


FISHWAY STATUS REPORT

Date: 1/6/2018
Inspection Period: 12/31/2017 thru 1/6/2018



**US Army Corps
of Engineers**
Portland District

JOHN DAY DAM
 JD/WC Project-Fisheries
 P.O. Box 823
 Rufus, Oregon 97050
 Phone: 541-506-7860

All JD Fishways are inspected once per day during the winter maintenance season, Dec. 1 - Feb. 28.
 Frequent monitoring of the PLC displays in SMF Fisheries Office as necessary.

John Day Dam	Inspections	Criteria	Total Number of Inspections: 5	Temperature: 40 F
	Out of Criteria	Limit		Secchi: 5.3 Ft.
NORTH FISHWAY			Returned to service 12/22/17 with all 6 AWS pumps available.	
Exit differential	0	≤ 0.5'		
Exit Control weirs	0	High setting	High setting is normal for JDN	
Count station differential	0	≤ 0.3'		
Weir crest depth (DS gauge)	0	1.0' ± 0.1'		
Entrance differential	0	1.0' - 2.0'	AVG 1.5	
SOUTH FISHWAY			Annual dewatering scheduled for 1/08/18. Orifice flow 1/05 AM.	
Exit differential	0	≤ 0.5'		
Exit Control weirs	0	Mid setting	Mid setting is normal for JDS	
Count station differential	0	≤ 0.3'		
Weir crest depth (US gauge)	0	1.0' ± 0.1'		
South entrance differential	0	1.0' - 2.0'	AVG 1.4	
Entrance weir SE1	0	depth (≥ 8')	AVG 8.9	
Collection channel velocity	0	1.5 - 4 fps	AVG 2.64	
N. Entrance PH(Bay 19)differential	0	1.0' - 2.0'	AVG 1.4	
Entrance weir NE1	0	depth (≥ 8')	AVG 10.6	
Entrance weir NE2	0	depth (≥ 8')	AVG 10.4	
JUVENILE PASSAGE	OOS		JBS season completed on 12/15/17. STS removal commenced on 12/16/17.	
Forebay/bypass conduit differential	OOS	4.0' - 5.0'	AVG 4.6	
Submersible traveling screens	OOS	visual inspect	All STSs removed from PH gatewells by 12/21/17, PMs and repairs underway.	
Turbine trashrack drawdown	OOS	<1.5', wkly		
Vert barrier screen drawdown	OOS	<1.5', wkly		
Spill volume	NA	per FPP	Spillway on seal since 8/01/17	
Spill pattern	NA	per FPP		
Turbine Unit Priority	0	per FPP		
Turbine 1% Efficiency	0	per FPP		

SMOLT MONITORING FACILITY

Operation:

SMF OOS since 11/30/17. It will return to service on 1 March 2018 which is one month earlier than the normal starting date at JD, per FPOM request.

Maintenance:

Planning for the Switch Gate's Lower Seals replacement/ improvements to reduce water leakage and risk to passing juvenile lamprey.

SMF SCADA update/mods' investigation by JD Electrical/ Portland District Engineers is underway.

Research: None

Birds :

Only a few birds, mostly cormorants are present at JD at this time. See the Avian Numbers tab for details.

6 Tower-to-Tower, 6 Spillway, 6 Navlock (2 failed on 11/02) and 7 PH lines are missing out of 125 grid's total.

The avian lines' contractor started mobilizing on 12/18/17. All original lines installed in 2011 will be replaced by 1 April 2018.

Operations:

JD South Fishway in service with two AWS Turbines and meeting all FPP criteria since 3/3/17.

JD North Ladder returned to service on 12/21/17. All 6 AWS pumps are available.

MU Gatewell Drawdowns: weekly or more frequently as necessary.

Maintenance:

JD North Ladder - minor CS repairs completed: Crowder bottom seals were replaced with new parts & New chain and sprockets were installed for the window's cleaning brush by JD Mechanical crew.

Calibration: All gauges/ sensors are within the criteria of 0.3' .

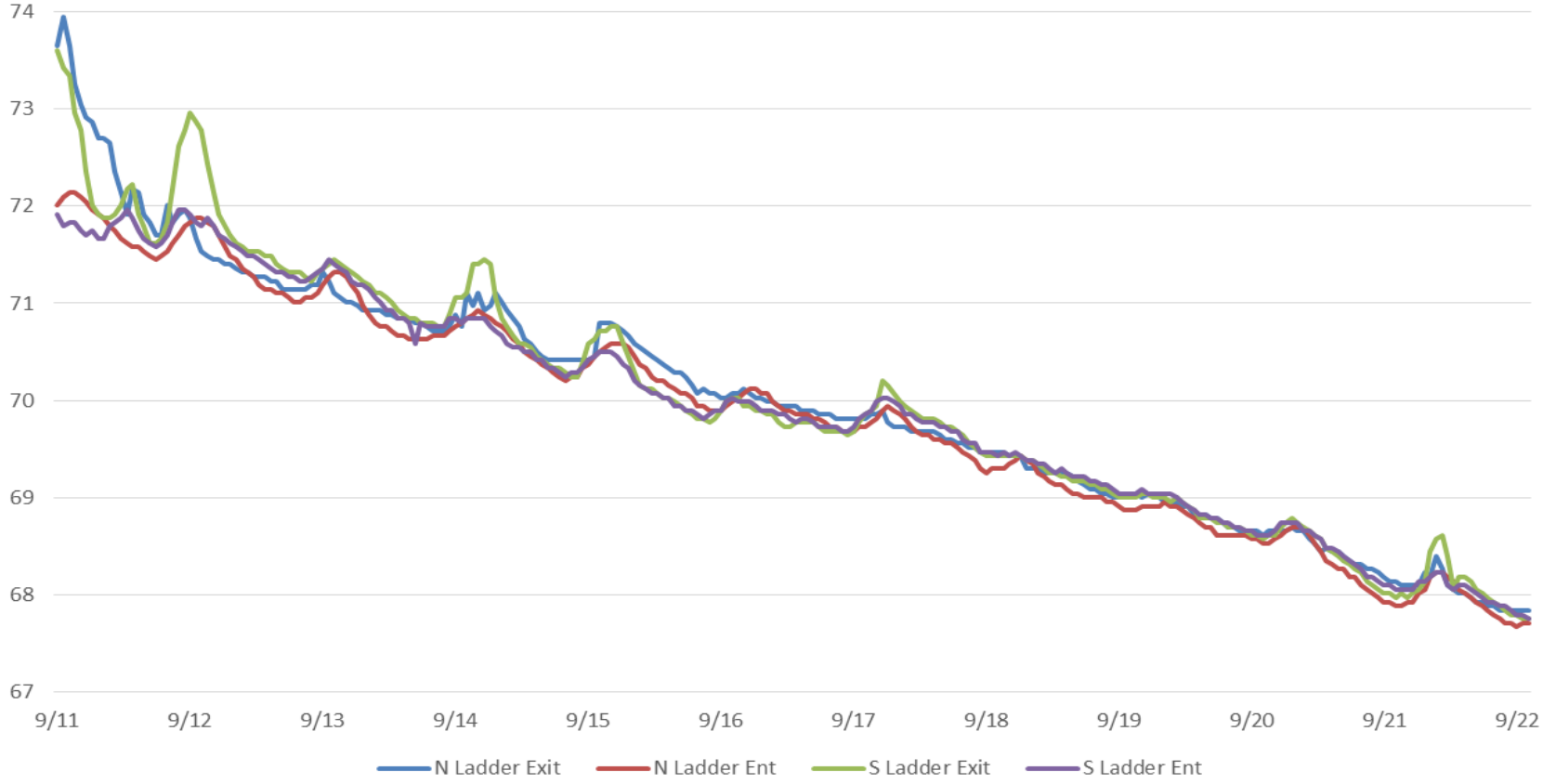
Research:

Adult PIT Support contract had been completed by early November with the office spaces installed and wired at both JD Adult Fishways.

However, the PSMFC crew continues with the Wi-Fi antennas installation. Both ladders will be ready to detect Adult PITs by 1 March 2018.

E-Signed by MOYNAHAN,KEVIN.PATRICK,1393959157
VERIFY authenticity with ApproveIT

Fishladder Water Temps JDA (9/11/17 - 9/22/17)



JDA Collection Channel Velocity

Date *13-Dec-17*

By: *MDL*

Bay(s)	Time	Sec.	Velocity (f/s)
<i>0-2</i>	<i>1:04</i>	<i>64</i>	<i>2.81</i>
<i>2 - 4</i>	<i>2:11</i>	<i>131</i>	<i>2.69</i>
<i>4 - 6</i>	<i>3:19</i>	<i>199</i>	<i>2.65</i>
<i>6 - 8</i>	<i>4:28</i>	<i>268</i>	<i>2.61</i>
<i>8 - 10</i>	<i>5:39</i>	<i>339</i>	<i>2.54</i>
<i>10 - 12</i>	<i>6:50</i>	<i>410</i>	<i>2.54</i>
<i>12 - 14</i>	<i>8:03</i>	<i>483</i>	<i>2.47</i>
<i>14 - 16</i>	<i>9:08</i>	<i>548</i>	<i>2.77</i>
<i>16 - 18</i>	<i>10:14</i>	<i>614</i>	<i>2.73</i>
			2.64

TW Bay19 = 161.2

RPMs: 68/68 (2&3) (1 @ 0)

FPP Criteria: 1.5–4.0 feet per second (2 fps optimum)

John Day Dam
Avian Zones



John Day Weekly Averages

	Temp:	Secchi:	Fallbacks
Sun	41	6.0	NA
Mon	41	6.0	NA
Tue	40	1.3	NA
Wed	40	6.0	NA
Thur	40	6.0	NA
Fri	40	6.0	NA
Sat		6.0	NA
AVG:	40	AVG: 5.3	AVG NA
			MAX NA
			MIN NA

	NE1	NE2	S.Ent	SE1	N.Ent	JBS Diff	Bay19
Sun	10.4	10.2	1.6	9.2	1.7	4.5	1.1
Sun							
Mon	10.7	10.5	1.3	8.4	1.6	4.6	1.4
Mon							
Tues	11.0	10.5	1.3	8.8	1.5	4.5	1.4
Tues							
Wed	9.9	9.8	1.3	8.7	1.4	4.5	1.5
Wed							
Thur	11.0	11.0	1.3	9.2	1.5	4.6	1.5
Thur							
Fri	oos	oos	oos	oos	1.4	4.6	oos
Fri							
Sat	oos	oos	oos	oos	1.5	4.6	oos
Sat							
AVG:	10.6	10.4	1.4	8.9	1.5	4.6	1.4

JDA Bird Counts: 12/31/17 to 1/6/18

NF(1): Non-Forage AM Survey NF(2): Non-Forage PM Survey

Date	Zone	Gulls				Cormorant				Caspian tern				White Pelican				Grebe				Total
		F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	
31-Dec	PHFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	1
31-Dec	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
31-Dec	PH1	0	0	0	0	24	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	24
31-Dec	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
31-Dec	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
31-Dec	SW1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
31-Dec	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
31-Dec	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		0		0		12		0		0		0		0		0		1		0		25
1-Jan	PHFB	0	0	1	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	5
1-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
1-Jan	PH1	0	0	0	0	25	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	25
1-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
1-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
1-Jan	SW1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
1-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
1-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		0		1		13		2		0		0		0		0		0		0		30
2-Jan	PHFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	PH1	0	0	0	0	25	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	25
2-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	SW1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
2-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		0		0		13		0		0		0		0		0		0		0		25
3-Jan	PHFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3-Jan	PH1	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8
3-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3-Jan	SW1	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
3-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
3-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		0		0		5		0		0		0		0		0		0		0		10

JDA Bird Counts: 12/31/17 to 1/6/18

NF(1): Non-Forage AM Survey NF(2): Non-Forage PM Survey

Date	Zone	Gulls				Cormorant				Caspian tern				White Pelican				Grebe				Total				
		F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)	F(1)	F(2)	NF(1)	NF(2)					
4-Jan	PHFB	0	0	1	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
4-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4-Jan	PH1	4	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5
4-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4-Jan	SW1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
4-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		2		1		1		1		0		0		0		0		0		0		0		0		7
5-Jan	PHFB	0	0	0	0	0	0	11	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11
5-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
5-Jan	PH1	4	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9
5-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
5-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
5-Jan	SW1	0	0	1	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
5-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
5-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		2		1		4		6		0		0		0		0		0		0		0		0		24
6-Jan	PHFB	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
6-Jan	SWFB	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6-Jan	PH1	1	0	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7
6-Jan	PH2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6-Jan	PH3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6-Jan	SW1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6-Jan	SW2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6-Jan	SW3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Avg/Survey		1		0		3		1		0		0		0		0		0		0		0		0		9
Totals		Gulls				Cormorant				Caspian tern				White Pelican				Grebe				Total				
		F		NF		F		NF		F		NF		F		NF		F		NF						
Weekly Total		9		3		99		18		0		0		0		0		1		0				130		
Avg/Survey		1		0		7		1		0		0		0		0		0		0				9		