

Title: Yakima River Coho Re-Introduction Feasibility Study

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Smolts were released in 2004 volitionally on April 5, 2005. Approximately 810,000 coho smolts were released from four acclimation sites. Two acclimation sites were located on the Naches River, Stiles and Lost Creek, and two on the Upper Yakima River, Holmes Ponds and Boone Pond. In 2004, the decision was made to abandon the old release strategy of holding fish longer into the spring and begin releasing smolts volitionally early in April. In addition to the change in release timing, all out of basin (Willard Coho) were acclimated in sites offering the highest survival, with ultimate goal of getting more acclimated smolts out of the basin. The remaining in basin smolts were released at the two sites with the lower survival. This adaptive approach was a relative success. Overall passage out of the Yakima Basin jumped from a low of 14, 500 in 2003 to approximately 164,000 in 2004. Pit tag survival from Holmes and Stiles was good at 11% and 19% respectively, and both the upper release sites had 17% pit tag survival.

In 2004-2005 the Yakima River Coho escapement was close to the 2003- 2004 escapement of 2,350 adult coho. The escapement above Prosser Dam was 2,341 coho. Of this total 501 (22%) were of hatchery origin and 1779 (78%) were of natural origin. These numbers do not include the 37 hatchery jacks and 24 wild jacks counted. A total of 257 redds were located in the Yakima Basin, including approximately 87 redds located in the Naches River up to Wapatox Dam (RM 17) and 33 redds found near the Holmes acclimation site. A milestone reached during the 2004 spawning surveys was finding redds near the Lost Creek Acclimation site RM 38. In addition, landowners at the Lost Creek Acclimation site reported observing silver salmon at the out fall to the ponds in late October.

Summer residual surveys continued to find no evidence of residualism in juvenile coho released from the Naches or Upper Yakima River. However, surveys did located high numbers of natural rearing coho in the lower Naches River and in the main stem Yakima River near Toppenish.