

FEMA REGION X
RISK MAP DISCOVERY INTERVIEW
CITY OF OROVILLE, WASHINGTON
April 2, 2015 11:00 AM PST

Participating

City of Oroville

- Chris Branch, Community Development Director

STARR (FEMA Contractor)

- Becca Fricke-Croft, Meeting Host
- Troy Sova, Senior GIS Analyst
- Andy Dobson, Senior Planner

Discussion

Becca Fricke-Croft made introductions and presented an overview of the RiskMAP program and the different projects and products that can benefit communities. Our overall goal is discovering how FEMA can help Oroville be a more hazard and disaster-resilient community. A copy of the presentation is included with these meeting notes as Appendix A.

Pre-Discovery meetings and interviews with communities within the Okanogan Watershed have been scheduled throughout March and April, 2015. Conducting pre-meeting interviews with communities helps us to better prepare for the in-person local Discovery meetings. The Discovery Meeting is scheduled for the week of May 4 – 6, 2015. Following the Discovery interview and meeting, STARR will prepare a report about the information compiled, including recommendations that FEMA may use to help allocate future Risk MAP funding. During the Discovery process, FEMA will be checking-in with and keeping communities informed every step of the way.

The following information was collected during the interview. Unless otherwise noted, all comments are from the City of Oroville representatives.

Community Contacts

- Updating name and contact information for Public Works Director, Rod Noel. He is also a contracted Fire Chief for the City.
- Adding City Clerk to mailing list, JoAnn Denny.

Confirm collected data

- Troy Sova discussed the data, in particular GIS base map data that has been collected thus far during Discovery from local, State and Federal resources.

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- o Local – County website provided transportation and parcel layers. Other layers will be requested via CD/DVD from the County. Troy thinks the County may have flown local imagery based on conversations with other communities
- Troy explained that the floodplain data shown on-screen is Q3 data captured from the “old” effective paper FIRMs. “Q3 floodplains” is a GIS layer depicting flood hazard boundaries that were “rubber-sheeted” or digitized from the paper FIRMs.
 - Besides what is already available on interview maps, additional data is available through Okanogan County. Troy will coordinate with state/county to revise the discussion maps prior to site visits in May. Should increase the accuracy and information available for in-person discussions.
 - Chris Branch notes on the map one area where the political boundary is not represented correctly and says he will follow up with the County to make sure they have the correct boundary outline.
 - Department of Ecology Q3 data for floodplain—only SFHA information we know of for Oroville
 - Would like to collect: environmentally sensitive areas, critical facilities and infrastructure, locations of levees, building footprints, if there is anything available.
 - City of Oroville works with Okanogan County (Gene Wilson and Ted Murray) for GIS mapping—nobody on staff in community.
 - Tonasket Creek frequently floods and has historically, although it does not have a FEMA-designated floodplain area. Oroville working with multiple agencies (Corps, FEMA, County) to have this creek studied and SFHA delineated.
 - Channel migration zones and county-wide study underway—data could be included in discovery maps and will be brought along to the Discovery Meetings.

Topography, LIDAR, GIS

- Where are critical facilities and infrastructure
 - o Chris annotating map with recent flood events along Tonasket Creek adjacent to City ball fields
 - o Community flooding results from draining wetlands, altering channel to creek, and land development altering drainage patterns.
 - o City is working on defining a project along Tonasket Creek to seek funding for bridge replacement, moving dikes back roughly 50’ for development
 - o Chris also mentions that Tonasket Creek is a steel-head transport section of the stream and may involve endangered species issues
 - o Chris indicated location of dam operated by irrigation district, located along Okanogan River southeast side of the City under orders of the International Joint Commission
 - o Dam controls level of Lake Osoyoos north of City (not shown on our base map), subject to various regulations and agreements related to maintaining and dredging channel at mouth of Tonasket Creek if sediments build up too much

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- Some fish-spawning habitat mentioned along streams, Tribal entity purchasing land for steelhead habitat preservation

During the final half of this interview, Becca will be asking questions designed to spark discussion with the City of Oroville regarding Resilience.

What is Valuable to the City of Oroville? What does the City try to protect?

- Cascade & Columbia Railhead center of City, two sawmills depend on this heavy-freight facility
- Lots of agriculture and orchards around the area, apple processing plants
- Customs and border patrol another large local employer
- City is partially diked to hold back flows from Okanogan River and Similkameen River
- Dam on Similkameen River northwest of City has caused some controversy—may be impacting natural waterfall area and fish migration

Planning

- The City was not involved in the Hazard Mitigation Plan as much as they would have liked and looking at mitigation needs for the community
- Fire Chief would be looked at as the Emergency Management official in the City but he's also the Public Works Director who had limited involvement with the plan
 - Wildfire concerns similar to some other nearby communities, issues of maintaining electricity during an emergency and the ability to pump water to reservoirs for firefighting

Earthquake Hazard

- Risk level/concern
 - Have had some minor tremors, nothing serious for many years and does not seem to be an active earthquake area
 - Chris mentioned that Christian Johnson (Building Inspector) would have more information relating to this type of hazard and infrastructure

Landslide Hazard

- Risk level/concern
 - Not inside city, rock outcropping to north of city along US 97 raises some concerns
 - Mostly aware of slopes in terms of requiring proper earthwork studies before any development can take place
 - City is not enforcing land restriction for future development
 - Champerty Shores was created by a landslide, north of Veranda Drive

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Wildfire Hazard

- Risk level/concern
 - High risk to area
 - Carltown Complex fire did not directly impact community, but safety concerns may have cut down on tourism.
 - State programs underway for getting funding for economic recovery projects following the fire
 - Okanogan County has a new emergency management director—old one left after fire
 - Okanogan County HMP does not have a lot of detailed information regarding Oroville, consensus had been that County was taking care of emergency management issues for the community

Severe Storm Hazard

- History and frequency
 - Occasional damage from high winds, roofs torn off
- Shelter needs and facilities
 - Haven't had anybody displaced from storms
 - School designated as shelter, however the school buildings are located behind dikes—if they were to breach the shelter would be washed out and are currently in the floodplain

Flood Hazard

- FIRM comments, revisions, questions
 - Need for lots of studies and updates—as mentioned previously the only SFHA data available is Q3 mapping derived from hard copy FIRM maps
 - Resort community north of City, Veranda Beach Resort has houses where Chris is not sure if the County was correct in the elevations used when the buildings were built to determine the flood levels
 - Chris also mentions about Ninemile Creek that has recently flooded by another resort near Oro Beach Road (RV Resort). Recently the floodplain was filled in extensively in this area at confluence of Ninemile Creek and Lake Osoyoos
 - Tribal entity has purchased land along Ninemile Creek for fish habitat and spawning
 -
- Are there any new floodplain studies underway?
 - Stream channel migration study mentioned earlier, sounds like Oroville is trying to make sense of the many dams, dikes and levees in the area and how they are impacting stream hydrology, flows, and sediment loads
- Other flooding issues or concerns
 - Complex river system south of City, water backing up from flows, dike/levee system southwest side of City south of Jennings Loop Road
 - Chris would like to see a Sub-Area Plan in the areas surrounding the sawmills

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- Logging mill southeast corner of city, concern with entire facility located within floodplain, flooding could wash a tremendous amount of material loose into waterways

Levees

- Current levees within the City are accurate and certified/operated by USACE. City maintains the levee structure

Communications and Outreach

- Current community outreach/engagement
 - Oroville not in great shape regarding emergency communication--procedures and preparedness a problem
 - Generally, need a much better strategy for communication and outreach, no public information officer, no procedures or agreed-on systems
- Who are the key players in communication and outreach to residents
 - Chamber of Commerce
- What kind of outreach works best in your community
 - Local weekly newspaper
 - Periodic city hall meetings
 - New city website
- Use of RiskMAP products for outreach, communication, and education
 - Potential for a lot of new ideas FEMA could share with community, new practices they could try out to improve communications and outreach (working with schools for instance)

Compliance and Training

- Floodplain administrator
 - Some concern that between Chris and the Building Administrator, they have too much going on, could use more training and education so they both have the same floodplain administration knowledge
 - Would like to take floodplain regulations beyond damage-reduction into environmental and habitat protection issues—have done some work along these lines with new subdivision ordinance

Next Steps

- Location for Discovery Meeting
 - Tonasket/Oroville School District, could coordinate for using their buildings
 - Either Tonasket or Oroville would work for location—both communities work together, relate well with one another (they share lots of staff)
 - “North County” grouping suggested by Chris, a sense of identity exists in northern communities separate from central valley and southern end of Okanogan County

Appendix A: Interview Presentation



FEMA

Risk MAP Discovery

Okanogan & Wenatchee Watersheds

Information Exchange Sessions
March/April 2015

RiskMAP

Increasing Resilience Together



Information Exchange Agenda

- **Overview of Risk MAP and Discovery**
- **Introduction to Enhanced Risk MAP Products**
- **Interactive Questionnaire**
- **Close**

The Vision for Risk MAP

Through collaboration with State, Local, and Tribal entities, Risk MAP will deliver quality data that increases public awareness and leads to action that reduces risk to life and property



RiskMAP

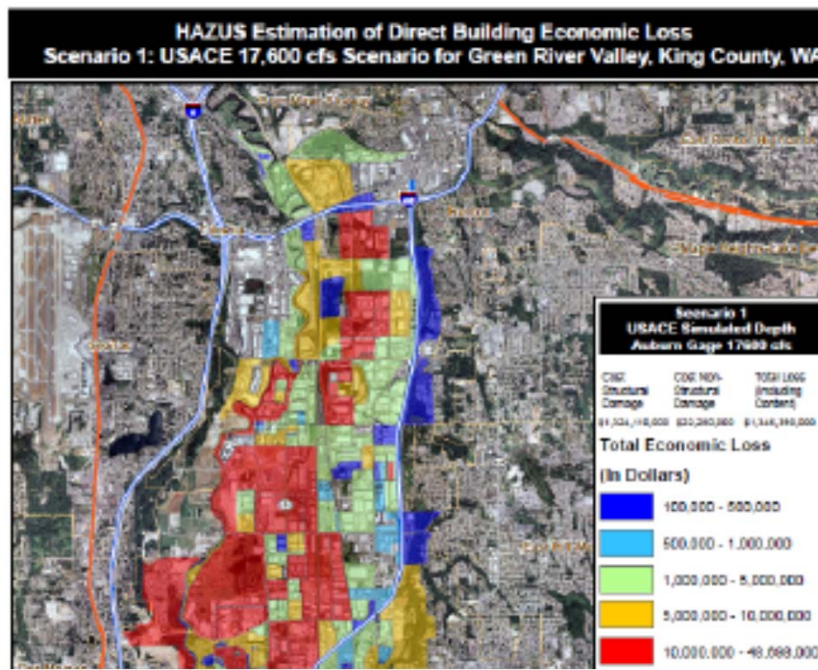
Increasing Resilience Together

- Collaborative approach
- Goals: quality data, public awareness, action that reduces risk
- Watershed-oriented
- Multi-Hazard
- Focus on up-front coordination
- Discovery is mandatory

Risk MAP Products

Multi-Frequency Depth & Water-Surface Elevation (WSE) Grids

10%, 2%, 1%, 0.5%, 0.2% annual chance profiles



Inundation

- 3 feet or less
- 3 to 6 feet
- 6 feet +

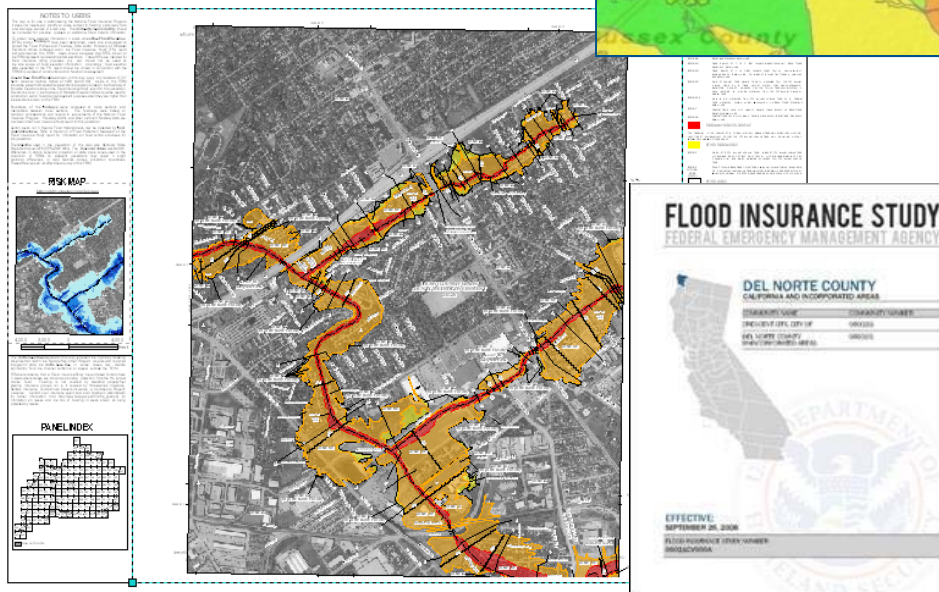
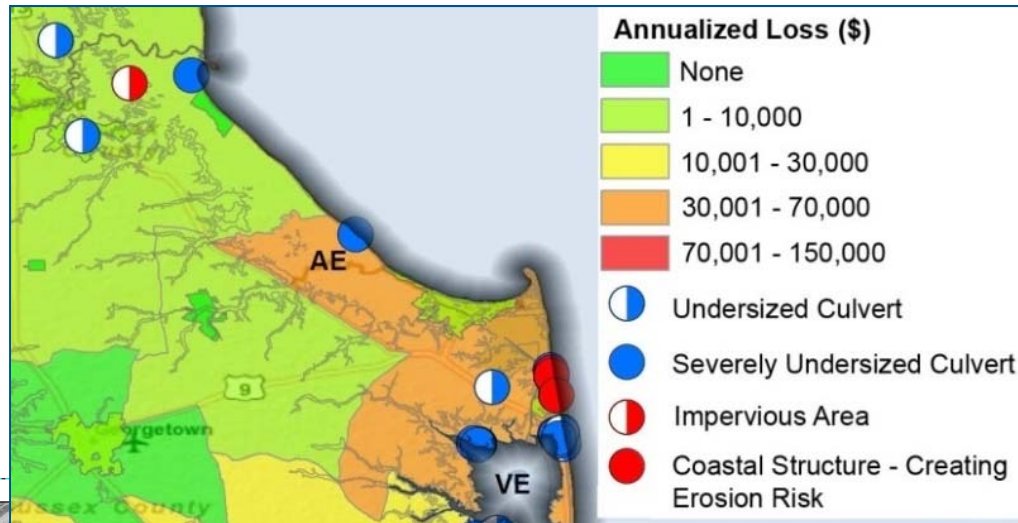
HAZUS Risk Assessment & National Flood Risk Layer

Enables communities to understand risk by reference to existing structure loss

Risk MAP Products

Contributing Hazard Factors

Highlights areas of concern identified throughout project



FIS Reports and DFIRM Maps

DFIRM and FIS will continue to fulfill regulatory requirements and support the NFIP

Discovery

Discovery is the process of data collection and analysis with the goal of initiating a hazard risk or mitigation project and risk discussions within the watershed

When:

- After an area/watershed has been prioritized
- Before a Risk MAP project is scoped or funded

Required for new and updated...

- Flood studies
- Flood risk assessments
- Mitigation planning technical assistance projects

Why:

- Increases visibility of flood risk information, education, involvement
- Helps inform whether a Risk MAP project will occur in the watershed



Okanogan & Wenatchee Discovery

- **Federal and State Data Collection**
- **Local Issues: Identify Risk MAP Needs**
 - Need support with mitigation planning?
 - Need mitigation projects?
 - Need new flood study data?
 - Need training on floodplain management?
 - Need support developing a hazard risk outreach program?
 - What else can FEMA do to help your community become resilient?
- **Pre-Discovery Interviews: March/April 2015**
- **Discovery Meetings: May 4-6, 2015**
- **Risk MAP Project(s) Identified**
- **Possible FEMA Funding Allocated for Risk MAP Project**

Discovery Interview

- **Local Contacts**
- **Data**
 - LiDAR
 - Local or Regional GIS Data
- **Mitigation Planning**
 - Desired Mitigation Projects
- **Local Hazards**
 - Earthquakes
 - Wildfires
 - Landslides
 - Severe Storms
 - Flooding
- **Levees**
- **Environmentally Sensitive Areas**
- **Communications and Outreach**
- **Compliance and Training**

Mitigation Planning		
How would you describe your level of involvement with the development of the mitigation plan? (Considerable, Moderate, Minimal)	Do you need assistance with mitigation planning in your community? (Yes, No, Possibly)	Mitigation Planning Comments, Explanations, Questions

Questions?

FEMA

- **Amanda Siok, Risk Analyst, amanda.siok@fema.dhs.gov**
- **Kristen Meyers, Mitigation Planner, kristen.meyers@fema.dhs.gov**
- **Ted Perkins, Regional Engineer, dwight.perkins@fema.dhs.gov**

WASHINGTON

- **Jerry Franklin, State Risk MAP Coordinator, jfra461@ecy.wa.gov**
- **Michelle Gilbert, Floodplain Management Specialist, migi461@ecy.wa.gov**

STARR

- **Emily Whitehead, emily.whitehead@stantec.com**
- **Troy Sova, troy.sova@stantec.com**
- **Becca Fricke-Croft, becca.croft@starr-team.com**