

The Dalles Dam Fishway Status Report

02/7/2021

Inspection Period: 01/31-02/6

THE DALLES DAM



The Dalles Project-Fisheries
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The Dalles Dam	Inspections OOC	Criteria Limit	Total Number of Inspections: 6	Temperature: 40.2 °F
			Comments:	Weekly Ave. Secchi: 5.0

NORTH FISHWAY (Dewatered 1/26)

Exit differential	0	≤ 0.5'	
Count station differential	0	≤ 0.3'	
Weir crest depth	0	1.0' ± 0.1'	
Entrance differential	0	1.0' - 2.0'	#DIV/0!
Entrance weir N1	0	depth (≥ 8')	#DIV/0!
Entrance weir N2	0	Closed	
PUD Intake differential	0	≤ 0.5'	

EAST FISHWAY (Return operation 1/25)

Exit differential	0	≤ 0.5'	Adjusting automation, operating manually in daytime.	
Removable weirs 154-157	0	Per forebay	Forebay sensor repaired 2/4/21. Adjusting automation	
Weir 158-159 differential	0	1.1' ± 0.1'	Adjusting automation	
Count station differential	0	≤ 0.3'	Adjusting automation	
153 Weir crest depth	0	1.0' ± 0.1'	Adjusting automation	
Junction pool weir JP6	0	> 7.0'		
East entrance differential	2	1.0' - 2.0'	1 fish unit operation Week ave. 1.0	
Entrance weir E1	0	No criteria		
Entrance weir E2	3	depth (≥ 8')	7.2	Week ave.
Entrance weir E3	3	depth (≥ 8')	7.0	Week ave.
Collection channel velocity	NA	1.5 - 4 fps		
Transportation channel velocity	NA	1.5 - 4 fps		
North channel velocity	NA	1.5 - 4 fps		
South channel velocity	NA	1.5 - 4 fps		
West entrance differential	0	1.0' - 2.0'	1.4	Week ave.
Entrance weir W1	5	depth (≥ 8')	7.3	Week ave.
Entrance weir W2	5	depth (≥ 8')	7.3	Week ave.
Entrance weir W3	0	No criteria	Closed	
South entrance differential	0	1.0' - 2.0'	1.7	Week ave.
Entrance weir S1	0	depth (≥ 8')	9.9	Week ave.
Entrance weir S2	closed	depth (≥ 8')	1 fish unit operation	

JUVENILE PASSAGE

Sluiceway operation	0	Units 1, 3, 18	OFF	
Turbine trashrack drawdown	0	<1.5', biwkly		
Spill volume/pattern	0	1 to 8	OFF	
Turbine Unit Priority	0	per FPP		
Gatewells	0	Weekly	6-Feb-21	

OTHER ISSUES:

Current Unit Outages

Line1 OOS. T1 replacement through 2/3/21
MU1 OOS through 2/5/21 annual
MU2 OOS through 2/28/21 overhaul
T10 (MU19 and 20) OOS 10/28/21 acetylene levels
SS01 OOS through 2/1/21 overhaul
FU1 OOS through 2/25/21 overhaul
MU17 OOS 2/1/21 through 2/1/21 annual
MU18 OOS 2/1/21 through 2/18/21 bearing and breaker work

Maintenance

Repaired wind damaged debris guard for north fishladder exit. Installation Feb17.
PUD intake rake out of service due to power track damage. Exploring repair options. Temporary repair planned for 2021 season.
Five of 6 east fishway collection channel dewatering pumps removed for repair/rehab. Work to resume FY21.
Fishway automation (SCADA) continues. East exit and entrance in operation. West and south on hold due to budget constraints.
Spillway assessment (MRER); Spillgates 1- 9 rehab date estimate 2034. Includes replacement of spillbay 9 trunnion pin repair
North fishway difuser grating and weirs inspected in dry. No problems found.
North count station diffuser valve inspected.

Predators

Low gull numbers. Refer to avian tab for bird numbers. High bald eagles numbers using westrick park and feeding on shad fall back.
Green laser use for piscivorous bird hazing testing continues. Effective on roosting birds during low light.
Investigating falconry for forebay tower cormorants.
Pikeminnow dam angling resumes next May. **All invasive bass/walleye by-catch release to continue per state requirement.**
Recovered 0 PIT tag numbers with ground scanners in North ladder. Located 3 more tags at east ladder waste site.

Research/Construction/Contractors

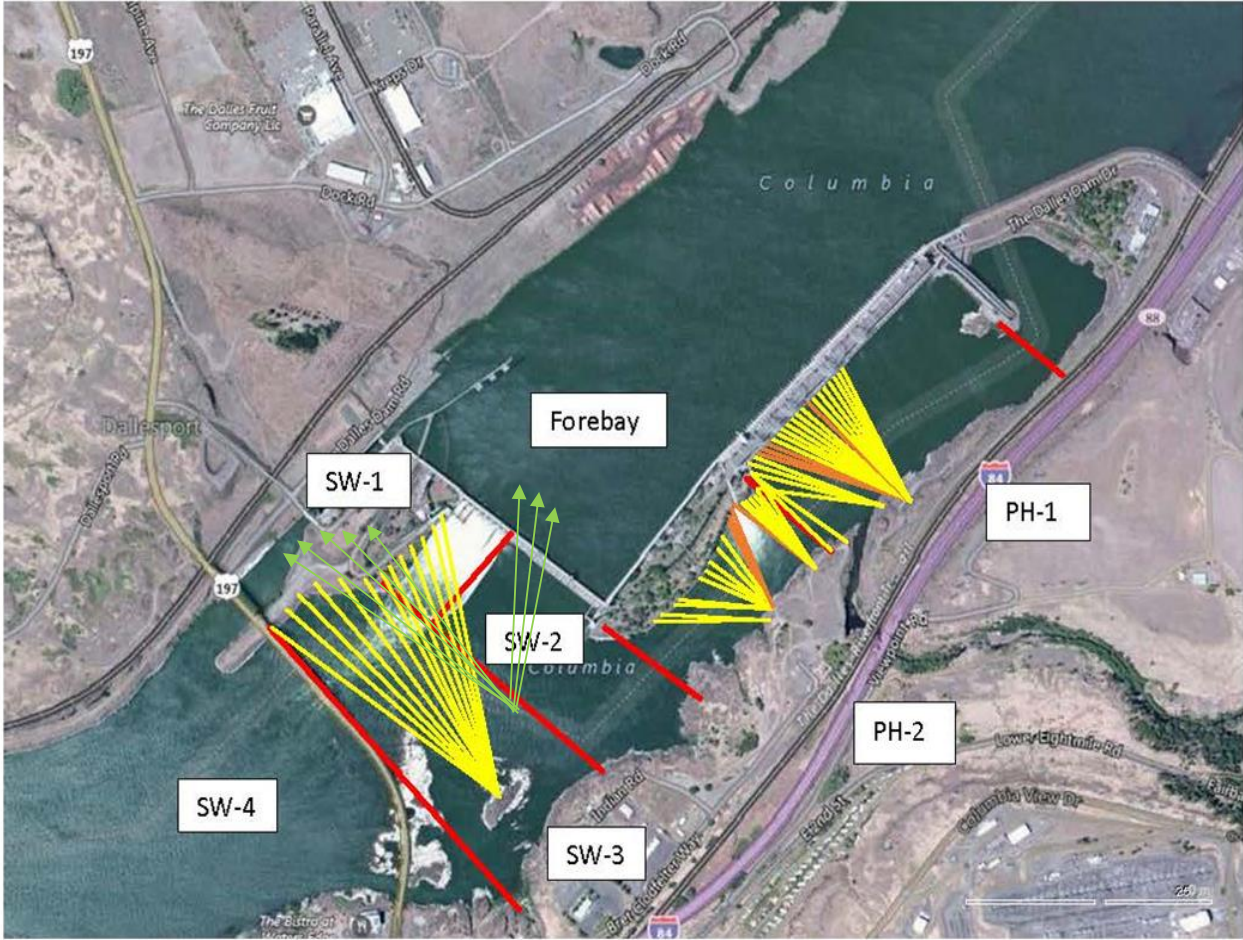
AWS intake trashrack - EDR funded for FY21 to investigate solution for debris plugging issue.
PITAGS north and east fishladder data collection at north count stations continues. East antenna annual maintenance this month during dewatering.
Fish unit rehab - Phase 1A on hold. Planning operation with AWS backup water supply during construction.

Fishway Operations

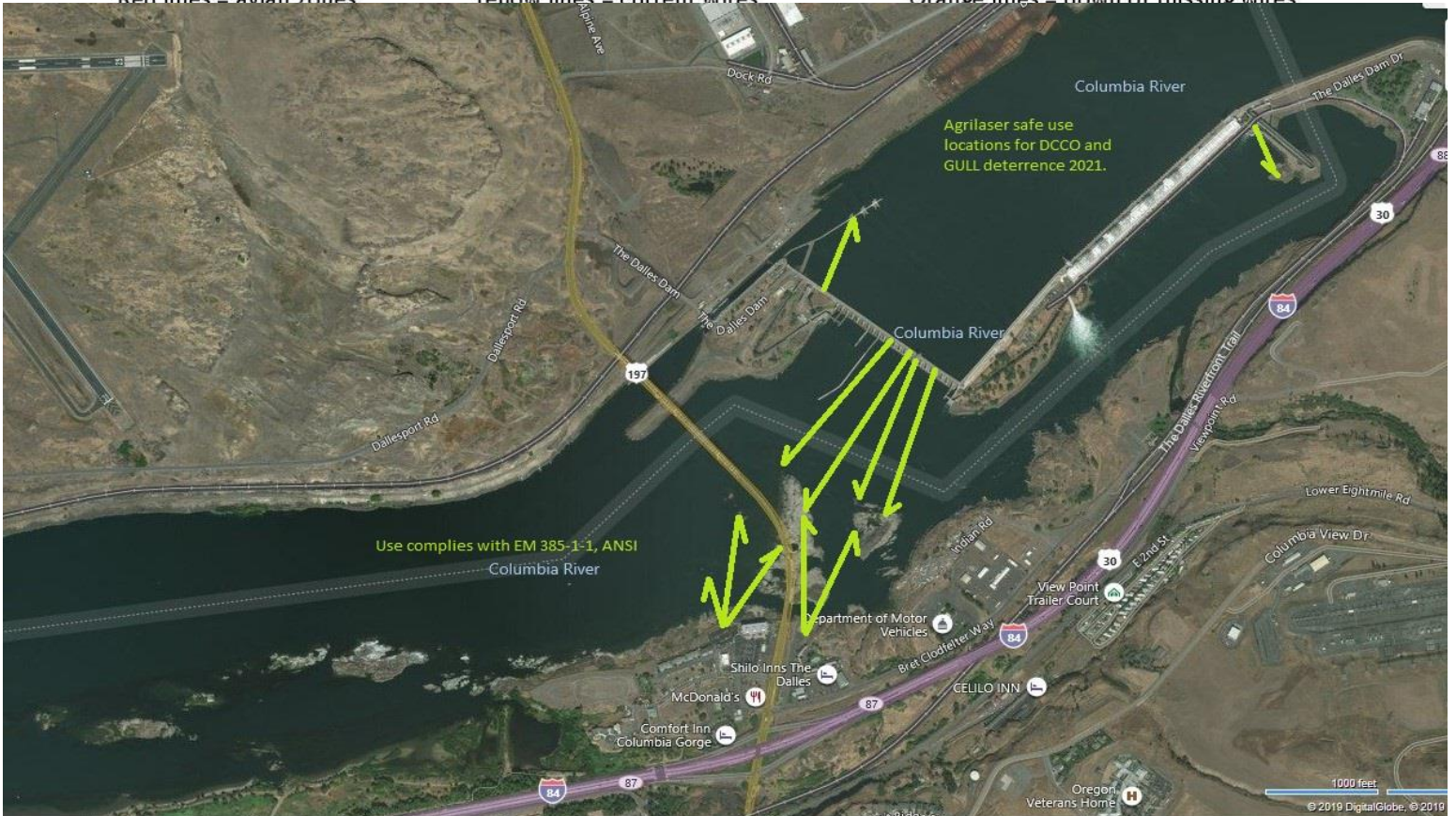
North fishway in full operation to 1/26
East ladder return 1/20. Single fish unit operation 1/25

Approved by: Ron Twiner, Operation Project Scanning for PITs.

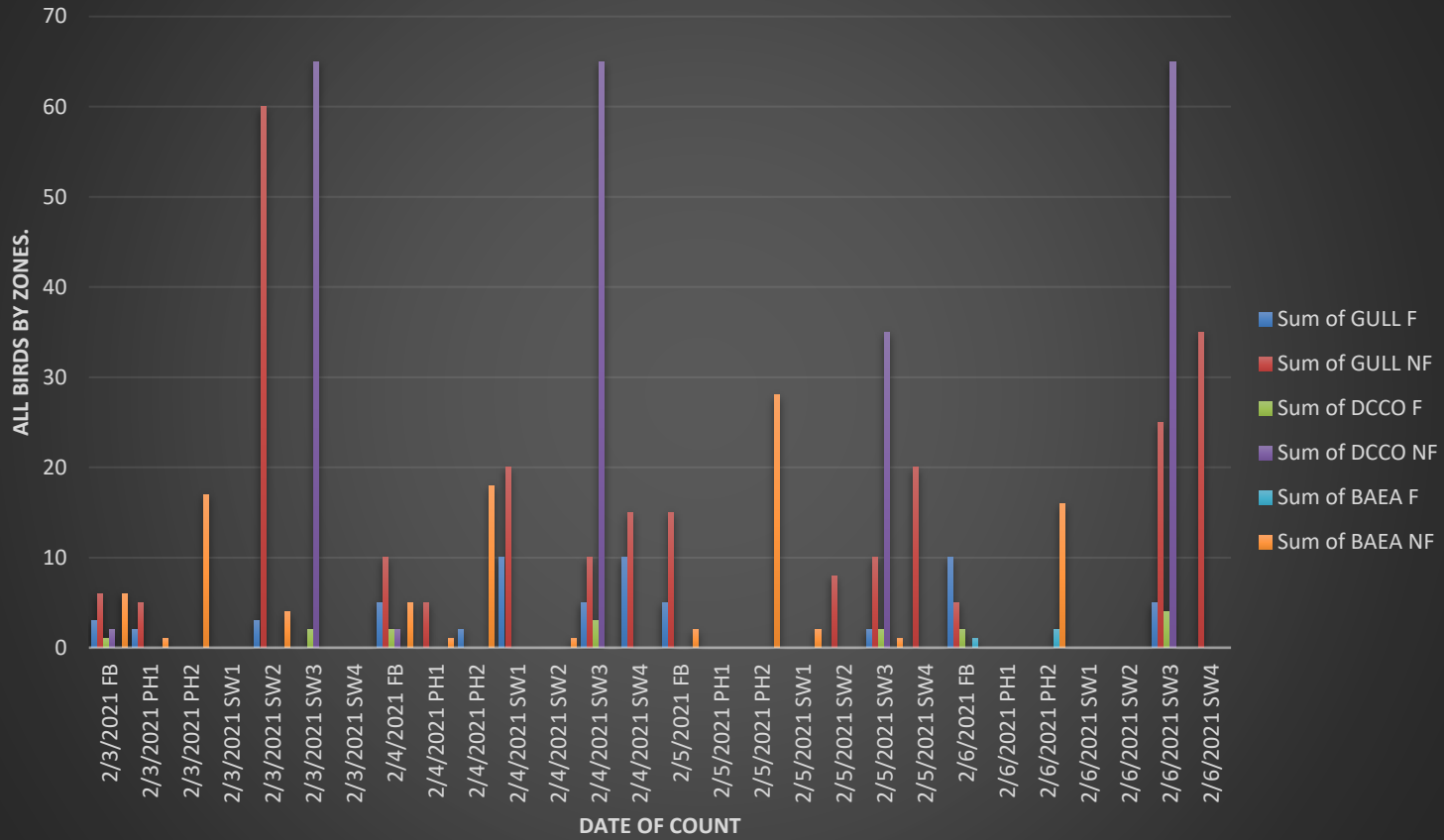
New Avian Lines and laser deterrent zones



Red lines = avian zones Yellow lines = current wires Orange lines = down or missing wires



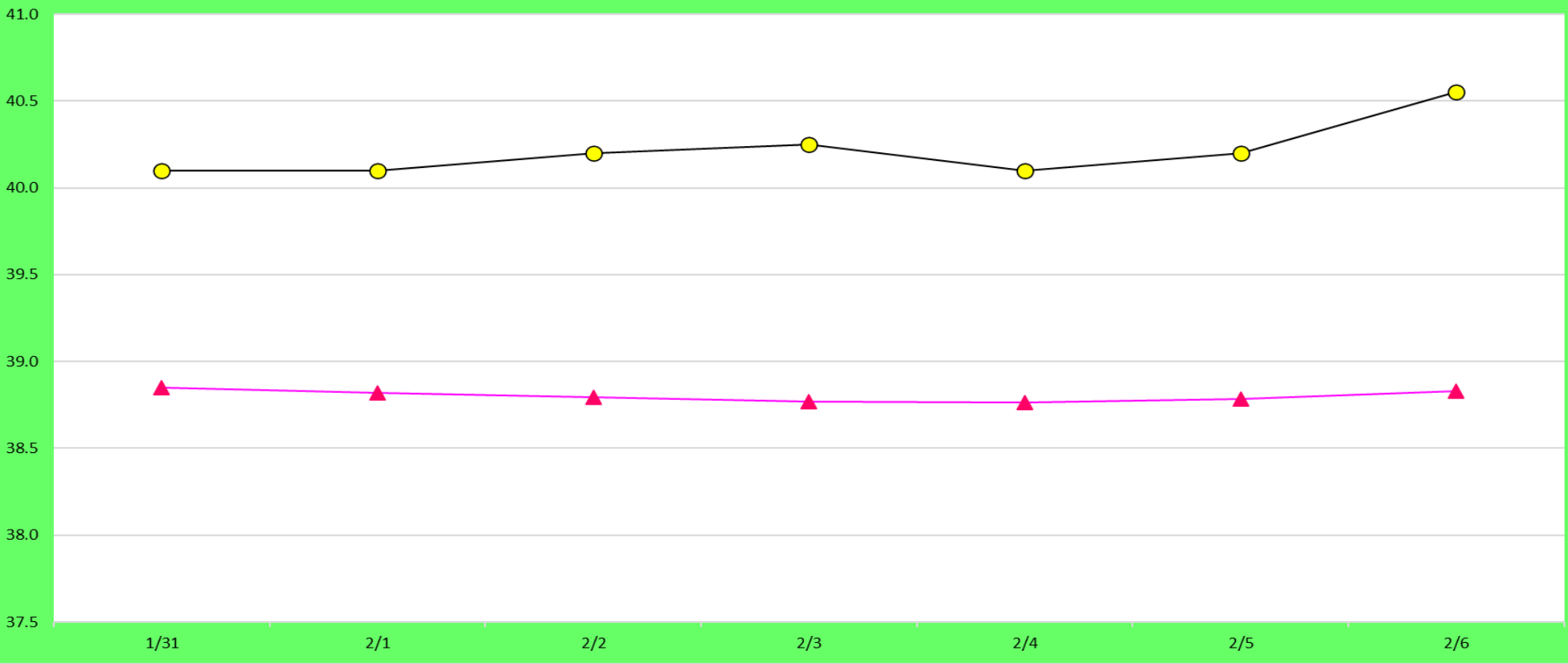
Bird Counts by zone TDA, 2/3- 2/6/2021



—●— Current USGS Daily Average

—▲— USGS Daily Average (2007-2020)

°F



Secchi:		°F
5.0	Sun	40.1
5.0	Mon	40.1
5.0	Tue	40.2
5.0	Wed	40.3
5.0	Thurs	40.1
5.0	Fri	40.2
5.0	Sat	40.6
5.0	AVG	40.2

[USGS Jan](#)
[USGS Feb](#)

The Dalles Dam Daily Readings and Averages for
Temperatures, Secchi, Entrances, and Spill

SCADA INSPECTION

out of criteria

Date:	North Ladder		East Ladder											
	Differential	N1 Depth	East Entrance					West Entrance			South Entrance			
			Differential	E1 Depth	E2 Depth	E3 Depth	JP 6	Differential	W1	W2	W3	Differential	S1	S2
1/31	Dewatered		No scada					1.0	7.7	7.7	-0.4			Closed per FPP on 1 FU
2/1			No scada											
2/2			0.7	-2.9	8.0	8.0	11.7	1.6	6.8	6.8	-1.3			
2/3			1.1	-2.2	7.2	6.2	12.4	1.4	7.5	7.5	-0.7	1.7	9.9	
2/4			0.9	-3.1	6.9	6.9	11.5	1.7	6.8	6.8	-1.4	1.9	9.3	
2/5			1.0	-0.9	6.8	6.8	11.2	1.5	7.0	7.0	-1.7	1.6	10.4	
2/6			1.1	-0.7	7.3	7.3	11.4	1.3	8.0	8.0	-0.7	1.4	10.1	
AVG:		#DIV/0!	#DIV/0!	1.0	-2.0	7.2	7.0	11.6	1.4	7.3	7.3	-1.0	1.7	

Fishways are inspected once daily.



Groups of western gulls painting the spillwall white.