

# Interagency Ecological Program 2024 Work Plan Element IEP-033 20-mm Survey (20-mm)

### **Project Manager and Affiliation**

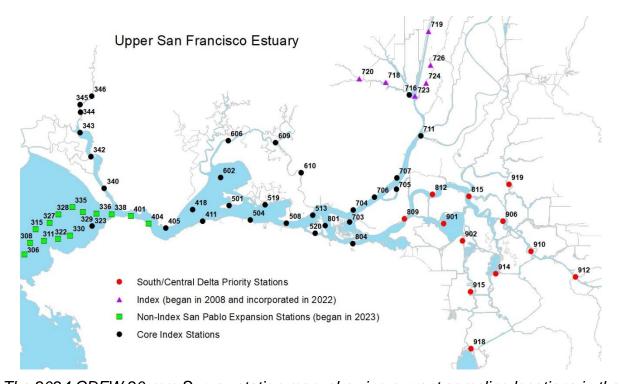
James Hobbs, CDFW

#### **Principal Investigator and Affiliation**

Vanessa Mora, CDFW

## **Annual Cost (thousands) and Funding Sources**

\$571 DWR; \$544 USBR



The 2024 CDFW 20-mm Survey station map, showing current sampling locations in the upper San Francisco Estuary. Stations marked with a black dot are index stations. Stations marked with a purple triangle are non-index stations that were added in 2008. Stations marked with a green square are high-outflow stations. Stations marked with red circles are south/central delta priority stations.

### **Description**

The 20-mm Survey monitors larval and juvenile Delta and Longfin Smelt distribution and abundance throughout their historic spring range in the Sacramento-San Joaquin Delta and upper Estuary.

#### **Project Need**

This survey provides up-to-date information specified in the 2019 Delta Smelt Biological Opinion (BO) for the operation of the SWP and the CVP. This survey monitors Delta Smelt around 20 mm TL in size which it is the size that "take" is counted against the SWP and CVP. This information allows managers to vary water operations and provide sufficient flows to maintain Delta Smelt rearing habitat away from the south and central Delta and minimize entrainment. This survey is also a requirement of Section 5.2 of Incidental Take Permit No. 2081-2009-001-03 for the State Water Project, issued by CDFW under the authority of the California Endangered Species Act and pursuant to Fish and Game Code sections 2081(b) and 2081(c), and California Code of Regulations, Title 14. Similar to Delta Smelt, the distribution and catch information of Longfin Smelt are used to determine entrainment risks and ensure that adequate flows are maintained for the protection of young Longfin Smelt.

### **Project Objectives**

- Determines the distribution of juvenile Delta and Longfin Smelt in relation to the major water diversions.
- Compares current relative abundance to historical annual abundances.
- Provides concurrent zooplankton density information to monitor the suitability of their food supply.

#### **Schedule of Milestones**

- Every two weeks between March through June field surveys will be conducted and field and laboratory results will be reported weekly to the Smelt Working Group and the WOMT team starting 5 days after the field sampling are concluded.
- Shortly afterwards, raw and calculated data will be uploaded to the Region 3's 20mm Survey web page.
- A memo describing the annual abundance index will be prepared and distributed in June.
- By the end of the calendar year a draft survey summary article will be submitted to the Editor of the IEP newsletter for publication.

#### **Project Products and Publications**

Not provided.