The Dalles Dam Fishway Status Report

9/14/23

Inspection Period 09/03-09/09, 2023

THE DALLES DAM



The Dalles Project-Fisheries P.O. Box 564 The Dalles, OR 97058-9998 Phone: 541-506-3800

The Dalles Dam	Inspections	Criteria	Total Number of Insp	ections:	14	Temperature: 69.				
The Dalles Dalli	OOC	Limit	Comments:			Weekly Ave. Seco	ni: 5.0			
			NORTH FI	SHWA	λ Υ					
Exit differential	0	≤ 0.5′								
Count station differential	0	≤ 0.3'								
Weir crest depth	0	1.0' ± 0.1'								
Entrance weir N1	0		Average for the week	9.4						
Entrance Differential	0		Average for the week	1.3						
N2		Closed								
PUD Intake differential	0	≤ 0.5'								
			EAST FIS	HWA	Y					
Exit differential	0	≤ 0.5'								
Removable weirs 154-157	0	Per forebay								
Weir 158-159 differential	0	1.1' ± 0.1'								
Count station differential	0	≤ 0.3'								
153 Weir crest depth	0	1' ± 0.1'	1.0' per FPP.							
Junction pool weir JP6	0	> 7.0'	Weekly average	10.4						
East entrance differential	0	1.0' - 2.0'	Weekly average	1.5						
Entrance weir E1	0	No criteria	Weekly average	2.1						
Entrance weir E2	0	depth (≥ 8')	Weekly average	11.3						
Entrance weir E3	0	depth (≥ 8')	Weekly average	11.3						
Collection channel velocity	0	1.5 - 4 fps	3.21 east entrance 8/5	5/23						
Transportation channel velocity	0	1.5 - 4 fps	3.99 fps 8/4/23							
North channel velocity	0	1.5 - 4 fps	2.77 fps 7/15/23							
South entrance	0	1.5 - 4 fps	5.02 fps 8/5/23							
West entrance differential	0	1.0' - 2.0'	Weekly average	1.5	grating dive repair					
Entrance weir W1	0	depth (≥ 8')	Weekly average	8.2	grating dive repair a	nd modified operation due to c	lamage			
Entrance weir W2	0	depth (≥ 8')	Weekly average	8.3	grating dive repair a	nd modified operation due to c	lamage			
Entrance weir W3	0	No criteria	Weekly average	-2.8						
South entrance differential	0	1.0' - 2.0'	Weekly average	1.4		grating dive repair				
Entrance weir S1	0	depth (≥ 8')	Weekly average	8.4		grating dive repair				
Entrance weir S2	0	depth (≥ 8')	Weekly average	8.4		grating dive repair				
			JUVENILE I	BYPAS	SS					
Sluicegate operation	0	Units 1, 8, 18	1-8-18 gates open.							
Turbine trashrack drawdown	0		8/27/2023 All MUs and FUs in criteria.							
Spill volume/pattern	0	1 to 22	1-8 bays in operation daily							
Turbine Unit Priority	0	per FPP								
Gatewells	0		8/27/2023 .							

Current Outages

MU19 & MU20 FOOS 10/07/2018 1205 - 10/31/2025 1700 T10 ACETYLENE

- -MU12 OOS 04/12/2021 0001 9/22/2023 ANNUAL
- -MU4 OOS 04/17/2023 0630 9/28/2023 1700, ANNUAL

Maintenance

Working on contract for north ladder vegetation removal in Feb

Planning spill gates 9 and 10 cable and gearbox swap. Possible this fall/winter.

Spillway assessment; Spillgates 1- 9 rehab 2034. Spillway crane replace first priority. Reviewing gate operation frequency. Diffuser grating damage discovered at east entrance. Dive repair completed 8/22. Reduced flow 5kcfs to 4 kcfs rest of season.

Predators

Northern Pikeminnow Management Program 28 for the week, 2290 YTD. Also removing bass and walleye, 114 YTD.

Planning removal of bass/walleye/catfish from all dewaterings for gut sample analysis. Working on permit.

Trial of Tori lines installed at east, south and west entrance

Pacific Lamprey translocation season ended 9/6 w/ a grand total of 1501 fish captured/translocated

Research/Construction/Contractors

USGS temperature link-

4 Peaks conduction fish c(August °F

Supporting lamprey improvements PDT. Two of 4 exit weir modified with lamprey orifice, other 2 next winter.

Planning for install of junction pool lamprey trap and entrance weir modifications via contractor this winter.

ODFW conducting monthly fishway inspections.

PTAGIS fishladder data collection at count stations continues

lamprey translocation #'s as of 8/27-at 1447 YTD

zebra/quagga mussel samples collected on 8/26/2023

Operations

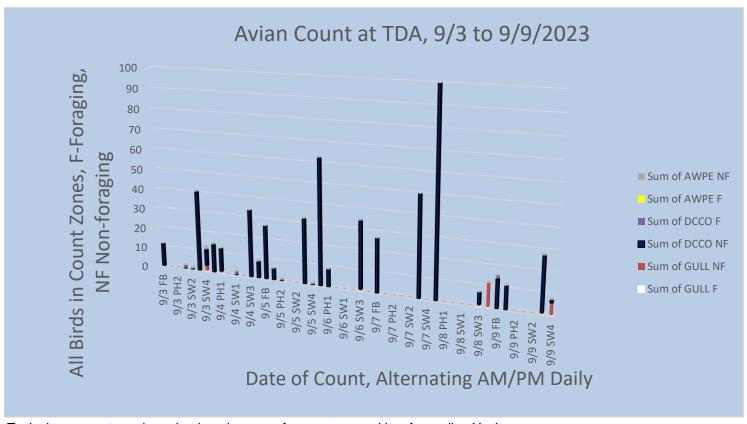
Sluice gates 1-1, 1-2, 1-3, 8-1, 8-3, 18-2 in accordance with fish passage criteria

Approved by: Ron Twiner, Operation Project Manager, The Dalles Dam

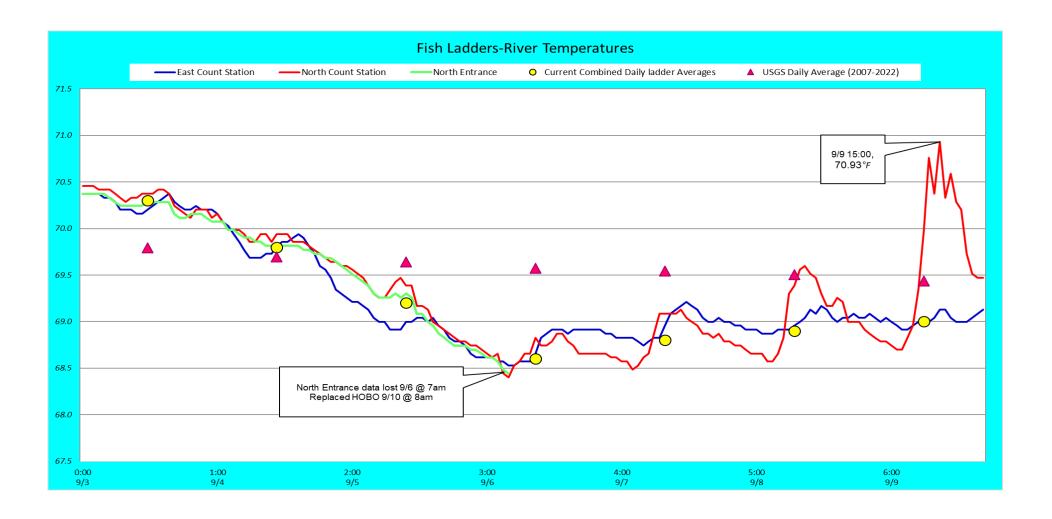
Bird Count Zones, Avian Lines and Laser Deterrent Sites







Typical cormorant numbers, but keeping away from entrances. Very few gulls - Yay!



Secchi:		USGS
5.0	Sun	70.3
5.0	Mon	69.8
5.0	Tue	69.2
5.0	Wed	68.6
5.0	Thurs	68.8
5.0	Fri	68.9
5.0	Sat	69.0
5.0	AVG	69.2

Reporting week data

Date:	North Ladder		East Ladder											
			East Entrance				West Entrance				South Entrance			
	Differential	N1 Depth	Differential	E1 Depth	E2 Depth	E3 Depth	JP 6	Differential	W1	W2	W3	Differential	S1	S2
9/3	1.2	9.5	1.5	3.3	10.9	10.8	10.3	1.5	8.2	8.1	-3.1	1.3	8.6	8.5
	1.3	9.4	1.3	4.0	11.6	11.5	11.0	1.3	8.7	8.8	-2.4	1.3	8.6	8.6
9/4	1.3	9.4	1.6	1.2	11.0	11.0	10.2	1.6	8.0	8.0	-3.0	1.4	8.2	8.0
	1.3	9.3	1.4	1.2	11.7	11.7	10.2	1.6	8.0	8.0	-3.0	1.4	8.2	8.2
9/5	1.3	9.4	1.5	8.0	11.3	11.3	9.8	1.6	7.8	7.9	-3.2	1.4	8.3	8.5
	1.3	9.5	1.4	1.2	11.7	11.7	10.2	1.5	8.1	8.1	-3.1	1.3	8.8	8.7
9/6														
	1.6	9.2	1.5	1.0	11.5	11.5	10.0	1.5	8.1	8.1	-3.1	1.5	8.2	8.0
	1.3	9.3	1.4	1.6	11.6	11.6	10.6	1.4	8.5	8.5	-2.7	1.4	8.6	8.6
9/7	1.3	9.4	1.5	2.3	11.2	11.2	10.2	1.5	8.3	8.3	-2.9	1.3	8.4	8.4
	1.3	9.5	1.4	2.5	11.4	11.4	10.4	1.3	8.6	8.6	-2.6	1.3	8.7	8.7
9/8														
	1.4	9.4	1.5	2.4	11.2	11.1	10.4	1.4	8.2	8.2	-2.7	1.5	8.1	8.1
	1.3	9.4	1.5	2.5	11.3	11.2	10.5	1.4	8.3	8.4	-2.6	1.4	8.2	8.4
9/9	1.4	9.4	1.5	2.7	11.2	11.2	10.6	1.5	8.4	8.4	-2.5	1.5	8.2	8.2
	1.4	9.5	1.6	2.6	11.1	11.1	10.6	1.5	8.3	8.3	-2.6	1.4	8.4	8.4
AVG:	1.3	9.4	1.5	2.1	11.3	11.3	10.4	1.5	8.2	8.3	-2.8	1.4	8.4	8.4

Fishways inspected twice daily