Local Programs Procedures

LPP 01-11 Manual Update
Subject: Release of Local Assistance Program Guidelines, Chapters 1, 4, and 7

Reference: *Local Assistance Program Guidelines*, Chapter 1, "Introduction/Overview," Chapter 4, "Surface Transportation Program (STP)," and Chapter 7, "Seismic Safety Retrofit," and LPP 97-02, "HBRR Revision Highway Bridge Replacement and Rehabilitation Procedures and Guidelines."

Effective Date: December 20, 2001 Approved: ***Original Signed By***

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User-Friendly Features:

- This Local Program Procedures (LPP) replaces Chapters 1, 4, and 7 of the *Local Assistance Program Guidelines* (LAPG) in their entirety.

These new procedures are incorporated in the electronic version of the LAPG that is available at the Division of Local Assistance Home Page at www.dot.ca.gov/hq/LocalPrograms/. Once there, click on "Publications" and then click on "Local Assistance Manuals."

PURPOSE

The purpose of this LPP is to disseminate revisions to the LAPG contained in Chapter 1, "Introduction/Overview," Chapter 4, "Surface Transportation Program (STP)," and Chapter 7, "Seismic Safety Retrofit."

BACKGROUND

Chapter 1 provides an overview of the entire LAPG including the roles of local and regional agencies as well as an introduction to various federal programs and state programs.

Chapter 4 covers the STP including such items as eligibility criteria, funding, and project implementation.

Chapter 7 explains 1) project eligibility for mandatory seismic retrofit funds and 2) the roles and responsibilities under the mandatory seismic retrofit program. Previous Seismic Safety Retrofit Program Guidelines were published in 1997 under the Intermodal Surface Transportation Act (ISTEA). Under the more recent Transportation Equity Act for the 21st Century (TEA-21),

Highway Bridge Replacement and Rehabilitation Program funds available to the State of California have been substantially increased.

SUMMARY OF CHANGES

Revisions in Chapters 1 and 4 focus on guidance that reflects current legislative requirements contained in TEA-21.

Changes in Chapter 7 contain new guidelines to clarify 1) how projects with different scopes can be funded and 2) the roles and responsibility of lead agencies and local agencies while ensuring that the State of California is properly administering this program. Specific changes in Chapter 7 are outlined below.

1) The previous guidelines did not provide guidance to deal with different project scopes. The new guidelines provide the basis for making proper funding decisions on local agency projects when combining seismic retrofit projects with other local agency projects.

2) Over the last few years, some local agencies have expressed their desire to retrofit their bridges to a higher than the no-collapse retrofit standard. The new guidelines clarify that local agencies will be responsible for any cost above and beyond that of the no-collapse retrofit.

3) The guidelines have been expanded to provide a more thorough explanation of the roles and responsibilities of lead agencies and local agencies.

4) The guidelines have been expanded to provide guidance on programming new projects under the mandatory seismic retrofit program.

TRANSITION TO IMPLEMENTING NEW GUIDELINES

These new guidelines are effective immediately. With regard to Chapter 7, local agencies that currently have projects under the mandatory seismic retrofit program should ensure that their projects are in compliance with these guidelines. Local agencies that have any questions about these new guidelines should contact their District Local Assistance Engineer (DLAE).

CHAPTER 1 INTRODUCTION/OVERVIEW

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CHAPTER 1 INTRODUCTION/OVERVIEW

1.1 PURPOSE

The purpose of this Program Guidelines manual is to provide local project sponsors with a complete description of the federal and state programs available for financing local public transportation related facilities. Each program is discussed in detail and addresses such topics as: project eligibility, project selection process, funding levels, key decision makers, significant dates, relevant statutory references and related publications.

With the 1997 state enactment of Senate Bill 45 (SB 45) and the enactment of the 1998 federal "Transportation Equity Act for the 21st Century" (TEA-21), new programs and increased funding levels have become available for local transportation projects.

Exhibit 1-A illustrates the various federal and state programs available for financing local transportation projects and the typical annual funding level for each of the programs. Note that state program funding levels are subject to inclusion in the annual state budget approved by the Governor.

Exhibit 1-B lists the various federal and state programs available for financing local transportation projects and includes a brief discussion of the programs and the eligible uses of the funds.

1.2 BACKGROUND

On September 12, 1997, the Governor signed SB 45, making substantial changes in the State's transportation programming process.

SB 45 was enacted with the following basic objectives:

(SB 45 amended, added, and repealed sections 14523-55 and 65071-86 of the Governmental Code, 99310-18 of the Public Utilities Code, and 163-7, 188, 199 and 2600-02 of the Streets and Highways Code.)

1. Preserve the basic planning and programming process, avoid legislative budgeting of projects, while changing the State Transportation Improvement Program (STIP) from a project delivery document to a resource management document.
2. Transfer transportation decision-making responsibility to those who are closest to the problem.
3. Eliminate artificial constraints and barriers to programming.
4. Place state highways, local roads and transit projects on equal footing for access to support costs.
5. Recognize the Caltrans role as owner-operator of the State Highway System, while removing Caltrans from lead responsibility for resolving urban congestion problems created largely by local decisions.
6. Provide incentives for regional accountability for the timely use of funds.
7. Retain the California Transportation Commission (CTC) role as guardian of state capital dollars, with responsibility for determining how best to manage those dollars in a wise and cost-effective manner.

On June 9, 1998, the President signed TEA-21 authorizing highway, highway safety, and other surface transportation programs for the next six years which significantly increased federal funding authorizations for state and local highways, and mass transportation. Federal funds allocated to California and available for state, local, and mass transportation projects have increased to approximately $2.5 billion annually.

The types of projects and activities now eligible for federal funding provide state and local governments with unprecedented flexibility in developing a mix of highway, transit and other alternatives to address statewide, regional and local transportation needs.

The Commission intends to carry out these objectives through its guidelines, stressing accountability and flexibility.

1.3 ROLES OF THE LOCAL AND REGIONAL AGENCIES

Cities, counties, Metropolitan Planning Organizations (MPOs), Regional Transportation Planning Agencies (RTPAs), and other authorities work independently as well as with Caltrans in the development of long and short range improvement plans. The role of local communities in the design of transportation improvement programs and selection of projects has continued to expand through the enactment of ISTEA, TEA-21, and SB 45. Transportation planning begins at the city and county level with the inclusion in their "General Plan" of a transportation (circulation) element. The key in local decisions is land use issues. The transportation elements developed in a local General Plan are incorporated along with air, water, congestion and environmental concerns into planning and programming documents developed by RTPAs and Metropolitan Planning Organizations (MPOs). Exhibit 1-C, MPO RTPA Map," is a map showing the location of MPOs and RTPAs in the state.

Transportation planning begins at the city and county level with the inclusion of a transportation element in a local "General Plan." The transportation elements developed in a General Plan are incorporated along with other concerns into planning and programming documents that RTPAs and MPOs develop.

Various local agency specialty plans (e.g. air, water, land use, and congestion) influence and are incorporated (as needed) into the Regional Transportation Plan (RTP). An RTP is a 20 year transportation plan that describes policies, strategies, and needs. An RTP presents the local area's vision for local multimodal transportation systems. RTPs are required by state and federal law. Caltrans cooperates in the development of the regional documents by providing expertise and information. RTPs must be consistent with FHWA and FTA planning regulations. These regulations impose conditions for receiving federal-aid funds that require each urbanized area to have a continuing, comprehensive and coordinated transportation planning process that results in RTPs and Federal Transportation Improvement Programs consistent with planned development of the area.

Key documents in transportation planning and programming are defined below. Also shown are an outline of roles and a flowchart overview of the planning and programming process. For more details, go to the Transportation Programming website at: www.dot.ca.gov/hq/transprog/.

RTIP: The Regional Transportation Improvement Program (RTIP) is the RTPA's share of the state STIP and must be consistent with the RTP. Updated every two years, the RTIP is a five-year program identifying projects based on funding availability from the STIP fund estimate. Upon adoption by the RTPA, the RTIP is submitted to Caltrans for approval and incorporation into the STIP.

STIP: The State Transportation Improvement Program (STIP) is a five-year capital improvement program of transportation projects, on and off the State Highway System, funded with revenues from the State Highway Account as well as other funding sources.

FTIP: Each of California's 16 MPOs prepares a Federal Transportation Improvement Program (FTIP) that includes a three-year priority list of highway and transit projects that are federally funded or are of regional significance. FTIPs also include federally funded capital improvements to the regions' transit systems along with associated federal operating assistance programs.

FSTIP: Prepared by Caltrans in cooperation with the MPOs and RTPAs, the Federal Statewide Transportation Improvement Program (FSTIP) is a three-year statewide intermodal transportation program that contains all projects in California that are federally funded or regionally significant.

Local — Cities, Counties & Other Agencies:

- Cities and counties set land-use policy and nominate transportation projects for funding by the RTPA.
- Transit agencies, such as Bay Area Rapid Transit (BART) and Los Angeles County Metropolitan Transportation Agency (LACMTA), nominate projects for funding and deliver transportation services and improvements.
- Environmental agencies at the local, state, and federal level review transportation projects and issue permits to ensure transportation improvements comply with environmental law.

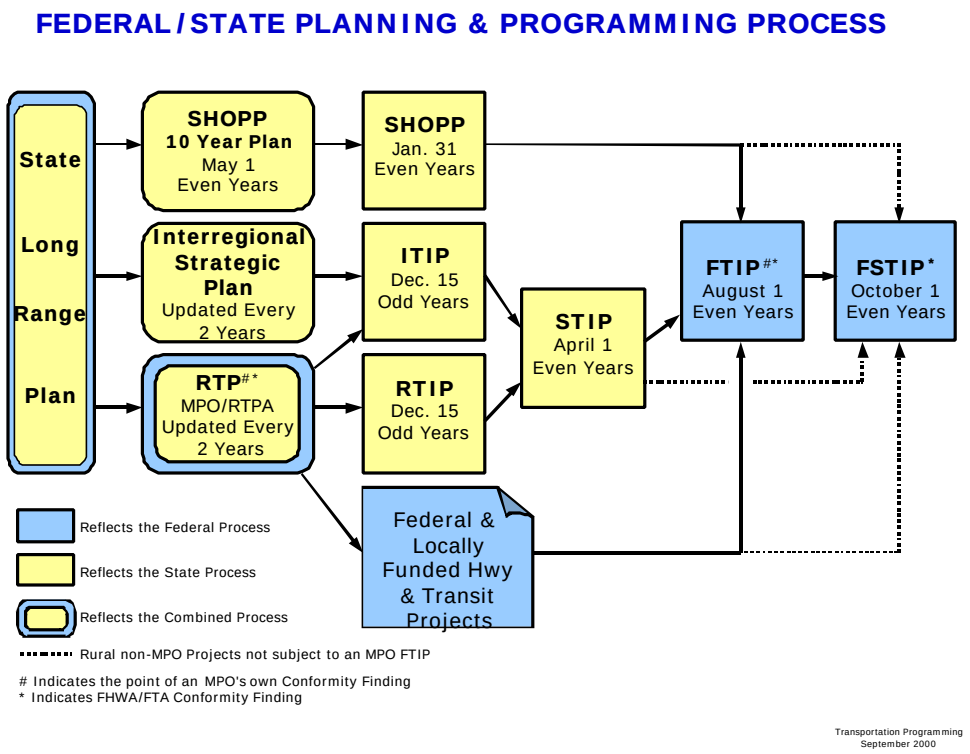
Regional — Metropolitan Planning Organization (MPO)

- Currently there are 16 MPOs in California.
- Prepares the 20-year Regional Transportation Plan and selects projects.
- The Governor designates an MPO in every urbanized area with a population over 50,000.
- Federally required planning bodies; typically the same as an urban region's RTPA.

Regional — Regional Transportation Planning Agency (RTPA)

- Includes 43 agencies formed by special legislation, council/association of governments, and local transportation commissions.
- Administers state funds and allocates federal and local funds to projects.
- Selects projects for the Regional Transportation Improvement Program (RTIP) in the STIP.

Process Flowchart



For more information, go to the Transportation Programming website at: www.dot.ca.gov/hq/transprog/.

1.4 FEDERAL PROGRAMS

The three major funding categories for local assistance projects are: the National Highway System (NHS), the Surface Transportation Program (STP) and the Congestion Mitigation and Air Quality Improvement Program (CMAQ).

NHS funds, typically restricted to projects located on the NHS, are programmed for local projects through the STIP. See Exhibit 3-A, "California Local Routes on the National Highway System" in this manual for a complete listing of local routes on the NHS.

STP funds may be used on any public road except those functionally classified as local roads or minor collectors. These roads are collectively referred to as federal-aid roads (or highways). The exception to the functional classification criteria is that bridge, safety, carpool related, and bicycle/pedestrian projects may be located on any road. TEA-21 allows a portion of the STP funds for rural areas to be used on rural minor collectors (see Chapter 4, "STP," in this manual).

The CMAQ program provides a flexible funding source for transportation projects and programs that help meet the requirements of the Clean Air Act. Eligible activities include transit improvements, travel demand management strategies, traffic flow improvements, and fleet conversions to cleaner fuels, among others. Funding is available for areas that do not meet the National Ambient Air Quality Standards (nonattainment area), as well as former nonattainment areas that are now in compliance (maintenance areas) (see Chapter 5, "CMAQ," in this manual).

Other funding categories for local assistance projects are described below.

The Highway Bridge Replacement and Rehabilitation (HBRR) program provides federal funds for bridge work on and off federal-aid highways. The purpose of this program is to help fund major reconstruction and replacement bridge projects (see Chapter 6, "HBRR," in this manual).

Ten percent of the STP apportionment authorized by TEA-21 is reserved for Safety Programs: Hazard Elimination Safety (HES) and Railroad-Highway Crossing Improvements (see Chapter 9, "HES," Chapter 10, "Railroad Crossing Improvements," and Chapter 24, "Safe Routes to School Program" in this manual).

Another ten percent of the STP apportionment is reserved for Transportation Enhancement Activities (TEA). This reservation is used for projects directly related to surface transportation that are over and above normal and mitigation work, and are within the twelve categories in federal statute (see Chapter 8, "TEA," in this manual).

Emergency Relief funds are used for the reconstruction of roads, streets, and bridges on federal-aid highways that are damaged by floods, earthquakes, hurricanes or other catastrophes. These funds become available when the damage is extensive and an emergency is formally declared by the Governor and approved by the Federal Highway Administration (FHWA) (see Chapter 11, "Disaster Assistance," in this manual).

Minor federal programs, including the Public Lands Highways, Scenic Byways, Defense Access Roads, High Priority Projects (name changed under TEA-21 from Demonstration projects) and Discretionary Bridge programs are discussed in Chapter 12, "Other Federal Programs," in this manual.

1.5 STATE PROGRAMS

SB 45 terminated three state funded local assistance programs:

- State & Local Transportation Partnership Program (SLTPP or Partnership Program)
- Flexible Congestion Relief (FCR)
- Traffic System Management Program (TSM)

State funds that were available for local agencies under SLTPP, FCR and TSM are now available for local agencies under the STIP program. Also, old state STIP funds and new TEA-21 funds allocated to the state are available for local agencies. Locally sponsored transportation projects receiving STIP funding may receive either state funds, or federal funds with a state funded match.

Article XIX of the California Constitution permits the use of state revenues in the State Highway Account (SHA) only for state highways, local roads and fixed guideway facilities. This means, for example, that rail rolling stock and buses may be funded only from the federal revenues in the SHA. For such projects, the non-federal match will have to be provided from a non-STIP source (see Chapter 23, "Local Agency STIP Projects" in this manual).

Other state programs available for locally sponsored transportation projects include:

- Optional Exchange and State Match Program
- Highway-Railroad Grade Separation Program
- Environmental Enhancement and Mitigation Program
- Bicycle Transportation Account
- Proposition 116 Improvements
- Petroleum Violation Escrow Account

The Optional Exchange program provides for qualifying RTPAs and counties to exchange their annual apportionment of Regional Surface Transportation Program (RSTP) funds and regional Transportation Enhancement Activities (TEA) funds for state cash. The State Match program provides state funds to match federal RSTP funds. Exchange and Match funds are not tied to federal requirements, but instead must comply with Article XIX of the State Constitution (see Chapter 8, "Transportation Enhancement Activities" and Chapter 18, "Optional Federal Exchange and State Match Programs," in this manual).

The Grade Separation Program provides state funds for the: 1) construction, reconstruction and alteration of grade separations to eliminate proposed or existing grade crossings, and 2) the removal or relocation of highways or railroad tracks to eliminate grade crossings (see Chapter 19, "Grade Separation," in this manual).

The Environmental Enhancement and Mitigation (EEM) program provides state funds for the transportation project to mitigate the environmental impacts of new or modified public transportation projects above and beyond that required by the environmental document (see Chapter 20, "EEM," in this manual).

The Bicycle Transportation Account (BTA) provides funds to cities and counties for projects that improve safety and convenience for bicycle commuters (see Chapter 21, "Bicycle Transportation Account," in this manual).

The Petroleum Violation Escrow Account (PVEA) provides funds for projects which save or reduce energy (see Chapter 22, "Other State Programs," of this manual).

The Safe Routes to Schools (SR2S) program provides funds to local governmental agencies based on the results of a statewide competition that requires submission of proposals for funding and rates those proposals on all of the following factors:

1. Demonstrated needs of the applicant.
2. Potential of the proposal for reducing child injuries and fatalities.
3. Potential of the proposal for encouraging increased walking and bicycling among students.
4. Identification of safety hazards.
5. Identification of current and potential walking and bicycling routes to school.
6. Consultation and support for projects by school-based associations, local traffic engineers, local elected officials, law enforcement agencies, and school officials."

(See Chapter 24, “Safe Routes to School Program,” of this manual.)

For further information about both federal and state programs contact the District Local Assistance Engineer (DLAE) for your area shown in Exhibit 1-D.

1.6 REFERENCES

- “A Summary – Transportation Equity Act for the 21st Century” Publication No. FHWA-PL-98-038, HPP-20/8-98(15M)E.
- California Transportation Commission – “1998 STIP Interim Guidelines,” Amended (September 29, 1999) CTC Resolution G-99-03
- “Statutes Relating to the Programming and Funding of Transportation Projects,” 1999, State of California, Department of Transportation, Division of Transportation Programming

EXHIBIT 1-A STATE & FEDERAL PROGRAMS AVAILABLE FOR LOCAL TRANSPORTATION PROJECTS

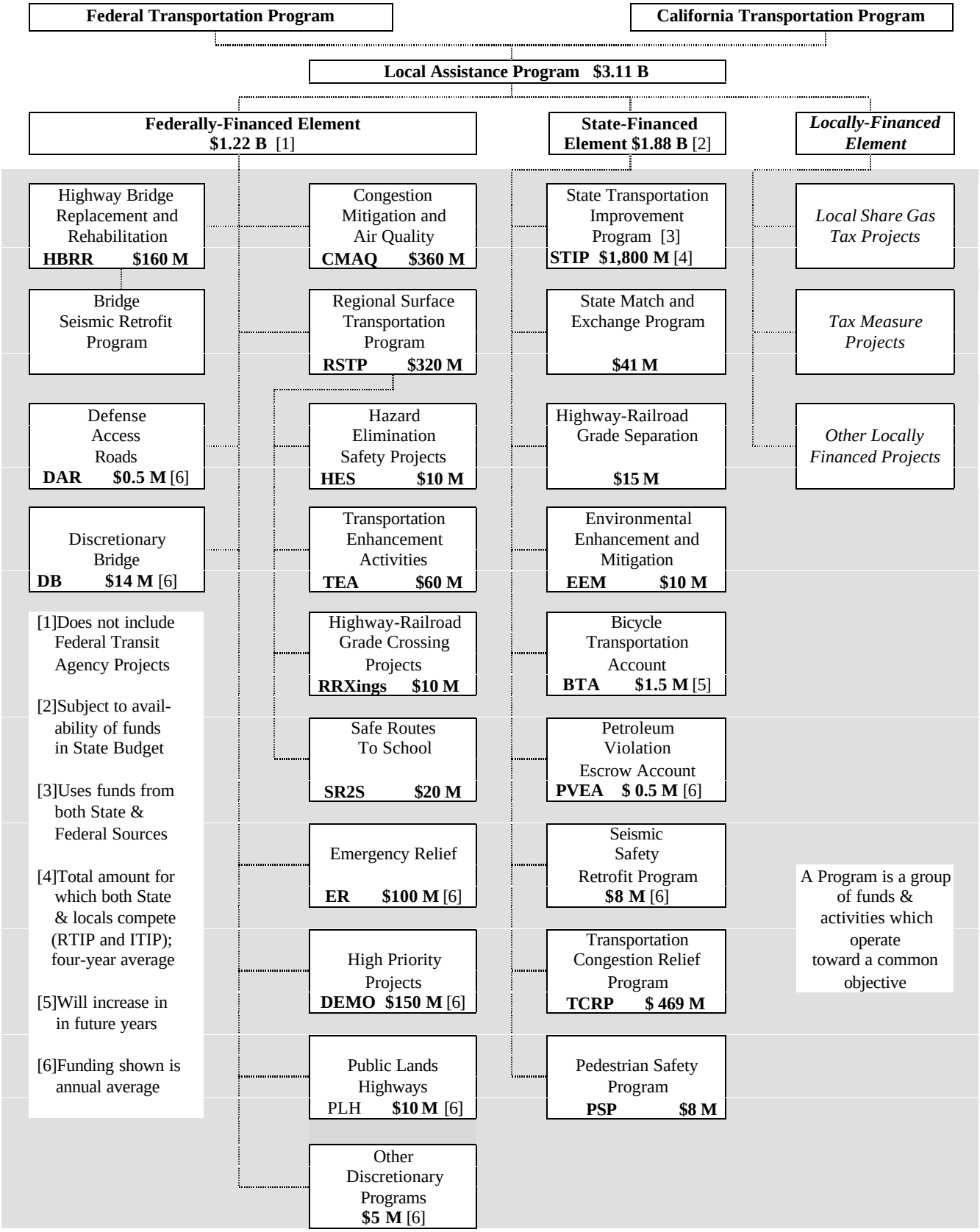


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EXHIBIT 1-B LOCAL ASSISTANCE PROGRAMS

Chapter	Program	Eligible Uses of Funds
4	Surface Transportation Program (STP)	Broad variety of transit and highway (includes streets and roads) projects
5	Congestion Mitigation and Air Quality (CMAQ)	Projects which contribute towards attainment of Clean Air Act requirements
6	Highway Bridge Replacement & Rehabilitation (HBRR)	Bridge replacement, rehabilitation, painting, and bridge rail replacement
7	Seismic Safety Retrofit	Remedy structural seismic design deficiencies of public bridges
8	Transportation Enhancement Activities (TEA)	Projects that enhance quality-of-life, in or around transportation facilities
9	Hazard Elimination Safety (HES)	Safety improvement projects on all public roadways
10	Railroad/Highway At-Grade Crossing	Eliminating hazards to vehicles and pedestrians at existing railroad crossings
11	Disaster Assistance (Emergency Relief)	Repair and restoration of damaged transportation facilities after a disaster
12.1	High Priority Projects	Projects initiated by Congress at the request of constituents
12.2	Public Lands Highways (PLH)	Projects that are within, adjacent to, or provide access to public land
12.3	Scenic Byways	Planning and enhancement funds provided for scenic byways
12.4	Discretionary Bridge	Program on hold - recommend using HBRR funds
12.5	Defense Access Roads (DAR)	Federal government program to mitigate defense installations and activities
14	Flexible Congestion Relief (FCR)	No new funding is available through this program
15	State/Local Transportation Partnership Program (STLPP)	No new funding is available through this program
16	Traffic Systems Management (TSM)	No new funding is available through this program
17	TSM Match	No new funding is available through this program
18	Optional Federal Exchange and State Match Programs	Exchanging local STP & TEA funds for state $ & providing state $ to locals
19	Grade Separation	Eliminating highway-rail crossing at grade with a grade separation
20	Environmental Enhancement and Mitigation (EEM)	Mitigate the environmental impacts of new or modified transportation facilities
21	Bicycle Transportation Account (BTA)	For bicycle bikeways and related facilities, planning, safety and education
22.1	Petroleum Violation Escrow Account (PVEA)	Projects that save or reduce energy
23	State Transportation Improvement Program (STIP)	Any transportation project that is approved by the RTPAs/MPOs and accepted by the CTC
24	Safe Routes to School (SR2S)	Pedestrian/bicycle school safety projects on all roadways
25	Traffic Congestion Relief Plan (TCRP)	Projects that relieve congestion, provide for the safe and efficient movement of goods, and provide inter-modal connectivity of transportation systems throughout California

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EXHIBIT 1-C MPO AND RTPA MAP

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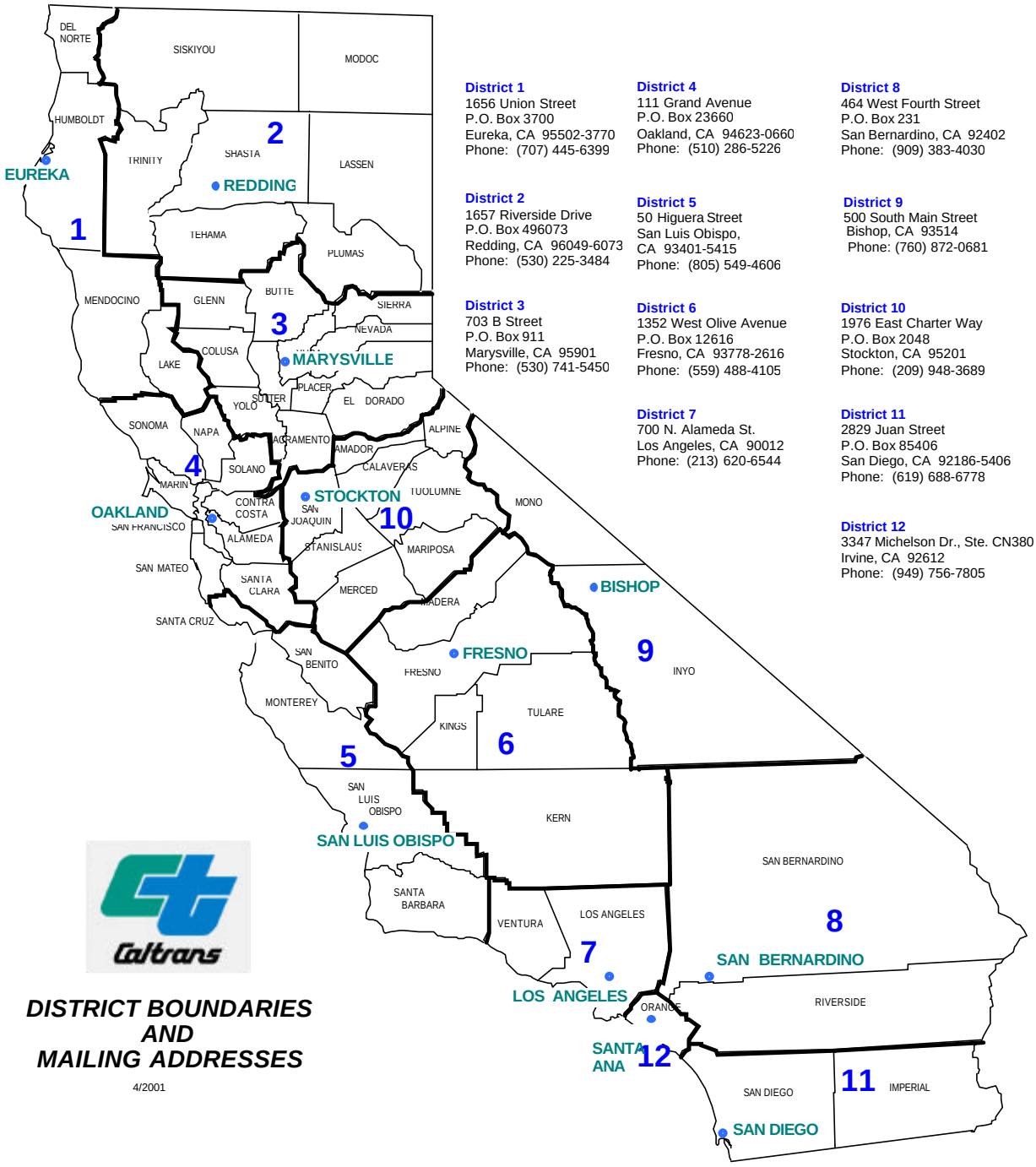
EXHIBIT 1-D DISTRICT LOCAL ASSISTANCE OFFICES



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CHAPTER 4 SURFACE TRANSPORTATION PROGRAM (STP)

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CHAPTER 4 SURFACE TRANSPORTATION PROGRAM (STP)

4.1 INTRODUCTION

The Surface Transportation Program (STP) was established by the 1991 Federal Intermodal Surface Transportation Efficiency Act (ISTEA) and continued with the passage of the Transportation Equity Act for the 21st Century (TEA-21) and the TEA-21 Restoration Act in 1998. Both new Acts are jointly referred to as TEA-21. Funds are directed to projects and programs for a broad variety of transit and highway work (including work done to streets and roads).

4.2 ELIGIBILITY CRITERIA

GENERAL

Eligible projects may be located on:

- Any federal-aid highway, including the National Highway System. (A portion of the funds reserved for rural areas may be spent on rural minor collectors for fiscal years 1998 through 2003.)
- Bridges on any public highway.
- Transit capitol projects, and intra-city/inter-city bus terminals and facilities.

Generally, the projects must be transportation projects or programs which are:

- Consistent with Title 23 United States Code (USC) and/or Title 49 USC.
- Derived from the Regional Transportation Plan (RTP), included in a Federal Transportation Improvement Program (FTIP) and/or Federal Statewide Transportation Improvement Program (FSTIP) and consistent with the conformity determinations of the Clean Air Act and its amendments.

PROJECT TYPES

Eligible project types (Title 23 USC, Chapter 1, Section 133) include:

- Construction, reconstruction, rehabilitation, resurfacing, restoration and operational improvements for highway and bridge projects, including bridge seismic retrofit, painting and application of calcium magnesium acetate, sodium acetate/formate, or other environmentally acceptable, minimally corrosive anti-icing and de-icing compositions. Also included are the necessary engineering, right-of-way and environmental mitigation for these activities.
- Transit capital projects under Chapter 53 of 49 USC including vehicles and facilities, whether publicly or privately owned, that are used to provide inter-city passenger service by bus.
- Carpool projects, fringe and corridor parking facilities, bicycle facilities and non-construction projects, pedestrian walkways, and modification of public sidewalks to comply with the Americans with Disabilities Act of 1990 (42 USC 12101 et seq.).
- Highway and transit safety infrastructure projects, hazard eliminations, projects to mitigate hazards caused by wildlife, and railway-highway grade crossing elimination or improvement.

- Highway and transit research and development and technology transfer programs.
- Capital and operating costs for traffic monitoring, management and control facilities and programs.
- Surface transportation planning programs.
- Transportation enhancement activities.
- Transportation control measures listed in Section 108(f)(1)(A) of the Clean Air Act excluding clause (xvi).
- Development and establishment of management systems under Title 23 USC, section 303.
- Wetlands mitigation and natural habitat efforts related to projects funded under Title 23 USC.
- Capital improvements for infrastructure-based intelligent transportation systems.
- Environmental restoration and pollution abatement projects, including retrofit or construction of stormwater treatment facilities (limited to 20% of the total cost of reconstruction, rehabilitation, resurfacing, or restoration projects).

PREVENTIVE MAINTENANCE

Section 119 of Title 23, United States Code, was amended by ISTEA and continued by TEA-21 to provide specific federal-aid fund eligibility for preventive maintenance on Interstate highways. Subsequent clarifications by the California Division Administrator for the FHWA extended federal-aid fund eligibility for preventive maintenance on other federal-aid highways.

Preventive maintenance projects may be advanced without including safety or geometric enhancements, but with the understanding that appropriate AASHTO safety and geometric enhancements will be an integral part of future reconstruction, rehabilitation, resurfacing, or restoration projects. Preventive maintenance includes, but is not limited to, roadway activities such as joint and shoulder rehabilitation, heater re-mix, seal coats, corrective grinding of PCC pavement, and restoration of drainage systems. These activities are eligible for federal-aid participation provided:

- The local agency certifies that it has a Pavement Management System (PMS). This certification is to be completed biennially, with a copy attached to the Field Review Form for all Preventive Maintenance Projects (see Exhibit 4-A, “Pavement Management System Certification”).

- The decision process used by the city or county to determine project strategies was based on the established PMS.

  Items to be covered and noted in the Field Review. See Chapter 7, “Field Review” in the *Local Assistance Procedures Manual* (LAPM).

- The PMS determined the project strategy to be cost effective and have a service life of five years or more.

  Items to be covered and noted in the Field Review. See Chapter 7, “Field Review” in the LAPM.

- The project is not for spot application. Spot application projects are considered to be normal maintenance and therefore not eligible.

- The preventive maintenance project does not degrade any existing safety or geometric aspects of the facility.

- All federal-aid requirements shall apply.

- Funding for each project shall be required to be in an approved Federal Statewide Transportation Improvement Program (FSTIP). (It is recommended that preventive maintenance projects be programmed on a lump sum basis for the program and not as individual projects.)

  Items to be covered and noted in the Field Review. See Chapter 7, "Field Review" in the LAPM.

4.3 FUNDING

California received $656 million dollars for the Federal Fiscal Year of 2000/2001 (October 1, 2000 to September 30, 2001) in total STP apportionments under the 1998 TEA-21 provisions. Funds are apportioned on a pro-rata percentage of federal-aid highway lane-miles, vehicle-miles traveled on lanes on federal-aid highways, and tax payments attributable to highway users. FHWA may impose annual penalties when the state does not comply with specific provisions of federal law. Certain deductions for administrative purposes, set-asides, and transfers may adjust the amount available for apportionment.

STP SAFETY PROGRAMS

Ten percent of the STP apportionment authorized by TEA-21 is reserved for safety programs defined by Sections 130 (railroad-highway crossing improvements) and 152 (hazard elimination projects) of the Act (see Chapter 9, "Hazard Elimination Safety," and Chapter 10, "Railroad/Highway At-Grade Crossing," in this manual).

STP TRANSPORTATION ENHANCEMENT ACTIVITIES (TEA)

Another 10 percent of the STP apportionment is reserved for Transportation Enhancement Activities. This reserved apportionment is used for a variety of special projects which serve to enhance or enlarge the function or purpose beyond that normally required for transportation service or environmental mitigation requirement (see Chapter 8, "Transportation Enhancement Activities" of this manual).

REGIONAL STP

Federal statute divides the remaining 80 percent of the STP apportionment among the urbanized and non-urbanized areas. Of this amount, 62.5 percent (50 percent of the total) must be divided among the urbanized areas (areas with populations over 200,000) and remaining areas of the state, normally on a population basis, and 37.5 percent (30 percent of the total) may be used in any area.

State law (Streets and Highway Code, Section 182.6) defines certain STP funds allocated within the state as Regional STP (RSTP). State law further defines how these funds are apportioned to the Metropolitan Planning Organizations (MPOs) by the state. Further apportionment is made by the MPOs to the County Transportation Commissions. Where there is no MPO, the apportionment goes to the Regional Transportation Planning Agency (RTPA).

For the Federal Fiscal Year of 2000/2001, the amount apportioned for distribution to the MPOs, RTPAs, and County Transportation Commissions is $318 million.

4.4 PROJECT SELECTION

The agencies receiving RSTP apportionments (i.e., MPOs, RTPAs, and County Transportation Commissions), in cooperation with Caltrans, cities, counties, and transit operators, develop a program of projects for entry into the FTIP/FSTIP. Each MPO or RTPA provides application rules for project listings in their local jurisdictions. Each regional FTIP is subsequently incorporated into the FSTIP, which also includes the projects for areas of the state not covered by MPOs.

4.5 PROJECT IMPLEMENTATION

Upon selection for funding through FTIP/FSTIP, project costs can become eligible for federal reimbursement through the FHWA authorization and obligation process. Requests to initiate project work must be processed through the District Local Assistance Office. Expenses incurred prior to authorization are not eligible for reimbursement. (See Chapter 3, “Project Authorization,” in the LAPM.)

Under TEA-21, the federal share for most California STP projects is 88.53 percent. Safety projects are eligible for 90 or 100 percent federal share (see Chapter 9, “Hazard Elimination Safety,” and Chapter 10, “Railroad/Highway At-Grade Crossing,” of this manual).

4.6 FEDERAL TRANSIT ADMINISTRATION (FTA) TRANSFERS

Under ISTEA and TEA-21, funds traditionally used for highway projects can be transferred to the FTA for use on transit projects (Title 23 USC, section 134). The funds transferred are primarily used to acquire buses, vans, and light rail trains, as well as for operations in the first three years of a transit system’s operations.

The transfer process begins when a transit operator determines that funding is needed for a specific project, such as acquiring a bus, rehabilitating vans, or constructing a transit facility. Next, the transit operator makes a grant application to FTA. Once the number is received from FTA, the transit operator submits the necessary documentation to the Caltrans District Local Assistance Engineer (DLAE). At this point, the project identified for funding should be included on the FTIP/FSTIP.

The DLAE then forwards the FTA transfer request to the Division of Local Assistance. Upon receiving a request, the Division of Local Assistance assures that adequate funding

and obligational authority is available. Afterward, the Division of Local Assistance submits a letter to FHWA that 1) identifies the project and 2) asks FHWA to transfer the funds, thereby reducing the apportionment for the region. When FHWA Headquarters Office of Budget and Finance completes the necessary documents, FHWA then transfers funds to FTA.[1]

For additional information, please refer to Chapter 3, "Project Authorization," of the LAPM.

4.7 RSTP/STATE FUNDS EXCHANGE

Non-MPO RTPAs may exchange their RSTP funding for State Highway Account funds. Counties represented by MPOs may exchange their guaranteed share of these funds provided that the amount is less than 1 percent of the total statewide apportionment or in excess of 3.5 percent total statewide apportionment by formula (see Chapter 18, "Exchange/Match Program," of this manual).

4.8 "USE IT OR LOSE IT" PROVISIONS OF ASSEMBLY BILL 1012

Assembly Bill 1012 (AB 1012) was enacted in October 1999 with a goal of improving the delivery of transportation projects. The legislation states that regional agency RSTP and Congestion Mitigation and Air Quality Improvement (CMAQ) funds that are not obligated within the first three years of federal eligibility are subject to reprogramming by the California Transportation Commission (CTC) in the fourth year.

Caltrans will apply the same policy to the Regional Transportation Enhancement Activities (TEA) program; although, the statutes do not specify that the Regional TEA program is subject to the same timely use of funds provisions. This treatment of Regional TEA funds is consistent with the CTC policy that states Regional TEA funds will be apportioned and managed in a manner similar to RSTP funds.

The roles and responsibilities for the timely use of funds are delineated in statute and are shared by regional agencies, Caltrans, and the CTC.

- Regional agencies are responsible for: 1) obligating the funds within the three-year time period, and 2) developing a plan for these funds that remain unobligated in the third year.
- Caltrans is responsible for monitoring and reporting unobligated balances.
- The CTC is responsible for reprogramming the unobligated balances to ensure no federal lapse occurs.

[1] Once transferred to FTA, the funds cannot be returned to FHWA.

Regional agencies must submit a formal obligation plan for any CMAQ, RSTP, or Regional TEA balance older than 2-years old to the DLAE by April 15 of each year. The plan must be tied back to the FTIP and provide a project identifier for each project.

Adequate time must be allowed in the plans for the required administrative processes in order to meet the federal funds cut off date of September 15. Therefore, regional agencies must submit all requests for obligation of funds to the Department district offices no later than August 15.

For information on policy and procedures necessary to implement the Timely Use of Funds provisions outlined in AB 1012, refer to the "Guidelines for Implementation of the Timely Use of Funds Provisions of AB 1012," found on the Local Assistance homepage at:www.dot.ca.gov/hq/LocalPrograms/.

4.9 REFERENCES

- Title 23 United States Code, Chapter 1, Sections 104, 133, 134,135,149, 152
- California Constitution, Article XIX
- Streets and Highways Code, Sections 182.4, 182.6
- "Guidelines for Matching Regional Surface Transportation and CMAQ Projects (August 4, 1993)," Division of Transportation Programming
- "A Guide to Federal-Aid Programs, Projects, and Other Uses of Highway Funds," Publication No. FHWA-PD-92-018, September 1992

LOCAL AGENCY LETTERHEAD

Date: _____

PAVEMENT MANAGEMENT SYSTEM CERTIFICATION

The City/County of _____ certifies that it has a Pavement Management System (PMS).

The system was developed by _____ and contains, as a minimum, the following elements from the attached federal requirements:

- Inventory of arterial and collector routes reviewed and updated biennially. The last update of the inventory was completed on _____, 20 ___ .
- Assessment of pavement condition for all routes in system incorporating the use of the international roughness index or the pavement serviceability rating data, updated biennially. The last review of pavement condition was completed on _____, 20 ___.
- History of pavement performance.
- Identification of all sections of pavement needing rehabilitation or replacement.
- Determination of budget needs for rehabilitation or replacement of deficient sections of pavement for current biennial period, and for following biennial period.
- Impact of budget decisions on future pavement condition.

(If PMS system was developed in-house, briefly describe it on an attached sheet.)

_____
Agency

_____
Signature

_____
Title

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CHAPTER 7 SEISMIC SAFETY RETROFIT

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CHAPTER 7 SEISMIC SAFETY RETROFIT

7.1 INTRODUCTION

The Seismic Safety Retrofit Program was established by emergency legislation (SB 36X) enacted during an extraordinary legislative session called after the October 17, 1989 Loma Prieta earthquake. The purpose of this program is to evaluate all publicly owned bridges in California and to take actions necessary to prevent their collapse due to earthquakes.

There are approximately 24,000 publicly owned bridges in California: 12,000 on state highways and 12,000 on or over local roadways. The local component of the Seismic Safety Retrofit Program provides funding and other assistance to cities and counties for evaluating bridges and constructing seismic retrofit projects.

The Director of Caltrans has set the mandated Seismic Safety Retrofit Program as a top priority.

7.2 PROGRAM FUNDING

The primary funding source for the local Seismic Safety Retrofit Program is the local share of the federal Highway Bridge Replacement and Rehabilitation (HBRR) funds, with State Highway Account (SHA) funds providing the required match.

Local bridge seismic retrofit projects developed under the mandatory Seismic Safety Retrofit Program (as defined below) are funded fully with a combination of federal and state funds. Eligible work items include consultant selection, seismic analysis leading to strategy selection, environmental, right-of-way, PS&E, construction, construction engineering and inspection. Local agency overhead costs for administering the projects are also eligible for reimbursement. Generally, there should be no cost to the local agency when developing retrofit projects as recommended by the strategy report (see Section 7.9, "Mandatory Strategy Meetings," under "Results," for details), with the exception of up-front progress payments prior to federal and state reimbursement.

There may be cases when a local agency chooses to expand the scope of a retrofit project to include other work such as rehabilitation, widening or bridge replacement. The local agency will be responsible for all costs in excess of the retrofit estimate, or the required local match for excess costs if the additional work qualifies for other federal funding (see Section 7.4, "Eligible Costs," of this chapter for details).

7.3 PROJECT ELIGIBILITY

This mandated Seismic Safety Retrofit Program is limited to those bridges that are determined to be Category 1, which is defined as bridges that might collapse in a seismic event.

SEISMIC SCREENING OF BRIDGES

At the outset of the local Seismic Safety Retrofit Program, all 12,000 local bridges were considered candidates for retrofitting. Caltrans has since performed a series of three technical screenings on these local bridges to determine if further seismic analysis would be needed. The screening processes utilized a seismic risk-ranking algorithm to assign a Ranking Factor to each of the bridges. Factors considered in these screenings included items such as traffic, bridge as-built information, and the nature of nearby faults. Bridges with Ranking Factors above a certain threshold were considered seismically vulnerable and were selected for inclusion in this mandatory program for further seismic analysis and potential retrofit.

RESULTS OF SEISMIC SCREENING

As of January 1, 2001 these screenings resulted in the following seismic safety findings:

BRIDGES	
10,165	Seismically safe: these bridges require no further analysis or retrofit.
631	Some seismic risk: these bridges have particular vulnerable details that warrant further examination when doing other work to the bridges.
1,204	Seismically vulnerable: these bridges require mandatory seismic analysis and retrofit if required by the analysis. Listing and current status of these bridges are available from the Seismic Safety Retrofit Program under "Program Information" of the Local Assistance website: www.dot.ca.gov/hq/LocalPrograms/

PROGRAMMING NEW PROJECTS

When a local agency has new information about a bridge that has not been retrofitted under this program, e.g., new seismic faults or soil conditions, that may change the Ranking Factor of the bridge or seismic analysis calculations, the local agency may request a new screening analysis of the bridge by Caltrans. If this new analysis results in a ranking above the level considered seismically vulnerable, the bridge will be added to the mandatory program. Local agencies should contact their Caltrans District Local Assistance Engineer (DLAE) for assistance.

Additional restrictions and deadlines on availability of matching funds from the State Highway Account on the mandatory retrofit projects may be imposed in the future as conditions change.

7.4 ELIGIBLE COSTS

All local agency costs which are directly attributable and/or properly allocatable to the specific Seismic Safety Retrofit project established by the strategy meeting (see Section 7.9), are eligible for reimbursement.

Appropriate PE costs, including Strategy, PS&E development and Consultant Oversight, are reimbursable according to Chapter 6, "HBRR Program," of this manual, Section 6.4.3, "Preliminary Engineering (PE) Costs."

To be reimbursed, local agencies are to follow the standard procedures outlined in the *Local Assistance Procedures Manual* (LAPM).

PROJECTS WITH DIFFERENT SCOPE

A local agency may decide to develop a construction project that is more extensive than that approved at the strategy meeting. For example, a local agency may choose to replace a bridge when the strategy meeting recommended retrofit. Agencies may also expand the retrofit project to design a higher performance standard than no-collapse, or to include bridge rehabilitation to address general bridge deficiencies. When these situations occur, the local agency is responsible for the extra cost beyond the program's committed funding towards the no-collapse retrofit project as recommended by the strategy. The program's funding commitment is the cost estimate included in the final strategy (approval) document. This funding commitment may be increased if additional cost items needed to complete the recommended project are identified by the local agency. Caltrans DLAEs, along with Headquarters Area Engineers and Seismic Retrofit Program Manager, will review these additional costs. Appropriate costs will be allowed and added to the total project cost.

If a bridge is on the HBRR eligible bridge list and the extra work qualifies for HBRR program funding, the extra cost may be partially (80%) covered by HBRR funds with local funding providing the match (20%).

7.5 ROLES AND RESPONSIBILITIES

DESIGNATION OF LEAD AGENCIES

The following three lead agencies were designated in accordance with the provisions of Section 179.3 of the Streets and Highways Code.

LOS ANGELES COUNTY was designated lead agency for local bridge retrofit projects in all the cities in Los Angeles County.

SANTA CLARA COUNTY was designated lead agency for local bridge retrofit projects located within the unincorporated portion of the county.

CALTRANS was designated lead agency for the remainder of local seismic retrofit projects throughout the state.

Total local Seismic Safety Retrofit Program = 1,204 Bridges (as of January 1, 2001).

Los Angeles County lead agency:	286 bridges
Santa Clara County lead agency:	36 bridges
Caltrans lead agency:	882 bridges

ROLES OF LEAD AGENCIES

The first responsibility of the lead agency was to inspect all publicly owned bridges within its jurisdiction to assess the need for analysis and potential retrofit work. This was completed in all areas through the seismic screenings performed by Caltrans.

The lead agency is responsible for making sure that a retrofit project is developed for each bridge that has been determined to require mandatory seismic analysis.

In addition to the above general lead agency responsibilities cited, Los Angeles County and Santa Clara County also took on the responsibility of actually developing seismic retrofit projects for bridges that fall under their jurisdiction.

ROLES OF LOCAL AGENCIES

For bridges where Caltrans was the designated lead agency, Caltrans offered to assist local agencies in performing seismic analysis and retrofit design. Most local agencies accepted this offer and Caltrans contracted out this work to consultants. These consultants have since completed all requested seismic analyses and structural retrofit design. All completed structure PS&Es have been delivered to local agencies. For these bridges, the responsibility of the bridge owning agency is to incorporate the retrofit design with environmental and other non-structural components of the project, to advertise and administer the construction contracts.

Those local agencies that are performing their own seismic analysis and design are responsible for developing seismic retrofit projects from start to finish. This includes, but is not limited to, initiating the projects, performing (or overseeing consultant performance of) seismic analyses, presenting the retrofit strategy to Caltrans at mandatory strategy meetings, ensuring environmental compliance, preparing PS&E, advertising and administering the construction contracts.

PROGRAMMING OF SEISMIC PROJECTS

All seismic retrofit projects must be included in the currently approved Federal Statewide Transportation Improvement Program (FSTIP) as an individual project or as part of a lump sum listing before federal funds can be authorized.

To expedite project delivery, Caltrans has instructed each Metropolitan Planning Organization (MPO) to include a blanket amount in their FTIPs for seismic and HBRR programs. In non-MPO areas, Caltrans has programmed these blanket amounts.

7.6 DESIGN STANDARDS

BASIC NO-COLLAPSE STANDARDS

The primary philosophy for the Seismic Safety Retrofit Program is to prevent bridge collapse. The result of a retrofit project should be a bridge that is safe from collapse in the event of a maximum credible earthquake. It is possible that the designer may demonstrate by analysis that a bridge will not collapse without any retrofit. In this case a “do nothing” strategy is an acceptable assessment. The designer must be cautioned to follow all load path demands and assure that no one portion of the resisting structural frame is deficient. “Bridge replacement” may also be an acceptable strategy when the existing bridge is in poor structural condition and the cost of retrofitting the bridge approaches or exceeds the cost of a new bridge with similar geometric configuration.

In addition to design standards and references in the LAPM Chapter 11, “Design Standards,” the following design standards and references are available to those involved in seismic design:

1. Caltrans Bridge Manuals:
   Bridge Design Manual –modified AASHTO specifications
   Bridge Memo to Designers
   Bridge Design Details
   Bridge Design Aids
   Bridge Memo To Designers 20-4, October 1995 – Earthquake Retrofit Guidelines for Bridges

2. *Seismic Design Criteria, Version 1.1* – Available from Caltrans, Division of Structures.

3. Other Related Publications: Various publications of design notes and research results from the University of California at Berkeley, San Diego and others. These publications are used extensively in current practice and enable the industry to keep up with the very latest research results. These research projects are listed in the *Bridge Memo To Designers 20-4.*

4. Computer Programs: Various computer programs have been developed by Caltrans' engineers. These programs will help ease the analysis and calculations required in retrofit analysis. They are available to consultants and local agencies involved in retrofit design.

Programs:	Beams304	Col604n	Col702r	Frame407
	Nfoot	Wframe	Xsection	

5. Caltrans Standard Special Provisions: The Division of Structures has Standard Special Provisions available on the Internet located in the Caltrans Engineering Service Center homepage at: www.dot.ca.gov/hq/esc/structurespecs/BRIDGE/.

References mentioned above are available through the Caltrans Structures Local Assistance Office.

HIGHER LEVEL PERFORMANCE RETROFIT STANDARDS

Some local agencies have expressed desire to retrofit their bridges to a service level performance standard. They would like to retrofit their bridges not only to withstand earthquakes but to suffer only minor damages that could be quickly repaired and allowing quick resumption of service. This would typically require extra or different retrofit measures that cost more than the standard no-collapse retrofit. Requests like this will be treated the same way as those projects with expanded scopes. The local agency will be responsible for any cost above and beyond that of the standard no-collapse retrofit.

METRIC

Either English or metric units may be used when the local agency, or their consultant, prepares the final PS&E package for bridge retrofit projects. However, English units must be used when Caltrans' consultants prepare the final PS&E package for seismic retrofit design. Regardless of the units used, both the bridge and roadway units must be the same (see Chapter 12, "Plans, Specifications and Estimate," of the LAPM for more information).

7.7 CONSULTANT SELECTION

Local agencies may retain the services of consultants to do all or part of the seismic design. Local agencies shall follow the consultant selection procedures in Chapter 10, "Consultant Selection," of the LAPM.

It is recommended that 10% of the funds authorized for preliminary engineering be retained for the design support during construction phase and the consultant contract be written so that the consultant will be able to answer questions about the design during construction and to assist on change orders.

7.8 MANDATORY FIELD REVIEWS

OBJECTIVES

Field reviews for seismic retrofit projects are mandatory. The objectives of field reviews for seismic retrofit projects are also different in several ways from typical local agency projects as outlined in Chapter 7, "Field Review," of the LAPM. The objectives of a seismic project field review are to:

- Begin to scope the project. (The project will not be fully scoped until after the strategy meeting.)
- Verify that the As-Built plans accurately represent the existing conditions.
- Check for modifications that would affect the seismic response of the structure.
- Dimension any members that are not accurately shown on the As-Built plans.
- If no As-Built plans are available, measure and dimension all pertinent structural members.
- Check for new conditions that would be affected by construction work.
- Discuss environmental considerations.

Important items to keep in mind for retrofit project field reviews include:

Access	Clearance	Coordination	Detour
Environmental	Falsework	Obstructions	Utilities
Modifications	Hydraulics	Permits	

WHO SHOULD ATTEND

Field reviews should be attended by:

- Consultants (if any)
- Local agency staff knowledgeable of utilities, right-of-way, environmental, traffic, etc.
- Caltrans Structures Local Assistance staff (if time and resources permit)
- Caltrans District Local Assistance staff (if time and resources permit)
- Caltrans District Environmental staff (if time and resources permit)

RESULTS

- The scope of the project is determined.
- The existing conditions are verified and any modifications documented.
- Construction controls are determined.
- Responsibilities are reviewed.

7.9 MANDATORY STRATEGY MEETINGS

OBJECTIVES

The objectives of the strategy meetings are to:

- Offer seismic designers support or alternative approaches.
- Determine that standard seismic retrofit details are being fully utilized.
- Establish alternative acceptable procedures to satisfy retrofits when unusual problems are encountered.
- Recommend alternative analysis when appropriate.
- Inform the project engineer of solutions to similar problems encountered by Caltrans, consultants, or other local agencies.
- Provide local agency personnel with information regarding potential traffic control, right-of-way, utility, and environmental problems.
- Achieve consensus agreement on economical and practical retrofit strategies.

WHO SHOULD ATTEND

The strategy meeting should be attended by:

- Design Consultants (Structural, Geotechnical, and Traffic if necessary)
- Local agency staff
- Caltrans Structures staff from:
  - Earthquake Engineering
  - Structures Design
  - Structures Construction
  - Structures Maintenance
  - Structural Foundations
- Structures Local Assistance Representative
- District Local Assistance Engineer

PREPARATION FOR THE MEETING

The designer or project engineer is expected to have performed the diagnostic analysis using the appropriate static and dynamic analysis, summarized the condition of columns, restrainers/hinges and abutments, and prepared a proposed solution prior to scheduling a strategy meeting. The designers should be prepared to discuss solutions considered and reasons for rejection of alternatives. At a minimum, a General Plan employing a legend of retrofit work and location of work, along with a table outlining the controlling design ductility ratios, should be presented. Additional tables and proposed details may also be necessary.

The local agency should be prepared to discuss the history of the bridge, environmental concerns, and any restrictions to construction such as traffic, right-of-way, etc.

MATERIALS REQUIRED FOR THE MEETING

The following materials are required for the Mandatory Strategy Meeting:

- Draft Strategy Report, including the General Plan, Sufficiency Rating from the Eligible Bridge List (see Chapter 6, "HBRR Program," of this manual), as-built plans, photographs, and an estimate of costs (capital and engineering). These materials (a minimum of 10 copies) should be submitted to the DLAE. The DLAE should forward the package to Structures Local Assistance Office in Sacramento two weeks prior to the scheduled strategy meeting.

- Any plans or reports pertinent to the proposed work (utility layout, right-of-way maps, etc.)

RESULTS

A general consensus regarding the acceptable analysis and retrofit approach should be reached by the strategy meeting attendees. Additional strategy meetings should not be necessary if all the information noted above is provided prior to and during the meeting. The conclusions reached should be outlined and summarized by the agency responsible for seismic design in "strategy meeting minutes" and documented in the Final Strategy Report. A copy of the minutes should be sent to all attendees. A copy of the Final Strategy Report will be kept on file in the Structures Local Assistance Office.

7.10 PROCESSING PROCEDURES WHEN CALTRANS IS THE LEAD AGENCY

Comprehensive processing procedures for developing local bridge retrofit projects under the Seismic Safety Retrofit Program are shown in Exhibit 7-A, "Seismic Safety Retrofit Program Flowchart" of this chapter. The following discussion is a summary of the procedural steps involved.

Blocks of projects are identified for each local agency for development based upon available funds and preliminary cost estimates. Project development activities vary somewhat depending upon which agency is responsible for seismic design. In general, structures are analyzed in priority order according to the rankings established by Caltrans' screening.

CALTRANS RESPONSIBLE FOR SEISMIC DESIGN

As of July 2001, Caltrans completed seismic analysis and structure design of all Seismic Safety Retrofit Program bridges for which it is responsible. Local agencies that requested Caltrans assistance should either have received or be expecting to receive the structure portion of the PS&E from Caltrans. Therefore, most agencies should be able to proceed directly to Step 12 of the following procedure, unless they have not requested authorization for preliminary engineering or not completed the necessary environmental documents:

1. Caltrans issues consultant task orders.

2. The local agency submits a "Request for Authorization" for the preliminary engineering phase (see Chapter 3, "Project Authorization" of the LAPM).
3. Caltrans issues an "Authorization to Proceed" to the local agency (see Chapter 3, "Project Authorization," of the LAPM).
4. Caltrans initiates the mandatory Field Review (see Section 7.8, "Mandatory Field Review" of this chapter).
   - The local agency that owns the bridge is required to attend.
   - Caltrans will give a minimum 2-week notification.
   - The local agency begins work on the Field Review form and Preliminary Environmental Study (PES) (see Chapter 6, "Environmental Procedures," of the LAPM).
5. Caltrans completes initial structural analysis after the Field Review.
6. The local agency finishes preliminary environmental investigations according to LAPM Chapter 6, "Environmental Procedures."
7. Caltrans holds a mandatory Strategy Meeting that determines which actions to take on the bridge.
8. The local agency completes a Field Review form after the Strategy Meeting.
9. The Division of Local Assistance (DLA) submits a Program Supplement for preliminary engineering to the local agency for execution.
10. The local agency completes environmental documents per previous discussions and meetings.
11. Caltrans completes the structural portion of PS&E and transmits it to the local agency.
12. The local agency completes the roadway portion of PS&E and combines it with the Caltrans PS&E portion. Caltrans will not review the combined PS&E. The local agency will certify the non-structural portion of the PS&E (see Chapter 12, "PS&E," of the LAPM).
13. The local agency submits a "Request for Authorization" for construction and constructs the project (see Chapter 3, "Project Authorization," of the LAPM).
    - "Authorization to Proceed" is required before the project is advertised.
    - DLA submits the Program Supplement for construction to the local agency for execution.
    - The Program Supplement must be executed before a local agency can be reimbursed (see Chapter 4, "Agreements," of the LAPM).
    - Caltrans will not provide oversight of the construction project; Caltrans will verify project completion.

LOCAL AGENCY RESPONSIBLE FOR SEISMIC DESIGN

Procedures are the same as when Caltrans is responsible for seismic design, except that:

1. The local agency submits a blanket "Request for Authorization" for preliminary engineering (see Chapter 3, "Project Authorization," of the LAPM).
   - Combines all bridges that the local agency will be responsible for into <u>one</u> "Request for Authorization."
   - Caltrans will verify that the project/funding is programmed in the FSTIP and the FSTIP has been approved by the FHWA.
2. Caltrans issues a blanket "Authorization to Proceed" and submits a Program Supplement for preliminary engineering to the local agency for execution.
3. If the local agency chooses to utilize consultants, see Section 7.7, "Consultant Selection" of this chapter.
4. The local agency initiates the mandatory Field Review.
   - Sends out notification of the Field Review 2-weeks prior with a complete listing of bridges to be reviewed to all appropriate people (see Section 7.8, "Mandatory Field Review," of this chapter).

- Caltrans District and Structures staff will attend if staff time allows.

5. The local agency completes the initial structural analysis and begins other preliminary studies (see Chapter 6, "Environmental Procedures," of the LAPM).
6. The local agency schedules a mandatory Strategy Meeting with Caltrans Structures.
   - The local agency will give a 2-week notification.
   - All meetings will be held in Sacramento.
   - All local agency travel costs are reimbursable.
   - See Section 7.9, "Mandatory Strategy Meeting," of this chapter.
7. The local agency completes the structures and roadway PS&E.
   - Caltrans Division of Structures will review 90% and 100% PS&E for concurrence with the strategy document.
   - The local agency certifies the completed PS&E package (see Chapter 12, "PS&E," of the LAPM).
8. The local agency submits a "Request for Authorization" for construction and constructs the project (see Chapter 3, "Project Authorization," of the LAPM).
   - "Authorization to Proceed" is required before the project is advertised.
   - DLA submits the Program Supplement for construction to the local agency for execution.
   - The Program Supplement must be executed before a local agency can be reimbursed (see Chapter 4, "Agreements," of the LAPM).
   - Caltrans will not provide oversight of the construction project; Caltrans will verify project completion.

7.11 COORDINATION OF SEISMIC AND HBRR PROJECTS

A number of seismic retrofit candidate bridges are also candidates for the HBRR Program (a program regarding the replacement or rehabilitation of bridges). For these bridges, a combination of seismic and HBRR funds may be used.

On bridges for which local agencies are responsible, the local agency should carefully review the eligible bridge list before beginning any seismic analysis of the bridge. In some cases, replacement or rehabilitation incorporating seismic considerations may be the best alternative.

On combined HBRR and seismic projects, the local agency should take the project to the strategy meeting to establish estimated capital costs for the seismic project. For capital cost of the combined project (right of way and construction), the state will provide the matching funds up to the estimated seismic retrofit cost established at the strategy meeting and the local agency will provide the matching funds to the cost in excess of the seismic cost. For support costs (preliminary engineering and construction engineering), the state and the local agency will be required to provide their proportional shares of the matching funds based on their estimated capital expenditure (established at strategy meeting).

7.12 REFERENCES

Most references are available either from the Division of Local Assistance website (www.dot.ca.gov/hq/LocalPrograms/) or the Division of Structures website (www.dot.ca.gov/hq/esc/).

Local Assistance Program Guidelines
Local Assistance Procedures Manual
Streets and Highways Code, Section 179.3
Bridge Design Manual –modified AASHTO specifications
Bridge Memo to Designers
Bridge Design Details
Bridge Design Aids
Bridge Memo to Designers 20-4, October 1995 – Earthquake Retrofit Guidelines for Bridges
Seismic Design Criteria, Version 1.1

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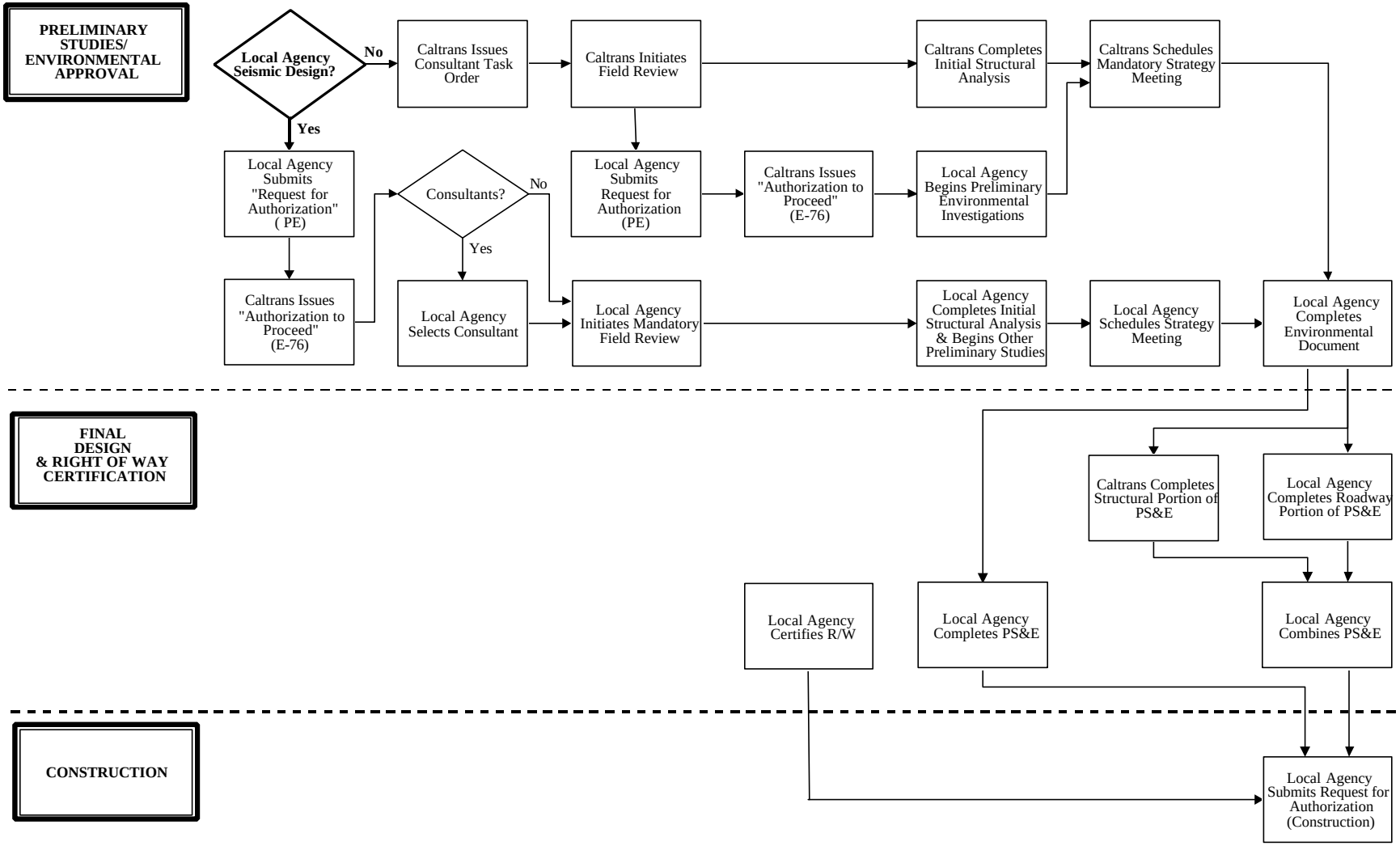
EXHIBIT 7-A
SEISMIC SAFETY RETROFIT PROGRAM FLOWCHART



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