

# Pacific States Marine Fisheries Commission

## John Day Dam Condition Monitoring Weekly Report, #23-8

Report Period: 5/20 – 5/26, 2023

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### SECTION 1. River Flow and Sampling Results

	Mean				
	Min	Max	Current	Last Week	2022
A. River Flow	310.7	416.7	376.8	396.7	271.7
B. Powerhouse 1	99.5	194.6	166.2	183.4	114.7
C. Spill (kcfs)	189.8	222.5	209.3	212.2	155.5
% of River Flow	49.6	67.6	56.1	53.9	57.5
D. Water Temp *	57.9	59.1	58.7	56.1	55.4
E. % Saturation *	121.7	125.0	123.1	123.6	114.6

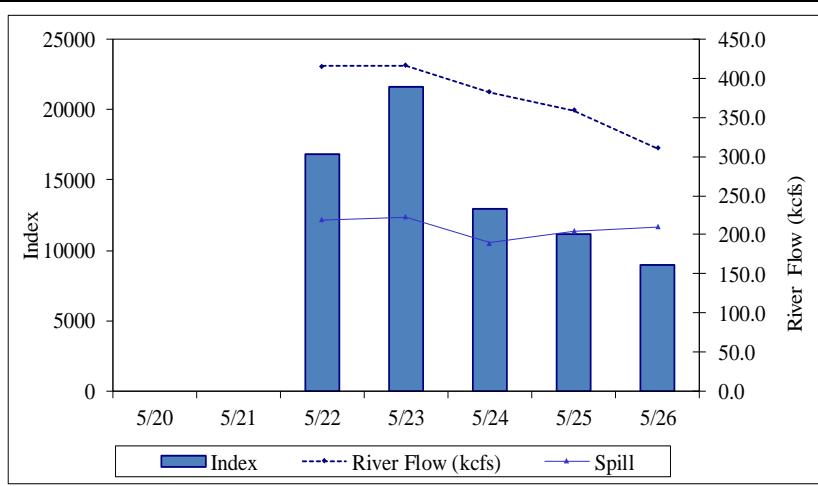
\* TDG data from USGS forebay sensor, water temp from lab and USGS sensor.

% SAMPLE COMPOSITION	This Week	Last Week
YEARLING CHINOOK	49.8%	73.5%
SUBYEARLING CHINOOK	9.5%	0.3%
CHINOOK FRY	1.0%	1.7%
UNCLIPPED STEELHEAD	9.4%	4.9%
CLIPPED STEELHEAD	17.9%	11.8%
COHO	5.9%	4.2%
COHO FRY	0.0%	0.0%
SOCKEYE	6.3%	3.7%

YEARLING CHINOOK						SUBYEARLING CHINOOK						COHO					
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	
5/20																	
5/21																	
5/22	2.0%	100	4.0	0.0	5,000	10,640	9	11.1	0.0	450	958	10	0.0	0.0	500	1,064	
5/23	2.0%	101	3.0	0.0	5,050	10,878	13	0.0	0.0	650	1,400	9	0.0	0.0	450	969	
5/24	3.5%	99	3.0	0.0	2,775	5,528	21	4.8	0.0	550	1,096	20	0.0	0.0	650	1,295	
5/25	4.0%	97	3.1	0.0	2,425	5,681	20	10.0	0.0	500	1,171	13	7.7	0.0	325	761	
5/26	7.6%	99	4.0	0.0	1,350	4,198	42	2.4	0.0	600	1,866	7	14.3	0.0	100	311	
Weekly		496	3.4	0.0	16,600	36,924	105	4.8	0.0	2,750	6,490	59	3.4	0.0	2,025	4,400	
Season to date		3,733	2.2	0.2	81,818	204,294	146	3.4	0.7	3,839	9,072	156	4.5	0.0	6,414	15,201	

UNCLIPPED						STEELHEAD						CLIPPED						SOCKEYE					
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index		
5/20																							
5/21																							
5/22	2.0%	6	1.0	0.0	300	638	24	4.2	0.0	1,200	2,554	9	11.1	0.0	450	958	14	21.4	0.0	700	1,508		
5/23	2.0%	23	0.0	0.0	1,150	2,477	41	2.4	0.0	2,050	4,416	54	7.4	0.0	1,600	3,187	15	6.7	0.0	425	847		
5/24	3.5%	19	1.0	0.0	500	996	24	4.2	0.0	600	1,406	21	11.4	0.0	410	1,275	10	0.0	0.0	375	878		
5/25	4.0%	21	2.0	0.0	525	1,230	35	11.4	0.0	410	1,275	933	4.1	0.0	38,375	96,545	109	6.4	0.0	115	358		
Weekly		94	5.3	0.0	2,770	6,259	178	6.2	0.0	5,860	12,837	63	7.9	0.0	2,065	4,548	317	3.5	0.0	9,916	24,282		
Season to date		317	3.5	0.0	9,916	24,282	933	4.1	0.0	38,375	96,545	109	6.4	0.0	4,290	9,921							

TOTAL						
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index
5/20						
5/21						
5/22	2.0%	158	5.1	0.0	7,900	16,811
5/23	2.0%	201	3.5	0.0	10,050	21,648
5/24	3.5%	228	4.4	0.0	6,500	12,949
5/25	4.0%	190	4.7	0.0	4,750	11,127
5/26	7.6%	218	5.0	0.0	2,870	8,924
Weekly		995	4.5	0.0	32,070	71,459
Season to date		5,394	2.8	0.2	144,652	359,314



Notes: Condition percentages are calculated from sample numbers.

Subyearling chinook and coho include fry.

Pacific Lamprey				Western Brook Lamprey					
Macrophthalmia			Ammocoetes			Ammocoetes			
End Date	# Smpld	% Mort	# Coll	# Smpld	% Mort	# Coll	# Smpld	% Mort	# Coll
5/20									
5/21									
5/22	2	0.0	100	0	0.0	0	0	0	0
5/23	2	0.0	100	1	0.0	50	0	0	0
5/24	2	0.0	100	0	0.0	0	0	0	0
5/25	5	0.0	125	0	0.0	0	0	0	0
5/26	3	0.0	45	0	0.0	0	0	0	0
Weekly	14	0.0	470	1	0.0	50	0	0	0
Season to date	230	0.0	2,903	106	0.0	565	0	0	0

## SECTION 2. Smolt and Lamprey Condition Monitoring Summary

### SECTION 3. Incidental Summary

	Bass Largemouth	Bass Smallmouth	Bluegill and Pumpkinseed	Bullhead	Carp	Catfish, Channel	Chiselmouth	Crappie species
This Week	0	0	1	0	0	0	0	0
Season to Date	0	3	6	0	2	1	0	7

	Dace - Longnose	Dace - Speckled	Chinook Jack	Kokanee	Lamprey Adult	Northern Pikeminnow	Peamouth	Perch Yellow
This Week	0	0	0	0	1	0	0	1
Season to Date	0	0	0	0	1	0	0	65

	Redside Shiner	Sand Roller	Sculpin species	Stickleback 3 spine	Sucker species	Shad Adult	Shad Juvenile	Sturgeon White
This Week	0	0	0	0	1	0	0	0
Season to Date	0	0	10	4	1	0	0	0

	Trout Bull	Trout Cutthroat	Trout Rainbow	Walleye	Whitefish Mountain	Siberian Prawn	Chum Salmon	Banded Killifish
This Week	0	0	0	0	1	7	0	0
Season to Date	0	0	0	21	1	176	0	1

### SECTION 4. Facility Operations

Condition Monitoring at John Day Dam is scheduled to sample Monday through Friday until early June. Samples will be taken from the Juvenile Bypass System between 0700 and 1300 hrs. and the Condition Exams will target approximately 100 of the predominant species of out-migrant, which is currently Yearling Spring Chinook. Collection, Index, and River flow estimates and averages are for the sample period only. Debris at the separator bars was moderate to high for the week which is coinciding with high river flows and turbid water. Visibility in the sample holding tank was about was better most days this week (> 12 inches) than last week but fish processing was still challenging during some periods. Debris consisted of sticks, tumbleweeds, pieces of terrestrial vegetation, and plastic.

### SECTION 5. Research

Genetic fin clip samples were taken from 14 Pacific Lamprey macrophthalmia and one Pacific Lamprey ammocoete for the Columbia River Inter-Tribal Fish Commission during this report period.

## SECTION 6. Pictures



Clipped Yearling Spring Chinook smolt (*Oncorhynchus tshawytscha*), approximately 155 mm fork length, showing an injury to the left side operculum and partial descaling, similar to one sampled at the John Day Dam Smolt Facility on May 19, 2023.



Yearling Spring Chinook smolt (*Oncorhynchus tshawytscha*), showing eye hemorrhaging, similar to one sampled at the John Day Dam Smolt Facility on May 24, 2023. Second example is of a steelhead smolt (*O. mykiss*) with a nose/head injury, sampled on May 26, 2023 at John Day Dam Smolt Facility.



Pacific Lamprey Macrophthalmia (*Entosphenus tridentatus*), approximately 140 mm total length, showing numerous paired avian predation marks on body and towards the caudal fin, similar to one sampled on 23 May, 2023 at the John Day Dam Smolt Facility.