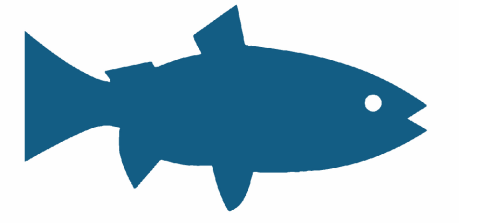




LEAVENWORTH NATIONAL FISH HATCHERY



Leavenworth National Fish Hatchery (LNFH) operates to provide mitigation for anadromous fish losses above Grand Coulee Dam. Located on Icicle Creek, LNFH produces a variety of species including spring and summer Chinook, coho, and steelhead to enhance fish runs in the Columbia Basin. The Icicle Work Group has proposed several projects to improve hatchery operation, reduce water use, and improve water quality.

Combined, these projects will provide an additional 20 cfs of water in Icicle Creek for instream flow and fish benefit year round.

Hatchery Conservation: Install recirculating tanks that reduce water use. Recirculating tanks also improve water quality.

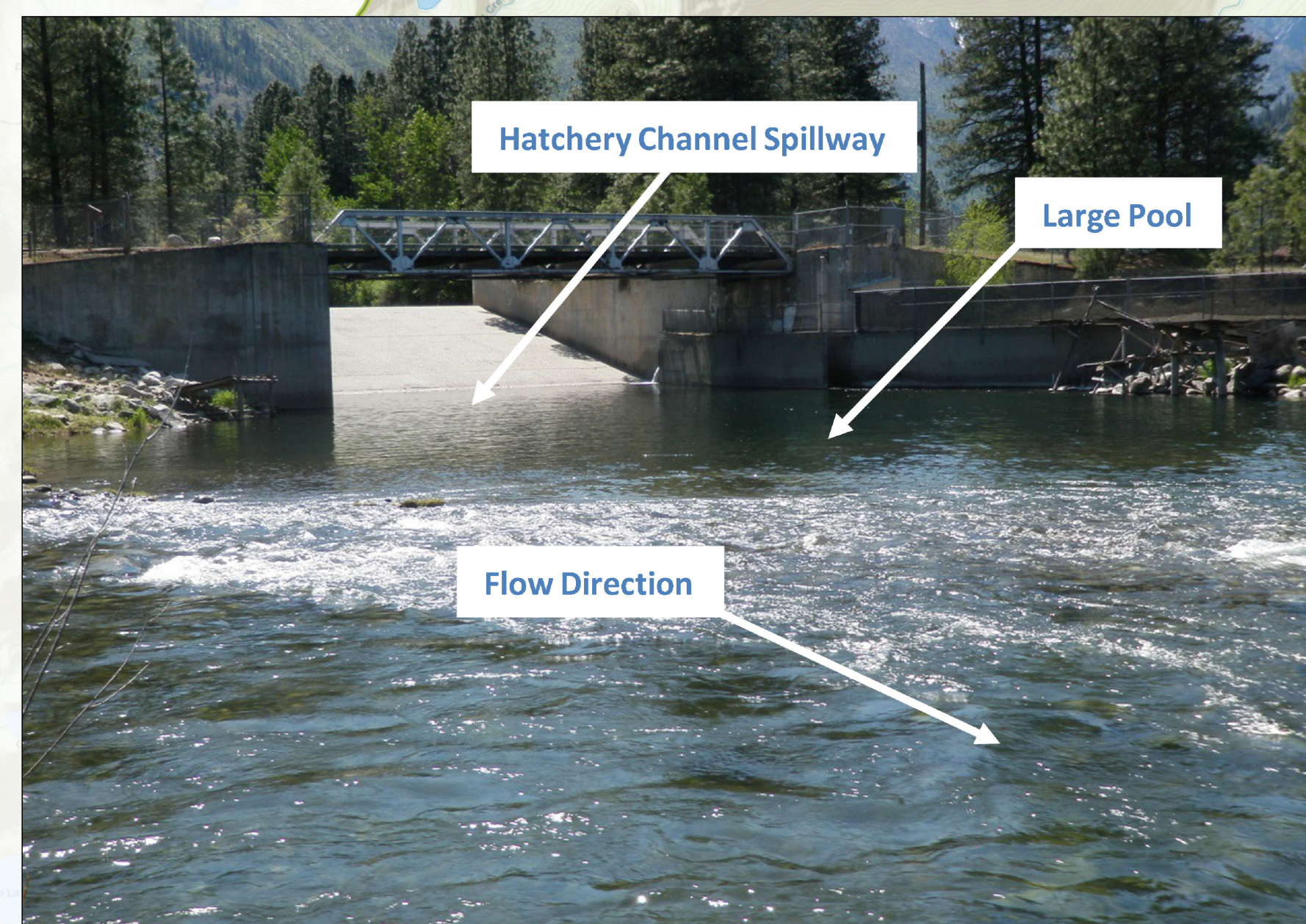
Groundwater Augmentation: Restore diminished groundwater supply through new well construction to meet temperature and pathogen standards.

Effluent Pumpback: Reuse effluent water to augment groundwater supply. This will decrease water withdrawals from Icicle Creek.

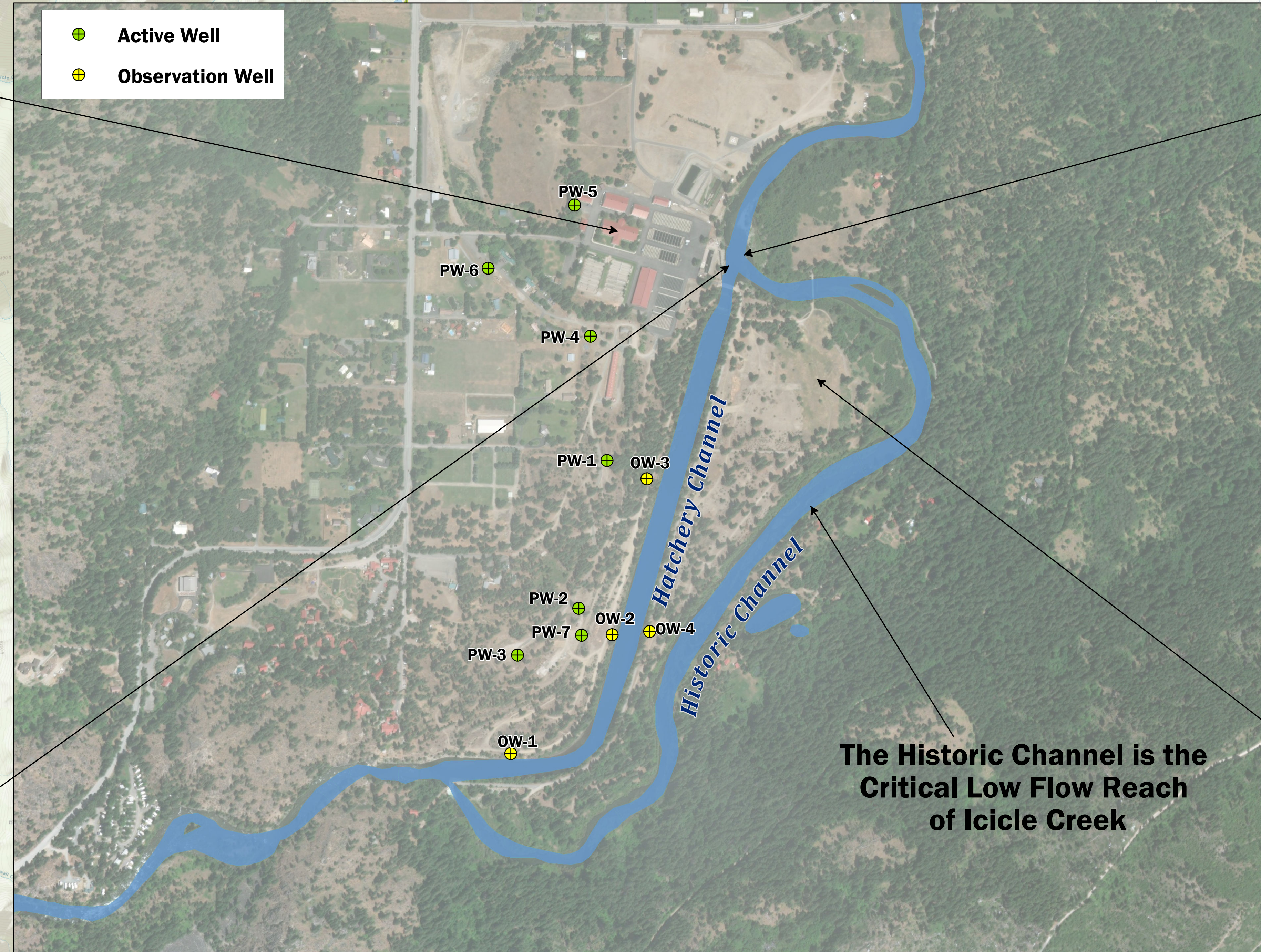
THE HATCHERY



Hatchery Conservation (Circular Tanks)



Spillway and Tribal Fishery at Downstream Pool



Filling Hatchery Channel

Fill Line

Water Stored in Hatchery Channel



Groundwater Augmentation (Test Pits for proposed groundwater infiltration gallery on Hatchery Island)

TRIBAL FISHERIES PROJECTIONS

The Yakama Nation and the Confederated Tribes of the Colville Reservation exercise federally protected fishing rights on Icicle Creek. From early May through mid-July of each year, the Yakama and Colville fish near the LNFH at several locations, including the plunge pool at the base of the LNFH spillway. The Tribal Fisheries Preservation and Enhancement Project will ensure projects proposed as part of the Icicle Strategy will not negatively affect the Tribal fisheries. This work would include studying the flow and channel morphology of Icicle Creek, fishery effectiveness monitoring, and developing an adaptive management plan.



Fishing at Plunge Pool



Plunge Pool at 700 cfs



Plunge Pool at 1700 cfs