DELTA LEVEES MAINTENANCE SUBVENTIONS PROGRAM

GUIDELINES: PROCEDURES AND CRITERIA

(Draft August 5, 2011)

Not reviewed by or approved by the Central Valley Flood Protection Board

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For approval by the

Central Valley Flood Protection Board

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Section 12984 of the California Water Code requires the Department of Water Resources to develop and submit to the Central Valley Flood Protection Board, for adoption by the Board, criteria for the maintenance and improvement of nonproject levees.

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Delta Levees Maintenance Subventions Program
Program Overview

The passage of the Disaster Preparedness and Flood Prevention Bond Act of 2006 (Proposition 1E) and the Safe Drinking Water, Water Quality and Supply, Flood Control, River and Coastal Protection Bond Act of 2006 (Proposition 84), authorizes the California Department of Water Resources (DWR) to make funds available to local agencies for, among other things, levee maintenance work.

Since the passage of Proposition 1E and Proposition 84 in November of 2006 the State, through the Delta Levees Maintenance Subventions Program (Subventions Program) and the Delta Levees Special Flood Control Projects, has invested over $200 million in flood control and habitat projects carried out by local agencies in the Delta. DWR funding has been dedicated to maintaining and improving the aging Delta Levees. Under California Water Code Section 12987, the Subventions Program must not only mitigate the habitat impacts of each maintenance plan it funds, but it must also ensure that it creates a result of net long-term habitat improvement in the Delta.

The Subventions Program is a cost share program that provides technical and financial assistance to local agencies in the Sacramento – San Joaquin Delta for the maintenance and rehabilitation of nonproject and eligible project levees. The Subventions Program is authorized by California Water Code Sections 12980 et seq., and is managed by DWR. The Central Valley Flood Protection Board (Board) reviews and approves DWR's recommendations and enters into agreements with local agencies to reimburse eligible costs of levee maintenance and rehabilitation.

The Guidelines: Procedures and Criteria contained herein, authorized by Water Code Section 12984 and Public Resources Code Sections 5096.830 and 75076 and approved by the Board, set forth the requirements for State financial assistance to local agencies and guide the administration of the Subventions Program. DWR will not fund projects that do not meet the minimum requirements of Water Code Sections 12980 – 12995.

In the event any provision in these Procedures and Criteria is unenforceable, or held to be unenforceable, all other provisions contained herein shall have force and effect and shall not be affected thereby.

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Article 1 DEFINITIONS

1.1 "Board" means The Central Valley Flood Protection Board.

1.2 "Corps" means the U.S. Army Corps of Engineers.

1.3 “CEQA” means California Environmental Quality Act.

1.4 "Delta" means the Sacramento-San Joaquin Delta as described in Section 12220 of the Water Code.

1.5 "DFG" means the Department of Fish and Game.

1.6 "Department" means the Department of Water Resources.

1.7 “District” means a reclamation district or other local agency that has jurisdiction over the maintenance and rehabilitation of nonproject and eligible project levees in the Delta.

1.8 "District operations" means work that is done by district-owned equipment and work forces on the payroll of the district/local agency. For districts made up of ten owners or less, district operations may also include levee work accomplished by farmer-owned equipment and farm work forces. For these districts, the identity of the landowners and the district are substantially the same.

1.9 "FEMA" means the Federal Emergency Management Agency.

1.10 "Force account work" means work arrangements defined in terms of engaging labor, services, or equipment on a per time unit basis.

1.11 “HMP” refers to the short-term hazard mitigation plan levee standard set forth in the *Flood Hazard Mitigation Plan for the Sacramento-San Joaquin Delta,* prepared by the Department of Water Resources for the Office of Emergency Services, dated September 15, 1983, or as amended. More information on levee standards can be found in the Appendix.

1.12 "Levee system" means all the nonproject and eligible project levees which protect an area of benefit.

1.13 "Local agency" means a reclamation or levee district or other public agency in the State of California, duly organized, existing and acting pursuant to the laws thereof, with the responsibility for the maintenance of a nonproject levee as defined in Water Code Section 12980(e) or a project levee as defined in Water Code Section 12980(f).

1.14 “NEPA” means National Environmental Policy Act

1.15 "Nonproject levee" means a local flood control levee in the Delta that is not a project facility under the State Water Resources Law of 1945, as shown on page 38 of the

Department of Water Resources “Sacramento-San Joaquin Delta Atlas”, dated 1993. [Water Code Section 12980 (e)]

1.16 “Plan” means plan as defined in Water Code Section 12987 which describes the specific maintenance, repair and improvement work the local agency intends to perform in the upcoming year, including cost estimates, and as described in detail in the work agreement and Article 2 of these guidelines.

1.17 "Project levee" means a federal flood control levee, as shown on page 40 of the Department of Water Resources “Sacramento-San Joaquin Delta Atlas”, dated 1993, that is a project facility under the State Water Resources Law of 1945, (Chapter 1 (commencing with Section 12570) and Chapter 2 (commencing with Section 12639) of Part 6), if not less than a majority of the acreage within the jurisdiction of the local agency that maintains the levee is within the primary zone of the Delta, as defined in Section 29728 of the Public Resources Code. [Water Code Section 12980 (f)]

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Article 2 PLANS

2.1 Eligibility, Submission and Approval of Plans

Pursuant to Water Code Section 12987, local agencies maintaining project or nonproject levees shall be eligible for reimbursement upon submission to and approval by the Board of plans for the maintenance and improvement of its eligible levees.

2.2 Long-Range Plans

Long-range plans shall consist of:

(a) A map showing the levee system on which project levees and nonproject levees under jurisdiction of the local agency are clearly shown. The ownership of levees in the system which are not under jurisdiction of the local agency, if any, shall also be clearly identified.

(b) Either engineering plans or a statement setting forth the local agency's long-range plans and methods for maintenance and rehabilitation of the nonproject and eligible project levees in the system, including plans for preservation and planting of levee vegetation where vegetation on the levee section is acceptable. The plans should describe the local agency's existing maintenance schedule for the entire nonproject and eligible project levee system, and the schedule for post-rehabilitation maintenance, if such maintenance is expected to occur on a different schedule. The plans should also describe the local agency's long-range goal for flood protection (e.g., Short-Term Hazard Mitigation Plan Standards, PL 84-99 Standards, Bulletin 192-82 criteria, or other applicable standard).

(c) The local agency's method of ensuring the maintenance and rehabilitation of the portions of the system's nonproject and eligible project levees, if any, which are not under its jurisdiction.

(d) The target date for completion of levee rehabilitation.

(e) An estimate of the cost of annual routine maintenance and the total cost of rehabilitation. Also, an estimate of the cost of any mitigation measures, required by DFG to ensure that no net long-term loss and net long-term improvement of habitat, if available.

(f) For nonproject levees all plans and schedules for levee improvement submitted to FEMA pursuant to the State Flood Hazard Mitigation Plan, Disaster Declaration FEMA-758-DR-CA (1986).

(g) An inventory of nonproject and eligible project levees, consisting of:

(1) A map of the levees at a scale of 1"= 2,000' or larger;

(2) The establishment of a levee mile or station designation and marking on the ground such mile or station designations at one-half mile or 2,500-foot intervals;

(3) A profile of the centerline of the levees;

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(4) Typical cross-sections of the existing levee and cross-sections at problem areas from the landside levee toe to under water levee toe or its adjacent berm. Sections should be taken at the beginning and end of transitions between materially different levee cross sections;

(5) The location, plan, and description (elevations where pertinent) of all encroachments on, over or through the levee section.

(6) Such other material or information pertinent to the inventory that the local agency may have submitted to FEMA, under the 1986 State Flood Hazard Mitigation Plan as referred to in subsection (f).

(7) Drawings showing the dimensions (length, width, and depth, in feet) of the proposed worksites, including all borrow areas or dredge areas.

(h) Provisions for the acquisition of any easements on and adjacent to the levee where the Department has made the determination required by Water Code Section 12987 that an easement for open space and nontillable crops is desirable to maintain the structural stability of the levee.

(i) Plans indicating proposed land use changes, if any.

(j) A plan to compensate for any impacts to fish, wildlife, or riparian habitat caused by levee rehabilitation or maintenance. The plan shall meet the goal of no net long-term loss and net long-term improvement for these habitats.

2.3 Annual Routine Maintenance Plans

Maintenance plans shall cover work to be performed on a fiscal year (July 1 to June 30) basis. They shall be in the form of a statement setting forth the local agency's planned maintenance within the scope of Article 5. An estimate shall be prepared showing the cost of each major activity and the year's total maintenance cost. When a statement will not adequately describe the work, it shall be shown on engineering plans or sketches. In addition the following information shall be included:

(a) A map, aerial photo, or engineering drawing showing the actual (or anticipated) locations and dimensions of the areas where maintenance will occur for the appropriate fiscal year, including, but not limited to, borrow areas, dredge areas, areas to be sprayed, disked, burned, or mechanically cleared, and areas where revetment must be replaced.

(b) A description of the maintenance schedule and how it applies to the areas under consideration for reimbursement (e.g., length of time between maintenance treatments).

2.4 Rehabilitation Plans

Rehabilitation plans shall cover work to be performed on a fiscal year (July 1 to June 30) basis. The plan shall be shown on an engineering drawing. The plan must show details of riparian vegetation or wildlife or fisheries habitat within the work area that will be disturbed and any proposed re-vegetation or mitigation measures the local agency will take.

An estimate shall be prepared showing the cost of each major activity and the total cost of the planned rehabilitation. Rehabilitation plans will conform to Article 6.

2.5 Plan Revisions

To the extent that there is a significant change in the Maintenance or Rehabilitation Plan(s), the local agency shall inform the Department in writing. Depending on the type of plan revision, approval may be required from one or more of the following agencies: Department, DFG, and/or Board.

2.6 Disaster Assistance

If after the applicant has applied for federal disaster assistance under PL 93-288, it is determined that the work performed does not qualify for such assistance, the applicant may apply for reimbursement to the Subventions Program. The associated costs shall be deemed incurred by the applicant in the year in which the latter application is filed. Such work must be compatible with Articles 5 and 6 of this document, and must have been denied reimbursement under Public Law 93-288 or the California Disaster Assistance Act.

Work items under this category must be clearly and separately indicated on the local agency's application and all costs for work performed must be substantiated. The Department will review the local agency's application and will determine the eligibility as if the costs were incurred in the fiscal year of application. The review of costs will be conducted as regular subventions work and is still subject to audit by the State Controllers Office.

If, due to a shortfall of funds, an applicant is not fully reimbursed for work rejected by FEMA in one fiscal year, the applicant may apply for the remaining reimbursement in the following fiscal year(s).

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Article 3 ADMINISTRATION

3.1 Application Requirements

A local agency must make application to the Board in order to participate in the program for each fiscal year; two copies of the application package shall be submitted to DWR and one copy of the application package shall be submitted to DFG. Each application package should consist of:

(a) A letter expressing the local agency's desire to participate.

(b) A statement of the local agency's long-range plans (see Article 2.2).

(c) A summary of the local agency's annual routine maintenance work plan (see Article 2.3).

(d) A summary of the local agency's rehabilitation work plan (see Article 2.4) for the fiscal year in which the work will be accomplished.

(e) A statement defining the land use of the area protected by the levee as well as any planned land use changes.

(f) A statement describing how the local agency is planning to comply, if not already in compliance, with the Memorandum of Understanding between the California Emergency Management Agency and FEMA, dated February, 25, 2010 (CalEMA – FEMA MOU). Local agencies are required to comply with the CalEMA – FEMA MOU in order to participate in the Subventions Program.

(g) A levee maintenance inspection report for the local agency's nonproject levees prepared in accordance with the criteria and guidelines provided in Appendix D.

(h) Acreage of the protected area and approximate number of permanent inhabitants.

(i) Method of assessment, assessed value, local agency tax rate for flood control, bonded indebtedness for flood control, and a summary of unpaid warrants for flood control work.

(j) Proof of application for federal disaster assistance, whenever eligible, under Public Law 93-288.

(k) If application is for reimbursement of work deemed ineligible for federal disaster assistance, damage survey report and/or other pertinent documentation (see Article 2.6) plus proof of costs incurred.

(l) Evidence that the local agency's maintenance and improvement plans are in compliance or consistent with CEQA. This requirement may be satisfied by a statement that the local agency has approved 1) Categorical Exemption, 2) Negative Declaration, or 3) Environmental Impact Report.

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(m) Evidence that the local agency's maintenance and improvement plans comply or are consistent with the California Endangered Species Act and the Federal Endangered Species Act.

(n) Evidence that the local agency's maintenance and improvement plans comply or are consistent with the Clean Water Act and the Rivers and Harbors Act, as administered by the U.S. Army Corps of Engineers.

A local agency must also notify responsible and trustee agencies of any actions that fall within these agencies' jurisdiction as required by law.

DFG will prepare a detailed outline of documentation requirements to assist local agencies' compliance with the intent of this Article and Article 2.

3.2 Application Deadline

With the exception of applications submitted pursuant to Water Code Sections 12993 and 12994, the application shall be submitted to the Department by July 1 for levee maintenance and rehabilitation work for the following fiscal year.

3.3 Approval of Application – Engineering Requirements and DFG Review

The Department shall review the application and make recommendations to the Board. The Board will approve the application in whole or in part or disapprove the application. The applicant will be informed of the disapproval of any application or any part of an application.

Following are among the conditions that need to be satisfied for approval of the application:

(a) Engineering – All engineering plans and reports shall be prepared and signed by a Civil Engineer licensed by the California Board of Registration for Professional Engineers, Land Surveyors and Geologists. The plans shall indicate which activities will be performed under the supervision of a duly licensed Civil Engineer.

(b) Department of Fish and Game Review – Pursuant to Water Code Section 12987 the Department of Fish and Game shall review all local agency plans. Plans shall not call for the use of channel islands or berms with significant riparian communities as borrow sites for levee repair material, unless fully mitigated. Plans shall not result in a net long-term loss of riparian, fisheries, or wildlife habitat. Local agency must have completed all of the requirements of Water Code Sections 12987 and 79050 in its previous agreements with the Board to be eligible for current funding under this program.

Costs required to meet DFG approval are eligible for reimbursement under the Delta Levees Subventions Program. DFG reserves the right to request additional information, pursuant to Article 3.1, it deems necessary to make a recommendation for approval of the application. DFG also reserves the right to disapprove applications that fail to meet the conditions set forth in these procedures, consistent with their statutory role of ensuring no net long-term loss of habitat.

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3.4 CEQA/NEPA Compliance

The local agency shall have full responsibility for ensuring the project is in compliance with CEQA and all applicable environmental laws and regulations.

The local agency shall be the lead agency for purposes of CEQA. However, the Board, as a responsible agency, will review and consider the project's CEQA environmental document(s) prior to providing funding for any project that is subject to CEQA. Such approval is fully discretionary and shall constitute a condition precedent to any work for which it is required. In cases where CEQA requires findings, the Board will make independent findings pursuant to CEQA based on information provided by the applicant and lead agency and decide whether to fund the project or to require changes, alterations or other mitigation before entering into a binding agreement authorizing payment.

3.5 Agreements

The Board and the local agency will enter into an agreement for the reimbursement of the costs of the work to be performed in accordance with the approved application, with the provisions and policies of Water Code Sections 12980 et seq., with these Procedures and Criteria, and with the recommendations of the Department.

The agreement will include a hold-harmless clause based on Water Code Section 12992.

The agreement will be submitted to the local agency for signature. Upon return of the signed agreement by the local agency, the Board will execute the agreement.

3.6 Advances

The local agency may request advances in accordance with the executed agreement. DWR has prepared an instructional procedure for local agencies requesting advance funds which is attached in the Appendix. A summary of the instructional procedure is as follows:

(a) The Department may provide, at its discretion, an advance to the applicant in an amount not to exceed seventy-five percent of the estimated State's share. No advance shall be made until the applicant has incurred costs averaging one thousand dollars ($1,000) per mile of nonproject and eligible project levee.

(b) The amount advanced shall be subtracted from the final amount due to be reimbursed after the work has been completed and inspected. If after the work has been inspected and the Department finds the work unsatisfactory, or the advances made exceed the amount reimbursable, the local agency shall promptly remit to the State all amounts in excess of the State cost share. The Board may require a bond to be posted to ensure faithful performance of the work set forth.

(c) Advanced payments or progress payments may only be made to the local agency after DWR and DFG determine the following approval requirements have been met by the local agency:

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(1) An AB 360 program *Advance Payment Information Form* is approved in writing by DFG and DWR.

(2) Documentation is submitted to DWR confirming that eligible deductible expenditures exceed the $1,000 per levee mile criteria.

(3) A schedule and appropriate bidding and contract documentation are submitted to DWR for projects requesting advanced funding.

3.7 Local Agency Claims

The local agency shall submit a claim for reimbursement to the Board upon completion of the maintenance and rehabilitation work associated with the fiscal year (July 1 through June 30) for which application is made to the Subventions Program. This claim must be filed by November 1 of the following fiscal year. The Department will compute the amount of reimbursement to the local agency based on the claim submitted, the availability of State funds, and the results of a field inspection.

3.8 Inspection of Work by DWR and DFG

Upon completion of work described in the approved plans, the local agency shall submit to the Department a claim for reimbursement of eligible expenses. Following submittal of the claim, the local agency shall request an inspection of the work by the Department and DFG. The purpose of this inspection is as follows:

(1) To confirm that work eligible for reimbursement was completed in conformance with the approved plans, and;

(2) To identify all associated mitigation and habitat enhancement work required for reimbursement.

The Department will notify the local agency and the Board regarding both the results of the inspection and requirements for remedial efforts, if any.

The local agency shall cooperate in the conduct of all inspections, including inspections by the Department pursuant to Water Code Section 12989 to monitor and ascertain compliance with and progress toward meeting the standards in the State's Flood Hazard Mitigation Plan, as updated or amended.

All habitat and mitigation requirements shall be completed to the satisfaction of DFG no later that three years from the date of the funding agreement absent a waiver of this requirement by DWR and DFG in writing. Failure to complete habitat and mitigation requirements within the three year period will result in forfeiture of reimbursement under this Program. Failure of a local agency to complete all of the requirements of Water Code Sections 12987 and 79050 in any previous agreement with the Board will cause local agency to be ineligible for funding under this Program until such time as local agency completes its outstanding habitat and mitigation requirements.

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3.9 Payment to Local Agency

Pursuant to Water Code Section 12988, upon receipt of the Department's and DFG's findings that the work has been completed in conformance with the approved plans, the Department will proceed with reimbursement of funds to the local agency as certified by the Board.

3.10 Local Agency Records and Audits

The local agency shall maintain all records, receipts, accountings, books, and invoices relating to the costs and quantities of labor and materials used, purchased, or contracted for in the performance of its levee maintenance and rehabilitation work for a period of ten years after the work has been performed or the expenses therefore incurred.

The Board and Department shall have full and free access at all reasonable times to these books and records with the right at any time during office hours to make copies thereof.

The Department, the Board, or the State Controller shall have the right to conduct audits, on a periodic basis, of the local agency's expenditures for levee maintenance and rehabilitation. The purpose of such audits is to assure the following: (1) State funds are being properly used. (2) Payments are not being made under different assistance programs for the same work. (3) Local agencies are seeking the lowest reasonable costs in the use of State funds. The local agency shall cooperate fully in any such audits.

The retention of source documentation is essential. Source documentation involves the concept of calibration when dealing with quantities. For example, barge tags by themselves do not represent adequate documentation. Some type of backup calibration is necessary to substantiate the unit quantity per barge. This calibration can consist of certification by a weigh master or a test by the project engineer. In general, one of the responsibilities of the contract administrator is the provision of quantities calibration, where applicable. Work performed by labor forces is best documented through original timesheets.

Audits may require access to contractors' books. Therefore, all contracts should include a standard clause providing for access to the contractor's books.

In general, when dealing with local agency records, especially for those local agencies that make use of more than one financial assistance program, the establishment of a separate account for Subventions Program activities is a great help in separating out costs for Subventions Program and other local agency activities. It is therefore encouraged that a special county account be set up for Subventions Program warrants.

3.11 Local Agency Engineering and Biological Data

The local agency shall provide DWR with all relevant engineering, surveying, and biological data compiled or obtained during the course of activities funded by the Subventions Program. Such data shall include, but not be limited to, surveys and survey control, topography, mapping products, material quantities, quality test data, mitigation impacts, engineering reports, and biological reports. These data shall be provided prior to

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final reimbursement to the local agency, and will be supplied to DWR in both hard copy and digital format. DWR retains the right to maintain and utilize these data in support of any of its activities.

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Article 4 REIMBURSEMENTS AND ELIGIBLE COSTS

4.1 General Provisions

Eligible costs for reimbursement are limited to construction costs incurred in the fiscal year for which application is made and associated administrative and engineering costs.

Subject to availability of State funds, a local agency shall be eligible for reimbursement for work completed under the agreement with the Board in accordance with the following:

(a) No costs shall be reimbursed until the local agency has spent an average of $1,000 per mile for all of its nonproject and eligible project levees.

(b) The local agency shall be reimbursed up to seventy-five percent of eligible costs incurred in excess of $1,000 per mile for all of its nonproject and eligible project levees.

(c) Levees which are not under the jurisdiction of an applicant agency but are in its system may be maintained under a formal agreement which results in costs to the local agency. Such levees will be considered the same as the local agency's other nonproject levees in computing State reimbursement so long as they meet the requirements of Water Code Sections 12980(e) and 12980(f).

4.2 Prioritization of Funds

Pursuant to Water Code Section 12987(f) if in any year the total eligible costs incurred exceed the State funds available, the Board will apportion the funds among those levees, or levee segments identified by the Department as being most critical and beneficial for flood control, water quality, recreation, navigation, habitat improvements, and fish and wildlife. The prioritization of funds shall be in accordance with the following scheme:

Maintenance – The first priority for funding is for levee maintenance and rehabilitation up to the Bulletin 192-82 standards (for geometry) associated with the existing land use at the time the Delta Flood Protection Act of 1988 was signed into law. Maximum reimbursable expenditures for annual routine levee maintenance are limited to $20,000/mile for eligible levees. The $20,000 cap includes the $1,000/mile local contribution required by Water Code Section 12986. Maintenance expenditures in excess of the $20,000 cap will be given a priority equal to work under the Bulletin 192-82 criteria.

Priority One – If available funds are sufficient to fully fund work described above, full reimbursement of approved claims will be made. When claims exceed available funds levee maintenance will be funded first and after that, full reimbursement of each approved claim will be made according to the categories listed below (in the order listed) until insufficient funds are available to fund a category. The claims in this latter category will be paid on a pro rata basis. Claims in lower categories will not be paid. Maximum reimbursable expenditures for this work are limited to $100,000 per mile of levee.

> Category 1: The Central Valley Flood Protection Board mandated top priority funding items.

Category 2: Plans that make special provisions for protection or enhancement of fish and wildlife habitat, recreation opportunities, or land use changes to reduce land subsidence or erosion. These provisions must be coordinated with the Department and/or DFG.

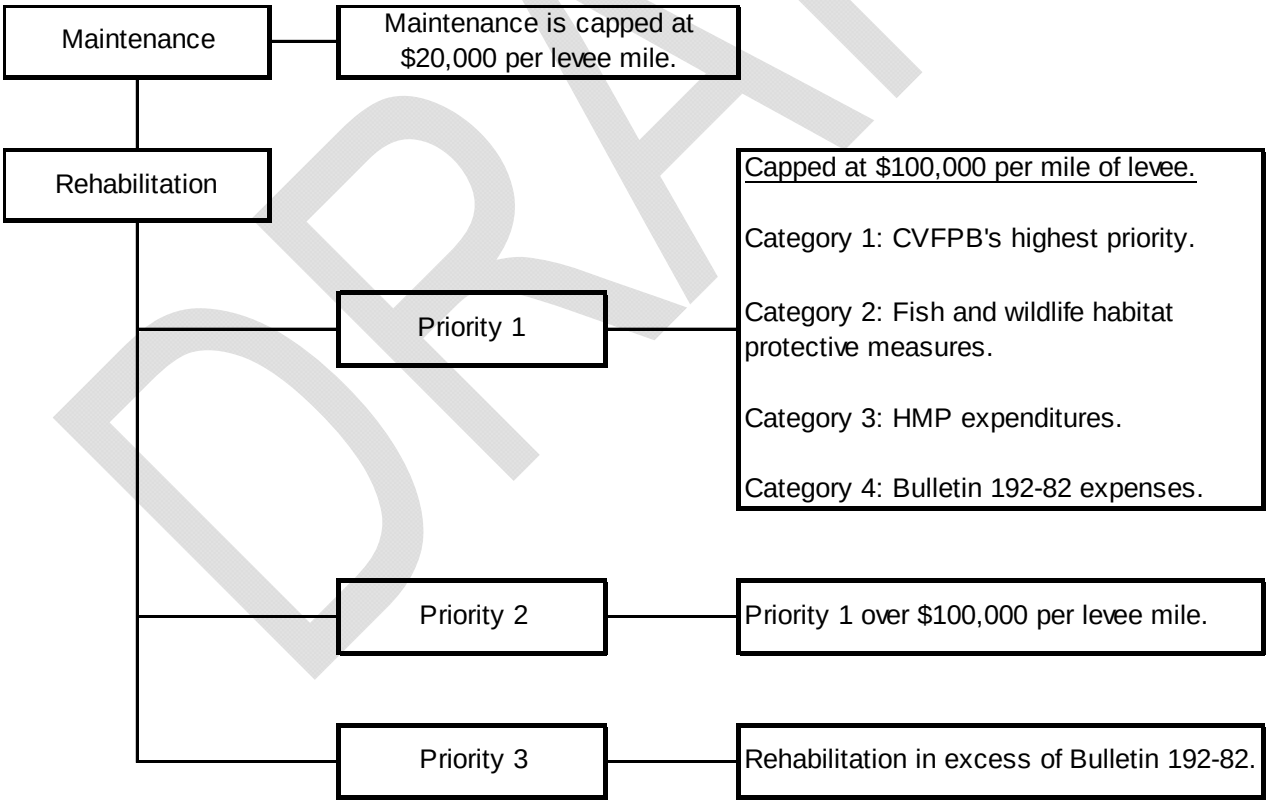
Category 3: Plans based on meeting the Short-Term Hazard Mitigation Plan (HMP) standards (see the Appendix for information on levee standards).

Category 4: Plans based on meeting Bulletin 192-82 standards or PL 84-99 standards (see the Appendix for information on levee standards).

Priority Two – The second priority for funding is for portions of an individual district's fiscal year work in excess of an average of $100,000 per mile of all nonproject and eligible project levees.

Priority Three – The third priority for funding is for reimbursement of work in excess of Bulletin 192-82 standards.

Funding Priority Flow Chart



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4.3 Eligible and Ineligible Costs

Reasonable costs for engineering, labor, materials, equipment rental, capital costs, and pro rata rental charges of agency-owned equipment are eligible for reimbursement. A survey of local rates will be used to ensure that rates charged to local agencies are justifiable.

Local agency costs incurred in the preparation and execution of the work plans, which meet the criteria and are a part of the Board approved plans, will be used to compute the amount of reimbursement. These costs must be associated with the fiscal year for which the application was made.

The salaries, expenses, and fringe benefits of the executive board, executive officer in charge of the agency, their immediate clerical support and the pro rata rent charge for their office and equipment are not eligible for reimbursement.

New construction or maintenance of drainage pumps and drainage ditches, with the exception of levee toe drains, are not eligible items for reimbursement.

4.4 Work Rejected by FEMA

Pursuant to Water Code Section 12993 applicants shall apply for federal disaster assistance, whenever eligible, under Public Law 93-288. If, and to the extent that it is determined that the work performed does not qualify for federal disaster assistance, the applicant may apply for reimbursement under Section 12986, and the costs shall be deemed incurred by the applicant in the year in which the latter application is filed.

For applications made pursuant to Water Code Section 12993, the following conditions apply: This work, which was denied for reimbursement by both FEMA and the California Emergency Management Agency, under Public Law 93-288, must have been denied for reasons of levee improvement or normal levee maintenance work. Work items under this category must be clearly and separately indicated on the agency's work plan. Damage Survey Reports (DSR's) and/or other pertinent documentation must be included with the agency's application as well as evidence of all costs incurred for the work performed. The fiscal year limitation for work performed under the Rehabilitation or Maintenance Plans does not apply here.

4.5 Local Agency Contracting

All of the local agency's contracting procedures should be in conformance with all applicable laws. Following are specific points that are important to the efficient administration of the Subventions Program in regard to local agency contracting.

(a) The local agency shall be responsible for compliance with competitive bidding, prevailing wage provisions, contract administration laws, and all applicable labor laws. At DWR’s request, local agency must promptly submit written evidence of local agency’s compliance with labor compliance program requirements.

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(b) Pursuant to Public Contract Code Section 20920, et seq., local agency contracts for reimbursable work in excess of $25,000 shall be let to the lowest responsive, responsible bidder. If the local agency determines that no bids are in its best interests, any or all bids may be rejected. The local agency may re-advertise, negotiate, or proceed to complete the project by force account. In any case, pertinent documentation indicating the reasons for the particular course of action should be retained and supplied to DWR. This documentation should clearly demonstrate that the concept of reasonable competition was adhered to, and consequently the price for the project met the lowest reasonable cost expectation.

(c) The responsibility for contract administration by the local agency should be clearly defined. A statement providing the name of the responsible individual should be included in the application to the Subventions Program. Unit price or lump sum type contracts are acceptable, however, cost plus contracts should be avoided.

(d) Construction work performed by the local agency's own forces, which the local agency has determined to be exempt from competitive bidding, shall be reimbursed pursuant to Article 4.9.

4.6 Emergency Work

All of the local agency's contracting procedures should be in conformance with all applicable laws. Following are specific points pertaining to emergency work that are important to the efficient administration of the Subventions Program.

(a) Pursuant to Public Contract Code Section 22050, in the event of an emergency a local agency may, pursuant to a four-fifths vote of its governing body, negotiate and award a contract for construction of work to prevent damage or repair of damaged works without advertising for bids. Specific requirements are detailed in applicable statutes.

(b) Pursuant to Water Code Section 12994, in an emergency as defined by Section 21060.3 of the Public Resources Code, that requires immediate levee work to protect public benefits in the Delta, DWR may expend up to $50,000 per emergency levee site ($200,000 maximum annually) without prior approval of a plan by the Central Valley Flood Protection Board or DFG. Eligibility requirements include, but are not limited to, the following: The local agency must fund 25 percent of the total costs of the emergency repair at the site and shall provide to DWR, in a timely manner, a resolution from its governing body that declares the emergency and authorizes the emergency repair. Costs incurred under such an emergency are only reimbursable to the extent they are not covered by other agencies such as the Corps of Engineers and/or FEMA.

4.7 Professional Services

(a) Reimbursements for professional services will be evaluated on a case by case basis. Reasonable charges that are applied in a cost effective manner will be eligible for reimbursement. Actual reimbursements shall be at the sole discretion of DWR.

(b) Markups – Markups by consultants for certain expenses incurred by the consultant and billed to the local agency may be eligible for reimbursement as follows:

(1) Up to 5% of subcontractor invoices for services including, but not limited to, engineering, surveying, mapping, construction management, construction inspection, geotechnical investigations, testing, environmental consulting, and obtaining permits.

(2) Up to 10% of eligible expenses such as document reproduction, mailing, and fees for providing public notice.

(3) Markups for expenses such as specialized equipment rental that are not addressed in these Procedures and Criteria will be evaluated on a case by case basis.

These markups shall constitute full reimbursement for additional administrative costs and no other additional payment will be made by reason of performance of the work. If a local agency can demonstrate that the markups set forth herein are too low for their particular situation, they can be adjusted on a case by case basis at the Department's discretion. Actual reimbursements shall be at the sole discretion of DWR.

4.8 Mileage Rates

Reimbursement of automobile mileage that is related to eligible work will follow the prevailing federal standard mileage rate for the cost of operating an automobile. No payment will be made for administrative costs related to mileage.

4.9 Use of Local Agency Forces

Reimbursement for use of local agency owned equipment shall be limited to 90% of the equipment rates established by Caltrans (Annual Labor Surcharge and Equipment Rental Rates) and the Subventions Program. The Caltrans equipment rental rates are available on the internet at:

http://www.dot.ca.gov/hq/construc/

If a local agency can demonstrate that these rates are too low for their particular situation, these rates can be adjusted on a case by case basis, at the Department's discretion.

The decision to base reimbursement on 90 percent of Caltrans equipment rates was made for the following reasons:

This percentage limits the fixed component of these rates to include only depreciation with no provision for overhead or profit.

The variable component incorporates all maintenance and operating expenses including fuel.

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4.10 Use of On-Island Borrow Material

(a) The use of on-island borrow material, although not encouraged by the Department, is reimbursable. On-island borrow material is defined as material originating from within the local agency. Following are limitations that apply when reimbursement is requested for use of on-island borrow material as fill for Delta levees:

(1) The material must be certified by a Geotechnical Engineer licensed by the Board for Professional Engineers, Land Surveyors and Geologists as suitable for levee construction.

(2) The excavation of such material shall be limited to sites at least 400 feet from the centerline of the levee. An exception to this limitation will be made in cases where material has been stockpiled immediately adjacent to the levee.

(3) Compliance with any and all applicable provisions of State law is required, including but not limited to Government Code Section 1090.

(b) Following are the reimbursable components associated with the use of on-island borrow material:

(1) Associated engineering costs.

(2) Transportation and placement costs.

(3) Royalty of $1.00 per cubic yard of material.

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Article 5 LEVEE MAINTENANCE

5.1 Levee Maintenance Inspection and Inspection Reporting for Nonproject Levees

Pursuant to Article 3.1(g), a levee maintenance inspection report for the local agency's nonproject levees, prepared in accordance with the criteria and guidelines provided in Appendix D, is required for participation in the Subventions Program.

Project levees in the Delta are inspected by DWR in accordance with criteria established by the Corps of Engineers. In contrast, nonproject levees have historically been inspected by local agencies using criteria that have varied considerably among participating districts. The guidelines in Appendix D are provided to encourage consistency in levee maintenance inspections and to ensure that Subvention Program funds are properly expended.

5.2 Eligible Levee Maintenance

Annual or routine levee maintenance is work intended to preserve the levee system in its current condition.

(a) Maximum reimbursable expenditures for annual routine levee maintenance are limited to $20,000/mile for eligible levees. The $20,000 cap includes the $1,000/mile local contribution required by Water Code Section 12986. Maintenance expenditures in excess of the $20,000 cap will be given a priority equal to work under the Bulletin 192-82 criteria (see Article 4.2).

Pursuant to Water Code Section 12994 (b)(1) in an emergency, as defined by Public Resources Code Section 21060.3, that requires immediate levee work to protect public benefits in the Delta, this maintenance cap can be exceeded. Costs incurred under such an emergency are only reimbursable to the extent they are not covered by other agencies, such as the Corps of Engineers and/or FEMA.

(b) The following items are levee maintenance activities eligible for reimbursement:

(1) Inspection by the local agency to ensure that adequate maintenance is being carried out and that dangerous or unusual conditions are discovered early. DWR recommends that, at a minimum, levees should be inspected by September 15 to allow time to correct dangerous conditions, in April to provide information to plan annual maintenance and repair, during and after periods of high water, and during and after periods of high winds which can accelerate wave erosion.

(2) Extermination of burrowing rodents and filling their burrows with compacted material to minimize seepage through the levee section. Shaping the levee crown to drain run-off freely.

(3) Repairing and shaping patrol or access roads and controlling the weight and speed of all vehicles using patrol roads on the levee crown.

(4) Repairing any minor slipouts, erosion, or subsidence of the levee section.

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(5) Removing drift deposits, debris, and litter from the levee and berm.

(6) Control of seepage and boils, including installation of impervious cores in the levee section.

(7) Cleaning drains and toe ditches that are adjacent to the landside levee toe and which intercept seepage.

(8) Vegetation control including cutting, removing or trimming vegetative growth such as weeds, brush, and trees in an allowable manner to the extent necessary to inspect and maintain the levee and the landside toe.

(9) Repairing or restoring rock protection except where such repairs are the responsibility of a federal agency - minor repairs can be made in cases of federal responsibility, if the appropriate federal agency does not perform these repairs expeditiously.

(10) Planning for flood emergencies to ensure the availability of adequate repair materials and equipment so that immediate action can be taken in the event of a flood fight.

(11) Removing or modifying encroachments which endanger the levee or interfere with maintenance. The costs associated with removal of encroachments and restoration of the levee section are eligible. The costs incurred by the local agency to compensate for the loss of encroachments are not reimbursable under this program. In the case where pipes through the levee are raised above the floodplain, 50 percent of the cost of the pipe through the levee design section is eligible. Fifty percent of the costs to replace or repair reclamation encroachments, such as cutoff walls, may be considered eligible on a case-by-case basis when a shared benefit with flood control can be shown.

(12) Determining the profile and conducting a cross section survey of levees often enough to detect subsidence (normally at least every fifth year).

(13) Other levee and underwater surveys.

(14) Engineering services and associated administrative work in connection with the Delta Levee Subventions Program, except specialized engineering work done in connection with rehabilitating levees to standards associated with proposed or ongoing change in land use.

(15) Miscellaneous items such as gates to control traffic on the levee, guard rails, etc.

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Article 6 LEVEE REHABILITATION

Levee rehabilitation refers to physical improvements intended to raise the levee system's standards. (See the Appendix for more information on levee standards.)

(a) Work that is considered eligible under the HMP criteria for agricultural levees includes the following:

(1) Raising the levee crown to an elevation of 1.0 foot above the 100-year flood frequency level. A tolerance of +0.5 foot (up to 1.5 feet above the 100-year flood frequency level) will be allowed for subsidence.

(2) Flattening waterside slopes to 1.5 horizontal to 1 vertical and landside slopes to 2 horizontal to 1 vertical.

(3) Widening the levee crown to a width of 16 feet and shaping to drain run-off freely.

(b) Work that is considered eligible under the PL 84-99 criteria for agricultural levees includes the following:

(1) Raising the levee crown to an elevation of 1.5 above the 100-year flood frequency level. A tolerance of +0.5 foot (up to 2.0 feet above the 100-year flood frequency level) to allow for subsidence is acceptable.

(2) Flattening waterside slopes to 2 horizontal to 1 vertical and landside slopes to 3 horizontal to 1 vertical or flatter as required to account for local depth of peat.

(3) Widening the levee crown to a width of 16 feet and shaping to drain run-off freely.

(c) Work that is considered eligible as part of the Bulletin 192-82 criteria for agricultural and urban levees includes the following:

(1) Raising the levee crown to an elevation of 1.5 feet above the 300-year flood frequency level for agricultural levees and 3.0 feet above the 300-year flood frequency level for urban levees. In each case a tolerance of +0.5 foot to allow for subsidence is acceptable.

(2) Flattening waterside slopes to 2 horizontal to 1 vertical and landside slopes to 3 horizontal to 1 vertical or flatter as required to account for local depth of peat; constructing landside berms to increase levee structural stability.

(3) Widening the levee crown to a width of 16 feet and shaping to drain run-off freely.

(4) Replacing existing or constructing new patrol roads and/or upgrading patrol and access roads to provide greater width or structural section for levee inspection, patrol and flood fighting purposes. If an asphalt surface is desired, reimbursement

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will be only the cost of an equivalent stretch of gravel surface road. If an existing asphalt road is upgraded, reimbursement is eligible to the extent that no other agency is responsible for maintenance of that road.

(5) Providing turnouts, access, roads and ramps as necessary.

(6) Relocation of toe ditches, if required, as a result of levee rehabilitation to Bulletin 192-82 criteria.

(7) Placing rock protection, or equivalent, on the waterside levee slope when erosion may potentially endanger the stability of the foundation or the integrity of the levee, except where such rock protection is the responsibility of a federal agency.

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Article 7 LEVEE EASEMENT ACQUISTION

7.1 Levee Easement Acquisition

This Article sets forth the requirements for State financial assistance to local agencies for levee easement acquisition.

The purpose of easement acquisition is to assist in achieving or maintaining structural stability of Delta non-project and eligible project levees in areas where the Department determines such easements would be beneficial to levee stability. Other benefits, such as the protection or creation of wildlife habitat areas and the prevention of future encroachments may also be a consideration for the acquisition of easements.

Pursuant to Water Code Section 12987(b) nonproject plans shall also be compatible with the plan for improvement of the Delta levees as set forth in Bulletin 192-82 of the Department, dated December 1982, and as approved in Water Code Section 12225. Both project and nonproject plans shall include provisions to acquire easements along levees that allow for the control and reversal of subsidence in areas where the Department determines that such easements would be desirable to maintain structural stability of the levee. Such easements shall:

(a) Restrict the use of the land to open-space uses, nontillable crops, the propagation of wildlife habitat, and other compatible uses;

(b) Provide full access to the local agency for levee maintenance and improvement purposes, and;

(c) Allow the owner to retain reasonable rights of ingress and egress as well as reasonable rights of access to the waterways for water supply and drainage.

The local agency cost of acquisition of the easements shall be reimbursable by the Department from moneys appropriated pursuant to paragraph (1) of subdivision (b) of Water Code Section 12300, or any other sources appropriated by the Legislature for purposes of this part.

7.2 Funding for Levee Easement Acquisition

(a) Funding Percentage – The acquisition of levee easements is not part of the regular Subventions Program. However, funding for levee easement acquisitions is similar to the funding of Subventions Program activities in some ways. State reimbursement for easement acquisitions is 75 percent of the total cost of easement acquisition including any associated engineering and administrative costs. A deductible amount of $1,000 per mile of nonproject and eligible project levees is not applicable for easement acquisition reimbursement.

(b) Funding Prioritization & Cap on Reimbursement of Easements – As mentioned above, easement acquisition and the Subventions Program are separate but related. The interconnection between these two programs is mainly due to the funding source, which is the same for both programs, i.e. the Local Assistance portion of the Delta Flood Protection

Fund. Since funds are limited, a shortfall of funding may occur occasionally. Therefore, to the extent that applications for reimbursement of Subventions work and easement acquisitions may exceed State funds available, an interrelated funding prioritization scheme is necessary.

The funding prioritization scheme described in Article 4 will be used in setting funding priorities for Subventions Program activities as well as easement acquisitions in cases of funding shortfalls. In order to limit curtailment of regular Subventions work, total funds available for all easement acquisitions in any given fiscal year are limited to 10 percent of the total Subventions Program direct pay funds allocated for that year. Insufficient applications for easement acquisitions or the designation of easement acquisition(s) as lower in priority compared to other Subventions activities can result in the expenditure of less than 10 percent of the direct pay funds for easement acquisition activities.

When a shortfall of funds occurs, the priority for reimbursement of easement acquisitions will be determined on a case-by-case basis. Prioritization of funds for levee acquisitions will generally depend on the following two factors:

(1) Potential flood control benefits achievable through levee acquisition.

(2) Other public benefits achievable through these acquisitions.

The higher the potential flood control benefits associated with the acquisition of a particular easement are, the higher the priority assigned to that acquisition will be. For borderline decisions between priorities, the second factor--degree of other public benefits--will be the deciding factor.

Following are the possible equivalent funding priorities (funding priorities are defined in Article 4) for reimbursement of levee easement acquisitions:

Priority One, Category 3: Plans based on meeting the Short-Term Hazard Mitigation Plan standards (see the Appendix for more information on levee standards).

Priority One, Category 4: Plans based on meeting Bulletin 192-82 standards or PL-84-99 standards (see the Appendix for more information on levee standards).

Priority Two: Portions of an individual district's fiscal year work in excess of an average of $100,000 per mile of all nonproject and eligible project levees.

(c) Levee Acquisition as Contribution to Local Share for Subventions Program – In certain cases, levee easements can be used as a contribution toward the 25 percent (or more) local cost share percentage required for participation in the regular Subventions Program. Following are the conditions under which a local agency's acquisition of a levee easement could serve as all, or a portion of, their local share cost:

(1) The Department confirms that the dedication of an easement is desirable in the maintenance of levee stability.

(2) The local agency acquires this easement through means of an in-lieu dedication, or some other means whereby no claim for any costs associated with the acquisition of this levee easement is filed.

(3) The resulting contribution toward the local cost share would equal 75 percent of the total value of the easement and any pertinent engineering and administrative costs.

7.3 Administrative Requirements

(a) A separate application in addition to the Subventions Program application will have to be submitted by the first of May preceding the beginning of the fiscal year for which reimbursement is sought. This application should be consistent with the long-range plans in the Subventions Program application, as set forth in Article 2.

(b) The application should include the following:

(1) Map showing the location of the proposed easement.

(2) Detailed estimate of all easement acquisition related costs.

(3) Statement regarding the purpose and benefits of the easement acquisition. If easements are proposed because of levees in poor condition, an analysis of the structural stability of the levees in question will be required. This analysis should be done by qualified engineering firm.

(4) Proposed schedule for the acquisition process. If the acquisition process is expected to run over into the following fiscal year(s), it should be noted. An updated application must be submitted for each fiscal year in which the acquisition process will run over.

(c) A final claim for reimbursement of easement acquisition costs must be filed by the same deadline as final claims under the regular Subventions Program. This deadline is November 1 following the end of the fiscal year for which application is made. Again, this final claim must be separate from those filed under the regular Subventions Program. As with the itemized costs in any claim, full documentation such as invoices for services and copies of warrants must be included.

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Article 8 FLOOD MANAGEMENT REPORTS & SAFETY PLANS

8.1 Requirements for Flood Management Reports

In accordance with Water Code Section 9140, if local agency is responsible for the operation and maintenance of a project levee, or if local agency operates and maintains a nonproject levee that also benefits land within the boundaries of the area benefited by the project levee, local agency shall prepare and submit to DWR, on or before September 30th of each year, a report of information for inclusion in periodic flood management reports prepared by DWR relating to the project levee. The information shall include all of the following:

(a) Information known to the local agency that is relevant to the condition of the project levee.

(b) Information identifying known conditions that might impair or compromise the level of flood protection provided by the project levee.

(c) A summary of the maintenance performed by the local agency during the previous fiscal year.

(d) A statement of work and estimated cost for operation and maintenance of the project levee for the current fiscal year, as approved by the local agency.

(e) Any other readily available information contained in the records of the local agency relevant to the condition or performance of the project levee, as determined by the Board or DWR.

8.2 Requirements for Safety Plans

In accordance with Water Code Section 9650, if local agency receives funding from the State to upgrade a project levee that protects an area in which more than 1,000 people reside, local agency responsible for the project levee and any city or county, including charter cities or counties, protected by the project levee shall enter into an agreement to adopt a safety plan within two years. The safety plan shall be integrated into any other local agency emergency plan and shall be coordinated with the state emergency plan. The local entity responsible for the operation and maintenance of the project levee shall submit a copy of the safety plan to DWR and the Central Valley Flood Protection Board. No advances or reimbursements shall be made by the State for a levee covered by this paragraph until it receives the agreement from all necessary entities. The safety plan shall include all of the following elements:

(a) A flood preparedness plan that includes storage of materials that can be used to reinforce or protect a levee when a risk of failure exists.

(b) A levee patrol plan for high water situations.

(c) A flood-fight plan for the period before the state or federal agencies assume control over the flood fight.

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(d) An evacuation plan that includes a system for adequately warning the general public in the event of a levee failure, and a plan for the evacuation of every affected school, residential care facility for the elderly, and long-term health care facility.

(e) A flood water removal plan.

(f) A requirement, to the extent reasonable, that either of the following applies to a new building in which the inhabitants are expected to be the essential service providers:

(1) The building is located outside an area that may be flooded.

(2) The building is designed to be operable shortly after the floodwater is removed.

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Delta Levees Maintenance Subventions Program
Procedures and Criteria

Appendix A-1
Delta Levee Standards Summaries

Following are summaries of common levee standards used in the Sacramento – San Joaquin Delta.

(a) Short-Term Hazard Mitigation Plan (HMP) Standards (for Agricultural Levees)

The short-term mitigation plan cited in Water Code section 12984(a) and set forth in the *Flood Hazard Mitigation Plan for the Sacramento-San Joaquin Delta,* prepared by the Department of Water Resources for the Office of Emergency Services, dated September 15, 1983, or as amended, contains criteria that include the following:

(1) Minimum freeboard of 1 foot above the 100-year flood frequency elevations determined by the Corps of Engineers.

(2) Minimum crown width of 16 feet with an all-weather access road.

(3) Waterside slopes no steeper than 1.5 horizontal to 1 vertical, with revetment in areas where erosion has been a problem. The size of the revetment material to be appropriate for the slope.

(4) Landside slopes no steeper than 2 horizontal to 1 vertical, with flatter slopes in the lower portion of the levee in areas where soil stability or seepage have been a problem.

(b) PL 84-99 Standards (for Agricultural Levees)

The Corps of Engineers publication *Guidelines for Rehabilitation of Non-Federal Levees in the Sacramento-San Joaquin Legal Delta* available on the Subventions Program website at http://www.water.ca.gov/floodmgmt/dsmo/bdlb/sp/ contains criteria that include the following:

(1) Minimum freeboard of 1.5 feet above the 100-year flood frequency elevations determined by the Corps of Engineers.

(2) Minimum crown width of 16 feet with an all-weather access road.

(3) Waterside slopes no steeper than 2 horizontal to 1 vertical.

(4) Landside slopes vary with levee height and depth of peat (range 3:1 – 5:1).

(5) Levee toe drain located 30 feet landward from the landside levee toe.

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(c) Bulletin 192-82 Criteria (for Agricultural and Urban Levees).

The Department of Water Resources publication *Bulletin 192-82, Delta Levees Investigation*, dated December 1982, contains criteria that include the following:

(1) Minimum freeboard for levees protecting agricultural and urban land consists of 1.5 feet and 3.0 feet respectively above the 300-year flood frequency elevations determined by the Corps of Engineers.

(2) Typical levee section has a crown width of 16 feet, a waterside slope of 2 horizontal to 1 vertical, and a landside slope that varies with depth of peat (range 3:1 to 7:1).

(3) Landside berms should be constructed where necessary to help provide stability for weak, highly compressible, peat foundations. Slopes on landside berms to be as flat as 15 horizontal to 1 vertical where required.

(4) In deep peat areas, staged construction consisting of periodic raising of the levee crown, back slope, and the landside berm may be required to compensate for continuing subsidence.

(5) Construction of levees on a new alignment (levee setback) to have a minimum crown width of 12 feet and slopes of 2 horizontal to 1 vertical on both the land and watersides.

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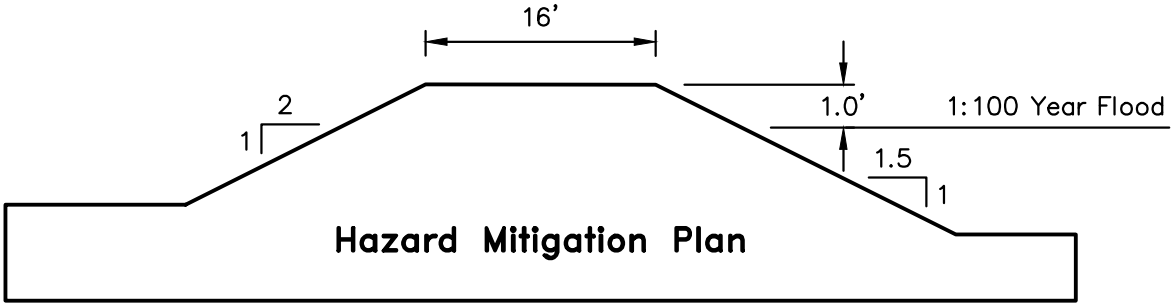
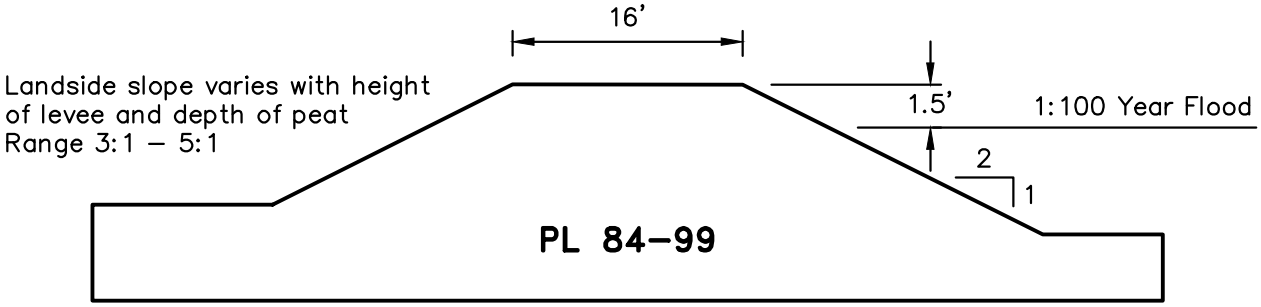
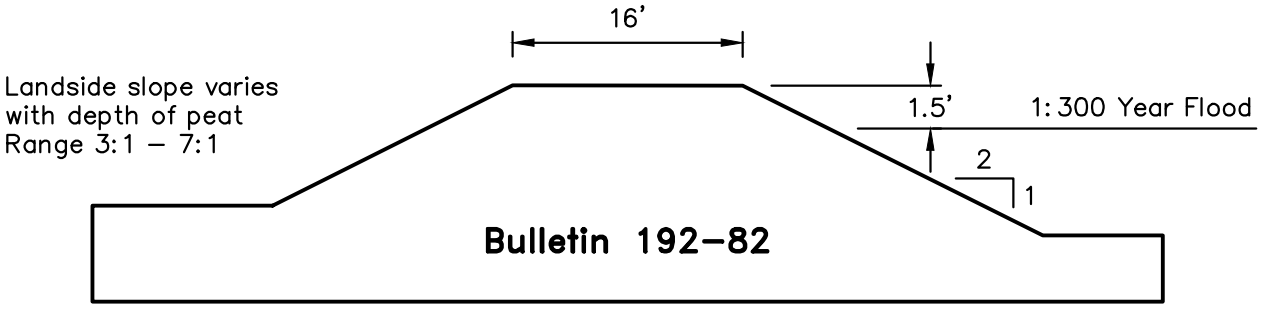
Delta Levee Standards

Agricultural

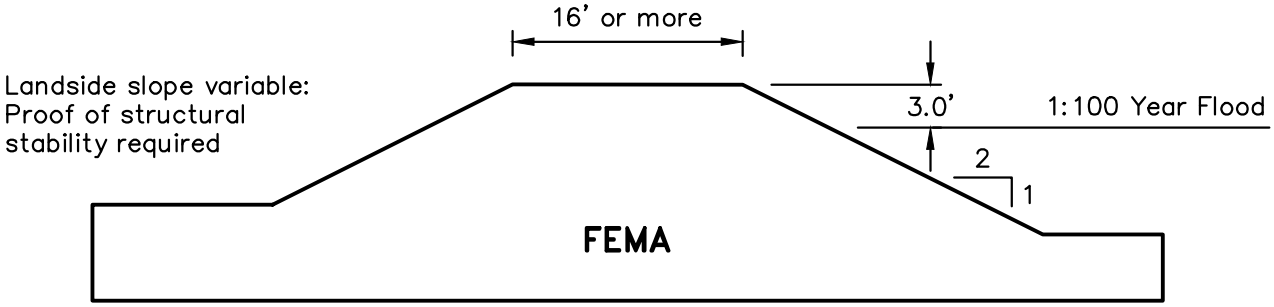


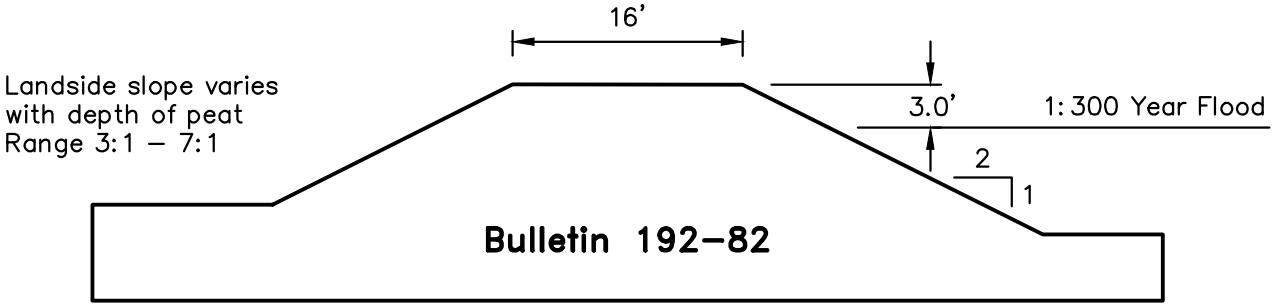




Delta Levee Standards

Urban





Delta Levees Maintenance Subventions Program
Procedures and Criteria

Appendix B-1
Procedure for Requesting Advance of Funds

California Water Code Section 12987.5 allows for advancing funds to applicants upon submission of plans for maintenance and improvement of Delta levees. Advance funding can provide needed cash flow to the local maintaining agencies so the necessary work can proceed without impacting reserved funds or require the borrowing of additional funds.

The Department of Water Resources (DWR) makes advance funding available to eligible local agencies for work above and beyond the routine maintenance work provided the proposed plans comply with the following requirements:

- California Environmental Quality Act guidelines
- California Endangered Species Act
- Public Contract Code competitive bidding requirements
- Bond funding labor compliance program requirements
- All applicable federal, State and local laws and regulations

Additionally, local agencies applying for advance funding must meet the Delta Levees Maintenance Subventions Program's "no net loss" and "net habitat improvement" requirements. Routine annual maintenance work will not be considered for advance funding. The specific requirements for advance funding for specific rehabilitation projects are as follows:

(a) Signed Work Agreement – A work agreement must be executed between the local agency and the Central Valley Flood Protection Board (Board) before DWR can process any requests for advance funding.

(b) Project Description – A project description detailing the proposed work has to be included in the package requesting advance funding as part of the submittal to DWR. The description should clearly show that the proposed work is above and beyond the routine maintenance work. All plans, maps, and specifications should accompany the project description. A work schedule must be included providing enough detail to show the work can be completed prior to July 1, the beginning of the next fiscal year.

(c) Labor Compliance Requirements – Local agency must provide evidence indicating that they will enforce a Labor Compliance Program pursuant to Labor Code Section 1771.5 as long as the local agency is requesting funding in whole or in part under Proposition 50, Proposition 84, or any other source of funding requiring enforcement of a Labor Compliance Program.

(d) Projects Performed under Contract – Where work is performed under contract, local agency is responsible for compliance with competitive bidding, contract administration laws, and all applicable labor laws including, but not limited to, Public Contract Code Section 20920, et seq. and Labor Code Section 1720 et seq. and 1770 et seq.

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(e) Advance funding is only applicable to the districts that are ready to proceed with their projects and have a signed construction contract in place. Requests for advance funding will only be considered for projects qualified as non-routine maintenance work. Advance amounts are based on the contract amount as outlined below; however, it will not exceed the approved amount by the Board.

Contract Amount ($)	Advance Amount (%)
Up to $500,000	75
$500,000 - $1,000,000	50
Over $1,000,000	35

(f) Local Agency Projects – A request for advance for levee rehabilitation performed with local agency forces will be evaluated on a case-by-case basis. These projects must include a Scope of Work prepared, signed, and managed by a Civil Engineer licensed by the California Board for Professional Engineers, Land Surveyors, and Geologists. This is to ensure that the materials used meet construction standards and work is to be accomplished in an efficient and effective manner. The Civil Engineer's estimated cost of the "Scope of Work" will be treated the same as the "Contract Amount" as described in the paragraph above for limiting the advance amount. Limitations to the maximum amount reimbursed for local agency's equipment costs will be determined in accordance with the equipment rates established by Caltrans and the Delta Levees Maintenance Subventions Program.

(g) Environmental Compliance – Each application for advance funding must include evidence that the project complies with the California Environmental Quality Act. In addition, each project must be compliant with the California Endangered Species Act, the Federal Endangered Species Act, and the Clean Water Act and the Rivers and Harbors Act, as administered by the U.S. Army Corps of Engineers. The accompanying "Advance Payment Information Form" must be filled out and accompany the advance request to ensure that all expenditures of program funds are consistent with "no net long-term loss" and "net habitat improvement" requirements. Please attach all necessary documents to support the form.

(h) Submittal Timeline – An eligible maintaining agency may submit a request for advance funds any time during the current State fiscal year. Local agencies are eligible for advances only after a minimum deductible of $1,000 per levee mile in costs have been incurred.

Prepare two copies of the package and submit one copy each to the Department of Water Resources and the Department of Fish and Game.

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AB 360 Program
Advance Payment Form

This form must accompany all Subvention Advance Payment requests for flood control work. The AB 360 Program (CA Water Code Section 12987) requires the Department of Fish and Game (DFG) to ensure that all expenditures of Program funds are consistent with no net long-term loss and net habitat improvement. As part of the advance approval process, DFG will review all information below as provided by the reclamation district. As needed, DFG will perform site inspections to ensure net habitat improvement.

Claimant Information

Reclamation District Name/Number			
Engineer/ Engineering Company			
Person Familiar with Project			
Email		Phone Number	
Fiscal Year of Proposed Work			

Work Description

Provide detailed descriptions of proposed work to be paid for under the advance: include work dates, locations by levee station, whether waterside or landside, width of work area, and provide pre-project photos of all work locations. The work descriptions should be identified by the following categories: Annual Routine Maintenance (Road Work, Erosion/Subsidence Control, Drainage Control, Water Control Devices, Rodent Control, Vegetation Control) and Levee Rehabilitation Work.

Mapping

Attach topographical maps, aerial photos, and/or engineering drawings showing the locations and dimensions of the area where project activities will occur. These include, but are not limited to, borrow areas, dredged areas, areas to be sprayed, disced, burned, or mechanically cleared, and areas where revetment must be replaced.

Potential Impacts and Avoidance

Are there any AB360 habitat types (riparian forest, scrub shrub, freshwater marsh, SRA) present within any of the work locations?

Yes ☐ No ☐

Are there any sensitive natural communities and plants or wetlands recognized by DFG or Federal Agencies present?

Yes ☐ No ☐

Are there any candidate, sensitive, or special status species recognized by DFG or Federal Agencies potentially present?

Yes ☐ No ☐

By levee station number, describe how impacts to habitat and sensitive species will be avoided.

Mitigation / Enhancement

Are there any unavoidable impacts to habitat or sensitive species? Yes ☐ No ☐

Please describe all proposed mitigation for unavoidable impacts. All potential impacts to special status species will require consultation under CESA and/or FESA and may require mitigation beyond that needed by the AB 360 Program.

To comply with the net long-term habitat improvement program and have a net benefit to aquatic species as required by Water Code Sections 12987 and 79050, the District agrees to participate in DWR and DFG sponsored programmatic habitat improvement projects.

CEQA Notification

CEQA documentation is necessary for any work which may cause a direct physical change or reasonably foreseeable indirect change in the environment.

Which of the following may be necessary for the work to be completed:

NOE ☐ Neg. Dec. ☐ Mit. Neg. Dec. ☐ EIR ☐

Is the documentation already complete?: Yes ☐ No ☐

If yes, please attach a copy of the documentation.

Required Permits

The Reclamation District is responsible for all environmental compliance related to the above work and must comply with all applicable federal, state, and local laws and regulations.

Notification under Section 1602 of the Fish and Game Code is required for all waterside work, including but not limited to flood control, habitat creation, and dredging. If there are any listed species in or near the work area, DFG should be consulted. Permitting under CESA is required if "take" of a state listed species may occur while undertaking any part of the project.

Which of the following may be necessary for the work to be completed:

Streambed Alteration Agreement ☐ Incidental Take Permit ☐

List all permits required to complete the above work (including other governmental agencies) and the date each permit was approved or roughly when you expect it to be approved.

Signature

Reclamation District Name and Number _____

District Representative (Printed) _____

District Representative (Signature) _____

Date Form Completed _____

Appendix C

MEMORANDUM OF UNDERSTANDING
BETWEEN
THE STATE OF CALIFORNIA
EMERGENCY MANAGEMENT AGENCY
AND
THE U.S. DEPARTMENT OF HOMELAND SECURITY'S
FEDERAL EMERGENCY MANAGEMENT AGENCY

REGARDING CRITERIA FOR PUBLIC ASSISTANCE ELIGIBILITY FOR RECLAMATION DISTRICTS IN THE SACRAMENTO/SAN JOAQUIN LEGAL DELTA

I. PARTIES

The Parties to this Memorandum of Agreement (MOU) are the State of California Emergency Management Agency (Cal EMA) and the U.S. Department of Homeland Security's Federal Emergency Management Agency (FEMA).

II. PURPOSE

The purpose of this Memorandum of Understanding (MOU) is to clarify for the Parties, the requirements for FEMA Public Assistance funding for emergency flood fighting, emergency repair, permanent restoration, and/or replacement of eligible damaged Non-Project Levees within the Reclamation Districts (Districts) in the Sacramento/San Joaquin Legal Delta (Legal Delta). "Districts" refers to special districts that are formed pursuant to the Reclamation District Act in the California Water Code Section 50000 et seq. This MOU clarifies disaster assistance eligibility requirements for Non-Project Levees that are the responsibility of Districts in the Legal Delta under major disasters and emergencies declared after the date this MOU is executed. This MOU applies to facilities owned by the Districts that are levees or their facilities directly linked to levees. Eligibility criteria for other facilities owned by the Districts but not directly related to the levees will be addressed as any other.

The minimum criteria set forth in this MOU are solely for the purpose of meeting FEMA Public Assistance eligibility. The minimum criteria do not constitute "FEMA Standards or design" as FEMA does not exercise specific regulatory authority over the Districts, nor do the criteria herein meet Public Law 84-99 or any other federal criteria applicable to facilities that provide protection against flood. The criteria stated herein do not supersede any provisions of the National Flood Insurance Act of 1968 (P.L. 90-488); the Flood Disaster Protection Act of 1973 (PL 93-234); or Executive Order 11988, Floodplain Management.

III. AUTHORITY

Sections 306 (a) and 406 of the Robert T. Stafford Disaster Relief and Emergency Assistance Act, 42 U.S.C. Sections 5149 and 5172, respectively.

IV. BACKGROUND

A. Following the joint approval of the FEMA-State (State of California) Agreement for FEMA-677-DR-CA (1983), an Amendment No.1 was necessary to add a portion of the Legal Delta to the Declaration. In addition, the Amendment established specific responsibilities and actions for FEMA, the State, and the affected Districts. One of the primary requirements of this Amendment was the development of a Flood Hazard Mitigation Plan (FHMP) for the Legal Delta by the State. This FHMP, dated September 15, 1983, was submitted to FEMA and approved.

B. Following flooding that resulted in Presidential Declaration FEMA-758-DR-CA (1986), FEMA requested a status report on the progress of the FHMP work. The report showed little progress had been made on the implementation of the required work; furthermore, the FHMP did not (1) specify an implementation plan, (2) specify a time frame for completion of the work, or (3) specify that the work was to protect against a 100-year flood. FEMA issued a Mission Assignment to the U.S. Army Corps of Engineers (USACE) to develop the elevations for a flood of that magnitude for the Legal Delta. Following the completion of those studies, Amendment No. 5 to the FEMA-State Agreement for Disaster FEMA-758-DR was signed to address issues of the implementation plan, a time frame for completion, and requirements for levee geometry (see Attachment 1). The Amendment was only applicable to certain Districts.

C. Since Amendment No. 5 was signed, it has become apparent that additional clarification of Public Assistance eligibility is required. The Districts manage and control Legal Delta levees that are a major collection point for potable water supplied to approximately two-thirds of the State's population. In addition, the Legal Delta and its levees are of vital concern to agricultural, transportation, urban, industrial, environmental, and recreational interests. For these reasons, the uniform eligibility criteria provided in Article VI applies solely to the District Non-Project Levees in the Legal Delta.

V. LEGAL DELTA AREA AND TYPES OF LEVEES

The area defined as the Legal Delta is shown in Attachment 2. The Districts within that boundary have levees that generally fall into one of two categories. In some instances, a District may have a combination of Project Levees and Non-Project Levees.

A. "Project Levees." These levees are within the USACE Rehabilitation and Inspection Program (RIP), as authorized by P.L. 84-99. Attachment 3 is a map showing the Project Levees. Such levees generally are eligible for FEMA Public Assistance only for the purpose of flood-fighting and debris removal following a presidentially declared disaster.

Project levees are integral to the functioning of the legal delta system. This MOU does not supersede or suggest any additional eligibility criteria for project levees.

B. "Non-Project Levees." Levees not under the USACE RIP and in compliance with requirements as set forth herein, are eligible for FEMA Public Assistance. These levees are shown in Attachment 4.

VI. CRITERIA FOR FEMA PUBLIC ASSISTANCE ELIGIBILITY

A. General

The following eligibility criteria shall be utilized for all Districts requesting FEMA Public Assistance for future disaster events after the date of signature of the MOU by Cal EMA and FEMA under the Robert T. Stafford Disaster Relief and Emergency Assistance Act, P.L. 93-288 amended, or subsequent applicable Federal Law:

B. Levee Geometry

1. The levee crown elevations must be at least one foot above the elevation of a flood expected to occur on the average of once every 100 years, and must meet levee cross section requirements as set forth in this section.

2. The minimum levee crown width shall be at least 16 feet. On the waterside of the levee, the slope shall be at least 1.5 feet horizontal to 1 foot vertical, with revetment in areas where erosion has been a problem. On the landside of the levee, the slope shall be at least 2 feet horizontal to 1 foot vertical, with flatter slopes in the lower portion of the levee in areas where soil sloughing and/or seepage have previously been identified.

3. Alternative engineering or design methods may be employed to meet the criteria set forth in this section, provided that the District furnish such engineering and design data that clearly demonstrates such methods meet or exceed the minimum level of protection provided for in this section. FEMA will evaluate such methods on a case-by-case basis to ensure the level of protection is met.

C. Profile/Cross Section Criteria

1. Each District must have available profiles and cross sections prepared no more than five years prior to the disaster event. If the information on these documents shows any discrepancies, the District must provide to Cal EMA updated profiles and cross sections for the area where the discrepancies were noted or a maintenance plan as set forth in Section VI D. Failure to address areas of non-compliance may result in a determination of ineligibility.

2. The 100-year stage-frequency elevation and the one foot of freeboard shall be clearly delineated on the profiles. The datum to be used in preparing the profiles and cross sections shall be Mean Sea Level (NVGD). 1988.

3. Field work and preparation of profiles and cross sections must be conducted (and documents certified) by a licensed surveyor.

4. Profiles of the existing levee grade shall be made with elevations shown at a minimum of every 1000 feet, unless there are low points in elevations between intervals. If that occurs, cross section profiles at intervals frequent enough to identify each low point must be taken. Obvious deviations include but are not limited to erosion along levee slopes, infrastructure encroachment into levee slopes, and areas of subsidence. The profile shall be taken on the entire length of all Non-Project levees within the District.

D. Annual Maintenance Plan

Non-Project levees belonging to the Districts shall meet the current standard set by the state or the criteria set forth in this section, whichever provides a greater level of flood protection, to be eligible for FEMA Public Assistance. The parties acknowledge that there may be instances where a District may be deficient in meeting these criteria. If one or more of the criteria is not met, the respective District shall submit an Annual Maintenance Plan to Cal EMA that fully describes any deficiencies, including a strategy and schedule for correcting said deficiencies based on risk. Cal EMA will review the plans to ensure all required elements have been addressed.

District Annual Maintenance Plans shall include, at a minimum:

- The regular annual maintenance and inspection schedule and frequency.
- Work items and standards to be employed for each scheduled cycle.
- The method used to identify, prioritize, and carry out maintenance efforts.
- Maintenance and repairs that would warrant immediate corrective action and the corresponding action.
- The annual maintenance budget.

VII. Cal EMA RESPONSIBILITIES

A. Cal EMA will be responsible for providing the Districts with the criteria set forth in Article VI above and ensuring Districts are aware of the following responsibilities:

1) In the event a District submits an application for FEMA Public Assistance, each District is responsible for knowing the requirements for, and ensuring compliance with, eligibility criteria set forth in Section VI of this document.

2) The District is responsible for preparing and having available profile and cross-section information, as set forth in Section VI C.

3) The District is responsible for developing an annual maintenance plan to address any deficiencies, including an aggressive strategy and a schedule for correcting those deficiencies, as per Section VI D.

4) The District is responsible for notifying Cal EMA of any participation in the USACE RIP.

5) The District is responsible for knowing FEMA and State requirements for requesting Public Assistance, documentation requirements, time lines and deadlines, and applicable Federal contracting requirements. The District is also responsible for informing any engineering firms and/or construction firms of time constraints and deadlines, and for ensuring that any disaster-related work is done within required time frames.

6) The District will agree to indemnify and hold harmless the United States and the State of California against any and all liability, claims, suits, losses, costs, and legal fees caused by, arising out of, or resulting from any negligent act or omission related to the performance of work to meet the standards and criteria set forth herein.

B. Cal EMA will ensure that specific information provided by FEMA that may impact the eligibility of, or funding for, disaster-related damage in the Legal Delta is provided to the Districts in a timely manner.

C. Cal EMA will review District Annual Maintenance Plans to ensure compliance with Section VI D and maintain a list of each District's plan status.

D. Cal EMA will ensure that consideration of eligibility for emergency repairs and emergency management work should be based on whether a District has demonstrated a good faith effort to substantially comply with eligibility criteria set forth in Section VI of this document.

VIII. FEMA RESPONSIBILITIES

A. FEMA will work with Cal EMA to ensure timely submittal of information that could affect applicable program criteria or eligibility status for the Legal Delta.

B. FEMA will inform the State of any issues that may arise related to disaster funding for reported damage to any eligible District levees in the Legal Delta.

C. FEMA will work with Cal EMA to maintain the District Annual Maintenance Plan list and use the list to establish the eligibility of Reclamation Districts.

IX. POINTS OF CONTACT

William Roche, Infrastructure Branch Chief
U.S. Department of Homeland Security, Federal Emergency Management Agency
Disaster Assistance Division, Infrastructure Branch
1111 Broadway, Suite 1200
Oakland, CA 94607-4052
Email: William.Roche@dhs.gov
Phone: 510-627-7077

Michael Baldwin, State Public Assistance Officer
California Emergency Management Agency
Recovery Division, Public Assistance
3650 Schriever Avenue
Mather, CA 95655
Email: Michael.Baldwin@calema.ca.gov
Phone: 916-845-8203

X. MODIFICATION

This MOU may be modified by mutual written consent of the Parties. The party desiring modification or amendment of this MOU should explain the basis for the need to modify the MOU.

XI. EFFECTIVE DATE AND TERMINATION

This MOU is effective the date of the last signature below, and shall remain in effect until terminated upon agreement of the Parties. Either party can terminate this MOU by providing forty-five (45) days written notice of its intent to terminate to the non-terminating party.

XII. APPROVALS

The following officials are authorized to sign this MOU expressing their respective party's intent to agree to all terms above.

XIII. FEMA AND Cal EMA CONCURRENCE

IN WITNESS WHEREOF, the parties hereto have executed this Memorandum of Understanding as of the day and year signed.

California Emergency Management Agency

By: _____ Date: 2/16/10

Secretary

By: Tom M Date: 1/29/10

Director, Office of Statewide Operations

DHS/Federal Emergency Management Agency

By: Nancy Ward Date: 2/24/10

Regional Administrator

By: Date: 2/25/10

for Director, Disaster Assistance Division

ATTACHMENTS:

Attachment 1. Amendment #5 to the FEMA/State Agreement for FEMA-758-DR
Attachment 2. Map of Sacramento/San Joaquin Legal Delta
Attachment 3. Map of Project Levees
Attachment 4. Map of Non-Project Levees

Attachment 1

Amendment #5 to the FEMA/State Agreement for FEMA-758-DR

Federal Emergency Management Agency
Region IX Building 105
Presidio of San Francisco, California 94129

April 28, 1987

The Honorable George Deukmejian
Governor, State of California
State Capitol
Sacramento, California 95814

Dear Governor Deukmejian:

Subject: Amendment #5, FEMA/State Agreement
FEMA-758-DR-CA

This letter is Amendment #5 to the FEMA/State Agreement on the subject major disaster declaration which was executed on behalf of the State of California dated February 25, 1986. This Agreement is amended as follows:

1. Paragraph 10 of the original Agreement is changed to include:

Add: The intent of this section of the the Federal/State Agreement is to establish the requirements for the approval of Damage Survey Reports (DSRs) under major disaster declaration FEMA-758-DR-CA, and to define eligibility criteria for reclamation districts requesting Federal disaster assistance in the event of future declarations under Public law 93-288 (PL 93-288) or subsequent applicable Federal law. The requirements contained within this section are applicable to districts requesting assistance under major disaster declaration FEMA-758-DR, and to those districts that received assistance under major disaster declarations FEMA-633-DR, FEMA-651-DR, FEMA-669-DR, FEMA-677-DR, and emergency declaration FEMA-3078-EM. This section applies to those reclamation districts, referenced above, located within the Sacramento/San Joaquin Delta, and RD 1607 (Van Sickle Island) and RD 2122 (Winter Island). The specific requirements are as follows:

A. IMPLEMENTATION PLAN

The aforementioned districts must submit an Implementation Plan, to be approved by FEMA, which upgrades their levees to the standards of the Short-Term Levee Rehabilitation Plan of September 15, 1983, the FEMA required Flood Hazard Mitigation Plan for the Sacramento/San Joaquin Delta (HMP). The implementation plan must be submitted by November 1, 1987, and must include:

1. Schedule

a. Districts must establish a five-year time frame to upgrade levees to the Short-Term HMP. The starting point for the five-year program is September 10, 1986, and all required short-term mitigation must be completed by September 10, 1991.

b. Exceptions to the implementation schedule may be granted by FEMA, if a district is restricted in the placement of material because of sub-soil instability or other geologic conditions affecting stability. The implementation plan may also be adjusted if a district sustains significant additional damage as a result of future disaster events.

c. The implementation schedule must identify the type, extent and location of HMP work (i.e., raising levee crown, rock placement, etc.) to be accomplished each year. The estimated cost for such work must be identified by station.

d. The implementation schedule must include the estimated cost of FEMA required HMP work, per year, over the five-year period. The estimated cost must be supported by calculations from cross sections.

e. A district must immediately notify FEMA, through the Office of Emergency Services (OES), if the FEMA approved schedule cannot be met. Within 30 days of the notice of non-compliance, FEMA will meet and confer jointly with district, OES, and Department of Water Resources (DWR) representatives to develop appropriate remedial action. Districts must provide documentary proof to justify any exceptions to the schedule. Failure to comply with the approved schedule, without justification acceptable to FEMA (see b. above) will result in the withdrawal of eligible disaster assistance funding, the issuance of a Bill for Collection for advanced or reimbursed funding provided under major disaster declaration FEMA-758-DR, and a determination by FEMA of ineligibility for future disaster assistance.

2. Profiles

Profiles submitted by districts must include:

a. Existing levee profiles (1983 or later) at 1,000-foot intervals.

b. The 100-year frequency elevations (waterside) at 1,000-foot intervals, using the 1982 Sacramento/San Joaquin Delta USACE Stage Frequency Study (Revised 1986).

3. Cross Sections

Cross Sections submitted by districts must include:

a. Existing levee cross sections (1983 or later) at 1,000-foot intervals. Cross sections must be provided at more frequent intervals if 1,000-foot intervals do not show typical cross section. For those reclamation districts that have already submitted their profiles/cross sections to FEMA, a resubmission of more frequent than 1,000 foot intervals is not required.

b. The HMP standard cross sections superimposed on the existing cross sections.

c. The minimum levee crown width shall be at least 16 feet.

1. Waterside slopes shall be at least 1.5 horizontal to 1 vertical, with revetment in areas where erosion has been a problem.

2. Landslide slopes shall be at least 2 horizontal to 1 vertical, with flatter slopes in the lower portion of the levee in areas where soil stability and seepage have been a problem.

3. The levee shall have all-weather access roads.

d. Where applicable, cross sections must indicate the FEMA-758 disaster-related damage, in order to separate those damages from the HMP work to be accomplished. Disaster related damages will be calculated from cross sections or other acceptable site specific documentation.

4. As-Built Drawings

a. As-built drawings must be submitted annually until work completion. The drawings must include levee profiles at 500-foot intervals. Typical cross sections at 500-foot intervals must show the type of work accomplished. Cross sections and profiles must be provided at more frequent intervals if 500-foot intervals do not show typical cross sections.

B. PROJECT APPLICATION APPROVAL

Project applications will be evaluated by FEMA, and approved or denied on a district by district basis. Districts must complete the following, in order for FEMA to remove DSRs from suspension , approve project applications and obligate funds under major disaster declaration FEMA-758-DR-CA and future major disaster declarations.

1. District Actions

a. A district must submit to FEMA, through OES, the information required and outlined by FEMA under Section A above. If the required information is not submitted, FEMA will inform the Governor's Authorized Representative of what must be submitted by the district, before FEMA will concur with the district's Implementation Plan.

b. A district must formally adopt a resolution committing itself to accomplish the levee mitigation and improvement work according to the FEMA approved Implementation Plan, and to maintain the levee to FEMA approved HMP standard.

c. A district must submit as-built drawings after completion of disaster-related work. The drawings must include typical cross sections at 500-foot intervals. Typical cross sections must be provided at more frequent intervals if 500-foot intervals do not show typical sections, especially in those areas where disaster related damage occurred.

2. Supplemental Damage Survey Reports

a. A district must notify FEMA, through OES, of anticipated cost overruns associated with approved permanent work, and prior to undertaking projects not identified on previously approved Damage Survey Reports (DSRs). A district must notify OES of emergency work cost overruns within five days after receiving the approved project application. Without advance notification, FEMA may not approve additional funding for cost overruns or supplemental work.

b. To support requests for consideration of cost overruns and/or additional work, a district must provide substantial supporting documentation, including stationing and quantities. Insufficiently documented costs will be ineligible for reimbursement.

3. Funding (Letter of Credit)

a. Reimbursement is limited to costs incurred to date, including billings on hand which require payment, and those expenditures expected to be incurred within the next four days of filing the claim for remimbursement. FEMA progress payments are limited to 75% of the FEMA 75% share of eligible costs, pending final inspection findings. Final payments to districts may be adjusted by FEMA after audit.

b. FEMA will only fund costs for engineering and surveys applicable to disaster-related damage repairs. FEMA will not fund those costs for engineering and surveys that are necessary to accomplish the hazard mitigation requirements indicated above.

C. RESPONSIBILITIES

1. District Responsibility

a. A district is solely responsible for the work that is accomplished as a result of the Implementation Plan requirements. A district is also responsible for the maintenance of the levees to the FEMA approved HMP standard. A district must acquire the necessary data, engineering, surveys, and geotechnical information to ensure that the levee upgrading work does not result in unusual or unexpected subsidence of the levee, breaching of the levee, or subsequent damage to improved private and/or public facilities.

b. A district will submit to and assist in an annual Delta levee inspection program, and will prepare a plan for annual maintenance and rehabilitation work, which will include information pertaining to achievement of objectives outlined in the Flood Hazard Mitigation Plan, Sacramento/San Joaquin Delta, for disaster declaration FEMA-758-DR-CA. Districts must submit this plan to DWR, Central District, by November 1 of each year, beginning November 1987.

c. A district will complete its annual levee maintenance by November 1 of each year.

d. A district will support a long-term comprehensive Federal/state/local flood control project that includes consideration of rehabilitating all Delta nonproject levees, thereby addressing the levee integrity issue, as well as issues such as wetlands, access to public lands, water quality, transportation, water transfer, recreation, fish and wildlife habitat enhancement, flood control, and identification of benefits and costs.

e. A district must also hold and save the United States and the State of California free from damages due to the required work, and shall idemnify the Federal Government and the State of California against any claims arising from such work.

2. State Responsibility

a. The State, in keeping with the comprehensive hazard Mitigation Plan for the Sacramento/San Joaquin Delta area, will notify each reclamation district within the Delta and RDs 1607 (Van Sickle Island) and 2122 (Winter Island), of the requirements for the Federal Emergency Management Agency (FEMA) approval of Damage Survey Reports (DSRs under FEMA-758-DR) and for eligibility for disaster assistance in the event of future declarations.

b. The state will provide funding, as available, through the Delta Levee Maintenance Subvention Program, for rehabilitation and maintenance.

c. The state will perform annual on-site inspections of district levees encompassed by the HMP.

d. The state will prepare an annual report on the mitigation work accomplished under the FEMA required, and approved, Implementation Plan during the prior year in addition to providing information regarding the mitigation work status of each district included in the HMP. The annual report will be submitted to FEMA no later than the first day of July each year, beginning July 1988.

e. The state must immediately notify FEMA, if the aforementioned deadline cannot be met. FEMA, OES, and DWR will meet and confer within 30 days of the discovery of non-compliance, to discuss the cause of non-compliance and to determine appropriate remedial action.

3. Federal Responsibility

a. FEMA will meet annually with the district, OES, and DWR representatives, to discuss and evaluate the status of and problems associated with the annual HMP report. This annual meeting will present an opportunity for FEMA and the state to raise issues and concerns relative to the Delta, and also allows more substantive communication between all parties.

b. FEMA will provide disaster assistance funding to the reclamation districts through the state under PL 93-288 or subsequent applicable Federal law. Funding will be provided to the reclamation districts on a district by district basis.

This Agreement may be amended at any time by written approval of both parties.

Sincerely,

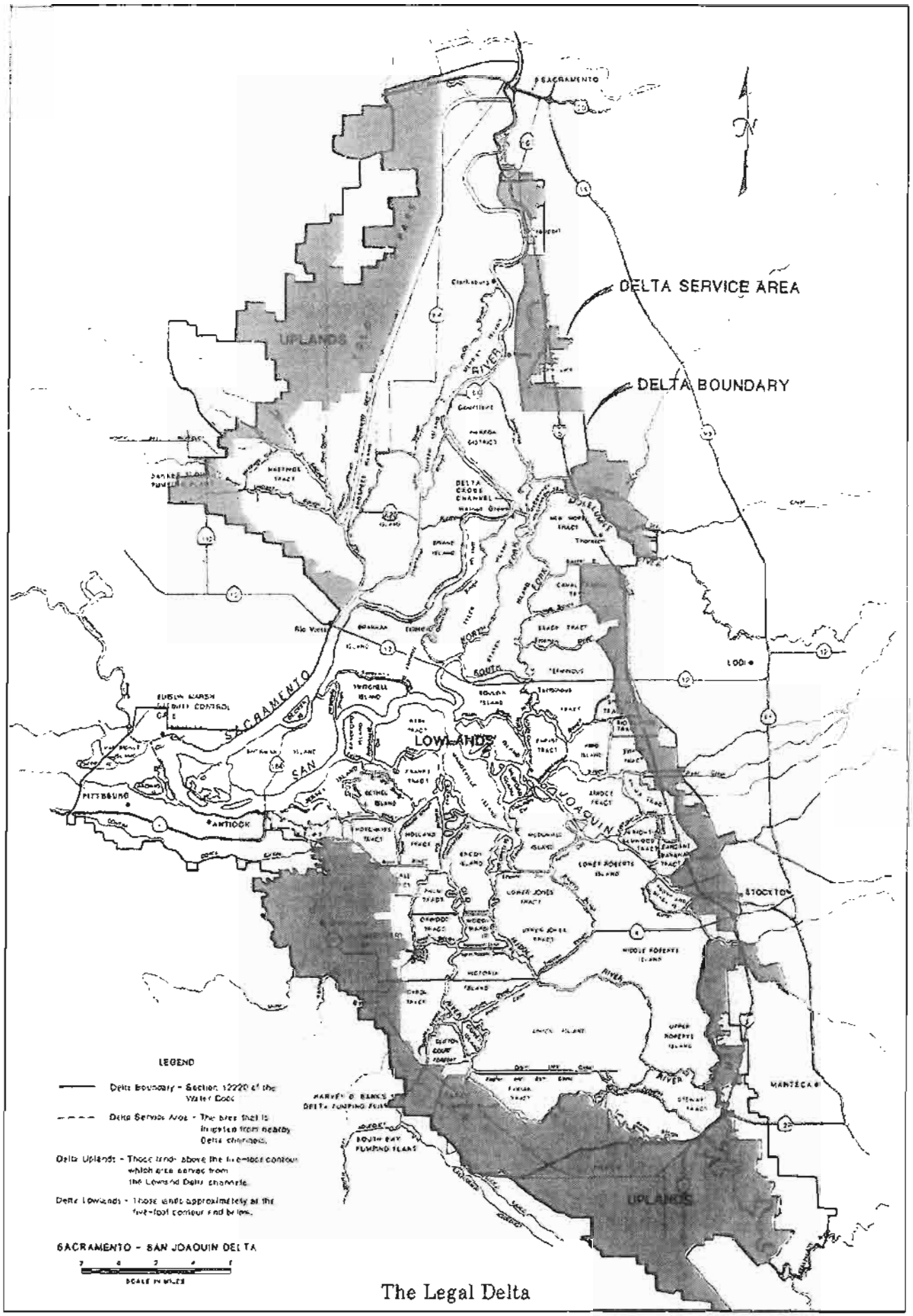
Robert L. Vickers
for Regional Director

Agreed: Donald L. Fisher
GOVERNOR'S AUTHORIZED REPRESENTATIVE

Date: April 29, 1987

Attachment 2

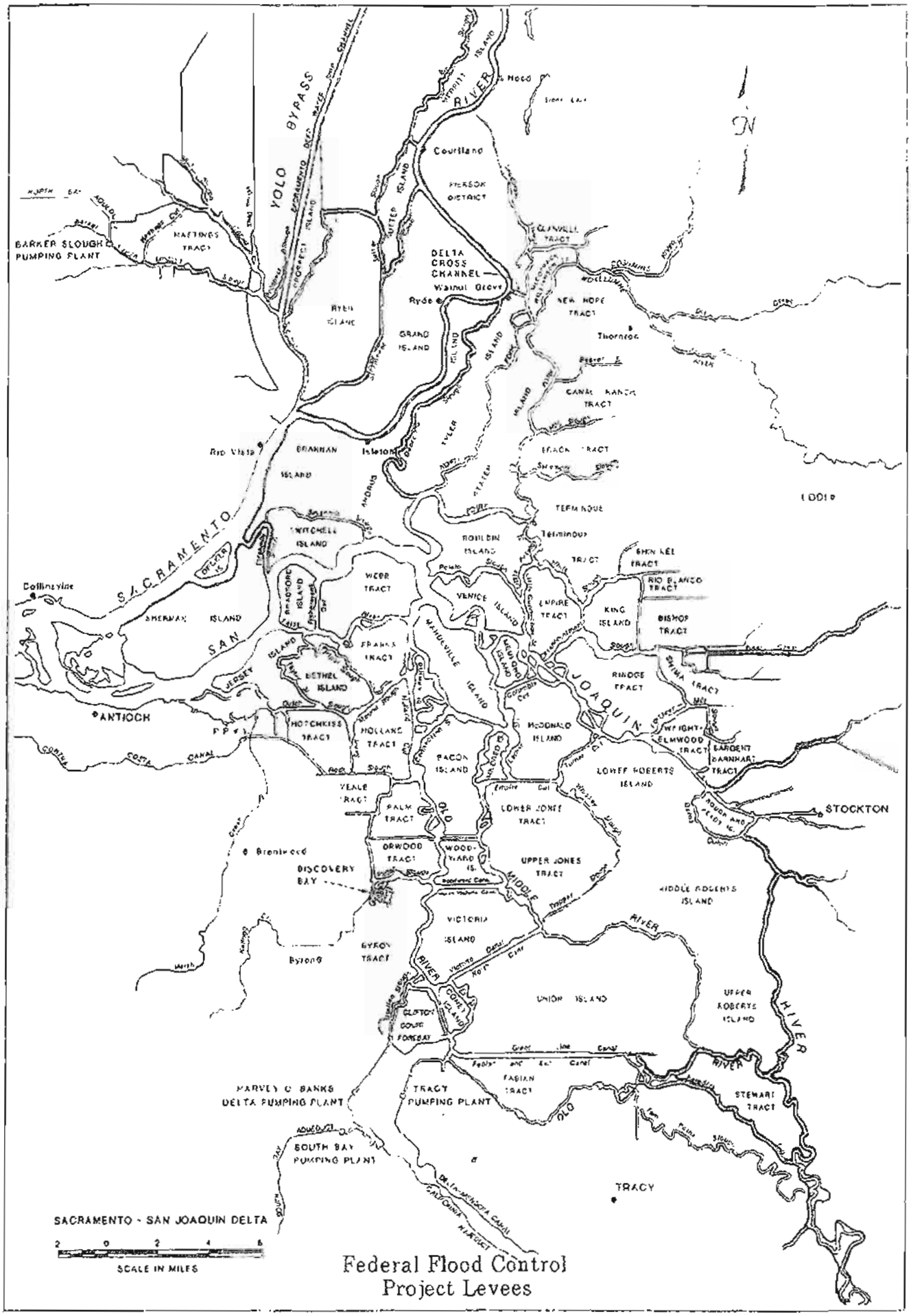
Map of Sacramento/San Joaquin
Legal Delta



The Legal Delta

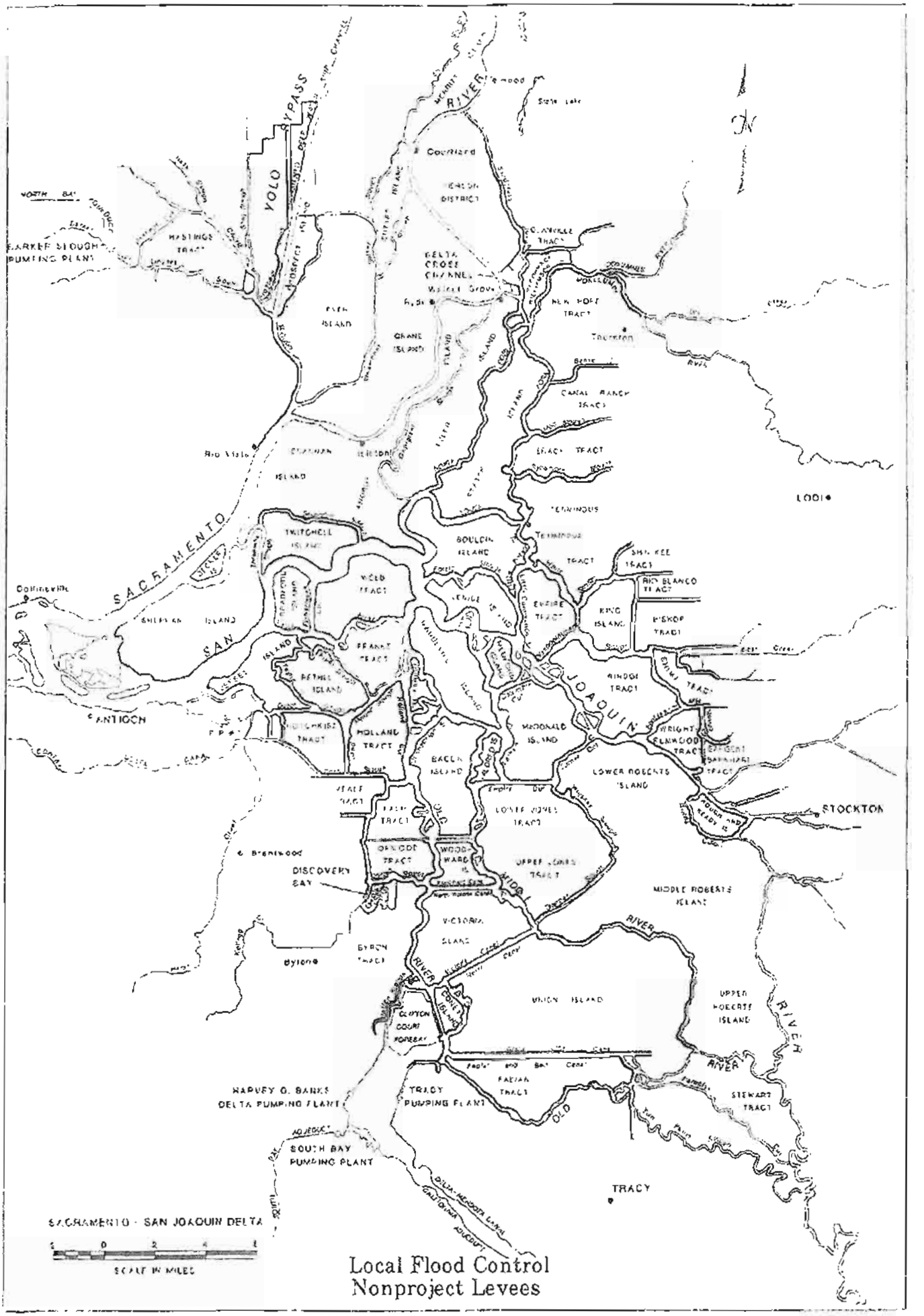
Attachment 3

Map of Project Levees


YOLO BYPASS
RIVER
Hood
Courtland
PEARSON DISTRICT
CLARKSBURG TRACT
BARKER SLOUGH PUMPING PLANT
HASTINGS TRACT
DELTA CROSS CHANNEL
Walnut Grove
Ryde
RYER ISLAND
GRAND ISLAND
NEW HOPE TRACT
Thornton
CANAL RANCH TRACT
BRANNAN ISLAND
Isleton
Rio Vista
TERMINOUS
LODI
MITCHELL ISLAND
ROBLIN ISLAND
Terminous
EBEN LEE TRACT
RIO BLANCO TRACT
WEBB TRACT
VENICE ISLAND
EMPIRE TRACT
KING ISLAND
BISHOP TRACT
Collinsville
SACRAMENTO
SAN JOAQUIN
SHERMAN ISLAND
FRANKS TRACT
MERRITT ISLAND
BETHEL ISLAND
JERSEY
RINDGE TRACT
SHIMA TRACT
ANTIOCH
HOTCHKISS TRACT
HOLLAND TRACT
BACON ISLAND
McDONALD ISLAND
WRIGHT-ELMWOOD TRACT
GARDENT-BARNHART TRACT
LOWER ROBERTS ISLAND
COSTA CANAL
VEALE TRACT
PALM TRACT
LOWER JONES TRACT
STOCKTON
Brentwood
ORWOOD TRACT
WOODWARD IS.
UPPER JONES TRACT
DISCOVERY BAY
MIDDLE ROBERTS ISLAND
VICTORIA ISLAND
Byron
BYRON TRACT
UNION ISLAND
UPPER ROBERTS ISLAND
CLIFTON COURT FOREBAY
HARVEY O. BANKS DELTA PUMPING PLANT
TRACY PUMPING PLANT
FABIAN TRACT
STEWART TRACT
SOUTH BAY PUMPING PLANT
TRACY
SACRAMENTO - SAN JOAQUIN DELTA
SCALE IN MILES
Federal Flood Control
Project Levees

Attachment 4

Map of Non-Project Levees


SACRAMENTO - SAN JOAQUIN DELTA
SCALE IN MILES
Local Flood Control
Nonproject Levees
SACRAMENTO
SAN JOAQUIN
RIVER
VOLO BYPASS
STOCKTON
LODI
TRACY
ANTIOCH
DISCOVERY BAY
HARVEY O. BANKS DELTA PUMPING PLANT
TRACY PUMPING PLANT
SOUTH BAY PUMPING PLANT
CLIFTON COURT FOREBAY
DELTA CROSS CHANNEL
MIDDLE ROBERTS ISLAND
UPPER ROBERTS ISLAND
LOWER ROBERTS ISLAND
UNION ISLAND
VICTORIA ISLAND
BACON ISLAND
MCDONALD ISLAND
BOULDIN ISLAND
TWITCHELL ISLAND
BETHEL ISLAND
GRANT TRACT
HOLLAND TRACT
WINDOW TRACT
KING ISLAND
BISHOP TRACT
RIO BLANCO TRACT
SHIN KEE TRACT
TERMINOUS TRACT
CANAL RANCH TRACT
NEW HOPE TRACT
CLARKSBURG TRACT
HASTINGS TRACT
FRANK TRACT
STEWART TRACT
BYRON TRACT
Byron
Brentwood
Courtland
Walnut Grove
Thornton
Rio Vista
Collinsville
Clarksburg
Isleton
Terminous
Stockton
Lodi
Tracy
Antioch
Discovery Bay

Delta Levees Maintenance Subventions Program
Procedures and Criteria

Appendix D
Local Agency Routine Nonproject Levee Maintenance Inspection

Local agencies should conduct routine levee maintenance inspections frequently to ensure that adequate maintenance is being carried out and that dangerous conditions are discovered early and emergencies are prevented. The Department of Water Resources (DWR) recommends that local agencies should, at a minimum, conduct such inspections before and after flood season and during and after periods of high water and high winds. Frequent inspections will assist local agencies to discover deficiencies, such as voids, erosion, cracking, subsidence, and seepage, that could result in levee damage or failure.

Annual inspections for planning routine maintenance and repair should be completed prior to July 1 to allow time to include corrective measures in the local agency's application under the Subventions Program.

(a) Reporting Guidelines – Inspection reports should include sufficient data for the local agency to (1) judge the adequacy of its levees and (2) to support the local agency's claim for reimbursement. Inspection reports should include, but not necessarily be limited to, the following information:

(1) Local agency name and district number.

(2) Local agency engineer and levee inspector (including contact information).

(3) A map of the entire levee system that shows levee stationing or levee miles, adjacent water courses, and the locations of problem areas.

(4) Photographs with sensible captions documenting conditions of problem areas.

(5) Date of inspection(s).

(6) A narrative description of the overall levee conditions that includes recommendations for proposed maintenance.

(b) Delta Levee Maintenance Inspection Log - The levee maintenance inspection log attached to this Appendix D is provided solely for the convenience of local agencies that choose to use it. Its use is not required.

(c) DWR recommends that local agency routine levee maintenance inspections should, at a minimum, document the following conditions as applicable.

(1) Evidence of burrowing rodents.

(2) Evidence that the levee crown does not drain run-off freely.

(3) The condition of patrol and access roads on the levee crown.

(4) Signs of sloughing, erosion, cracking, or subsidence of the levee.

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(5) Presence of drift deposits, debris, and litter on the levee berms and slopes.

(6) Presence of seepage and boils including comparison with historical data as applicable.

(7) The condition of drains and toe ditches that are adjacent to the landside levee toe. This may include measurement of flow, if any, and comparison with historical data where applicable.

(8) The presence of vegetative growth (such as weeds, brush, and trees) that obstructs visual inspection of the levee.

(9) The presence and condition of suitable ground cover, such as grass, intended to minimize erosion on levee berms and slopes.

(10) The presence and condition of rock armor on the waterside slope.

(11) Existing field conditions that may impede the delivery or use of supplies and equipment during a flood fight event.

(12) Encroachments which endanger the levee or interfere with maintenance.

(13) Signs of obvious changes in the levee profile or cross section that indicate the need for levee repair and/or updating of topographical surveying data.

(14) Signs of obvious changes in the adjacent channel cross section that indicate the need for updating the local agency's bathymetric data.

(15) The need for repair or replacement of damaged gates, guard rails, and other items intended to control traffic on the levee.

(16) The need for repair or replacement of damaged or missing levee station or mile markers.

The guidelines herein are provided to encourage consistency in maintenance inspections and to ensure that Subvention Program funds are properly expended. The information provided herein is not intended to address all conditions and components that may be required in a flood control system. Local agencies should consult with a Civil Engineer licensed by the California Board of Registration for Professional Engineers, Land Surveyors and Geologists for guidance regarding their specific inspection, maintenance and rehabilitation needs.

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LOCAL AGENCY LEVEE MAINTENANCE INSPECTION LOG SHEET _____ OF _____

DISTRICT NUMBER _____ UNIT _____ LENGTH IN MILES _____

ISLAND OR TRACT NAME _____ DATE OF INSPECTION _____

WATERWAYS _____

INSPECTION ITEM	LOCATION OF DEFICIENCIES IN LEVEE MILES OR STATIONS				FROM TO			TOTAL
LEVEE CROWN								
VEGETATION CONTROL								
ROAD SURFACE MAINTENANCE OR REPAIR								
ROAD CROWN GRADING								
OTHER								
LANDSIDE LEVEE								
VEGETATION CONTROL								
VEGETATION TO BE TRIMMED UP FROM THE GROUND								
SLIPOUT, EROSION, CRACK OR SUBSIDENCE REPAIR								
TOE DITCH CLEANING								
OTHER								
WATERSIDE LEVEE								
VEGETATION CONTROL								
REVETMENT REPAIR								
SLIPOUT, EROSION, CRACK OR SUBSIDENCE REPAIR								
DRIFT DEPOSITS OR DEBRIS REMOVAL								
OTHER								

LOCAL AGENCY LEVEE MAINTENANCE INSPECTION LOG

INSPECTION ITEM	LOCATION OF DEFICIENCIES IN LEVEE MILES OR STATIONS	FROM / TO						TOTAL
ENCROACHMENTS								
SEEPAGE AND BOILS								
RODENTS								
RODENT CONTROL								
BURROW FILLING								
OTHER								
REMARKS								

INSPECTED BY	DATE:
DISTRICT ENGINEER	DATE: