



CITY OF PETALUMA

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September 7, 2011

Ms. Danielle Hutchings
Association of Bay Area Governments
101 Eighth St.
Oakland, CA 94607

SUBJECT: 2010 City of Petaluma HMGP Annex Update

Dear Ms. Hutchings:

Please find enclosed the City of Petaluma's 2010 HMGP Annex Update, including Exhibits A-C. A copy has been sent to you via email as well.

Please let us know if you require any further information.

Sincerely,

Larry Zimmer, P.E.
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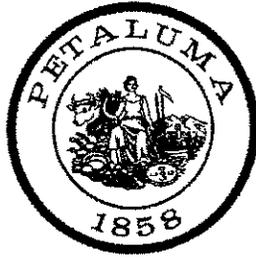
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City of Petaluma
2010
Local Hazard
Mitigation Plan Annex

City of Petaluma 2010 Local Hazard Mitigation Plan Annex

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Introduction

Located 40 miles north of San Francisco in the center of its North Bay region, the City of Petaluma is comprised of 13.9 square miles of land and 0.1 square mi of water with a population of 57,941, based on the 2010 census. Petaluma has a well-preserved, historic city center which includes many buildings that survived the 1906 San Francisco earthquake. Petaluma is situated at the northern most navigable end of the Petaluma River, a tidal estuary that snakes southward to San Pablo Bay. See Exhibit A for Regional Location Map.

A significant amount of the City is in the river's flood plain, which overflows its banks every few years. Above the City of Petaluma on the northwest flank of Sonoma Mountain is the Fairfield Osborn Preserve, a nature reserve with a diversity of native flora and fauna. Nearby to the southeast is Tolay Lake, the site of prehistoric seasonal settlement by Miwok and Pomo tribes. It is flanked by the unincorporated communities of Penngrove to the north and Lakeville to the south. The Coordinates for the City are 38°14'45"N 122°37'53"W. The 2010-11 City budget is \$154,994,550. The City of Petaluma employs approximately 287 full time employees and provides both police and fire protection services.

The Regional Planning Process

The City of Petaluma participated in various ABAG workshops, conferences, and meetings, including:

- 5 ABAG Regional Planning Committee meetings
- Wild Fire, July 2, 2009
- Flooding July 7, 2009
- Regional Planning Committee Meeting, Aug 9, Sept. 17, Dec. 3, 2009
- 10 Inter-departmental/City meetings and phone conference calls - multiple meetings and conference calls were held with each department associated with specific strategy categories beginning in May 2009, July 2009, August 2009, November 2010, April 2011, June 2011 and August 2011.

The Local Planning Process

In 2007, Consultant to City of Petaluma, Recovery Operations Specialty Services (R.O.S.S.), participated in various ABAG workshops, conferences, and meetings, including a sub-regional meeting to review draft priorities and reach consensus on priorities for mitigation. For more information on these meetings and for rosters of attendees, please see Appendix A and H in the ABAG Multi-Jurisdictional Local Hazard Mitigation Plan 2010 (MJ-LHMP). In addition, the City of Petaluma has provided written and oral comments on the Multi-Jurisdictional Plan and provided information on facilities that are defined as "critical" to ABAG.

The process of preparing this plan was familiar to the City of Petaluma, which has a Safety Element to its General Plan that includes a discussion of fire, earthquake, flooding and landslide hazards. In addition, the City routinely enforces the California Environmental Quality Act (CEQA), which, since 1988 has required mitigation for identified natural hazards. The City's effort has been focused on building on these pre-existing programs, identifying gaps that now may lead to disaster vulnerabilities, and addressing these risks through mitigation.

Many of the activities conducted by the City were fed into the planning process for the Multi-Jurisdictional Plan. It participated in various ABAG workshops and meetings. In addition, the City has provided oral comments on the Multi-Jurisdictional Plan. Finally the City provided information on facilities that are viewed as "critical" to ABAG.

The City of Petaluma worked in conjunction with R.O.S.S., who met with representatives from multiple City departments to identify and prioritize appropriate mitigation strategies. Participating in these meetings were senior management and staff from the Fire Service, Police Service, and the Public Works Department including planners, building department officials, facility managers, civil engineers, public health specialists, emergency managers, and police and fire officials.

- Susan Lackie (Retired) -Budget Grants and Project Manager-Discussed and reviewed 2005 Strategies and current HMP update
- Curtis Bates -City Engineer/Flood Plain Administration-Provided Flood Mitigation information and activities associated with Flood Control.
- Dave Sears -Police Lieutenant-Contributed information regarding Mitigation Strategies for 2005 and 2010.
- Vince Marengo (Former) -Public Works Director-Apprised team of current relevant departments and contacts. Reviewed 2005 Mitigation Strategies and 2010 Strategies
- Larry Zimmer- PE -Capital Improvement Manager(acting as PW Director)- Provided information associated with his responsibilities and the impact on the 2010 Mitigation Strategies
- Fleming Nguyen -Sr. Civil Engineer -PW Department - Assisted identifying 2010 Update information
- Larry Andersen -Fire Chief-Provided information relevant to the Depts. 2005 and 2010 Mitigation Strategies.

At the first individual meetings, updated general priorities and appropriate departments were identified. Subsequent meetings identified mitigation strategies, prioritized said strategies, and reviewed preliminary budgets and potential funding

sources for strategies designated as “high” priority for City-owned-and-operated facilities.

Processes for updating Plan Sections

Representatives from the same departments reviewed the findings from 2005 and determined that there were no revisions to recommend to City policies and programs for the 2010 ABAG Local Hazard Mitigation Plan. No changes had occurred to City policies since 2005. The 2010 Plan does incorporate the new data from ABAG, and the 2010 planning process.

Review of Existing Reports, Studies and Plans

Existing Reports, Studies, Plans, and technical information	Method of Incorporation into the Jurisdiction Annex
City of Petaluma General Plan	Hazards Assessment and priority mitigation actions and programs
City of Petaluma Emergency Operations Center Management Operations Plan	Mitigation and Strategies
City of Petaluma General Plan 2025 (May 2008)	Mitigation and Strategies
City of Petaluma Municipal Code	Mitigation and Strategies

Public Meetings

The City tapped into new technology to facilitate active public participation. Several varieties of public meetings were held for the public to comment. Technology was a key part of the City’s plan to provide information. The City website contained information regarding the update process and the previous Hazard Mitigation Plan, and offered the public the opportunity to submit comments online. Notice of the opportunity to submit online comment was posted and the Comment Form made available, on the website for 3 months. See Exhibit B1 for screen shot of the homepage for the City’s website for FEMA Disaster Mitigation Strategies, and Exhibit B2 for screen shot of the FEMA Strategies Comment Form provided for public input.

An open community webinar was also held to encourage and allow public comment. The meeting was published in the local newspaper, and posted on the City’s website. Public dial in 800 lines were available for comment and input. The DRAFT Mitigation Strategies and the Final Strategies were also published on the City website. Notices were published in the local newspaper prior to the events. See Exhibit C3 for Proof of Public Notice, and Exhibit C4 for Proof of Payment for Public Notice. No public comments were received from either the webinar meeting or published internet posting. However, the City will seek further comments prior to and during the adoption process for the 2011 Plan. The City will also adopt the plan in a public hearing format that will provide further opportunities for public comment. In

addition, the City will publish a press release to the local media and place an announcement on the city website to further publicize the local annex document and make the public more aware of the issues and strategies facing the City, prior to the adoption by the Petaluma City Council.

The City Council will adopt the plan in a public meeting via an official Resolution upon Annex approval by FEMA. The Mitigation Strategies will become an implementation appendix of the Safety Element of the City of Petaluma General Plan.

Hazards Assessment

The ABAG Multi-Jurisdictional Local Hazard Mitigation Plan, to which this is an Annex, lists nine hazards that impact the Bay Area, five related to earthquakes (faulting, shaking, earthquake-induced landslides, liquefaction, and tsunamis) and four related to weather (flooding, landslides, wildfires, and drought). Maps of these hazards and risks are shown on the ABAG website at <http://quake.abag.ca.gov/mitigation/>.

The City of Petaluma has reviewed the hazards identified and ranked the hazards based on past disasters and expected future impacts. The conclusion is that earthquakes (particularly shaking and liquefaction) flooding, wildfire, and landslides (including unstable earth) pose a significant risk for potential loss.

The City of Petaluma does not face any natural disasters not listed in the ABAG multi-jurisdictional plan and no new hazards have been identified by the City of Petaluma since the original development of this plan in 2005.

While the City of Petaluma has undertaken a number of general hazard mapping activities since the first Safety Element was prepared by the City of Petaluma, all of these maps are less detailed and are not as current as those shown on the ABAG website at <http://quake.abag.ca.gov/mitigation/>.

Past Occurrences of Disasters (natural and human-induced)

The City of Petaluma has experienced a number of different disasters over the last 50 years, including numerous earthquakes, floods, energy shortages, landslides, and severe storms.

The Loma Prieta Earthquake of 1989 is another example of the kind of large scale disaster which can strike the Bay Area. It killed 63 persons, injured 3,757, and displaced over 12,000. With over 20,000 homes and businesses damaged and over 1,100 destroyed, this quake caused approximately \$6 Billion of damage. Reconstruction continues some two decades later as the replacement for Oakland-Bay Bridge is still several years from completion. The City of Petaluma suffered no significant damages resulting from the Loma Prieta Earthquake of 1989. Fortunately,

in the past 5 years no significant disaster related incidents have occurred in the City of Petaluma.

More information on State and Federally declared disasters in the City of Petaluma can be found at:

<http://quake.abag.ca.gov/mitigation/ThePlan-D-Version-December09.pdf>.

Risk Assessment

Urban Land Exposure

Hazard exposure of the City's urban land is based on information in ABAG's website: <http://quake.abag.ca.gov/mitigation/pickdbh2.html>.

The "2005 Existing Land Use with 2009 Mapping" file was used for this evaluation (in the existing plan, the file used was "Existing Land Use in 2000").

In general, the hazard exposure of the City of Petaluma is increasing over time as the amount of urban land exposed to Flooding increases (In the last 5 years, 956 additional acres of land has become exposed to a 100-year flood and 176 additional urban acres have been exposed to a 500-year flood).

Exposure (acres of urban land)			
Hazard	2005	2010	Change
<i>Total Acres of Urban Land</i>	8226	8205	-21
Earthquake Faulting (within CGS zone)	0	0	0
Earthquake Shaking (within highest two shaking categories)	1028	1025	-3
Earthquake-Induced Landslides (within CGS study zone)	0	0	0
Liquefaction (within moderate, high, or very high liquefaction susceptibility ¹)	6572	6217	-355
Flooding (within 100 year floodplain) ²	125	1081	+956
Flooding (within 500 year floodplain)	284	460	+176
Landslides (within areas of existing landslides)	1402	1403	+1
Wildfire (subject to high, very high, or extreme wildfire threat)	223	176	-47
Wildland-Urban Interface Fire Threat	4116	4140	+24
Dam Inundation (within inundation zone)	0	0	0
Tsunamis within inundation area)	No critical facilities		

¹ Updated use of the Quaternary system has enabled a more accurate accounting of affected urban area impacted by liquefaction.

² Updated NFIP maps resulted in a more accurate accounting of the increase in exposure.

	within threat area		
Drought No drought data available	N/A	N/A	N/A

Infrastructure Exposure

The City of Petaluma also examined the hazard exposure of infrastructure within the jurisdiction based on the information on ABAG's website at:

<http://quake.abag.ca.gov/mitigation/pickdbh2.html>.

In the table below it shows, of the 225 miles of roadway in the City of Petaluma, the following that are exposed to the various hazards analyzed.

Exposure (miles of infrastructure)						
Hazard	Roadway		Transit		Rail	
	2005	2010	2005	2010	2005	2010
<i>Total Miles of Infrastructure</i>	211	225	0	0	5	6
Earthquake Shaking (within highest two shaking categories)	211	219	0	0	5	6
Liquefaction Susceptibility (within moderate, high, or very high liquefaction susceptibility)	170	180	0	0	5	6
Liquefaction Hazard (within CGS study zone)	0	0	0	0	0	0
Earthquake-Induced Landslides (within CGS study zone)	0	0	0	0	0	0
Earthquake Faulting (within CGS zone)	0	0	0	0	0	0
Flooding (within 100-year floodplain)	1	13	0	0	0	1
Flooding (within 500-year floodplain)	9	12	0	0	0	1
Landslides (within areas of existing landslides)	30	32	0	0	0	1
Wildfires (subject to high, very high, or extreme wildfire threat)	2	2	0	0	0	0
Wildland-Urban Interface Fire Threat	108	118	0	0	3	3
Dam Inundation (within inundation zone)	0	0	0	0	0	0
Tsunamis*no data available						
Drought* no data available						

Exposure of City-Owned Buildings, Plus Critical Healthcare Facilities and Schools

Finally, the City of Petaluma examined the hazard exposure of critical health care facilities and schools located within the City of Petaluma city- owned buildings based on the information on ABAG’s site at:

<http://quake.abag.ca.gov/mitigation/pickcrit.html>. The City of Petaluma provided a list of the critical facilities it owns to ABAG. ABAG provided a detailed assessment of the hazard exposure of each of its facilities. The table below illustrates the number of facilities exposed to the various hazards analyzed.

Exposure (number of facility types)								
Hazard	Hospitals		Schools		Locally owned bridges and interchanges		Locally owned critical facilities	
	2005	2010	2005	2010	2005	2010	2005	2010
<i>Total Number of Facilities</i>	1	1	24	35	9	9	46	28
Earthquake Shaking (within highest two shaking categories)	0	0	5	2	3	2	3	3
Liquefaction Susceptibility (within moderate, high, or very high liquefaction susceptibility)	1	1	18	23	9	8	36	20
Liquefaction Hazard (within CGS study zone)	0	0	0	0	0	0	0	0
Earthquake-Induced Landslides (within CGS study zone)	0	0	0	0	0	0	0	0
Earthquake Faulting (within CGS zone)	0	0	0	0	0	0	0	0
Flooding (within 100 year floodplain)	0		0	0	0	7	2	2
Flooding (within 500 year floodplain)	0	0	0	0	0	0	0	1

Landslides (within areas of existing landslides)	0	0	2	4	10	3	10	5
Wildfires (subject to high, very high, or extreme wildfire threat)	0	0	0	0	0	0	0	0
Wildland-Urban Interface Fire Threat	0	0	10	21	5	5	24	14
Dam Inundation	0	0	0	0	0	0	0	0
Tsunamis (within inundation area)	0	0	0	0	0	0	0	0
Drought	-	-	-	-	-	-	-	-

Repetitive Loss Properties

Based on the NFIP's records for flood damage claims as of August 31, 2009, a total of 34 properties are listed as repetitive loss properties (i.e. the property owners have flood damage claims exceeding \$1,000 at least twice in a 10 year period since 1978) The general locations of these properties are shown in Exhibit C1. However, a majority of the 34 existing repetitive loss properties, which are primarily located in the Payran Area neighborhood, have not filed a claim in the past 10 years. This is largely due to the Petaluma River structural flood control project, the majority of which has been completed. The City of Petaluma will be working closely with FEMA and the Insurance S., Inc. Services office to request that the properties in question be removed from the City's repetitive loss property list. See Exhibit C2 for list of repetitive loss locations.

Other Risks

The City of Petaluma plans to continue to work with ABAG to improve the risk assessment information being compiled by ABAG, including developing ways to assess how any soft-story buildings are located in the City.

The City of Petaluma plans to work with ABAG to develop specific information about the kind and level of damage to buildings, infrastructure, and critical facilities which might result from any of the hazards previously noted.

National Flood Insurance Program

The City of Petaluma has participated in the National Flood Insurance Program (NFIP) since 1983. The City also has participated in the Community Rating System (CRS) since 1995 and is currently class 6.

In 2010 the City went through a 5 year verification cycle with ISO and updated our Floodplain Management Plan. We maintained our Class 6 rating. Since that time there have been no changes in the approved plan but anticipate a change in rating once the Petaluma River Structural Flood Control Project has been completed. Petaluma Flood Control data and maps are used to regulate flood hazard areas along with FEMA maps. The City also enforces the floodplain building regulations through plan review and inspection. The largest hurdle the City faces is maintaining trained staff to enforce and update the program.

The City has a floodplain ordinance and we also use the City's General Plan 2025 which contains development and open space policies and programs with emphasis on enhancing natural and beneficial area. Refer to Chapters 4 and 8 of the General Plan which can be found at: <http://cityofpetaluma.net/cdd/plan-general-plan.html>.

Mitigation Goals and Objectives

The goal of the ABAG MJ-LHMP is to maintain and enhance a disaster-resistant region by reducing the potential for loss of life, property damage, and environmental degradation from natural disasters, while accelerating economic recovery in the aftermath of those disasters. This goal is unchanged from the 2005 Plan and continues to be the goal of the City of Petaluma in designing its mitigation program.

The City of Petaluma has historically been impacted primarily by Flood Disasters. We are listing here the goals and objectives pertaining to Flood Plain Management. The City of Petaluma 2010 Flood Plain Management Plan lists the following goals and objectives:

- Increase community outreach efforts to local development community by sponsoring floodplain management workshops in conjunction with the State National Flood Insurance Program Coordinator.
- Continue to train new and update existing City Planning, Building and Public Works staff on NFIP, CRS and City floodplain management requirements.
- Continue annual stream and creek channel maintenance in accordance with established City, Sonoma County Water Agency and other regulatory requirements.
- Secure funding and complete the remaining Petaluma River Flood Control project. The project is currently scheduled to be completed by summer of 2011.
- Obtain certification from the Army Corps of Engineers for the flood wall and flood control project; complete acceptance of the project by the City.

- Pursue certification of existing levees that protect the City's waste water treatment plant and wetlands.
- Complete the City's XP-SWMM model and be cooperating technical partner with FEMA and the SCWA.
- Update the City's Flood Insurance Rate Maps once the flood control project is complete and certified by the Army Corps of Engineers.
- Pursue obtaining an A99 designation, from FEMA, for the Payran area until new FIRM maps are issued.
- Pursue the acquisition of McNear Peninsula as open space and natural and beneficial areas.
- Implement General Plan 2025 policies regarding Petaluma River Corridor terracing to accommodate a 100-year storm event, to all extent practicable.
- Coordinate to update the City's PH II Storm Water Management Plan with requirements of the NFIP, CRS and the City floodplain ordinance.
- Coordinate flood control and maintenance projects with the Zone 2A Flood Advisory Committee.
- Convert the City's benchmark system from NGVD 1929 to NAVD 1988 to be consistent with the new FIRMS. Work with the Army Corp of Engineers to dredge the Petaluma River channel within the new flood control project area to preserve flood design capacity.
- Monitor and update the City's stream level gauge system and expand as needed to maximize the use and effectiveness of the data in the operation of the Flood Alert System.
- Encourage local, State and Federal agencies to fund stream maintenance programs; pursue grants for increasing flow capacity in conjunction with stream enhancement projects. Work with the Fire Department to update the telephone information hotline and notification system. Establish a more effective distribution system, such as a mailer in the City water bill, notifying residents of who to contact for flood information. City of Petaluma Floodplain Management Plan 32 October 4, 2010.
- Continue to pursue and develop higher regulatory standards for designing 1-year flood event standards. The current standard, which was created by FEMA and is used within the City of Petaluma, addresses 100-year flood events.

Mitigation Activities and Priorities

Evaluation of Progress from 2005 Plan

The 2005 LHMP included numerous items that were under study: The information below lists the 2005 Strategy number, the specific goal of the study, the City department that undertook the study, the outcome of the study, and whether the outcome was funded or not funded.

Strategy #: GOVT-b-14 **Department Undertaking Study:** Fire Department
Study Objective: Install a warning system with outdoor sirens, coordinating them to the utmost extent possible with those of neighboring jurisdictions.
Outcome: Our study revealed that warning sirens are not an effective tool in the Petaluma Area due to the nature of natural disasters we anticipate here. Sirens are a more common warning device for coastal areas that have some, but little warning of, a natural disaster, specifically with tsunamis. In the Petaluma Area our greatest natural disaster threats include those with zero warning, such as earthquakes, and those with a few days warning, such as floods. Our efforts are put into notifying the public about how to best prepare for these types of disasters before they actually occur. Following the occurrence of a natural disaster, we use radio, television, and other media outlets to get our messages to the public.
Outcome Funded/ Not Funded: Not funded.

Strategy #: GOVT-b-15 **Department Undertaking Study:** Fire Department
Study Objective: Conduct periodic tests of the outdoor sirens installed as part of the alerting and warning systems, no less frequently than once per month.
Outcome: See GOVT-b-14.
Outcome Funded/ Not Funded: Not funded.

Strategy #: GOVT-b-22 **Department Undertaking Study:** Fire Department
Study Objective: Investigate the use of phone based warning systems for selective geographic areas.
Outcome: This system is currently in effect and has been used to broadcast messages to specific geographic areas during recent flood emergencies. This system is coordinated throughout Operation Area (Sonoma County) Emergency Operations Center.
Outcome Funded/ Not Funded: Funded and implemented at the County level.

Note: All other studies listed in the 2005 Mitigation Strategies were not funded.

Future Mitigation Actions and Priorities

As a participant in the 2010 ABAG multi-jurisdictional planning process, the staff of the City of Petaluma helped in the development and review of the comprehensive list of mitigation strategies in the overall multi-jurisdictional plan. The decision on priority was made based on a variety of criteria, not simply on an economic cost-benefit analysis. These criteria include being technically and administratively feasible, politically acceptable, socially appropriate, legal, economically sound, and not harmful to the environment and our heritage. The draft Strategies will be provided to the City Council for adoption pending approval of this LHMP by FEMA.

Ongoing Mitigation Strategy Programs

The 2010 Mitigation Strategies listed as high can be found at:
<http://www.abag.ca.gov/bayarea/eqmaps/mitigation/strategy.html>. No new strategies have been identified from the 2005 HMP Strategies for City of Petaluma. The following 2010 Strategies have been ranked as a “high” Priority:

GOVT a-7-Periodically assess the need for new or relocated fire or police stations and other emergency facilities, changes in staffing levels, and additional or updated supplies, equipment, technologies and in service training classes. The Public Works Departments will be responsible for monitoring this strategy, locating funding and other opportunities.

GOVT a-9 - Develop and maintain a system of interoperable communications for first responders from cities, counties, special districts, state and federal agencies. The Public works will be responsible for monitoring the potential funding and other grant opportunities.

HOUSING h-8- Continue to develop a public education campaign on the costs, risks and benefits of earthquake, floods and other Hazard Insurance-The Community Development Department will be responsible for this strategy and will continue to monitor potential funding and grant opportunities.

HOUSING k-2- Continue to develop funding sources to provide at cost NOAA weather radios to residents in flood prone hazard areas. The Department of Public Works will be responsible for monitoring potential funding and grant opportunities.

The 2010 HMP shows all Existing strategies are underfunded. No new studies are being undertaken at this time.

Incorporation into Existing Planning Mechanisms

The City of Petaluma has several planning mechanisms which help create a more disaster-resistant region. The list below highlights those programs, the list is found at:
<http://www.abag.ca.gov/bayarea/eqmaps/mitigation/strategy.html>.

The list highlights those programs identified as Existing Programs in the Mitigation Strategy spreadsheet. Others are on-going that are currently underfunded. It is the City’s priority to find additional funding to sustain these on-going programs over time.

The City has a Safety Element in its General Plan that includes a discussion of fire, earthquake, flooding and landslide hazards. This Plan will be adopted as an implementation appendix to the Safety Element following final review by FEMA. In addition, the City enforces the requirements of the California Environmental Quality Act (CEQA), which, since 1988, requires mitigation for identified natural hazards. The City has used these pre-existing programs as a basis for identifying gaps that may lead to disaster vulnerabilities in order to work on ways to address these risks through mitigation.

Plan Update Process

As required by the Disaster Mitigation Act of 2000, the City of Petaluma will update this plan Annex at least once every five years, by participating in a multi-agency effort with ABAG and other agencies to develop a multi-jurisdictional plan. To that end, the Public Works Project Manager will contact ABAG four years after this plan is approved to ensure that ABAG intends to undertake the update process. If so, the City again will participate in the multi-jurisdictional plan. In the event ABAG is unwilling or unable to act as the lead agency in the multi-jurisdictional effort, other agencies will be contacted, including the County's Office of Emergency Services. ABAG counties should then work together to identify another regional forum for developing a multi-jurisdictional plan. The Capital Improvement Manager for the City will serve as the primary monitor. The current (as of September 2011) is Larry Zimmer. The Alternate Point of Contact will be the Senior Civil Engineer currently Fleming Nguyen. Their contact information can be found under Mitigation Plan Points of Contact.

The Annex will be a discussion item on the agenda of department leaders generally in January of each year. The Annex priorities will be discussed and amended or updated as necessary.

The public will continue to be involved whenever the plan is updated, as appropriate, during the monitoring and evaluation process. Prior to adoption of updates, the City will provide the public with an opportunity to comment on the updates. A public notice will be posted on various technologies to announce the comment period and meeting logistics.

Mitigation Plan Points of Contact

Primary Contact

Name: Larry Zimmer

Title: Capital Improvement Manager

Mailing Address: 11 English Street, Petaluma, CA 94952

Telephone: 707-776-3674

Email: Lzimmer@ci.petaluma.ca.us

Alternate Point of Contact

Name: Fleming Nguyen

Title: Senior Civil Engineer

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Telephone: 707-778-4312

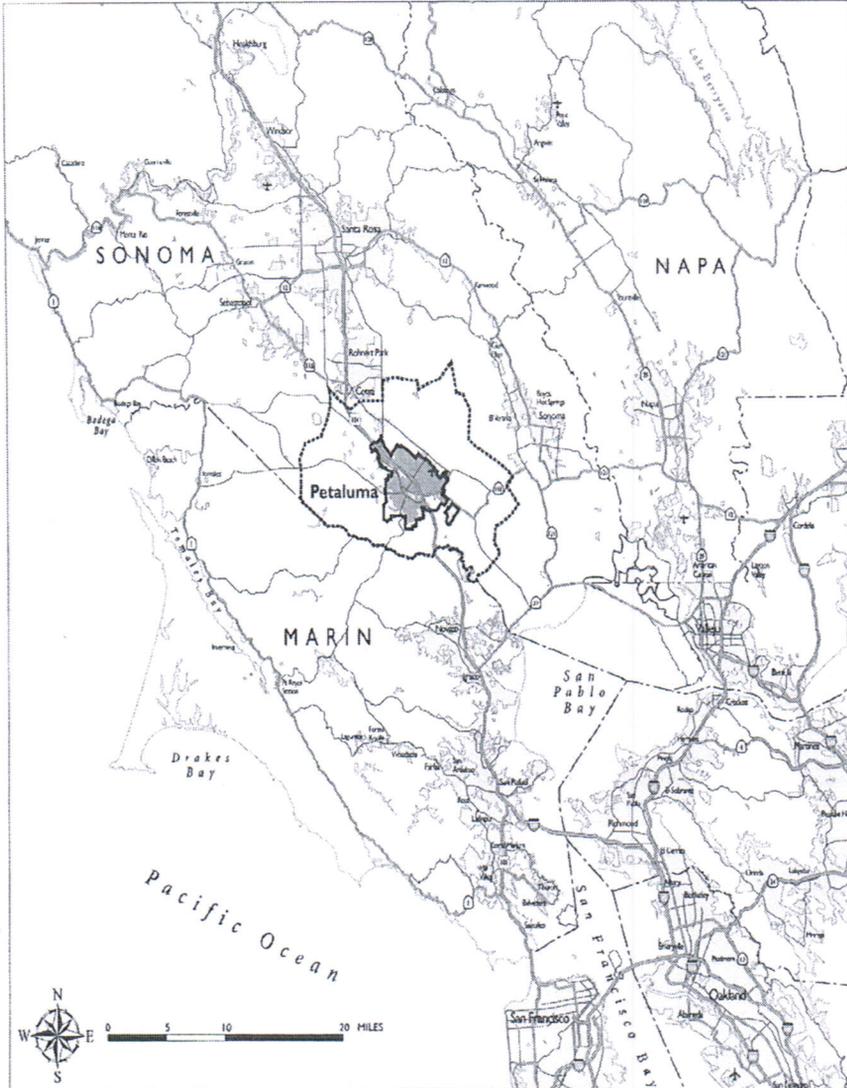
Email: fnguyen@ci.petaluma.ca.us

Exhibit A -Regional Location Map

Figure 1

REGIONAL LOCATION

Floodplain Management Plan 2010



Source: General Plan 2025

- Watershed Area
- Urban Growth Boundary
- Urban Areas



City of Petaluma
11 English Street
Petaluma, CA 94952
publicworks@ci.petaluma.ca.us



Exhibit B

Exhibit B1 -Web Site Screen Shot of FEMA Disaster

Mitigation Strategies Homepage

Exhibit B2 - Web Site Screen Shot of FEMA Strategies

Comment Form for Public Input



Site Search:

Home Airport Transit Capital Improvements Development Engineering Traffic Operations Parks Feedback

FEMA - Disaster Mitigation Strategies

Quick Links

- Bid & RFP Opportunities
- Prevailing Wage
- Operations Service Form
- Floodplain Administration
- Fire Sprinkler Grant Application
- Graffiti Reporting
- Sewer Lateral Replacement Grant Program
- Street Paving Priorities

Encroachment Permits

- Encroachment Permit Form
- Encroachment Permit Submission by Email
- Why you need an EP
- Insurance Requirements
- Bond Requirements
- Tree Removal Permit
- Approved Street Trees List
- Residential Sidewalk Maint.

Airport

- Airport Commission
- Hangar Deposit Form

Quick Links

- Newsletter November '08

Transit

- Bus Advertising
- Contact Transit
- Fares, Passes, and Transfers
- Maps
- Paratransit
- Rider Alerts
- Rider's Guide
- Schedules
- Short Range Transit Plan
- Transit Advisory Committee

Quick Links

- Sonoma County Transit
- Park & Ride Locations
- Transportation 2035
- Golden Gate Transit

Please note - this will be open for public comment for two weeks from the time of posting.

The City is offering to the public the opportunity to comment on disaster preparedness mitigation strategies.

Please make comments on the plan. Here are the instructions -

1. Read the **Mitigation Strategies report/matrix**. The priorities' definitions are in the table at the bottom of this page. There are eight Mitigation Strategy sections and you can read them individually (if you choose to view the individual sections, they will open in separate windows, for easy reference when making comments) -

- (INFR) Infrastructure**
- (HSNG) Housing**
- (HEAL) Health**
- (ECON) Economy**
- (GOVT) Government**
- (EDUC) Education**
- (ENVI) Environment**
- (LAND) Land Use**

2. Make note of the specific Mitigation Strategy and item number you wish to comment on. Make comments on the **form**.

3. "Attend" our virtual meeting. Public comments on the Hazard Mitigation strategies are welcomed and will be forwarded to FEMA for review.

Monday, September 14 at 9:00 AM Pacific Daylight Time.

To join the audio part of the meeting dial:

1-877-230-8129

Guest Code 1091127

To join the online meeting visual part of the meeting please go to:

<https://www2.gotomeeting.com/join/637819115>

Meeting Password: Petaluma

Meeting ID: 637-819-115



Photo courtesy of Scott Hess

11 English Street
Petaluma, CA 94952
phone: 707.778.4474
fax: 707.776.3602
email: publicworks@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Thursday

Contact Information

Airport Manager,
Bob Patterson

601 Sky Ranch Drive
Petaluma, CA 94954
phone: 707.778.4404
fax: 707.778.4405
email: airport@ci.petaluma.ca.us

Hours:
Mon. - Fri. 8:00 A.M. - 5:00 P.M.
Sat. & Sun. 8:00 A.M. - 4:00 P.M.
After Hours Service:
Fee: \$25.00
Call Bob Patterson at 707.753.1166

Contact Information

Capital Improvement Program
Manager,
Larry Zimmer

11 English Street
Petaluma, CA 94952
phone: 707.778.4483
fax: 707.776.3602
email: publicworks@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Thursday

Contact Information

City Engineer/Flood Plain
Administrator
Curt Bates, P.E

11 English Street
Petaluma, CA 94952
phone: 707.778.4474
fax: 707.776.3602
email: cbates@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Thursday

Priority Codes

EQ	Earthquake (all types)
LS	Landslide



Petaluma Transit

facebook

Name:
Petaluma Transit

Status:
Welcome back to our valued student riders! Good...

Fans:
23

WF	Wild Fires
FL	Flood
SEC	Security
DR	Drought
Ag	Agricultural
Flu	Flu
Heat	Heat
TS	Tsunami

Once you have read the strategy matrix, please make a note of the specific item numbers (e.g., "Public Education g-6") and enter into the blanks provided. All comments received will be submitted to the Federal Emergency Management Agency (FEMA) for review.

Go [here](#) to make comments. You may make as many submittals as you wish.

Capital Improvements

- Bid & RFP Opportunities
- Plan Holder's Form

Reports

- Petaluma Railroad Trestle
 - Historic Structure Report
 - Limited Structural Assessment
 - Wood Evaluation

Development Engineering

- Mapping
- Benchmark and Monument Mapping
- City Standards
- Engineering Permits & Applications
- Soils Report Library
- Handouts
- Sewer Lateral Replacement Grant Program

Floodplain

- Floodplain Administration Management Plan
- River Enhancement Plan

Encroachment Permits

- Encroachment Permit Form
- Encroachment Permit Submission by Email
- Why you need an EP
- Insurance Requirements
- Bond Requirements
- Tree Removal Permit
- Approved Street Trees List
- Residential Sidewalk

Contact Information

City Engineer
Curt Bates, P.E.

11 English Street
Petaluma, CA 94952
phone: 707.778.4474
fax: 707.776.3602
email: pwtraffic@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Thursday

Contact Information

Operations
Ken Burnett, Operations
Superintendent
707.778.4474

22 Bassett Street
Petaluma, CA 94952
phone: 707.778.4303
fax: 707.776.3619
email: publicworks@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Thursday

Contact Information

Transit Manager
Joseph Rye

555 North McDowell Blvd
Petaluma, CA 94954
phone: 707.778.4460
fax: 707.776.3799
email: transit@ci.petaluma.ca.us

Hours: 8:00 A.M. - 5:00 P.M.
Monday - Friday

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- City Home
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Quick Links

- Animal Services
- City Phone List
- Citywide Calendar
- Employment Opportunities
- Flood/Emergency Prep Info
- Garbage and Recycling
- Meeting Agendas/Minutes/Videos
- Take a tour - Cool Places on our web site
- Water Conservation
- Water Recycling Expansion

Maint.

Quick Links

ITE
ASCE

Traffic Engineering

Traffic Count Request
Form
"Street Light Out" Form
Petaluma Pedestrian and
Bicycle Advisory
Committee
Traffic Videos

Quick Links

Bike Sonoma
Bay Area Bikes

Maintenance & Operations

D Street Bridge Mooring
Permit
Operations Service Form

Quick Links

Greenwaste - Spring
Cleanup
North Bay Corporation and
Redwood Empire Disposal

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City of Petaluma, California



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FEMA Strategies Comments Form

Traffic Engineering

[Traffic Count Request Form](#)

["Street Light Out" Form](#)

[Petaluma Pedestrian and Bicycle Advisory Committee](#)

[Traffic Videos](#)

Quick Links

[Bike Sonoma](#)

[Bay Area Bikes](#)

Please make your comments in the form below. Be sure to include the Strategy (Infrastructure, Health, etc) and item numbers (a.2, etc.) from the **Strategy matrix**.

Please enter the Strategy and item number (e.g., Health G.4)

Comments:

Your name:

Email Address:

Your address:

Contact Information

City Engineer
Curt Bates, P.E.

11 English Street
Petaluma, CA 94952
phone: 707.778.4474
fax: 707.776.3602
email: pwtraffic@ci.petaluma.ca.us

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[Water Conservation](#)
[Water Recycling Expansion](#)

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Exhibit C

Exhibit C1 -Repetitive Loss Property Map

Exhibit C2 -Repetitive Loss Properties List (2 pages)

Exhibit C3 -Proof of Public Notice

Exhibit C4 -Proof of Payment for Public Notice

Repetitive Losses in the Floodplain Based on the NFIP's records for flood damage claims as of August 31, 2009, a total of 34 properties are listed as repetitive loss properties (i.e. the property owners have filed flood damage claims exceeding \$1,000 at least twice in a 10-year period since 1978). The general locations of these properties are shown in Figure 3. However, a majority of the 34 existing repetitive loss properties, which are primarily located in the Payran Area neighborhood, have not filed a claim in the past 10 years. This is largely due to the Petaluma River structural flood control project, a majority of which has been constructed. The City of Petaluma will be working closely with FEMA and the Insurance Services Office, Inc. to request that the properties in question be removed from the City's repetitive loss property list.

Table 1. Repetitive Loss Properties, City of Petaluma

Property Address	Claims Filed In Years
1327 Clegg St	2005, 2008
56 Cordelia Dr	1982, 1986, 1998
44 Cordelia Dr	1982, 1986, 1998
109 East Ct	1982, 1983, 1986
111 East Ct	1980, 1982, 1983, 1986
100 East Ct	1982, 1983, 1986
1150 Industrial Ave	1998, 2005, 2008
1160 Industrial Ave	1998, 2005, 2008
4 Jess Ave	1983, 1986
8 Jess Ave	1983, 1986
9 Jess Ave	1983, 1986, 1998
12 Jess Ave	1983, 1986
16 Jess Ave	1982, 1986, 1998
17 Jess Ave	1982, 1986, 1998
28 Jess Ave	1982, 1986, 1998
32 Jess Ave	1983, 1986
36 Jess Ave	1983, 1986, 1998
44 Jess Ave	1983, 1986
48 Jess Ave	1982, 1983, 1986, 1995, 1998
50 Jess Ave	1983, 1986, 1998
78 Jess Ave	1982, 1986, 1998
519 Lakeville St	1983, 1986
1238 Magnolia Ave	1982, 1983
3624 Petaluma Blvd N	1999, 2000

Table 1 Continued

3700 Petaluma Blvd N	1986, 1995, 1996, 1997, 1998
811 Petaluma Blvd S	1982, 1983
3 Rocca Dr	1982, 1986, 1998
27 Rocca Dr	1982, 1986, 1998
35 Rocca Dr	1982, 1986, 1998
43 Rocca Dr	1983, 1986, 1998
47 Rocca Dr	1982, 1986, 1995, 1998
49 Rocca Dr	1983, 1986, 1998
115 W. Payran St	1982, 1986
20 Woodworth Way	1982, 1986

PROOF OF PUBLICATION

(2015.5 C.C.P.)

STATE OF CALIFORNIA

County of Sonoma

I am a citizen of the United States and a resident of the county aforesaid: I am over the age of eighteen years, and not a party to or interested in the above entitled matter. I am the principal clerk of the printer of The Press Democrat, a newspaper of general circulation, printed and published DAILY IN THE City of Santa Rosa, County of Sonoma; and which newspaper has been adjudged a newspaper of general circulation by the Superior Court of the County of Sonoma, State of California, under the date of November 29, 1951, Case number 34831, that the notice, of which the annexed is a printed copy (set in type not smaller than nonpareil), has been published in each regular and entire issue of said newspaper and not in any supplement thereof on the following dates to wit:

The Press Democrat - Legal Notices
9/4 1x, s9/11 1x - 09/11/2009

I certify (or declare) under penalty of perjury, under the laws of the State of California, that the foregoing is true and correct.

Dated at Santa Rosa, California, on

09/11/2009

Roxanne Nussan

SIGNATURE

This space for County Clerk's Filing Stamp

Proof of Publication of



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Santa Rosa, CA
 Tel: (866) 470-7133 • Fax: (863) 802-7825
 FED ID#: 06-1567241

1 BILLING PERIOD		2 ADVERTISER / CLIENT NAME	
08/31/09 - 09/27/09		TRANSTEC CONSULTING	
23 TOTAL AMOUNT DUE		*UNAPPLIED AMOUNT	
0.00		3 TERMS OF PAYMENT	
21 CURRENT AMOUNT DUE		22 30 DAYS	
.00		60 DAYS	
		OVER 90 DAYS	
		.00	
		.00	

ADVERTISING INVOICE and STATEMENT

24 INVOICE NUMBER	4 PAGE #	5 BILLING DATE	6 BILLED ACCOUNT NUMBER	7 ADVERTISER / CLIENT NUMBER
10640672	1	09/27/09	518237	

8
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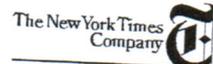
10 DATE	11 NEWSPAPER REFERENCE	12/13/14 DESCRIPTION - OTHER COMMENTS/CHARGES	15 SAU SIZE 16 BILLED UNITS	17 TIMES RUN 18 RATE	19 GROSS AMOUNT	20 NET AMOUNT
08/30		BALANCE FORWARD				.00
09/01	2426882	Deposit of \$170.40-				
09/27	2426882	Applied Deposit - 2426882				
09/04	2426882	FEMAHAZARDMIT	1x21		170.40	-170.40
	09/11	INT/FULL,PD/FULL				170.40
		0001 2426882				

STATEMENT OF ACCOUNT AGING OF PAST DUE ACCOUNTS

21 CURRENT NET AMOUNT DUE	22 30 DAYS	60 DAYS	OVER 90 DAYS	*UNAPPLIED AMOUNT	23 TOTAL AMOUNT DUE
.00	.00	.00	.00		.00

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