


# FISHWAY STATUS REPORT

Date: 1/20/2018  
 Inspection Period: 1/14/2018 thru 1/20/2018



**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:	7	Temperature:	40 F
	Out of Criteria	Limit				
<b>NORTH FISHWAY</b>			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		
<b>SOUTH FISHWAY</b>	<b>OOS</b>		OOS since dewatered on 1/08. RTS is the week of 2/20/18.			
Exit differential	<b>OOS</b>	≤ 0.5'				
Exit Control weirs	<b>OOS</b>	Mid setting	Mid setting is normal for JDS			
Count station differential	<b>OOS</b>	≤ 0.3'				
Weir crest depth (US gauge)	<b>OOS</b>	1.0' ± 0.1'				
South entrance differential	<b>OOS</b>	1.0' - 2.0'	AVG	#DIV/0!		
Entrance weir SE1	<b>OOS</b>	depth (≥ 8')	AVG	#DIV/0!		
Collection channel velocity	<b>OOS</b>	1.5 - 4 fps	AVG	2.64		
N. Entrance PH(Bay 19)differential	<b>OOS</b>	1.0' - 2.0'	AVG	#DIV/0!		
Entrance weir NE1	<b>OOS</b>	depth (≥ 8')	AVG	#DIV/0!		
Entrance weir NE2	<b>OOS</b>	depth (≥ 8')	AVG	#DIV/0!		
<b>JUVENILE PASSAGE</b>	<b>OOS</b>		JBS season completed on 12/15/17. STS removal commenced on 12/16/17.			
Forebay/bypass conduit differential	<b>OOS</b>	4.0' - 5.0'	AVG	4.6		
Submersible traveling screens	<b>OOS</b>	visual inspect	All STSs removed from PH gatewells by 12/21/17, PMs and repairs underway.			
Turbine trashrack drawdown	<b>OOS</b>	<1.5', wkly				
Vert barrier screen drawdown	<b>OOS</b>	<1.5', wkly				
Spill volume	NA	per FPP	Spillway on seal since 8/31/17			
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:**

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

The avian lines' contractor is making fantastic progress due to mild and non-windy winter and is expected to complete all work early, by 3/1/18.

**Operations:**

JD South Fishway OOS/ dewatered since 1/08. Dewatering went well with hardly any fish encountered upstream of the CS due to flushing 3X. Only a handful of adult shad and 4 steelhead juveniles were bagged and released into tailrace in excellent condition. Additionally, 180 adult lamprey were found hiding inside of the Lamprey Trap. They were netted, loaded into transport tank and released into Forebay, a few miles upstream of the dam, in excellent condition.

JD North Ladder in service since 12/21/17. All 6 AWS pumps are available.

MU Gatewell Drawdowns: none due to winter maintenance season. Will commence in early March 2018.

**Maintenance:**

JD North Ladder - minor drainage issues on AWS pumps being handled by the JD Maintenance cleaning their drains.

JD South Fishway OOS/ dewatered since 1/08. Expansion joints and AWS turbine 3 oil leak's repairs will be accomplished by JD Maintenance before the return to service the week of 2/20/18. Planning for the ROV inspection of CC gratings for the same week.

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

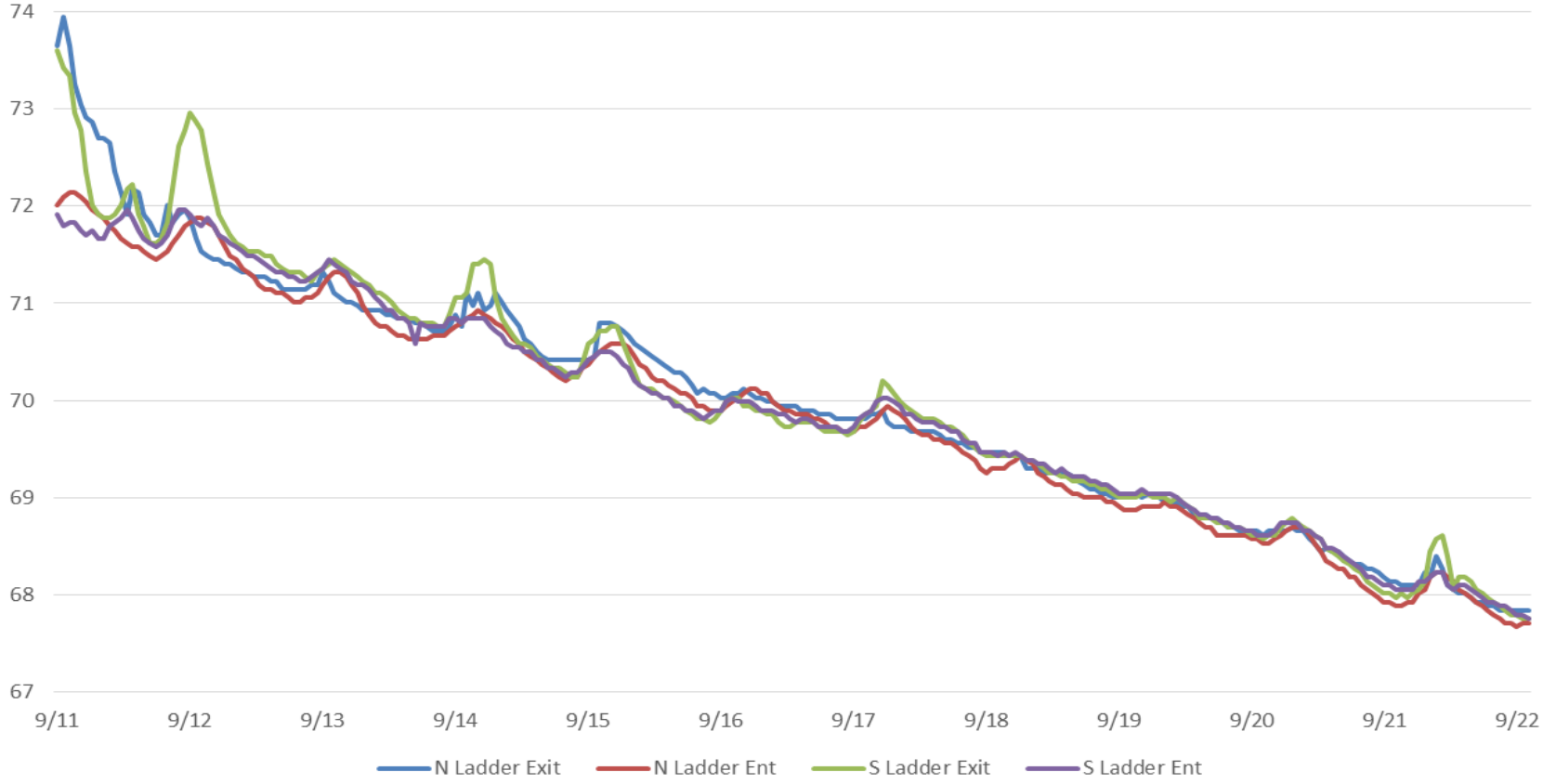
**Research:**

Adult PIT Support contract ran into minor issues and has been delayed since November. However, the contract is to be accepted by 2/1 and then PSMFC's crew will complete their hardware installation in February. Both ladders should be ready to detect Adult PITs by 1 March 2018.

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

MOYNAHAN,KEVIN.PATRICK,1393959157

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>
			<b>2.64</b>

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	40	6.0	NA
Mon	40	6.0	NA
Tue	40	6.0	NA
Wed	40	6.0	NA
Thur	41	6.0	NA
Fri	41	6.0	NA
Sat	41	6.0	NA
<b>AVG:</b>	<b>40</b>	<b>AVG: 6.0</b>	<b>AVG</b> NA
			<b>MAX</b> NA
			<b>MIN</b> NA

	NE1	NE2	S.Ent	SE1	N.Ent	JBS Diff	Bay19
Sun	oos	oos	oos	oos	1.7	4.6	oos
Sun							
Mon	oos	oos	oos	oos	1.6	4.6	oos
Mon							
Tues	oos	oos	oos	oos	1.4	4.6	oos
Tues							
Wed	oos	oos	oos	oos	1.5	4.5	oos
Wed							
Thur	oos	oos	oos	oos	1.4	4.6	oos
Thur							
Fri	oos	oos	oos	oos	1.5	4.6	oos
Fri							
Sat	oos	oos	oos	oos	1.5	4.6	oos
Sat							
<b>AVG:</b>	#DIV/0!	#DIV/0!	#DIV/0!	#DIV/0!	1.5	4.6	#DIV/0!



**JDA Bird Counts: 1/14/18 to 1/20/18**

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)					
18-Jan	PHFB	0	0	0	0	0	0	12	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
18-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
18-Jan	PH1	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
18-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
18-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
18-Jan	SW1	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
18-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
18-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		0		0		2		6		0		0		0		0		0		0		0		0		16
19-Jan	PHFB	0	0	0	0	0	0	34	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	34
19-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
19-Jan	PH1	2	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
19-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
19-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
19-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
19-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
19-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		1		17		0		0		0		0		0		0		0		0		38
20-Jan	PHFB	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8
20-Jan	SWFB	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
20-Jan	PH1	0	0	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
20-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
20-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
20-Jan	SW1	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
20-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
20-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		0		0		3		4		0		0		0		0		0		0		0		0		13
<b>Totals</b>		<b>Gulls</b>				<b>Cormorant</b>				<b>Caspian tern</b>				<b>White Pelican</b>				<b>Grebe</b>				<b>Total</b>				
		F		NF		F		NF		F		NF		F		NF		F		NF						
Weekly Total		2		5		31		82		0		0		0		0		0		0		0		0		120
Avg/Survey		0		0		2		6		0		0		0		0		0		0		0		0		9