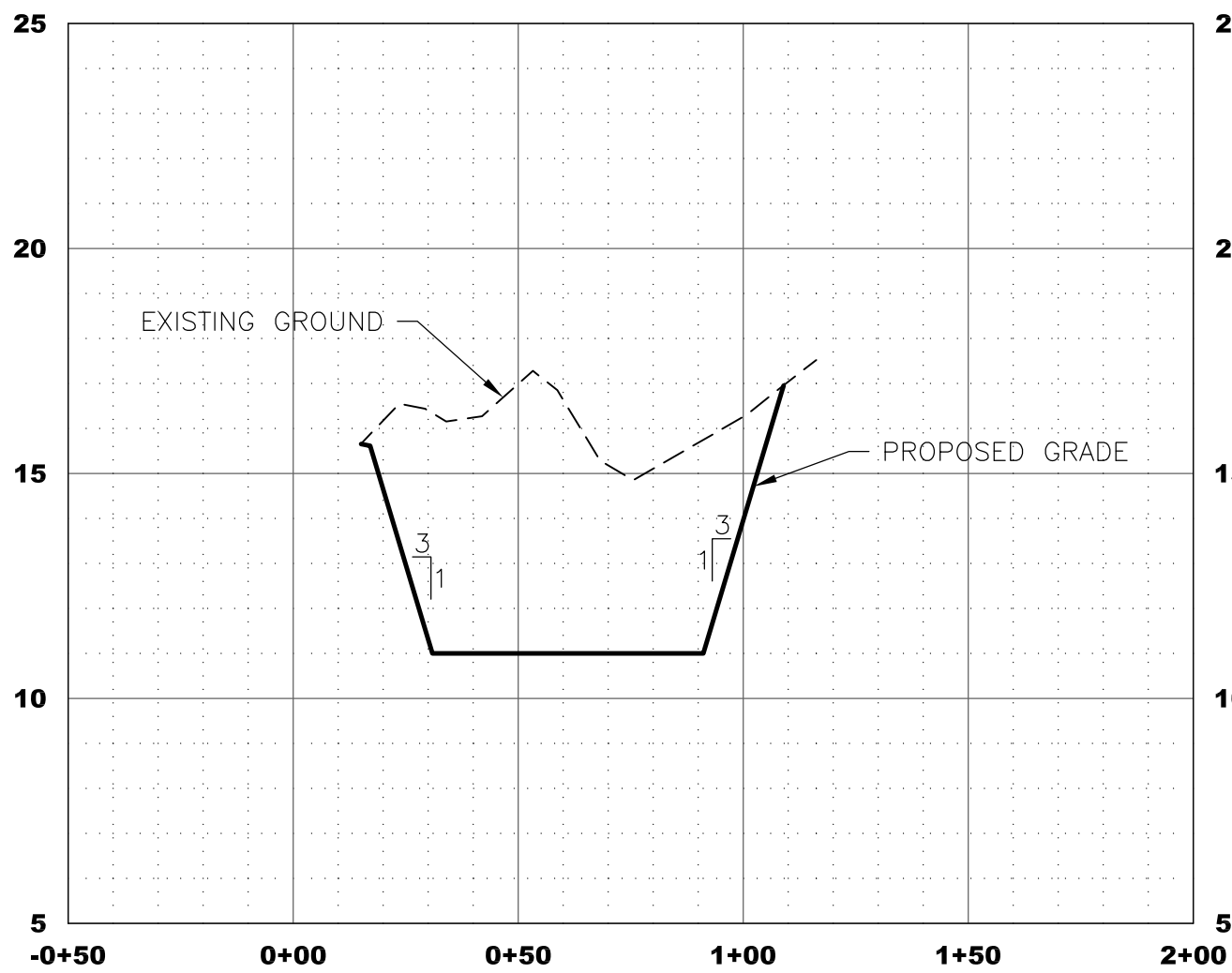
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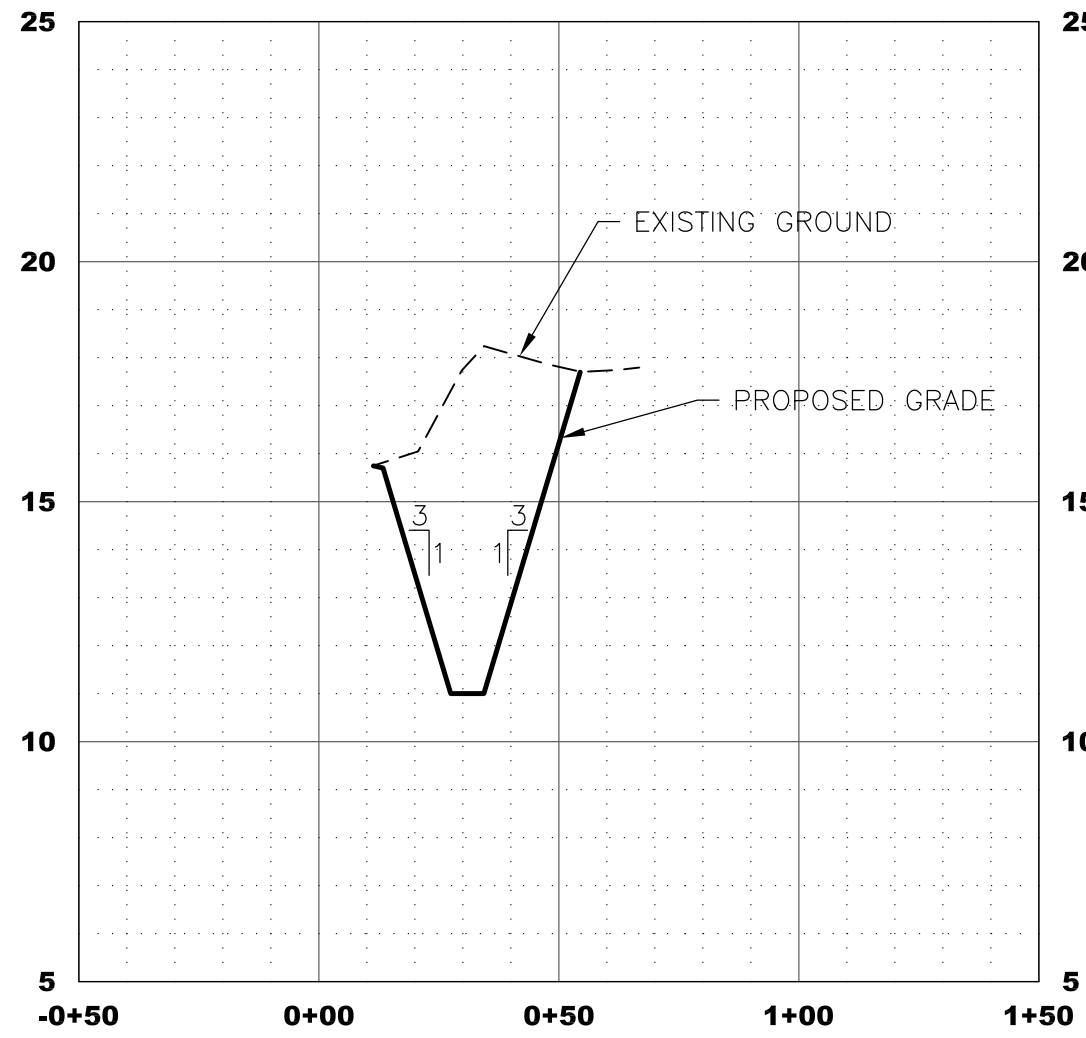
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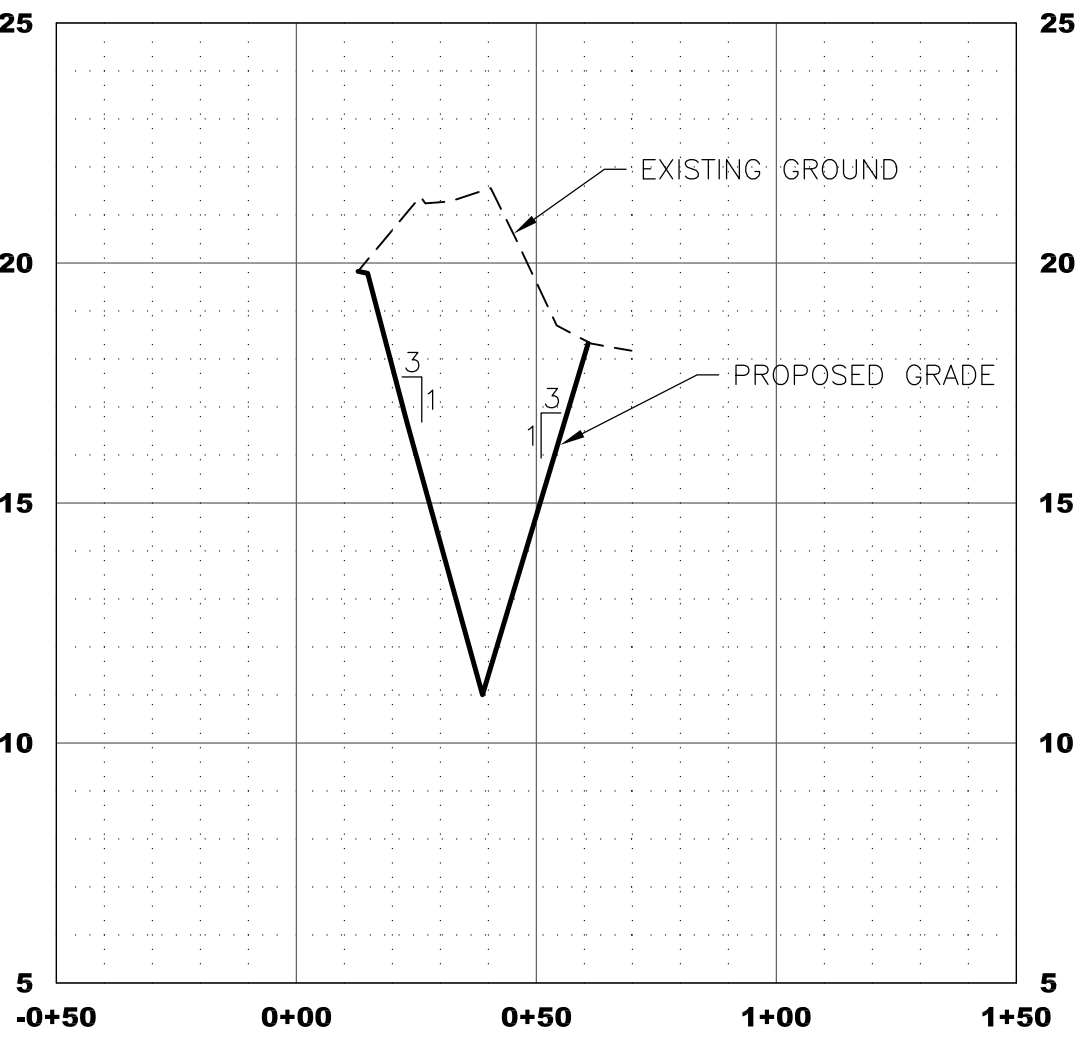
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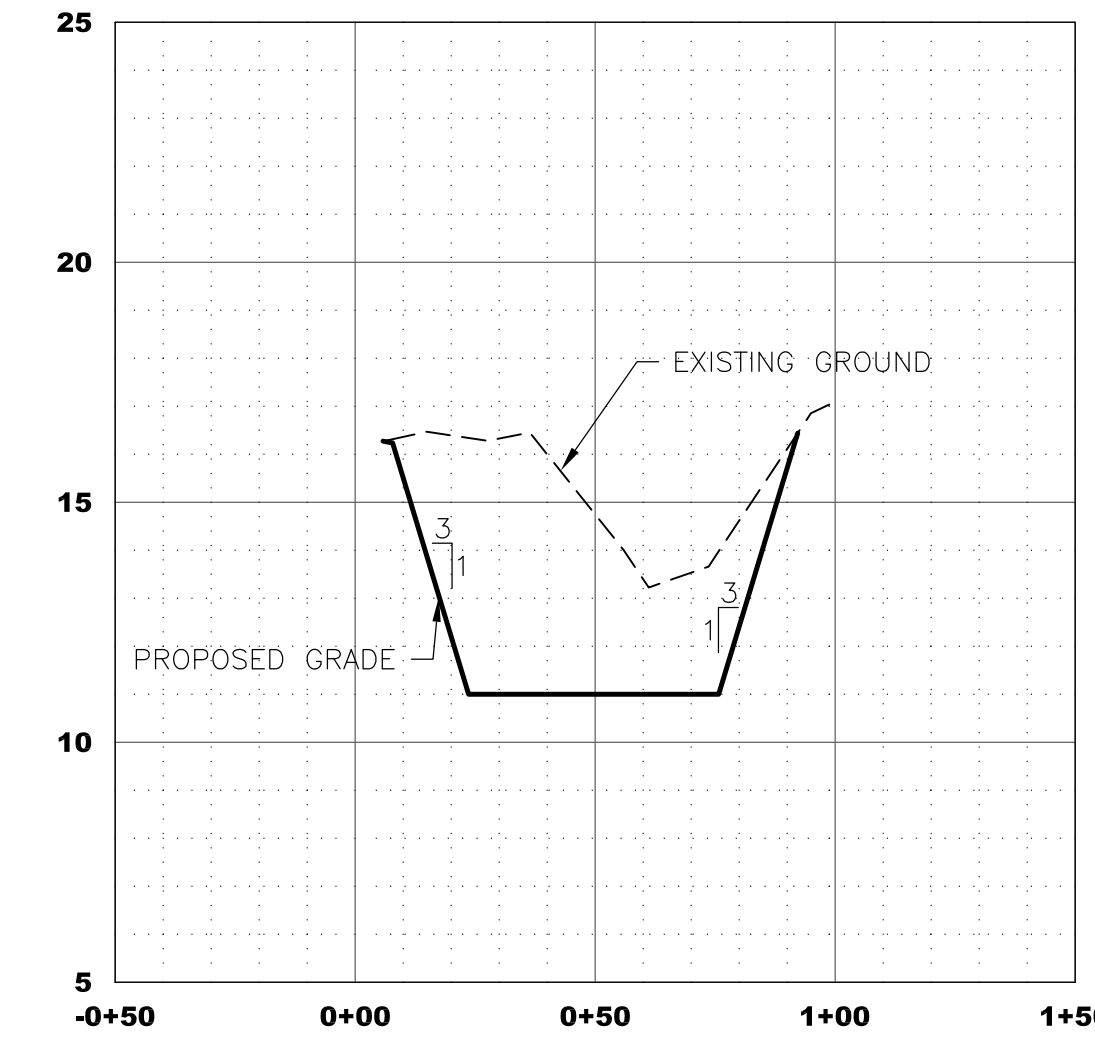
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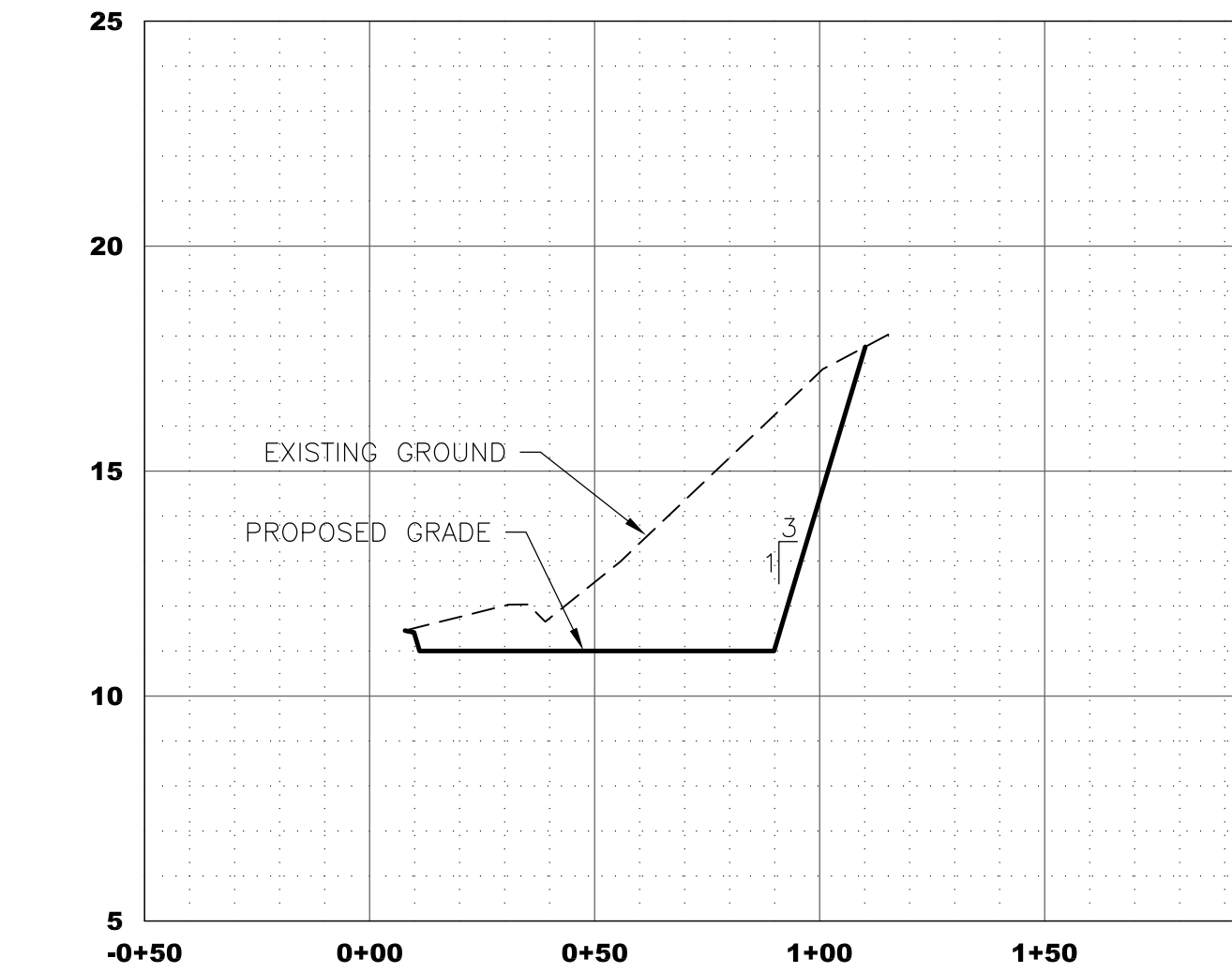
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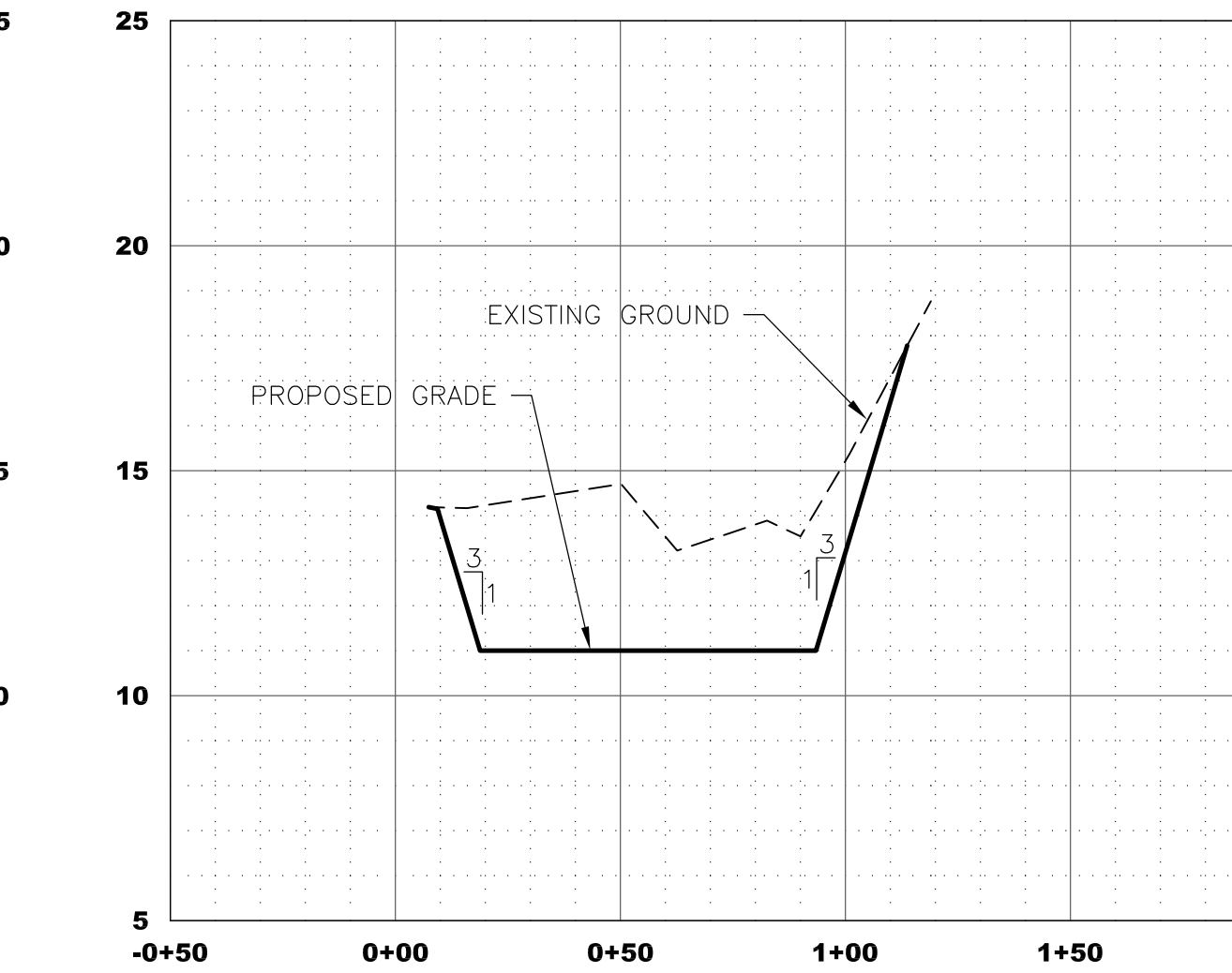
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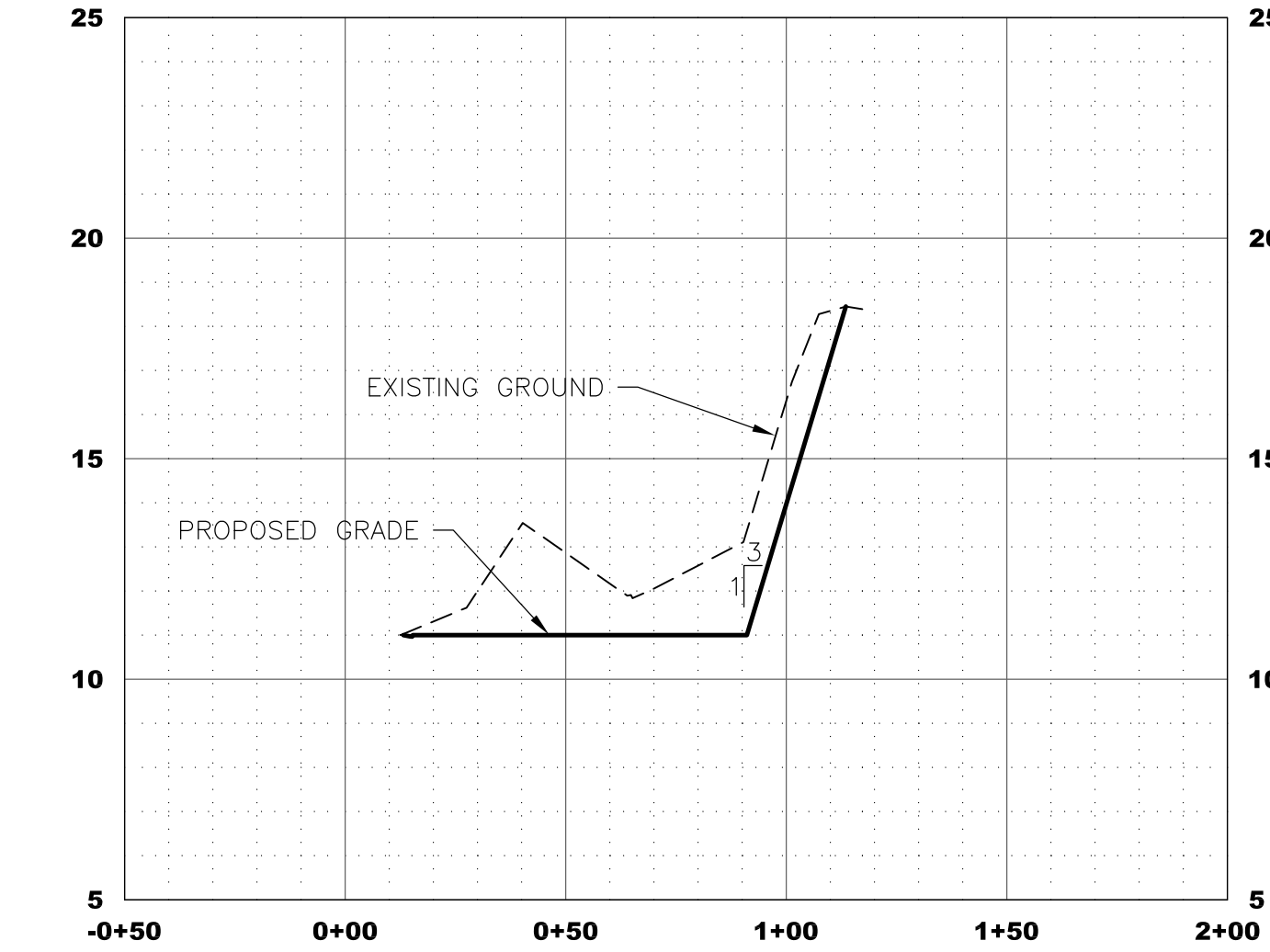
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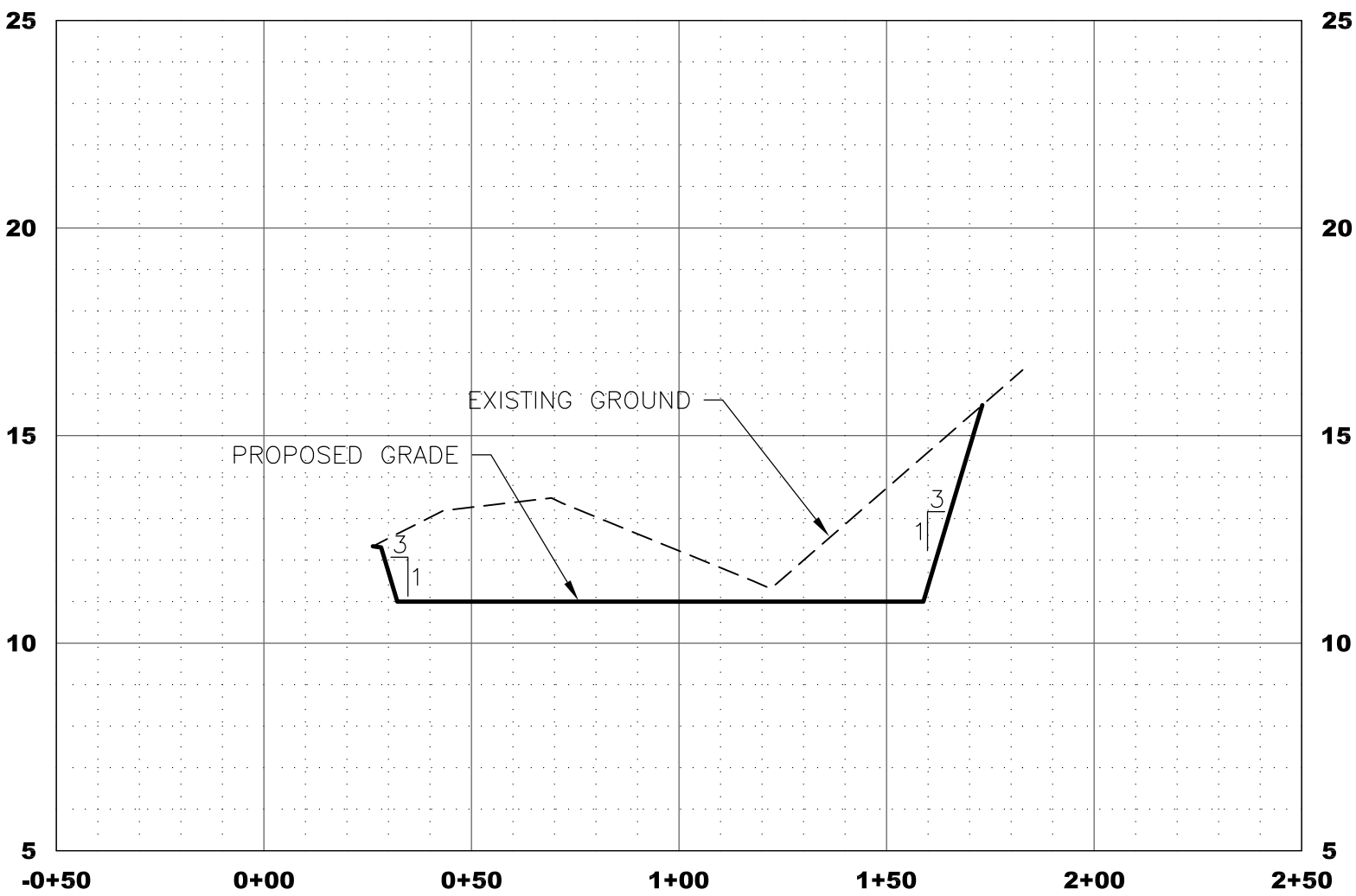
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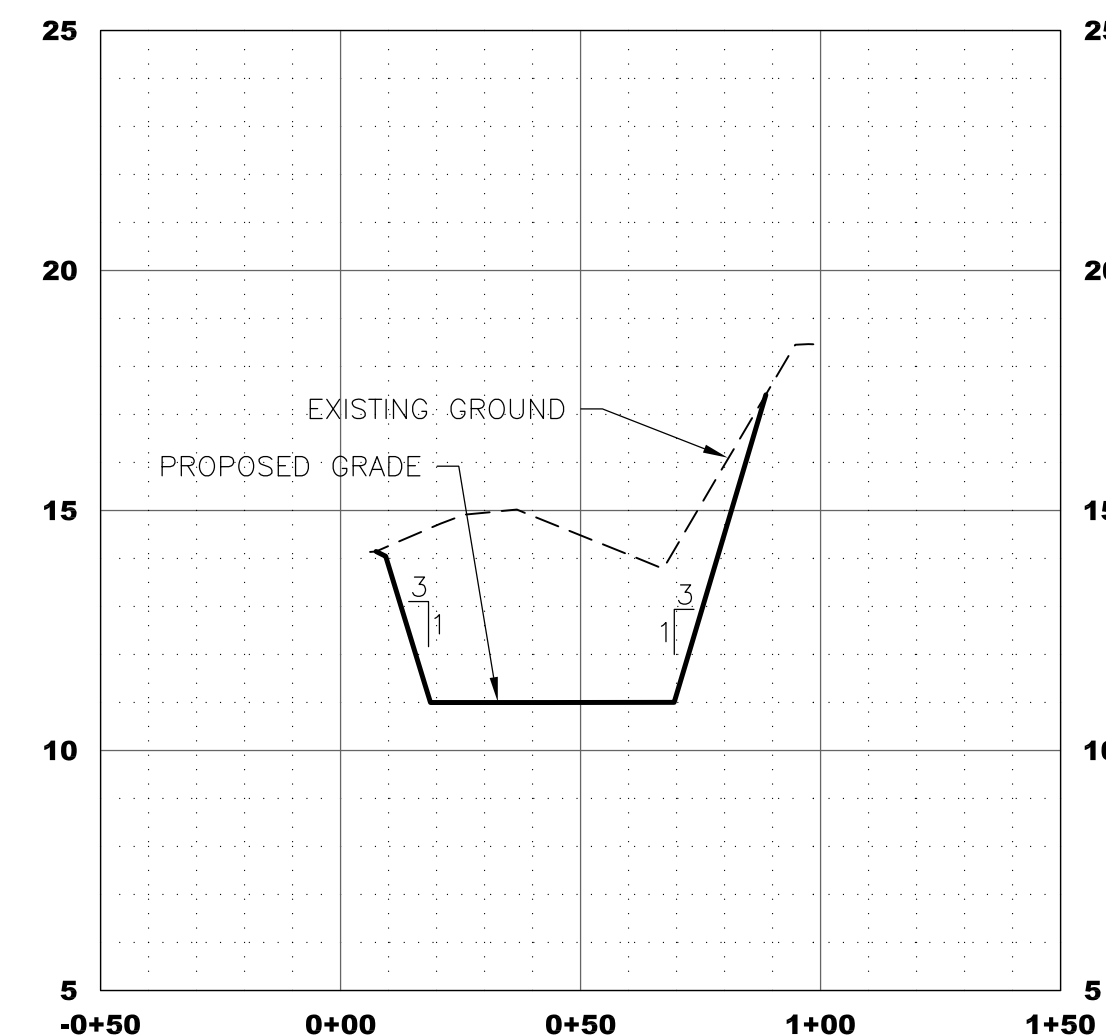
SECTION S7



SECTION E1



SECTION E2



SECTION E3

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REV	DATE	DESCRIPTION	DRAWN BY	CHK BY	ENG'R
			PROJECT ENG'R		APPROV BY

PATCH SERVICES

CALIFORNIA   \* ENGINEERING \*   TEXAS

333 SUNSET AVE. SUITE: 150  
SUISUN CITY, CA 94585  
PHONE: 707-425-4949  
FAX: 707-425-4553



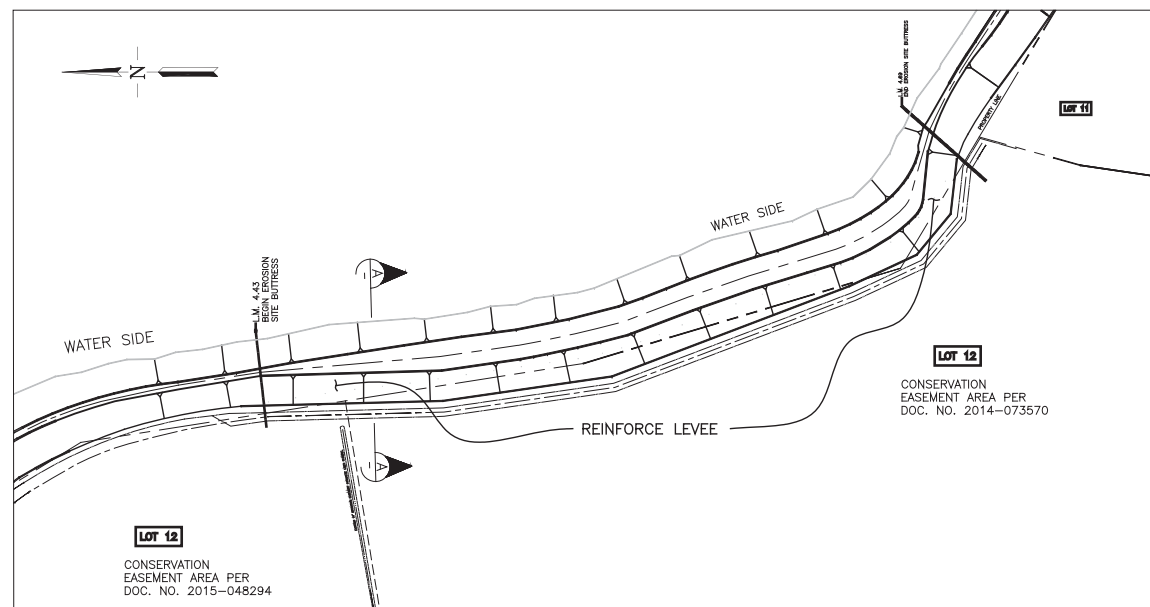
21175 TOMBALL PARKWAY SUITE: #308  
HOUSTON, TX 77070  
PHONE: 281-330-1466  
FAX: 832-698-2835

PESCADERO RECLAMATION DISTRICT  
RD 2058

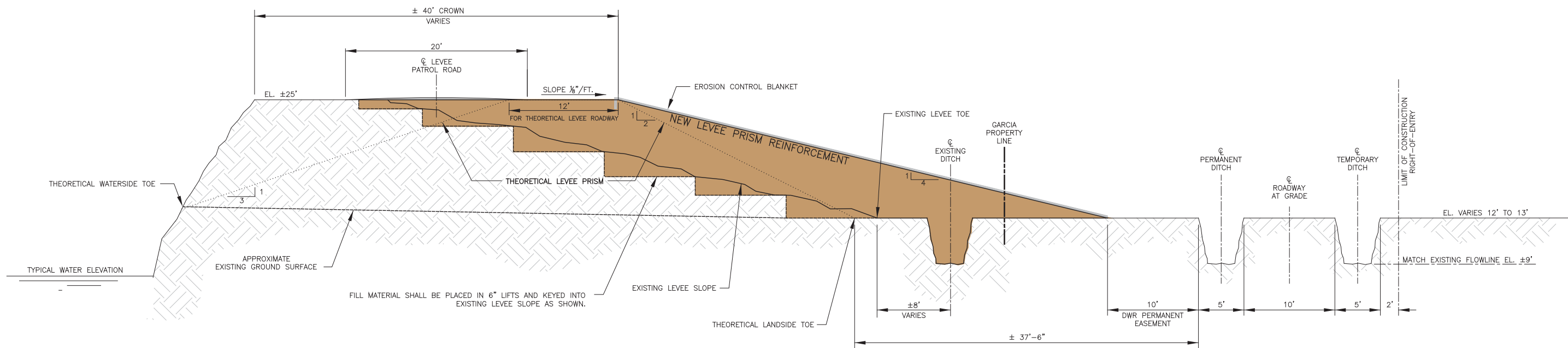
RD 2058  
TOPOGRAPHICAL MAP OF SURVEYED BORROW AREA  
NORTH AND SOUTH OF TOM PAINE SLOUGH

SCALE:	HORZ 1" = 40 FT / VERT 1" = 4'		
JOB NO:	1616		
DATE:	08/18/2017		
DRAWN BY:	DB		
CHECKED BY:	CJP		
DRAWING NUMBER	SHEET NUMBER	REV	
D-1616-7017		△	

1. THIS DRAWING PROVIDES A VIEW OF THE TYPICAL MAKEUP AND CONSTRUCTION OF THE REINFORCED LEVEE ALONG THE EROSION SITE. THIS DRAWING ALSO SHOWS THE LIMITS OF THE DWR EASEMENT AND IRRIGATION DRAINAGE DITCH LOCATIONS.
2. THE THEORETICAL LEVEE PRISM CONFORMS WITH AND IS BASED ON INFORMATION PROVIDED IN FIGURE 8.01, PAGE 4.19, CCR TITLE 23.
3. THE EXISTING LANDSIDE LEVEE PRISM IS BASED ON FIELD SURVEY DATA TAKEN OVER THE LENGTH OF THE CROWN REHABILITATION SITE AND THE EROSION SITE.



## KEY MAP



SECTION A-A  
REINFORCED LEVEE PRISM

THIS DRAWING WAS PREPARED BY PATCH SERVICES FOR A SPECIFIC PROJECT, TAKING INTO CONSIDERATION THE SPECIFIC AND UNIQUE REQUIREMENTS OF THE PROJECT. REUSE OF THIS DRAWING OR ANY INFORMATION CONTAINED IN THIS DRAWING FOR ANY PURPOSE IS PROHIBITED UNLESS WRITTEN PERMISSION FROM BOTH PATCH SERVICES AND PATCH'S CLIENT IS GRANTED.																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																													
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