### **FISHWAY STATUS REPORT**

**Date:** 4/11/2015

**Inspection Period:** 4/5 thru 4/11/2015

All JD Fishways are inspected twice per day during fish season, Mar. 1 - Nov. 30 Frequent monitoring of the PLC displays in SMF Fisheries Office as necessary.

### JOHN DAY DAM



JD/WC Project-Fisheries P.O. Box 823 Rufus, Oregon 97050

Phone: 541-506-7860

John Day Dam	Inspections	Criteria	Total Number of Inspections: 14 Temperature: 49 F
	Out of Criteria	Limit	Secchi: 6.0 Ft.
NORTH FISHWAY			5 out of 6 AWS pumps available since 12/23/14
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			3 AWS Turbines in regular service since 2/28/15
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 8.6
Collection channel velocity	0	1.5 - 4 fps	AVG 3.21
N. Entrance PH(Bay 19)differential	0	1.0' - 2.0'	AVG 1.5
Entrance weir NE1	0	depth (≥ 8')	
Entrance weir NE2	0	depth (≥ 8')	AVG 8.8
JUVENILE PASSAGE			In regular service with all necessary STSs since 3/23
Forebay/bypass conduit differential	0	4.0' - 5.0'	AVG 4.6
Submersible traveling screens	0	visual inspect	
Turbine trashrack drawdown	0	<1.5', wkly	Monthly trashrack raking scheduled for week 4/27
Vert barrier screen drawdown	0	<1.5', wkly	
Spill volume	0	30/40 %	Fish spill and TSWs started up on 4/10/15 per FOP
Spill pattern	0	per FPP	Per 2015 FOP
Turbine Unit Priority	0	per FPP	
Turbine 1% Efficiency	0	per FPP	

#### SMOLT MONITORING FACILITY

Operation: SMF in sampling mode since 3/31 AM. 24 hrs/ 7 days a week sampling by PSMFC as required by FPP.

JD Fisheries crew has started regular 24/7 swing shift schedule as required by FPP; it will continue this until the end of sampling season on 9/15.

Maintenance: All devices working well without any issues at this time

Research: N/A

None

Fallbacks: AVG: 60 MAX: 83 MIN: 36

#### OTHER ISSUES:

#### JOHN DAY

BIRDS: see the Avian Numbers tab. We report all species and locations, but in reality only gulls in the tailrace BRZ are relevant at JD.

JD Tailrace BRZ Avian Grid will be missing two across river lines # 26 & 27; JD Engineering was unable to reinstall them due to contracting issues.

It is impossible to predict if gulls will penetrate the grid through this gap; JD Fisheries will monitor and report on an increased predation if any results.

JD Engineering preparing to issue an improved/ multi- year contract for the lines maintenance during the next winter outage, in February 2016.

#### Operations:

JBS in regular service since 3/27.

JD North Fishway in regular service; 5 out of 6 AWS pumps are available. Repair work on pump 4 continues; pump 3 has vibration issues and should be the last in service.

JD South Fishway in regular service with 3 AWS Turbines; it is meeting all FPP criteria.

#### Maintenance:

JD North AWS pumps - five out of total six are available. Repair of AWS pump # 4 by a contractor started on 1/26 & is ongoing.

STS at MU8 found failed; due to bad motor on 4/07 PM. Immediately replaced with working spare. Kudos to JD Ops and Structural for quick work! Gatewell drawdown: All gatewells were in criteria.

Calibration: All sensors were within the criteria of 0.3'.

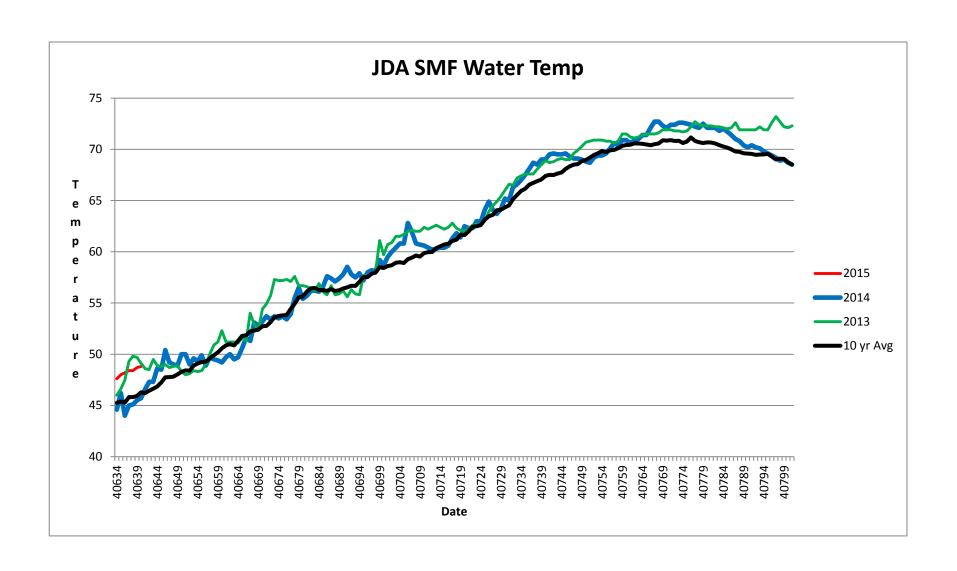
#### Research:

2015 Adult Fish Counting by Normandeau Associates commenced on 1 April, 2015.

Adult Salmonids Radio telemetry evaluations are ongoing at both JD adult fishway. University of Idaho crew is in charge of detecting of all adult salmonids, which were tagged and released at Bonneville Dam. They may conclude these operations mid-May

Kevin Moynahan Date: 20-Apr-15

OPM John Day/Willow Creek Project



# **JDA Collection Channel Velocity**

Date	9-Apr-15
By:	ML

Bay(s)	Time	Sec.	Velocity (f/s)
0-2	1:12	72	2.50
2 - 4	2:07	127	3.27
4 - 6	3:02	182	3.27
6 - 8	3:59	239	3.16
8 - 10	5:00	300	2.95
10 - 12	5:50	350	3.60
12 - 14	6:49	409	3.05
14 - 16	7:46	466	3.16
16 - 18	8:32	512	3.91
			3.21

## **2015 JDA Piscivorous Bird Counts**

(F=foraging, NF=non-foraging)

### Avian Bird Counts for the Week of April 5th- April 11th

	Gull		Cormorant		Caspian tern		Pelican		Grebe		
	F	NF	F	NF	F	NF	F	NF	F	NF	Total
PHFB	0	11	0	0	0	0	0	0	173	0	184
SWFB	0	10	0	0	0	0	0	0	0	0	10
PH1	0	0	4	0	0	0	0	0	0	0	4
PH2	0	0	0	0	0	0	0	0	0	0	0
PH3	0	0	0	0	0	0	0	0	0	0	0
SW1	0	0	7	3	0	0	0	0	0	0	10
SW2	0	0	2	21	0	0	0	0	0	0	23
SW3	1	0	0	0	0	0	0	0	0	0	1
Total	1	21	13	24	0	0	0	0	173	0	232
MOS	1	3		8		0		0	2	3	Χ

**MOS = Most Observations during one Survey** 



## John Day Weekly Averages

	Temp:
Sun	48
Mon	48
Tues	49
Wed	49
Thur	49
Fri	49
Sat	49
AVG:	49

	Secchi:
	6.0
	6.0
	6.0
	6.0
	6.0
	6.0
	6.0
VG:	6.0
	·

	Fallbacks	
	83	
	55	
	71	
	67	
	74	
	37	
	36	
AVG	60	
MAX	83	
MIN	36	
-		•

	NE1	NE2	S.Ent	SE1	N.Ent	JBS Diff	Bay19
Sun	8.9	9.0	1.5	8.6	1.4	4.6	1.7
Sun	8.7	8.8	1.4	8.4	1.5	4.6	1.5
Mon	8.6	8.7	1.5	8.5	1.5	4.6	1.7
Mon	9.5	9.6	1.4	8.5	1.5	4.5	1.6
Tues	9.4	9.4	1.4	8.5	1.4	4.5	1.6
Tues	8.6	8.7	1.4	8.8	1.4	4.6	1.6
Wed	9.4	9.6	1.5	8.4	1.5	4.6	1.6
Wed	8.2	8.4	1.1	8.8	1.5	4.5	1.4
Thur	8.2	8.4	1.5	8.8	1.5	4.8	1.7
Thur	8.0	8.1	1.4	8.5	1.5	4.4	1.7
Fri	8.2	8.3	1.2	9.5	1.4	4.6	1.6
Fri	8.5	8.4	1.1	8.4	1.7	4.5	1.3
Sat	9.1	8.9	1.3	8.6	1.6	4.7	1.4
Sat	9.2	9.1	1.4	8	1.7	4.6	1.0
AVG:	8.8	8.8	1.4	8.6	1.5	4.6	1.5