



The fish ladder on Fall Creek is being repaired.

SHMUEL THALER/SENTINEL

Swim with the fishes

Fish & Fishing

San Lorenzo Valley water district spends big to help little steelhead

By JASON HOPPIN

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✓ FELTON — From a rickety bridge high over a small river, you can look down into a dry creekbed and see framing lumber, rebar, jackhammers and fresh concrete pours, looking for all the world like a sophisticated road construction project.

It sort of is. Located at a sharp, steep bend along the cool, mountain-fed Fall Creek, the project is known as a fish ladder, a series of weirs with cutouts that allows fish to swim upstream.

The San Lorenzo Valley Water District is spending nearly \$300,000 on the project, which will help endangered steelhead while maintaining the water supply for thousands of Felton residents.

The fish ladder at Fall Creek is a great example of how a public utility can be an effective partner at improving the environ-

SEE LADDER ON A3



The Fall Creek fish ladder allows steelhead to swim upstream to spawn.

SHMUEL THALER/SENTINEL

IF YOU GO

PLANNING WORKSHOP

WHAT: The San Lorenzo Valley Water District wants input on management of a large piece of watershed property in Felton.

WHEN: 7-9:30 p.m. Thursday

WHERE: Felton Fire House, 131 Kirby St., Felton

LADDER

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ment an a fish habitat while also providing better water service to its customers," said Supervisor Bruce McPherson, who toured the project this week.

But like most renovation projects, this one didn't go exactly as planned. The work will span two years after district officials discovered shoddy work on the earlier fish ladder, which was built in 1996 and began to fail a few years after that. The project will also bring the ladder up to modern regulatory standards, which make it easier for young fish to get upstream.

"When we got in and got the stream dewatered, what we discovered is they hadn't really explored stream bedrock. Basically, they built it over the top of fill material," District Manager Jim Mueller said. "I don't want to denigrate anybody's construction, but it was pretty poorly constructed."

The ladder is the price of doing business in an ecologically sensitive area. Several county water districts face environmental challenges, from taking steps to improve fish counts in streams to saltwater encroaching on depleted groundwater supplies.

Local fisheries biologist Don Alley is assisting with the project, relocating scores of fish further upstream during construction, which involves diverting the stream through a makeshift pipeline. Alley said the fish appear to be doing well.

"There were a lot of juvenile fish in here," Alley said.

The 100-square-mile San Lorenzo watershed includes three federally listed species, including two salmonoids: steelhead and coho. If they can get there, fish enjoy Fall Creek, one of the first

major tributaries of the San Lorenzo River.

Juvenile salmon will spend a year or two in the stream, pushing as far upstream as they can go. That makes a fish ladder critical wherever humans have installed barriers, such as the one in place at the Fall Creek water intake.

"Although steelheads are best swimmers of the bunch, they're limited by how high they jump and how deep the pool is that approaches the obstacle," Alley said.

The poor construction allowed water to flow under the weirs, or barrier designed to alter the flow, and kept the pools from filling up. In addition, new standards have lowered the jump heights for to just six inches for juvenile fish. One jump had been two feet tall.

Due to the steep terrain, bulldozers and other large machines can't be used. Much of the work is being done by hand.

"They spent a lot of hand-digging and jackhammering," water district operations manager Rick Rodgers said, adding that the district bought 70 dumpster bags, called Bagsters. "We'd stack 'em and crane 'em out everyday. We probably took 100 (cubic) yards of material out of that small area."

The Resource Conservation District of Santa Cruz County is helping the district with the project, not only lending expertise but clearing the way for multiple permit approvals through a coordinated permitting process, with the Fall Creek project requiring go-ahead from five different federal, state and local agencies.

"It saves a lot of time. What could have been a couple of years to get a project like this permitted, we're able to do within a year," said Alicia Moss, a program specialist

with the Resource Conservation District. "And it significantly reduces the cost."

Work on the project will stop next week, in time for winter rains. It will resume in August.

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