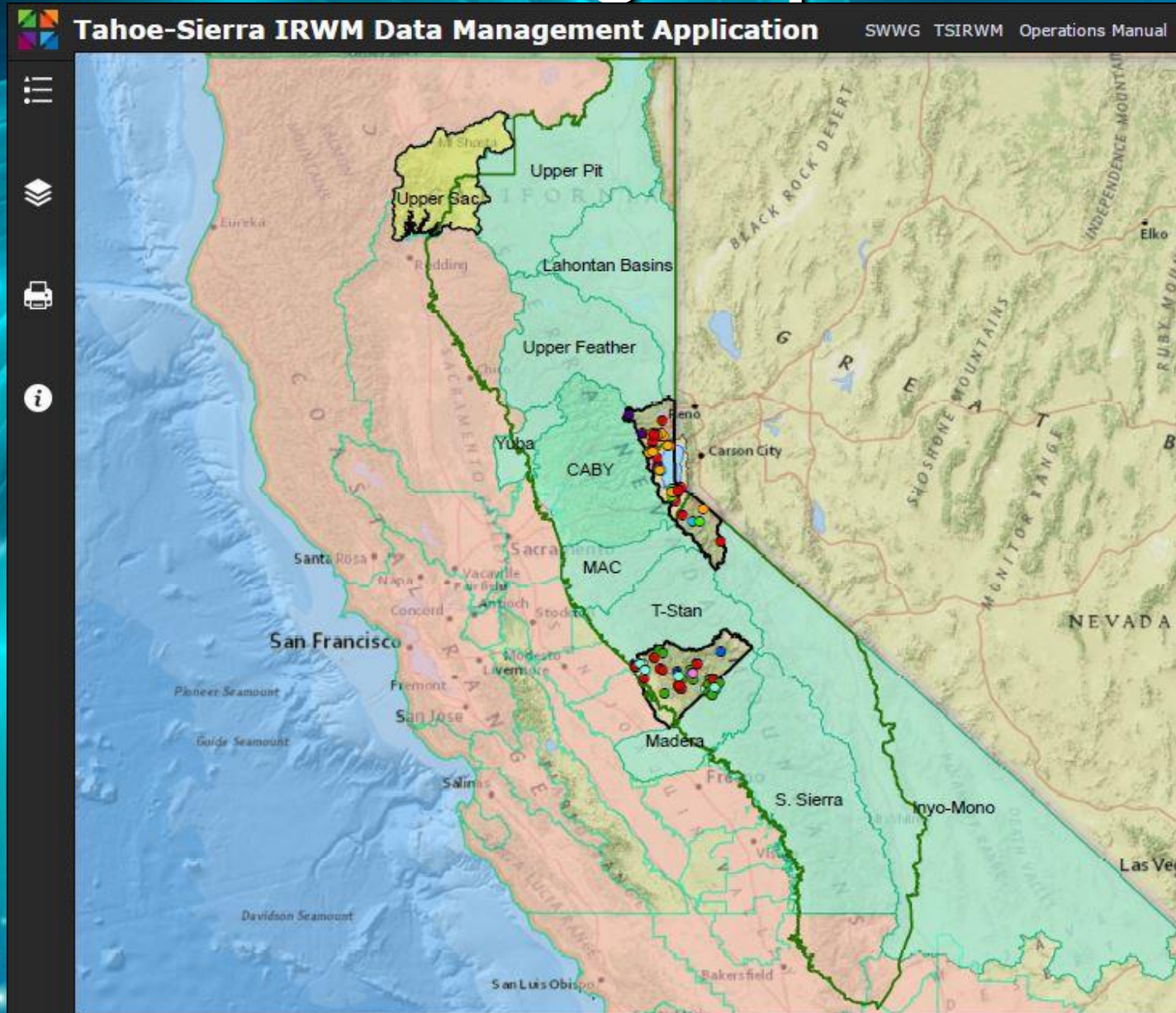


# Sierra Water Workgroup Presents:



Kate Gladstein, SWWG

Elizabeth Mansfield, SWWG



# Data Management Tool

## Background

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The Sierra Water Workgroup is developing Web Applications to facilitate IRWM project management within the Sierra Nevada. These web tools are customized and funded directly by the IRWM areas. We have launched apps for the **Tahoe-Sierra & Yosemite-Mariposa** regions, and **CABY** is next!

### Collaborating Entities:

- **SWWG IRWM regional stakeholders;**
- **CA Department of Water Resources;**
- **Many State Agencies and Non-Profit Organizations (data);** and
- Special thanks to **ESRI**

### Benefits:

- **Regional & Interregional Data Management;**
- **Methods for tracking project performance;** and
- **Opportunity to Streamline Funding and Resources.**

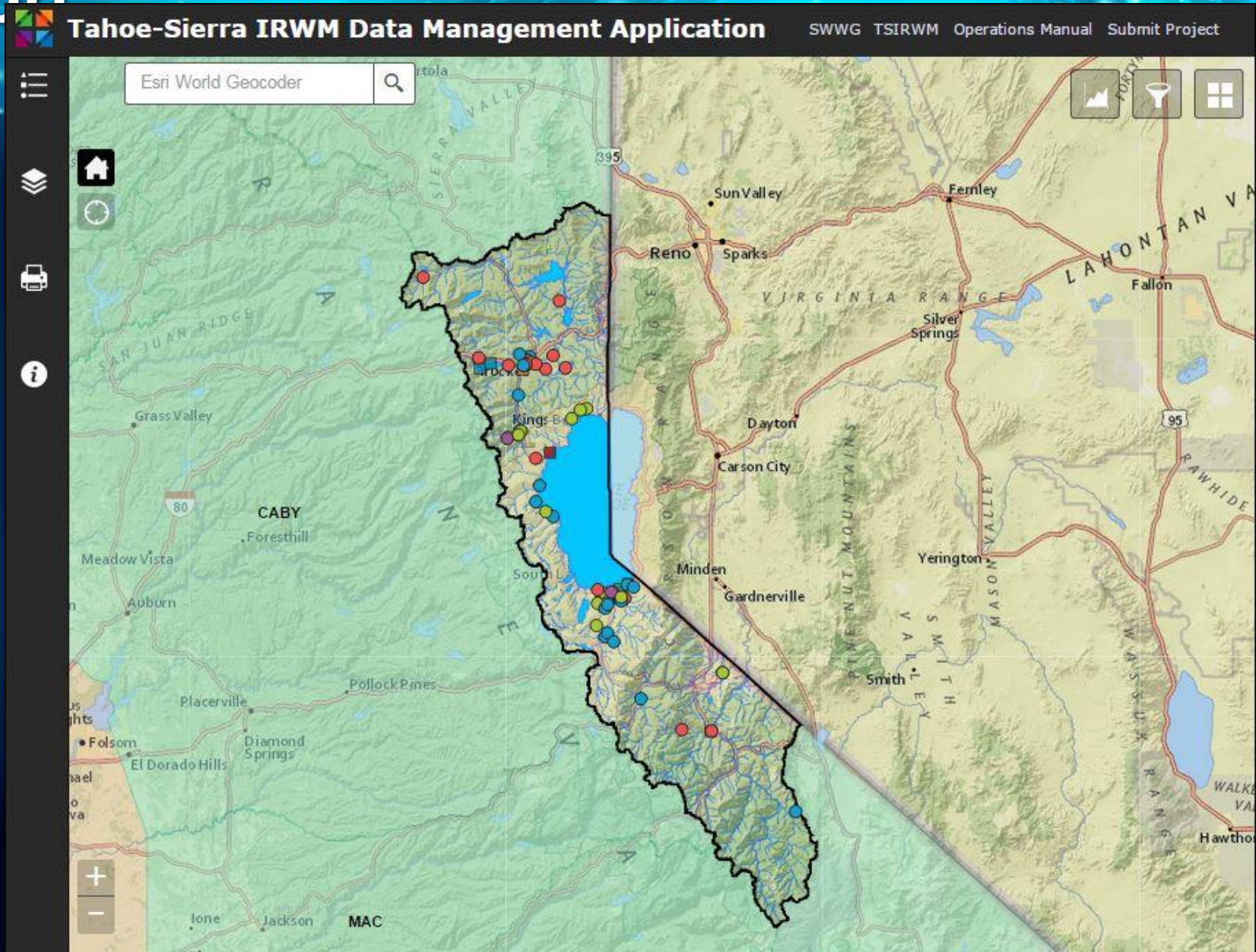
---

**The app displays resource, spatial boundary, and project data:**

**goal to be as simple to use as ‘Google Maps’ - for IRWM needs**



# Tahoe-Sierra IRWM Data Management App





# App

## Layer

## Legen

Print

## Charts

## Projects Query



# Tahoe-Sierra IRWM Projects

## TSIRWM Projects

- Flood Management/Stormwater
- Ecosystem Restoration
- Water Supply
- Groundwater
- Water Quality

(1 of 14)

### Verified Projects (Ongoing)

Project Title	Mountain View Well Ground Water Protections
Project Status	Ongoing
Project Category	Water Supply
Project Subcategory	None
Agency/Organization	South Tahoe Public Utility District
Agency/Organization Phone	530-543-6215
Project Description	STPUD performed a conditions assessment in 2012 of all water infrastructure. The Mountain View Well was identified in this assessment as needing extensive wellhead protection and rehabilitation. The well structures and appurtenances have exceeded AWU Useful Life and will need to be updated. The updates would include replacement piping, casing, screens, etc. In addition, the wellhead protection necessary at this well will also protect the groundwater resources.
Part of Larger Project	Yes
Larger Project Description	
IRWMP Objectives	WQ4, WS1, WS2, GWM1, IWM1
Impacts/Benefits	DAC
RMS	Urban Water Use Efficiency, Conveyance, Drinking Water Treatment & Distribution
Est. Project Cost	297,500
Current Stage	Permitting
Year of Completion	2015
Website	

Attachments:  
No attachments found

### Tahoe-Sierra Integrated Regional Water Management

Our effort is to identify regional water resources challenges and opportunities and prioritize actions and projects to address the challenges and opportunities. The goal has been to

[Zoom to](#)

# Charts Feature

Operations Manual Submit Project

Esri World Geocoder



## Chart

Click one of the following task items to execute chart.

- Verified Projects (Ongoing) by Category
- Verified Projects (Ongoing) by Subcategory
- Verified Projects (Ongoing) by Agency/Organization
- Verified Projects (Completed) by Category
- Verified Projects (Completed) by Subcategory
- Verified Projects (Completed) by Agency/Organization
- Submitted Projects by Category
- Submitted Projects by Subcategory
- Submitted Projects by Agency/Organization
- Total Estimated Cost per Agency/Organization (Ongoing Projects)**
- Total Estimated Cost per Agency/Organization (Completed Projects)
- Average Estimated Cost per Agency/Organization (Ongoing Projects)
- Average Estimated Cost per Agency/Organization (Completed Projects)

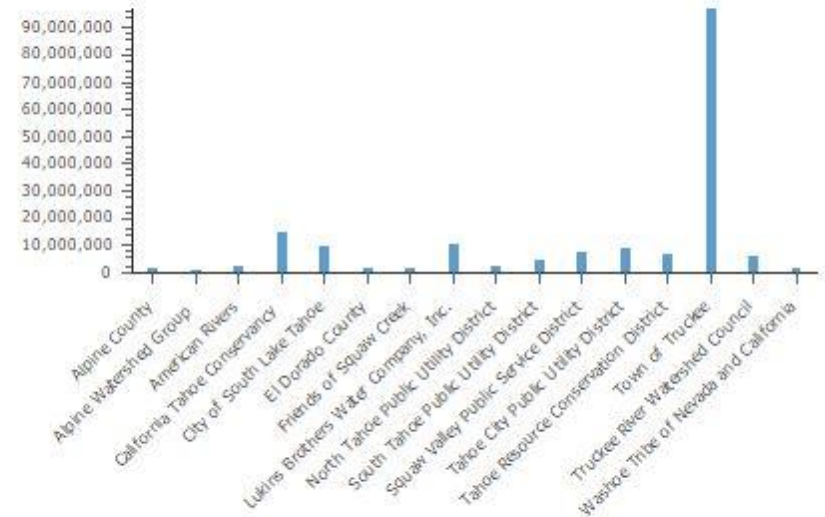
Clear

## Chart

Options

### Chart Results

Total Estimated Cost per Agency/Organization (Ongoing Projects)

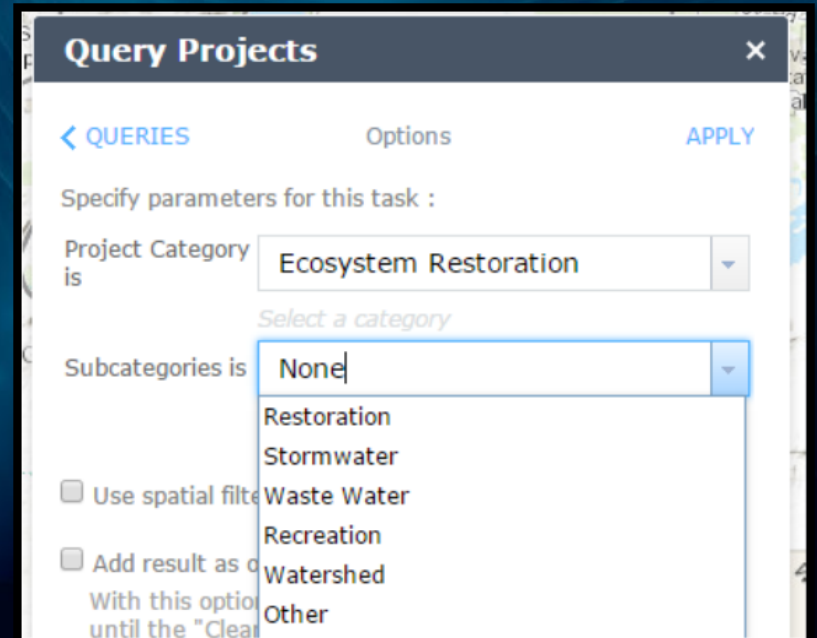
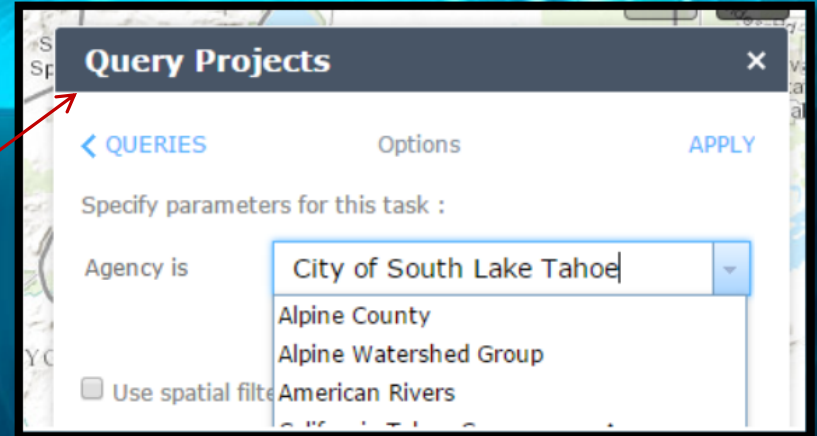
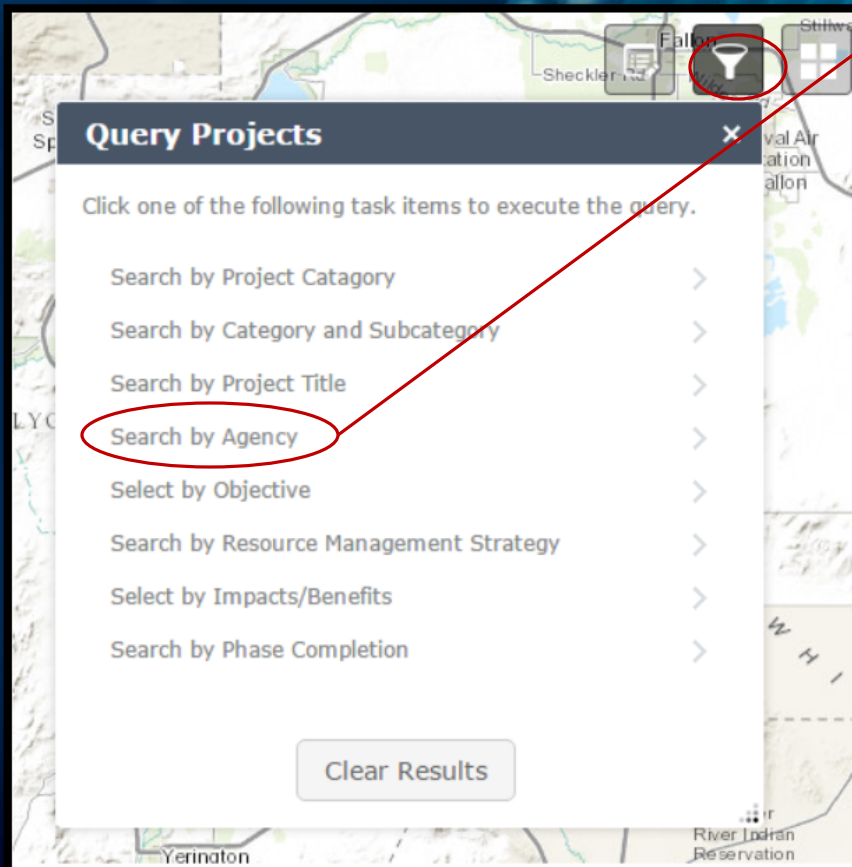


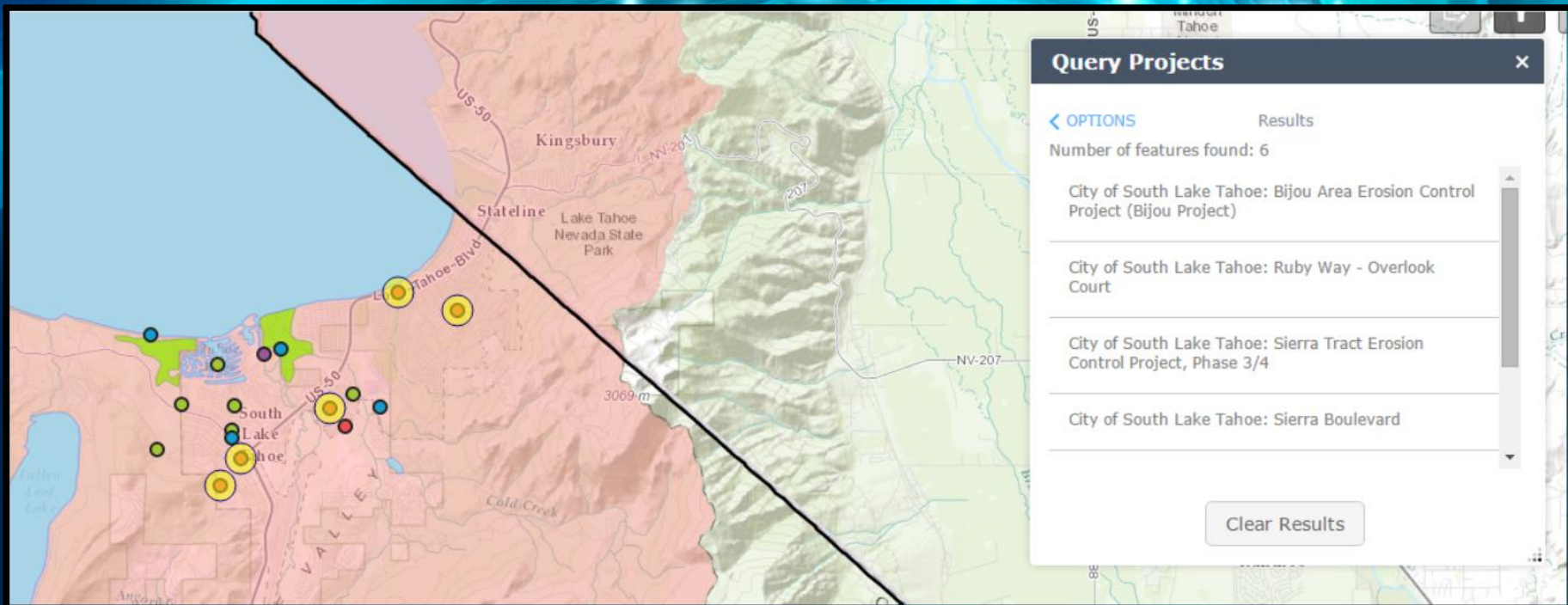
Sum of estimated costs for verified projects (ongoing). Drag right corner of chart window to resize.

Clear



# Query Projects Feature





Options Zoom to Clear Selection Refresh

Show Selected Records

Show Related Records

Filter

Filter by Map Extent

Show/Hide Columns

Export to CSV

		longitude	agency	primary contact	secondary contact
Aquatic Invasive Species Programs	39.31681	-120.1462	Town of Truckee	Dan Olsen	Alex Terrazas

60 features 0 selected

Print

Map Title: Tahoe-Sierra Web Map

Layout: MAP\_ONLY

Format: PDF

Advanced Print



# Print Map Feature



Yosemite-Mariposa Web Map

Print

Map Title: Yosemite-Mariposa Web Map

Layout: A3 Landscape

Format: PDF

Advanced Print

1. Yosemite-Mariposa Web Map

Clear Prints

Print

Map Title: Yosemite-Mariposa Web Map

Layout: A3 Landscape

Format: A3 Landscape

A3 Portrait

A4 Landscape

A4 Portrait

Letter ANSI A Landscape

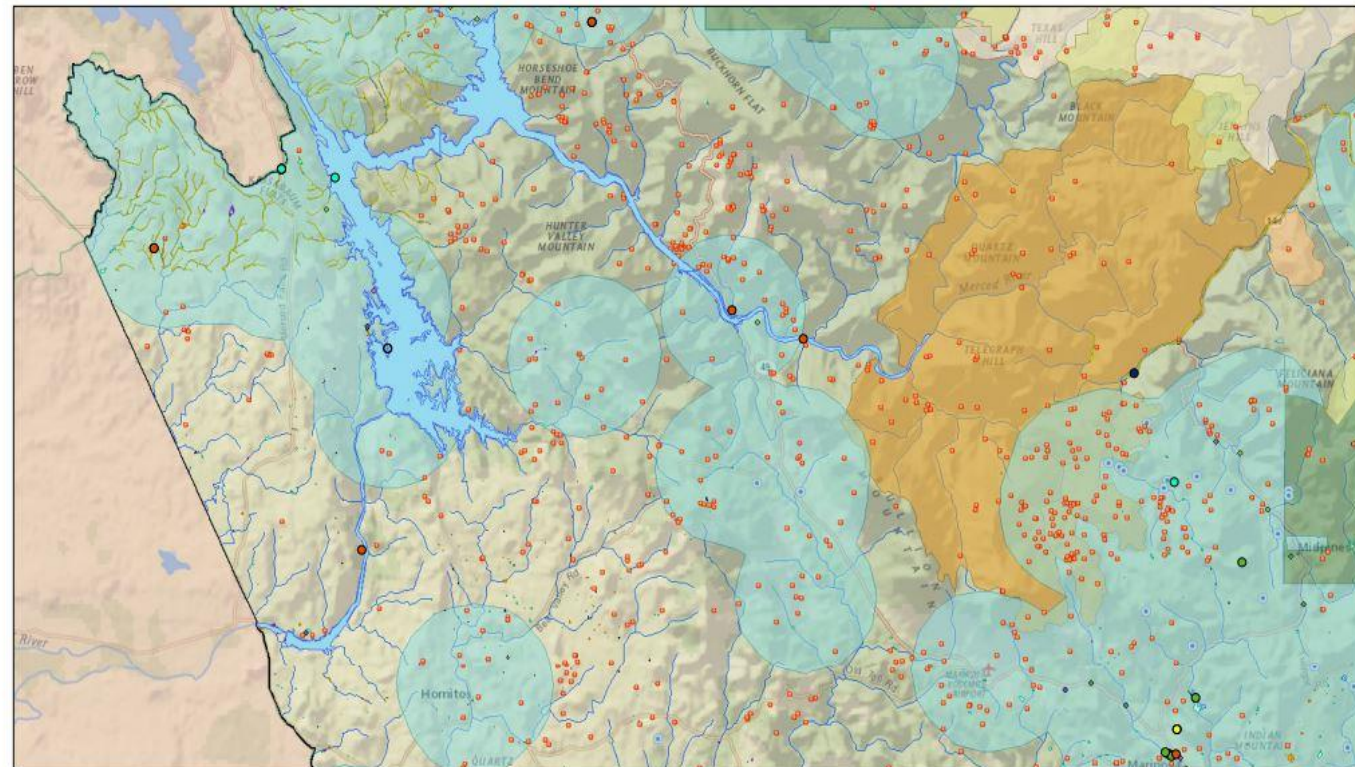
Letter ANSI A Portrait

MAP\_ONLY

Tabloid ANSI B Landscape

Tabloid ANSI B Portrait

Clear Prints



March 23, 2016

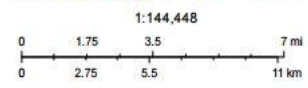
- Verified YM Projects - Ongoing
- Water Supply
  - Water Quality
  - Environmental and Habitat
  - Resource Stewardship
  - Community Involvement
  - Flood Management/Stormwater
  - No Info

- Wetlands
- Freshwater Emergent Wetland
  - Freshwater Forested/Shrub Wetland
  - Freshwater Pond
  - Lake
  - Other
  - Riverine
  - Mine Resources: Gold

- Wells Sampled
- Water System (Public) Type
  - Hotel/Motel Groundwater
  - Industrial/Agricultural Groundwater
  - Institution Groundwater
  - Mobile Home Park Surface Water
  - Recreation Groundwater
  - Recreation Surface Water

- Residential Groundwater
- Residential Surface Water
- Transient Groundwater
- Wildland Urban Intermix: Source Agency
- CDF, FS
- Federal, FS
- State, CDF

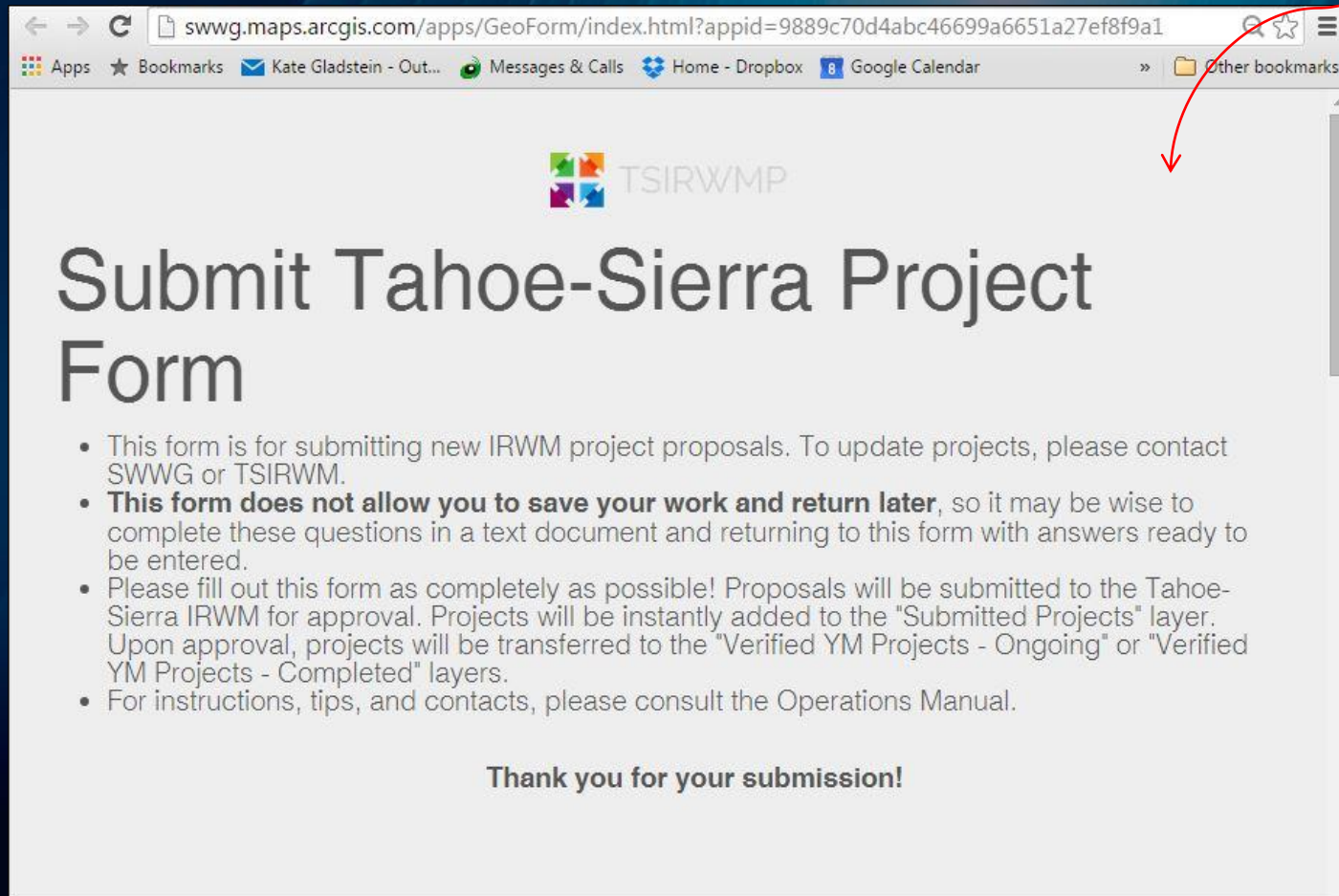
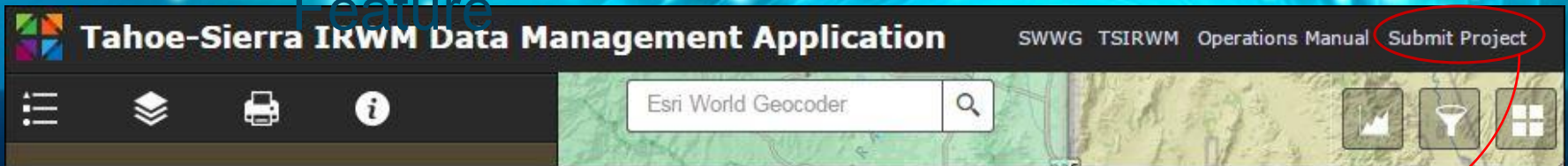
- Vegetation Burn Severity Boundaries
- 1980-1989
  - 1990-1999
  - 2000-2004
  - 2005-2009
  - 2010-2014
  - Streams and Canals



Content may not reflect National Geographic's current map policy. Sources: National Geographic, Esri, DeLorme, HERE, UNEP, WCMC, USGS, NASA, ESA, METI, NRCAN, GEBCO, NOAA, increment P Corp.

# Submit New Project

## Feature



- This form is for submitting new IRWM project proposals. To update projects, please contact SWWG or TSIRWM.
- **This form does not allow you to save your work and return later**, so it may be wise to complete these questions in a text document and returning to this form with answers ready to be entered.
- Please fill out this form as completely as possible! Proposals will be submitted to the Tahoe-Sierra IRWM for approval. Projects will be instantly added to the "Submitted Projects" layer. Upon approval, projects will be transferred to the "Verified YM Projects - Ongoing" or "Verified YM Projects - Completed" layers.
- For instructions, tips, and contacts, please consult the Operations Manual.

**Thank you for your submission!**



[Submit New Project](#)

## 1. Enter Information

Select...

Select... Specify the location for this entry by clicking.

Select...

Latitude: 38.97083, Longitude: -119.95755

Yuba

Select...

\_\_\_\_\_ Sacramento

A map of the San Francisco Bay Area. Vallejo is marked with a red dot and labeled. Concord is marked with a red dot and labeled. The map shows the bay, surrounding cities, and major roads.

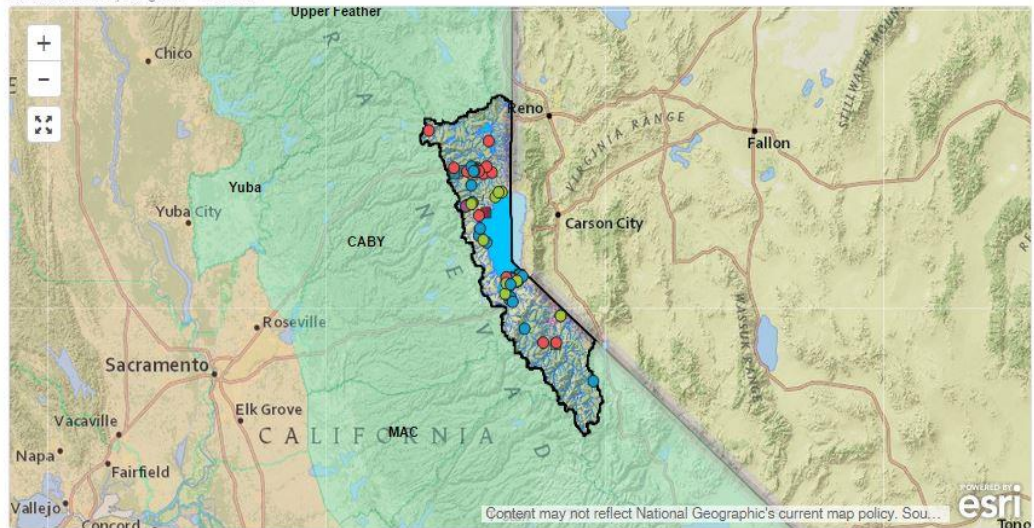
## 2. Select Location

Specify the location for this entry by clicking/tapping the map or by using one of the following options.

Search Lat/Lon

Find address or place

Latitude: 38.97083, Longitude: -119.95755

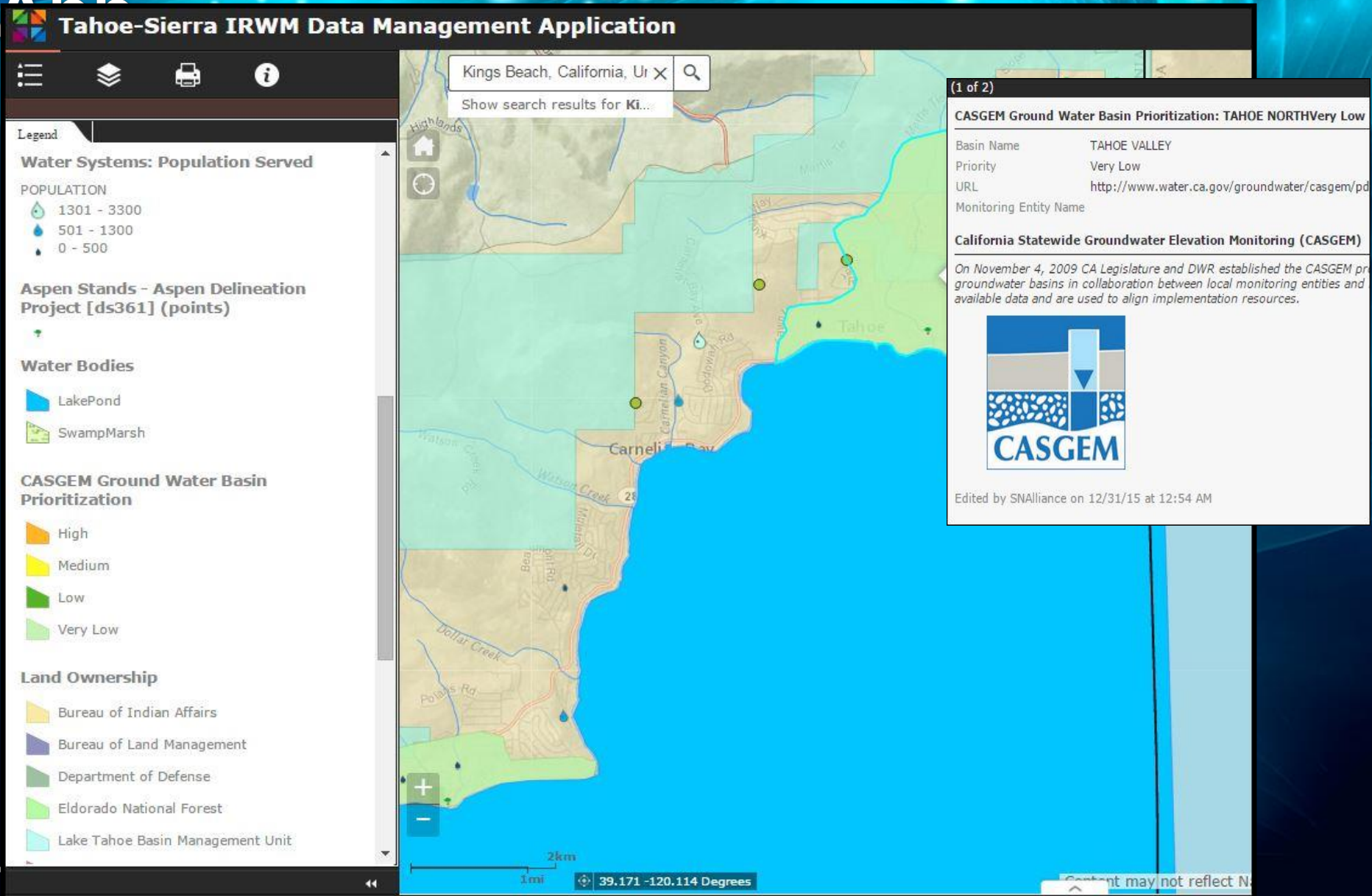


### 3. Complete Form

Add this information to the map.

[Submit Entry](#)

# Tahoe-Sierra IRWM Data Management



Features



# Yosemite-Mariposa IRWM

## Verified YM Projects - Ongoing

- Water Supply
- Water Quality
- Environmental and Habitat
- Resource Stewardship
- Operational Efficiency and Transfers
- Community Involvement
- Flood Management/Stormwater
- No Info

## Verified YM Projects - Completed

- Water Supply

## California Spotted Owl Home Range Core Areas



## Northern Sierra Nevada Foothills wildlife corridors



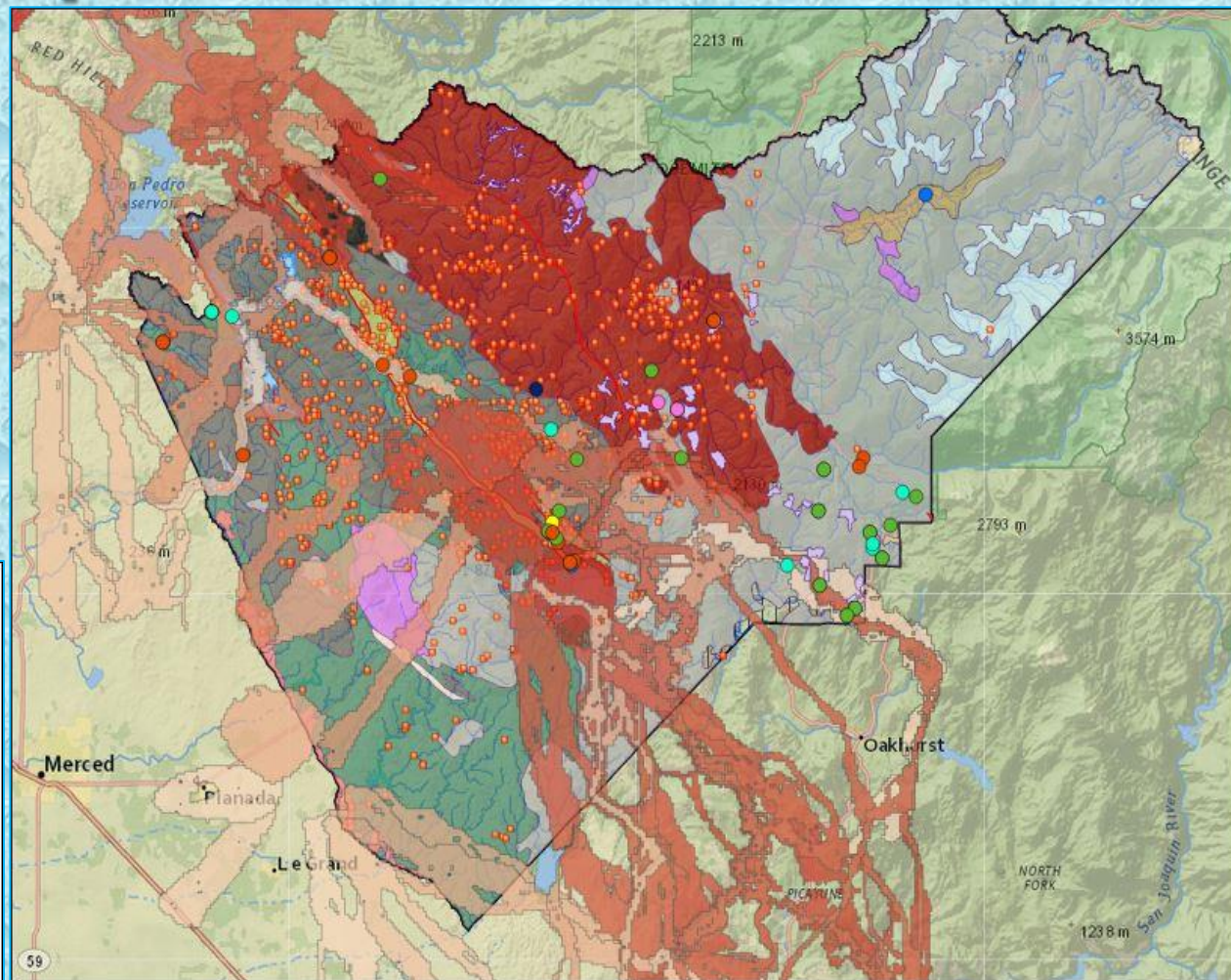
## California Faults

## Yosemite-Mariposa Geologic Units

- alluvium
- andesite
- argillite
- felsic volcanic rock
- gabbro
- glacial drift
- granodiorite
- intermediate volcanic rock
- mafic volcanic rock
- peridotite
- plutonic rock (phaneritic)
- sandstone
- schist
- slate
- tephrite (basanite)
- water

## Gold Resources

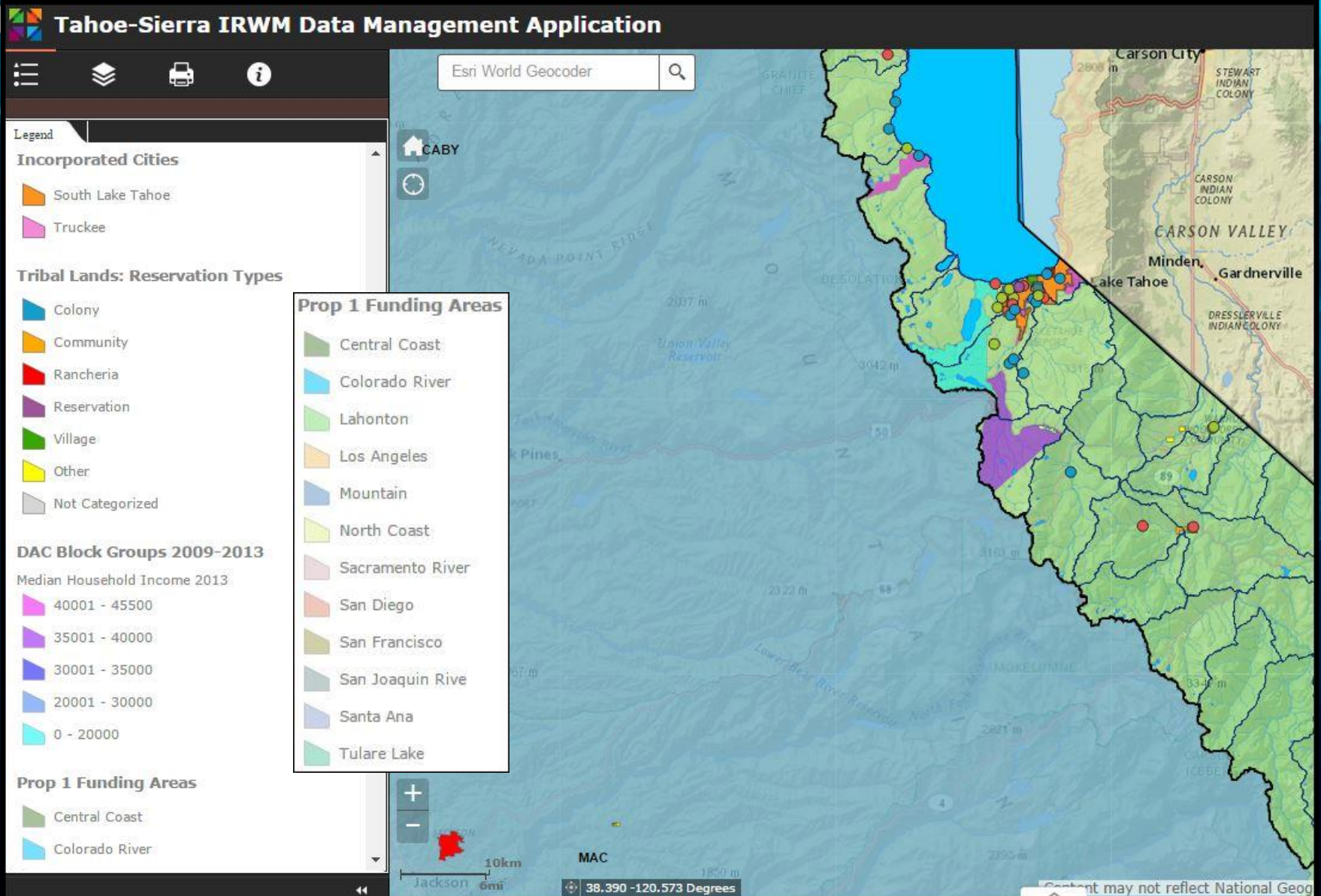
To Explore Our  
Features



Watershed's Unique



# Tahoe-Sierra IRWM Data Management



To Manage Our Watershed Communities



# Yosemite-Mariposa IRWM



## Yosemite-Mariposa IRWM Data Management Application

Sierra Water Workgroup Y-M IRWM New Project Form

**Legend**  
**Wildland Urban Intermix: Source Agency**

- CDF, FS
- Federal, FS
- State, CDF

**Old Forest Emphasis Areas: Forest Prescription**

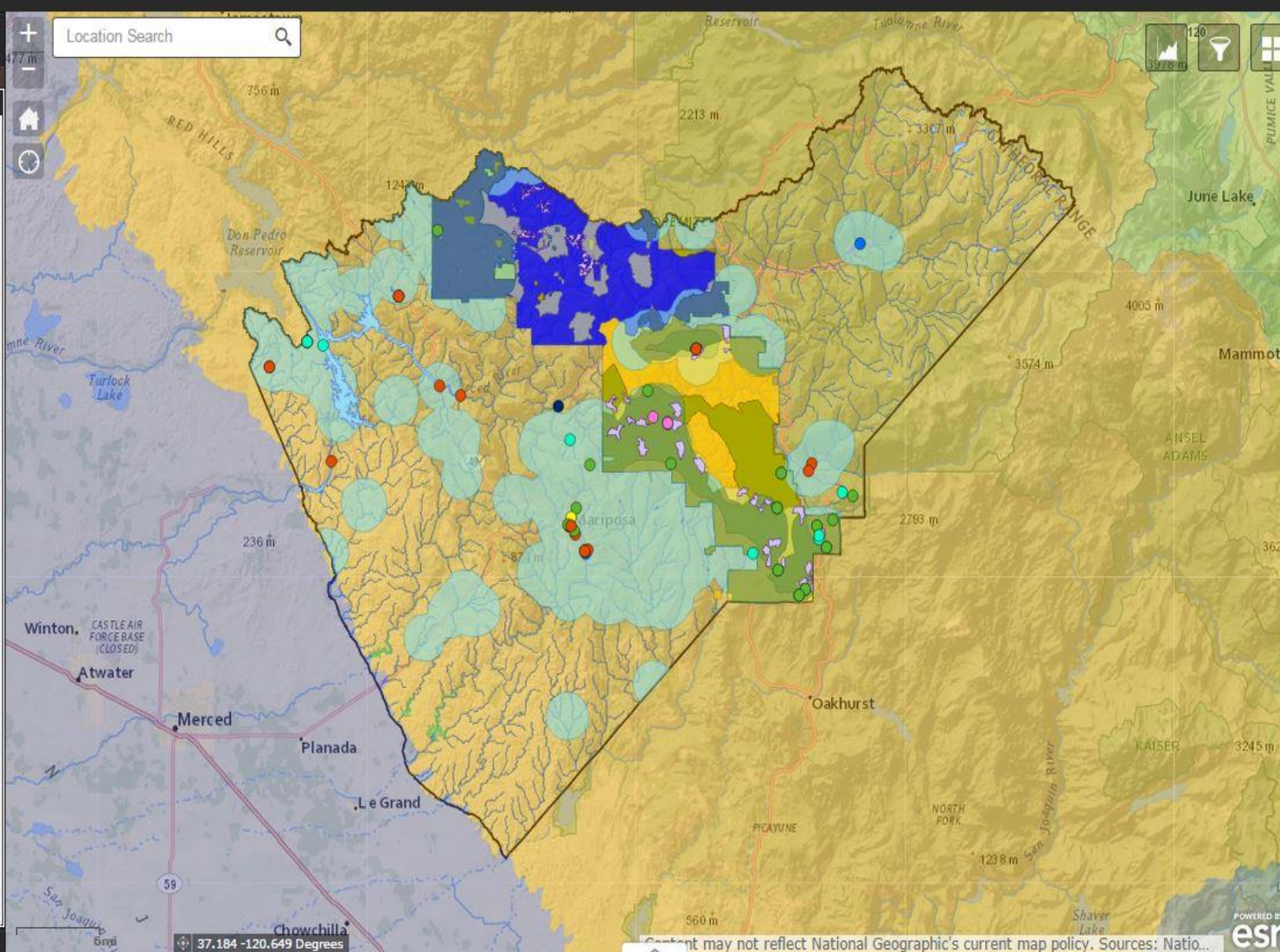
Fire: Burning with possible Pre-Mechanical Treatment. The objective of this prescription is to remove sufficient surface and ladder fuels so that prescribed burning is a possible choice for treatment. This is used primarily in Old Forest Emphasis Areas.

**National Forest Inventory Planning Units**

- Sierra
- Stanislaus

**Prop 1 Funding Areas**

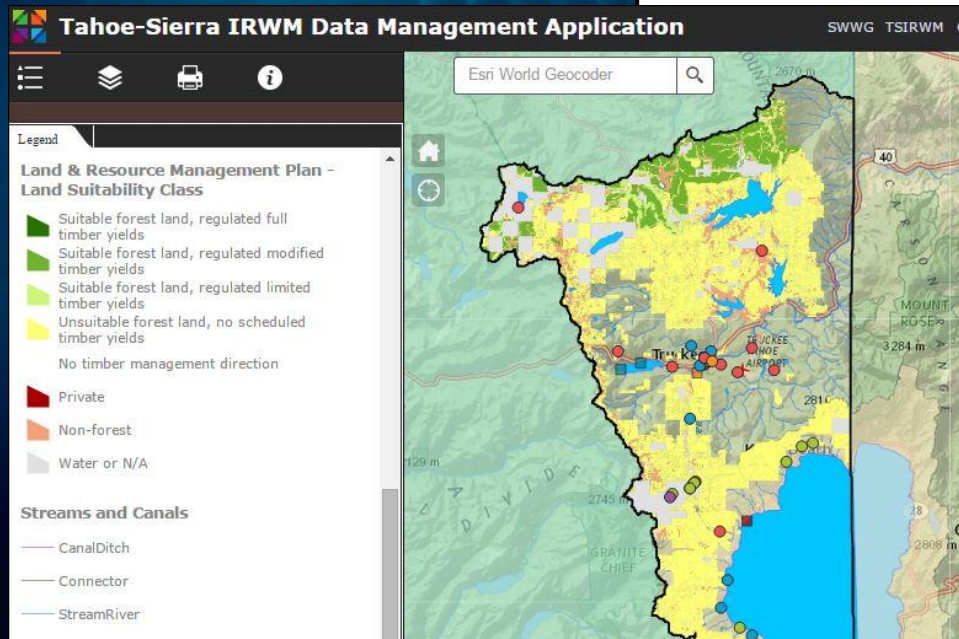
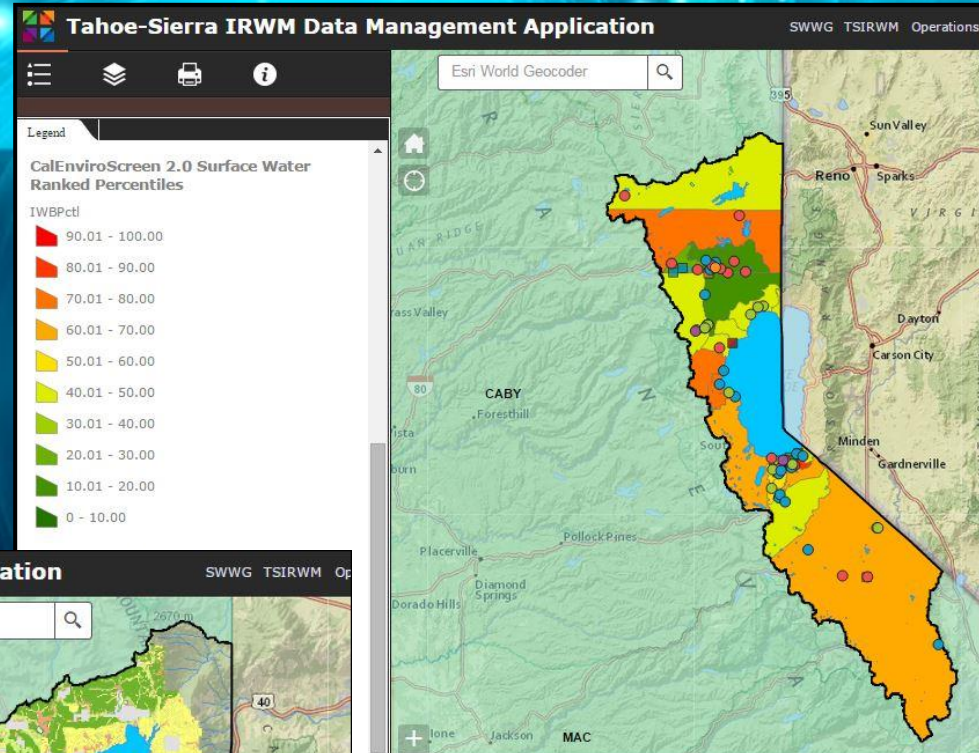
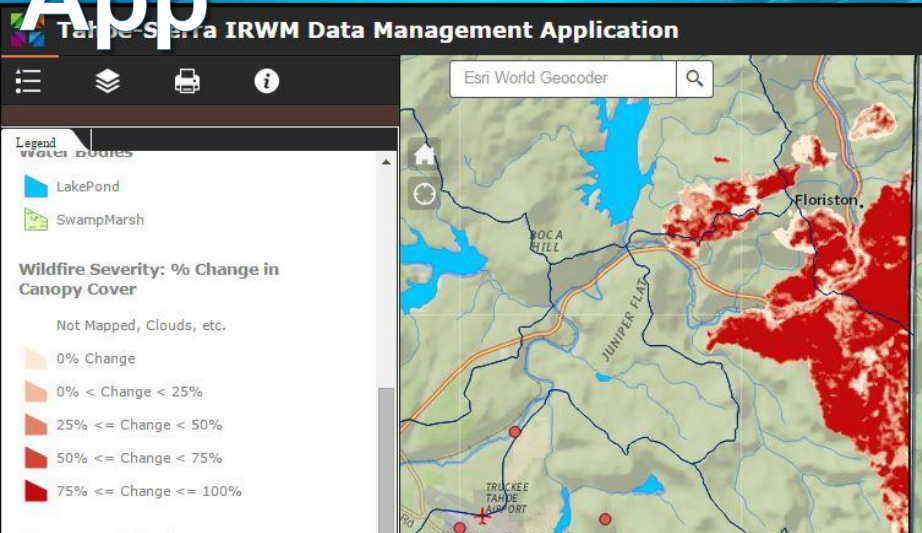
- Central Coast
- Colorado River
- Lahonton
- Los Angeles
- Mountain
- North Coast
- Sacramento River



To Manage Our watershed  
Communities



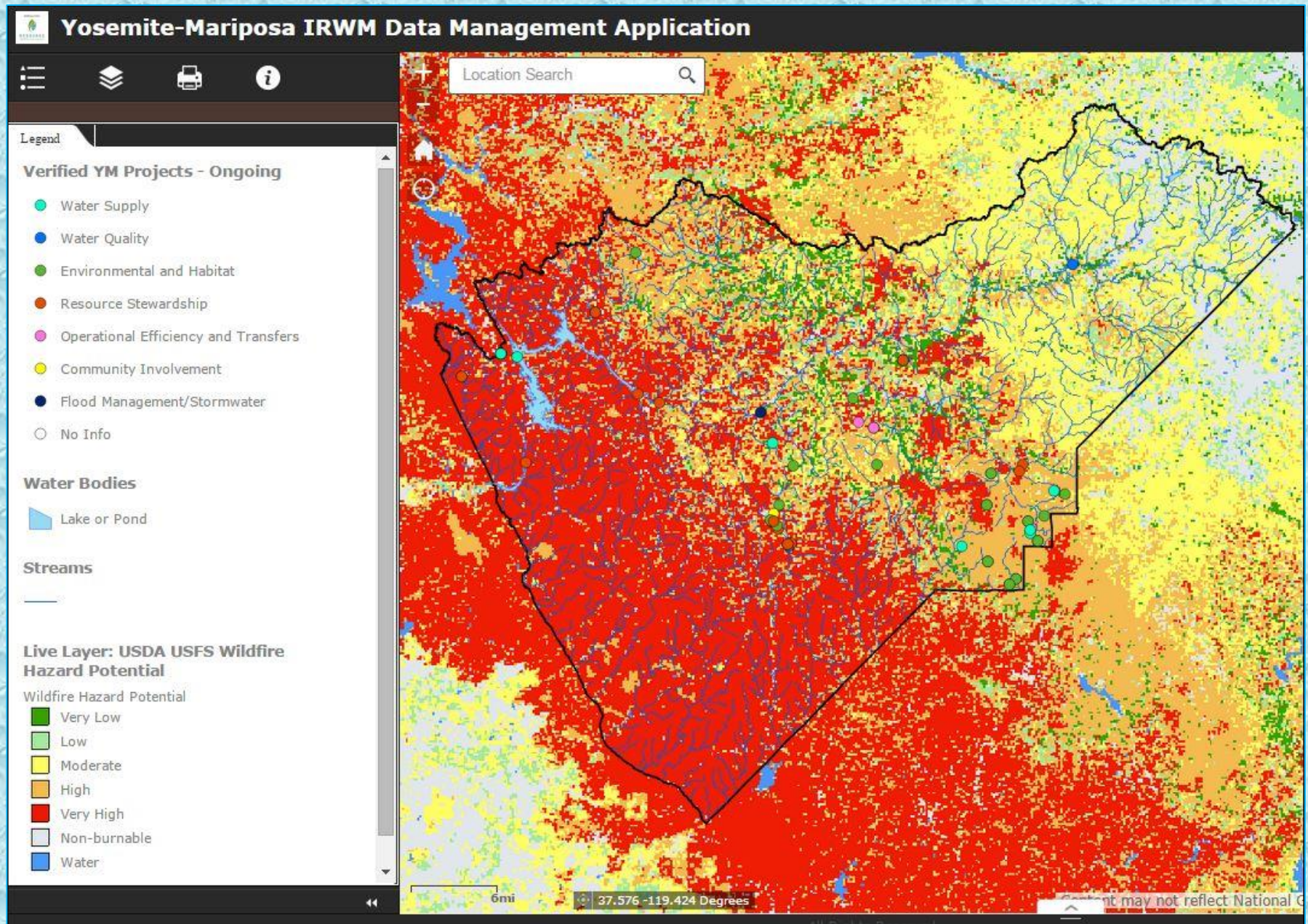
# Tahoe-Sierra IRWM Data Management App



To Track Our Watershed's Goals



# Yosemite-Mariposa IRWM







# Looking Forward

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Sierra Water Workgroup looks forward to continuing this project!  
To make this tool even more effective:

- Incorporation of all Sierra Nevada IRWMs;
- Interregional integration and collaboration for IRWMs;
- Increase IRWM project data as needed; and
- Potential for increased DAC assessment.

SWWG asked to speak at ESRI's 2016 Conference: Watershed  
Session

**Please visit our web tools:**

**<http://bit.do/TSIRWM>**

**<http://bit.do/YMIRWM>**

**Questions?**

**[Kqladstein@gmail.com](mailto:Kqladstein@gmail.com)**