



PUBLIC UTILITY DISTRICT NO. 1 of CHELAN COUNTY
P.O. Box 1231, Wenatchee, WA 98807-1231 • 327 N. Wenatchee Ave., Wenatchee, WA 98801
(509) 663-8121 • Toll free 1-888-663-8121 • www.chelanpud.org

March 13, 2015

VIA ELECTRONIC MAILING

Honorable Kimberly D. Bose, Secretary, and
Nathaniel J. Davis, Sr., Deputy Secretary
FEDERAL ENERGY REGULATORY COMMISSION
888 First Street, NE
Washington, DC 20426

Re: **Lake Chelan Hydroelectric Project No. 637**
License Article 408, Appendix D Water Quality Certification Condition IV.E. and
Settlement Agreement Article 7(c)(2) -
Notice of Temporary Changes in Pumped Flow to Habitat Channel for 2014
and 2015

Dear Secretary Bose and Deputy Secretary Davis:

In our letter dated October 14, 2013, the Public Utility District No. 1 of Chelan County, Washington (Chelan PUD), notified the Federal Energy Regulatory Commission's (Commission) of a temporary change in flow to the Chelan River habitat channel by operating four rather than five pumps during the October 15 through November 30, 2013 (fall 2013) Chinook salmon spawning period. In your letter order dated February 25, 2014, the Commission acknowledged this change. On March 13, 2015, Chelan PUD contacted Mr. Thomas LoVullo, the Commission's Aquatic Resources Branch Chief to discuss the changes described below.

As outlined also in our October 2013 letter, components of the temporary action plan for evaluating reduced flows and spawning habitat availability in the Chelan River habitat channel was to "...conduct the same pump operation (four pumps versus five) during the steelhead spawning period, March 15 through May 15, in 2014." Per the August 14, 2013, Chelan River Fishery Forum (CRFF) meeting minutes, the "... CRFF agreed that Chelan PUD should execute Plan B, flow reduction in the habitat channel, 4-pump operation in fall 2013 and spring 2014..."

Chelan PUD implemented 4-pump operation during the Chinook salmon spawning period, from October 15 through November 30, 2013, and the steelhead spawning period, March 15 through May 15, 2014. Results of the evaluation of flow adjustments on spawning habitat and use for

both Chinook salmon and steelhead will be included in our Biological Objectives Status Report due to the Commission on April 30, 2015.

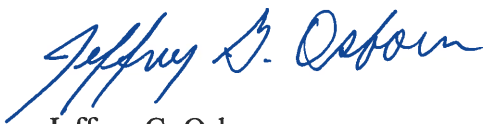
No steelhead redds were observed in the habitat channel during weekly spawning ground surveys conducted between March 15 and May 15, 2014. Participants noted during the August 20, 2014, CRFF meeting that the lack of steelhead spawning in the habitat channel in 2014 was probably related to a Columbia River-wide incidence of low adult steelhead returns. Additionally, the CRFF speculated, and agreed, that the lack of steelhead may have been due also to the Wanapum dam crack incident delaying steelhead upstream migration in 2014.

Measures focused on increasing steelhead spawning habitat availability and suitability was discussed by the CRFF during the February 4, 2015, forum meeting, specifically reducing pump station flows during the spawning period and providing gravel enhancement to the habitat channel. Based on input from CRFF members after the February 4 meeting, the CRFF supported Chelan PUD implementing 4-pump operation for the steelhead spawning period from March 15 through May 15, 2015. Steelhead spawning ground surveys will be conducted by Chelan PUD on a weekly basis, results will be reported to the CRFF upon completion of the steelhead spawning period and surveys, and results will be discussed and evaluated during CRFF meetings to determine future actions. Chelan PUD and the CRFF will be continuing the adaptive management approach to meeting biological objectives in the Chelan River habitat channel, specifically measures to increase steelhead spawning availability and suitability. Chelan PUD will notify the Commission of any future temporary changes in pumped flows for both steelhead and Chinook salmon spawning.

A record of CRFF discussion and agreement with the continued adaptive management approach is attached with this letter.

Please contact me (509) 661-4176 regarding any questions or comments.

Sincerely,



Jeffrey G. Osborn
Compliance Program Supervisor
jeff.osborn@chelanpud.org

cc: Erich Gaedeke, FERC Portland Regional Office
Chris Coffin, Washington Department of Ecology
Chelan River Fishery Forum

Enclosure: Chelan River Fishery Forum consultation record

CONSULTATION RECORD

Chelan PUD provided a draft of the Habitat Channel Flow Reduction Proposal to Ecology and other CRFF participants (listed below) during the June 20, 2013 Forum meeting.

FORUM PARTICIPANTS	AGENCY
Irle, Pat	Washington State Department of Ecology
McKinney, Charlie	Washington State Department of Ecology
Caldwell, Jim	Washington State Department of Ecology
Pacheco, Jim	Washington State Department of Ecology
Korth, Jeffrey	Washington State Department of Fish and Wildlife
Simon, Graham	Washington State Department of Fish and Wildlife
Maitland, Travis	Washington State Department of Fish and Wildlife
McCoy, Gina	Washington State Department of Fish and Wildlife
Willard, Catherine	United States Department of Agriculture – Forest Service
Martinez, Alex	United States Department of Agriculture – Forest Service
Glesne, Reed	National Park Service
Lewis, Steve	United States Fish and Wildlife Service
Yeager, Justin	National Marine Fisheries Services
Towey, Bill	Confederated Tribes of the Colville Reservation
Rose, Bob	Yakama Indian Nation
Merkle, Carl	Confederated Tribes of the Umatilla Indian Reservation
Goedde, Robert	City of Chelan
Archibald, Phil	Lake Chelan Sportsman Association

Chelan River Fishery Forum	
Meeting History Related to Chelan River Habitat Channel Spawning Flow Reduction Proposal	
Chelan PUD Meeting Announcement and Agenda 5/23/13	<p>June 20 CRFF Meeting Announcement Agenda</p> <p>The date available to most Forum members for our next meeting is Thursday, June 20, 2013. The meeting is scheduled for 8:00 am to 12:00 noon in the Second Floor Conference Room in the Chelan PUD Headquarters Building. I will be sending out a formal agenda in the very near future. Topics of discussion will include:</p> <ol style="list-style-type: none"> Chelan River Habitat Channel Habitat Suitability Index (HIS) data collected recently by Ecology and WDFW;

	<p>2. Chelan River Habitat Channel ramping rate study;</p> <p>3. Chelan River Habitat Channel spawning flow reduction proposal;</p> <p>4. Cutthroat trout stocking in Reach 1; and</p> <p>5. Chelan River temperature data (Where is the heating occurring and when? How may this be affecting fish?).</p> <p>If anyone has additional agenda items that you would like to discuss, then please email them to me soon and I will include them on the agenda. I will be sending out proposals for items 2, 3, and 4 for your review prior to the meeting. I will coordinate with Steve Hays regarding information for item 5 and when to send that out for review as well. Lots to do between now and the 20th!!! See you then.</p>
Chelan PUD Meeting Reminder and Agenda 6/13/13	Email Reminder - June 20 CRFF Meeting Agenda Draft Pump Flow Reduction Proposal – proposal summary attached
CRFF Meeting Minutes 6/20/13	Habitat Channel Flow Reduction Proposal Discussion on flow reduction proposal. Jeff Osborn will incorporate members’ comments and edits into the proposal and review it with the Forum at the next CRFF meeting.
Chelan PUD Meeting Announcement and Agenda 7/9/13	July 16 Meeting Announcement and Agenda Comments reviewed and incorporated into the 6/20/13 proposals (wsct stocking, flow reduction , ramping rate)
CRFF Meeting 7/16/13	Flow Reduction and Ramping Rate Final edits to the Habitat Channel Ramping Rate Investigation and Habitat Channel Proposals will be made and the proposals sent to the CRFF for their final review/comments. Final discussion will occur at the 14 August 2013 meeting.
Chelan PUD Meeting Minutes 7/17/13	Dear Chelan River Fishery Forum: The link below will take you to the June 20, 2013 Chelan River Fishery Forum meeting minutes on the PUD webpage. Additionally, attached are the pump flow reduction and ramping rate proposals with your edits from the June 20 meeting indicated in redline. As we discussed yesterday, the cutthroat stocking proposal is still in progress pending discussions regarding hatchery evaluation (7/22) and PIT-tag detection equipment installation (7/17) with WDFW.
Chelan PUD Meeting Announcement and Agenda 8/6/13	Meeting Announcement August 14 Meeting and Agenda Item Habitat Channel flow reduction proposal final review.
CRFF Meeting 8/14/13 Meeting Minutes	Habitat Channel Gravel Removal/Supplementation Project Jeff Osborn, Chelan PUD, reported that all permits necessary for Plan A (gravel removal above Noah’s Ark and placement below Noah’s Ark)

<p>8/22/13</p>	<p>were received. Unfortunately, the use of a suction dredge was discovered to be prohibitively expensive. After a lengthy discussion considering pros and cons of all other options of gravel supplementation and flow reduction, the CRFF agreed that Chelan PUD should execute Plan B, flow reduction in the habitat channel, 4-pump operation in fall 2013 and spring 2014 and then Plan A, gravel removal/supplementation, in fall 2014. Jim acknowledged that widening the Chelan River habitat channel could be an option to discuss in the future, if necessary. The CRFF confirmed, again, to change, and collect data, on one variable at a time. This methodology will provide for more accurate measuring results.</p>
<p>Chelan PUD Email Notification of final plans for four pump operation 9/11/13</p>	<p>Dear Chelan River Fishery Forum: I am very pleased to inform you that Chelan PUD Engineering Services staff conducted some outstanding work the past few weeks and were able to remove the gravel pile above Noah's Ark and deposit approximately 30 yards of excellent spawning material below the Ark. The effort was conducted yesterday..... As we discussed in previous meetings, because we have moved the gravel pile, we will plan on 5 pump operation for the spring 2014 steelhead spawning period of March 15 through May 15. We will operate 4 pumps during the 2013 Chinook spawning period, October 15 through November 30, as we discussed previously.</p>
<p>CRFF Meeting Minutes 8/20/14</p>	<p>It was noted that the lack of steelhead spawning in the Habitat Channel in 2014 was probably related to a Columbia River-wide incidence of low steelhead returns. The CRFF speculated and agreed that the lack of steelhead may be due to the Wanapum crack issue delaying steelhead migration.</p>
<p>Chelan PUD email requesting preference for 4-pump or 5-pump operation for the 2015 March 15 through May 15 steelhead spawning period.</p>	<p>From: Osborn, Jeff Sent: Thursday, February 05, 2015 10:27 AM To: Alex Martinez; Ashley Rawhouser; Bill Towey; Bitterman, Deborah; Bob Goedde; Bob Rose; Carl Merkle; Charlie McKinney; Chris Coffin; Gina McCoy; Graham Simon; Hays, Steve; Hugh Anthony; Jeff Korth; Jim Pacheco; Justin Yeager; Kari Grover Wier; Osborn, Jeff; Pat Irle; Phil Archibald; Richard Vacirca; Smith, Michelle; Steinmetz, Marcie; Steve Lewis; Travis Maitland; Truscott, Keith Subject: Pump operation for 2015 steelhead spawning period</p> <p>Dear Chelan River Fishery Forum: An Action Item that I neglected to address and document thoroughly yesterday was to develop a recommendation from the Forum for pump operation during the 2015 steelhead spawning period. Jim Pacheco's PHABSIM modeling results demonstrated more Weighted Useable Are available in the Habitat Channel for steelhead spawning under a 4 pump operation compared to a 5 pump operation. Additionally, the Forum recommended, and Chelan PUD has implemented, 4 pump operation for the 2013 and 2014 Chinook salmon and 2014 steelhead spawning periods. Therefore, the proposed pump operation options for implementation during the 2105 steelhead spawning period are:</p>

	<ol style="list-style-type: none"> 1. 4 pump operation from March 15 through May 15 (license spawning period); or 2. 5 pump operation from March 15 through May 15. <p>Please let me know your preferred operation at your earliest convenience, and I will relay the Forum recommendation to the Chelan PUD operations folks for implementation this year.</p> <p>Thank you very much.</p> <p>Jeff Osborn Compliance Program Supervisor Natural Resources Public Utility District No. 1 of Chelan County 327 North Wenatchee Avenue PO Box 1231 Wenatchee, WA 98807-1231 Phone: 509-661-4176 FAX: 509-661-8108 Email: jeff.osborn@chelanpud.org</p>
<p>Responses: WDFW</p>	<p>From: Simon, Graham A (DFW) [mailto:Graham.Simon@dfw.wa.gov] Sent: Monday, February 09, 2015 11:21 AM To: Osborn, Jeff; Alex Martinez; Ashley Rawhouser; Bill Towey; Bitterman, Deborah; Bob Goedde; Bob Rose; Carl Merkle; McKinney, Charlie (ECY); Coffin, Chris (ECY); Mccoy, Gina O (DFW); Hays, Steve; Hugh Anthony; Korth, Jeff (DFW); Pacheco, James (ECY); Justin Yeager; Kari Grover Wier; Phil Archibald; Richard Vacirca; Smith, Michelle; Steinmetz, Marcie; Steve Lewis; Maitland, Travis W (DFW); Truscott, Keith Subject: RE: Pump operation for 2015 steelhead spawning period</p> <p>Jeff – Travis and I spoke an agree we should go with Option 1. If others have concerns let us know</p> <p>Graham</p>
<p>Lake Chelan Sportsman’s Association response</p>	<p>From: Kim Lohse [mailto:kim.l.lohse@gmail.com] Sent: Tuesday, February 17, 2015 11:19 AM To: Osborn, Jeff Cc: Alex Martinez; Ashley Rawhouser; Bill Towey; Bitterman, Deborah; Bob Goedde; Bob Rose; Carl Merkle; Charlie McKinney; Chris Coffin; Gina McCoy; Graham Simon; Hays, Steve; Hugh Anthony; Jeff Korth; Jim Pacheco; Justin Yeager; Kari Grover Wier; Pat Irle; Richard Vacirca; Smith, Michelle; Steinmetz, Marcie; Steve Lewis; Travis Maitland; Truscott, Keith Subject: Re: Pump operation for 2015 steelhead spawning period</p> <p>Jeff et al., my preference is option one. Thanks for following up. Phil Archibald Lake Chelan sportsman's association</p> <p>Sent from my iPad</p>