Ridgefield Pits Restoration Project Memo to Technical Oversite Group -- NMFS Comments

**Draft Restoration Goals:**

Goal 1: Restore Native Vegetation Communities

* NMFS agrees this is a valuable component to the Ridgefield pits restoration efforts. In addition to providing sources of wood to be recruited, this goal and it subsequent objectives are in alignment with several key priorities identified by the LCFRB within the EFLR sub-basin recovery plan

Goal 2: Enhance Thermal Refuge

* NMFS believes this is a vital component to the restoration efforts. Cold-water refugia is a habitat feature necessary for ESA listed salmonids throughout their life histories, and in the face of climate change protection/enhancement of these areas will be pivotal in recovery efforts. The objectives of this goal will all support the protection/enhancement of cold-water refugia sites. However without grading of avulsed pits, their lentic nature will support warm water and negate any benefits to restoration of cold water refugia sites.

Goal 3: Increase Quality and Quantity of Spawning and Rearing Habitat

* All of these ESA listed species are “Primary” populations with respect to recovery within the Lower Columbia River. NMFS is highly supportive of any habitat restoration/enhancement projects that have the potential to increase the production potential within the EFLR. All of the objectives for this goal meet or exceed minimum design criteria for habitat restoration projects. If implemented there is no doubt the quantity and quality of spawning and rearing habitat would be increased.

Goal 4: Restore Channel Migration Zone and Floodplain Connectivity

* This goal and objectives, while important, and consistent with a key priority within the LCFRB EFLR sub-basin recovery plan, seems to clash with Goal 6. It may be advantageous to combine goals 4 and 6 as they rely so heavily on one another to be successful.

Goal 5: Create A Dynamic Channel Which Supports Adjustments and Sediment Transport

* NMFS agrees with this goal and objectives, and agrees is pivotal in the restoration of the Ridgefield pits.

Goal 6: Develop Restoration Approaches and Actions Consistent With Existing Land Use

* See goal 4 above

**Draft Restoration Alternatives:**

NMFS is most supportive of the Full Floodplain and Pits regrade, and believes this is the best option with respect to contributing to the recovery of the “Primary” ESA populations within the EFLR. It should be noted that NMFS is supportive of any habitat restoration actions, which support the recovery of ESA listed species and their critical habitats. However, we also understand that cost and other outside factors could influence the final restoration designs and future implementation of the Ridgefield Pits Restoration Project. Additionally, NMFS would be least supportive of the No Action/ Passive Recovery alternative, and would need significant evidence that the relocation of the main-channel alternative would have a very low chance of failure (avulsing back into the pits), before supporting this alternative.

Finally, NMFS thanks you for the opportunity to comment on the Ridgefield Pits Restoration Alternatives Memo, and looks forward to future collaboration with the Technical Oversite Group. We are standing by to assist with any pre-consultation requests with respect to ESA take coverage on proposed restoration activities. Please feel free to contact me (Joshua.ashline@noaa.gov) if you have any questions or concerns.