Fremont Weir
Sacramento River
Knights Landing Ridge Cut
Cache Creek
Willow Slough Bypass
Putah Creek
Lisbon Weir

Legend
Last Day Wet
1/1 - 2/1
2/1 - 2/15
2/15 - 3/1
3/1 - 3/15
3/15 - 4/1
4/1 - 4/15
4/15 - 5/1
5/1 - 5/15
5/15 - 6/1
6/1 - 6/15
6/15 - 7/1
7/1 - 7/15

Notes:
Yolo Bypass Salmonid Habitat Restoration and Fish Passage
Last Day Wet Sacramento Weir Channel 2011
Prepared for DWR  Created By: HDR
Figure F79
Appendix G

FEMA Requirements and FEMA FIRM Panels
FEMA Requirements

Fremont Weir is located in Yolo and Sutter Counties, California. The weir is primarily located in Yolo County but a small portion on the west side lies between the Sacramento River and the Old River cutoff. Since the county boundaries generally follow the old Sacramento River in this area, this portion of the weir resides in Sutter County. Since both of these communities participate in the National Flood Insurance Program (NFIP), they are required to follow the NFIP regulations related to floodplain development found in Chapter 44 of the Code of Federal Regulations (44 CFR).

The NFIP regulations are keyed to “development” in the floodplain. “Development” is defined as “any man-made change to improved or unimproved real estate.” The NFIP regulations identify the minimum requirements that communities must follow. The communities may establish more stringent requirements. The minimum requirements set forth in the CFR depend on the flood hazard and level of detail of the data FEMA provides to the community. For Sutter County and Yolo County in the area of the Fremont Weir, FEMA has provided flood insurance rate maps (FIRMs) showing special flood hazard areas (SFHA) Zone A and Zone AE. FEMA SFHA Zone A indicates areas subject to inundation by the 1-percent-annual-chance flood event. Because detailed hydrodynamic analyses have not been performed, no Base Flood Elevations (BFEs) or flood depths are shown on the flood hazard maps. FEMA SFHA Zone AE indicates areas subject to inundation by the 1-percent-annual-chance flood event determined by detailed methods. BFEs are shown within these zones. The flood maps in the area of Fremont Weir do not include a regulatory floodway. The current FIRM panels available from FEMA’s website (see also Appendix G) in the area of Fremont Weir are:

- Sutter County – Map No. 0603940795E, effective December 2, 2008
- Yolo County – Map No. 06113C0320G, effective June 18, 2010

In both counties, the Fremont Weir is located in an AE Zone with base flood elevations and no floodway designated. The specific regulation that applies to development in this case is 44 CFR 60.3(c)(10): [Communities must] Require until a regulatory floodway is designated, that no new construction, substantial improvements, or other development (including fill) shall be permitted within Zones A1-30 and AE on the community's FIRM, unless it is demonstrated that the cumulative effect of the proposed development, when combined with all other existing and anticipated development, will not increase the WSE of the base flood more than one foot at any point within the community.

In order to comply with this requirement, the effective flood insurance study hydrodynamic models must be obtained from FEMA. Specific procedures outlined by FEMA are then followed to develop the existing conditions and project conditions hydrodynamic models for comparison. Unless the individual communities have more stringent requirements, this would be the minimum analysis necessary to provide to the floodplain administrators of each jurisdiction where the project is located.