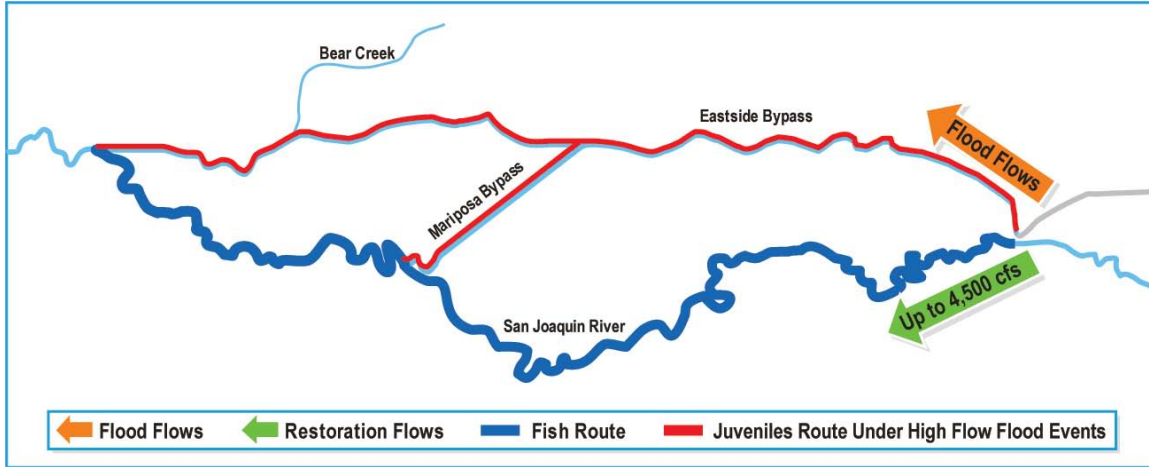
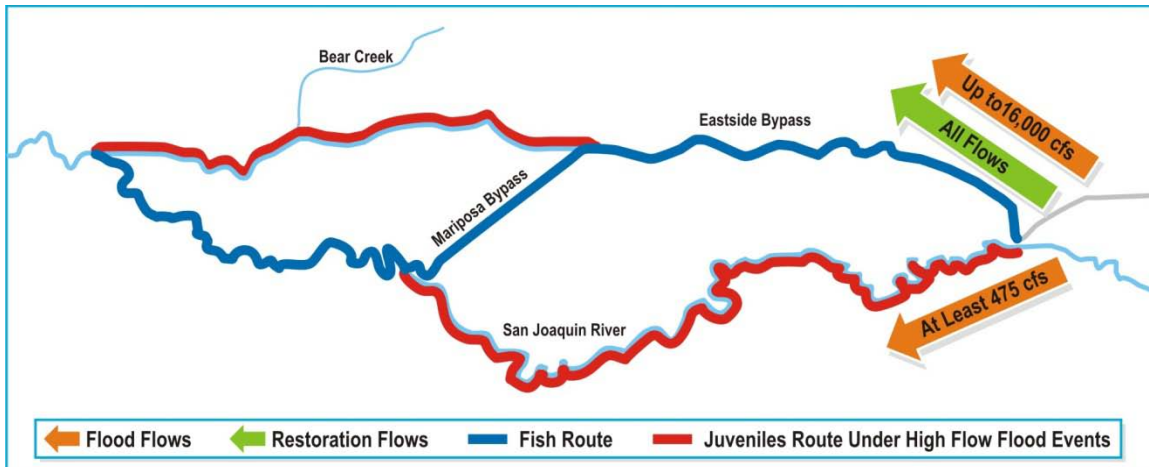




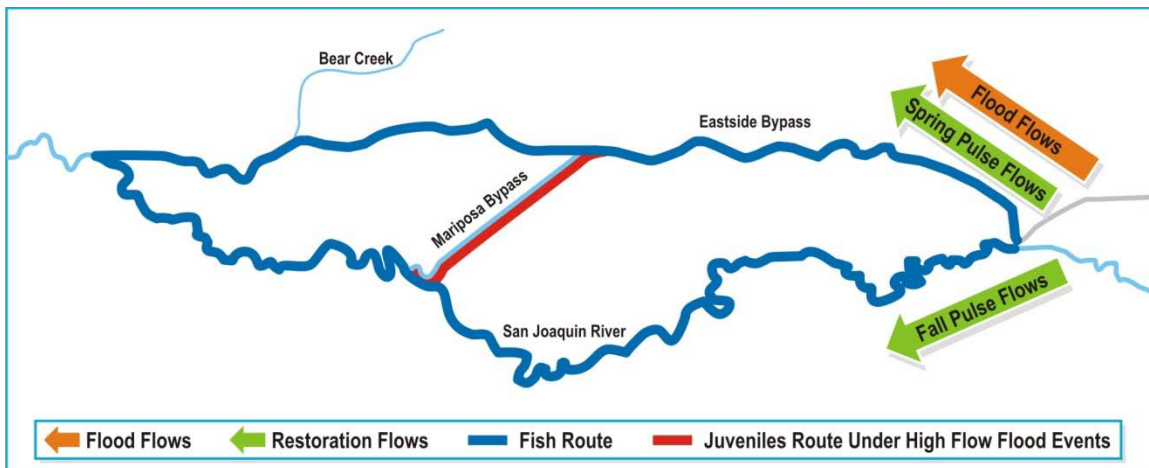
<b>Reach 4B Project Initial Alternatives</b>				
<b>Channel/ Structure</b>	<b>Initial Alternative 1 Main Channel Restoration</b>	<b>Initial Alternative 2 Bypass Restoration</b>	<b>Initial Alternative 3 Bypass All Pulse Flows</b>	<b>Initial Alternative 4 Split Pulse Flows and Restore Both</b>
San Joaquin River Flows	Up to 4,500 cfs (all Restoration Flows)	At least 475 cfs of Flood Flows	Restoration Flows of at least 475 cfs	Base and fall pulse flows; some spring pulse flows
Bypass System Flows	Flood flows greater than 4,500 cfs	All flows up to capacity	Flow greater than 475 cfs	Flow greater than Reach 4B capacity
Fish Routing	SJR	Eastside Bypass Reach 2, Mariposa Bypass	SJR, Eastside Bypass Reaches 2 and 3	SJR, Eastside Bypass Reach 2, Mariposa Bypass
Habitat	SJR	Bypass	SJR and Bypass	SJR and Bypass
Reach 4B Headgates	Remove Headgate	Simple Gate	Construct gates and roughened channel fishway	Construct gates and roughened channel fishway
Eastside Bypass Control Structure	No Change	No Change	Fish Passage	No Change
Mariposa Bypass Control Structure	No Change	Notch Center Bays	No Change	Notch Center Bays
Mariposa Drop Structure	No Change	Remove Drop Structure	No Change	Fish Passage
Reach 4B1 Levee Alignment Options	B, C, D	A	A	A, B, C



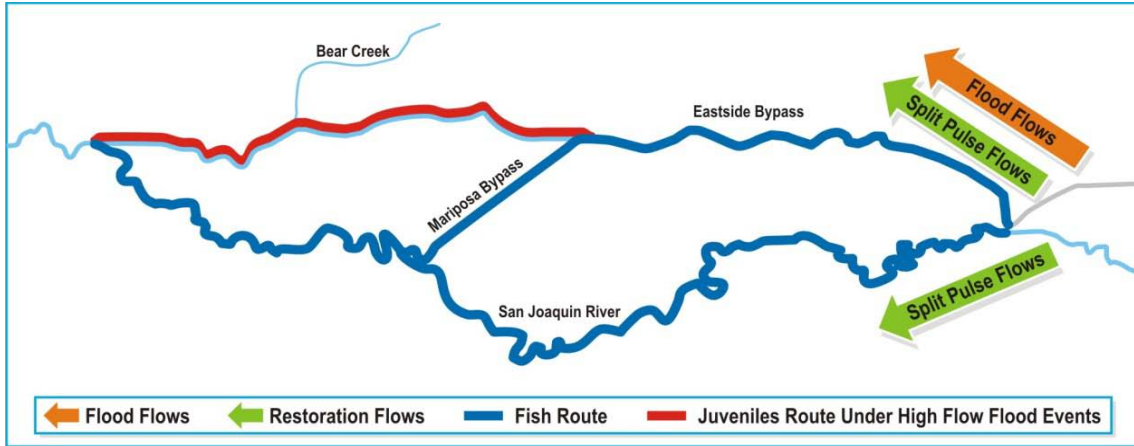
**Initial Alternative 1 – Main Channel Restoration**



**Initial Alternative 2 – Bypass Restoration**



**Initial Alternative 3 – Bypass All Pulse Flows**



**Initial Alternative 4 – Split Pulse Flows, Restore Both**

Levee Alignment Options for Reach 4B1							
Levee Alignment Options	Initial Alternative				Levee Length	Capacity	Approx. Width Between Levees
	1	2	3	4	Left/Right in feet		
Option A		✓	✓	✓	102,000/ 90,200	1,500 cfs	250-400 ft
Option B	✓			✓	77,800/ 76,400	4,500 cfs	1,300 to 2,000
Option C	✓			✓	72,800 / 66,300	4,500 cfs	3,500 to 5,500
Option D	✓				70,200 / 65,100	4,500 cfs	1-2 miles wide at widest part

cfs = cubic feet per second  
ft = feet