

Pacific States Marine Fisheries Commission

John Day Dam Condition Monitoring Weekly Report, #23-10

Report Period: 6/3 – 6/9, 2023

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SECTION 1. River Flow and Sampling Results

	Min	Max	Mean		
			Current	Last Week	2022
A. River Flow	211.7	230.3	222.6	263.8	386.2
B. Powerhouse 1	51.1	53.4	52.2	57.0	166.2
C. Spill (kcfs)	156.8	178.0	169.0	205.5	218.6
% of River Flow	74.1	77.3	75.9	77.9	57.0
D. Water Temp *	62.4	63.6	63.1	60.1	57.6
E. % Saturation *	112.9	119.4	117.3	115.4	118.9

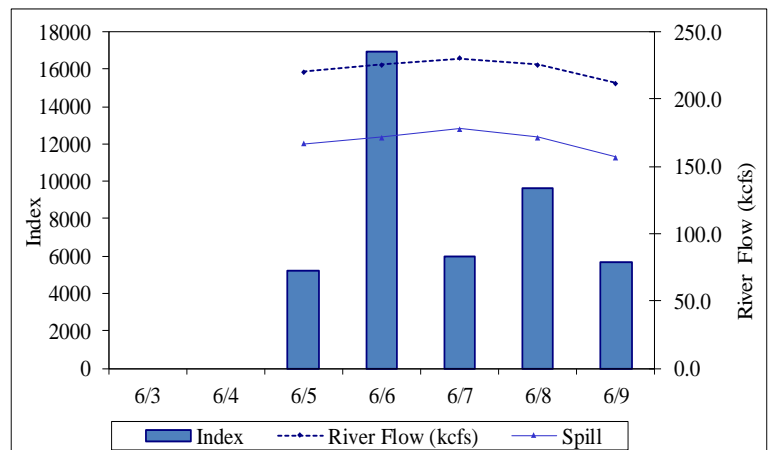
* TDG data from USGS forebay sensor, water temp from lab and USGS sensor.

% SAMPLE COMPOSITION		This Week	Last Week
YEARLING CHINOOK		2.4%	15.8%
SUBYEARLING CHINOOK		90.7%	65.3%
CHINOOK FRY		0.7%	0.5%
UNCLIPPED STEELHEAD		0.7%	2.7%
CLIPPED STEELHEAD		0.3%	2.8%
COHO		4.5%	10.4%
COHO FRY		0.0%	0.0%
SOCKEYE		0.5%	2.6%

YEARLING CHINOOK							SUBYEARLING CHINOOK					COHO				
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index
6/3																
6/4																
6/5	9.3%	3	0.0	0.0	45	190	108	1.9	0.0	1,150	4,848	3	33.3	0.0	30	126
6/6	2.9%	1	0.0	0.0	20	86	109	0.0	0.0	3,830	16,437	1	0.0	0.0	20	86
6/7	7.9%	0	0.0	0.0	0	0	101	1.0	0.0	1,270	5,694	3	0.0	0.0	40	179
6/8	5.1%	7	0.0	0.0	121	516	104	2.9	0.0	2,068	8,827	3	33.3	0.0	41	175
6/9	8.6%	3	33.3	0.0	18	71	101	2.0	0.0	1,156	4,550	16	6.3	0.0	230	905
Weekly		14	7.1	0.0	204	863	523	1.5	0.0	9,474	40,357	26	11.5	0.0	361	1,472
Season to date		3,870	2.2	0.2	83,882	213,374	1,182	1.4	0.1	19,838	79,214	263	5.3	0.0	7,765	21,191

UNCLIPPED STEELHEAD							CLIPPED STEELHEAD					SOCKEYE				
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index	# Smpld	% Desc	% Mort	# Coll	Index
6/3																
6/4																
6/5	9.3%	1	0.0	0.0	10	42	0	0.0	0.0	0	0	0	0.0	0.0	0	0
6/6	2.9%	0	0.0	0.0	0	0	0	0.0	0.0	0	0	2	0.0	0.0	70	300
6/7	7.9%	0	0.0	0.0	0	0	1	0.0	0.0	20	90	0	0.0	0.0	0	0
6/8	5.1%	1	0.0	0.0	20	85	0	0.0	0.0	0	0	0	0.0	0.0	0	0
6/9	8.6%	2	0.0	0.0	8	31	1	0.0	0.0	4	16	1	0.0	0.0	20	79
Weekly		4	0.0	0.0	38	159	2	0.0	0.0	24	105	3	0.0	0.0	90	379
Season to date		342	3.5	0.0	10,264	25,810	957	4.0	0.0	38,689	97,924	132	6.1	0.0	4,600	11,363

TOTAL						
End Date	Sample Rate	# Smpld	% Desc	% Mort	# Coll	Index
6/3						
6/4						
6/5	9.3%	115	2.6	0.0	1,235	5,207
6/6	2.9%	113	0.0	0.0	3,940	16,909
6/7	7.9%	105	1.0	0.0	1,330	5,963
6/8	5.1%	115	3.5	0.0	2,250	9,604
6/9	8.6%	124	3.2	0.0	1,436	5,653
Weekly		572	2.1	0.0	10,191	43,336
Season to date		6,746	2.6	0.1	165,038	448,877



Notes: Condition percentages are calculated from sample numbers.
Subyearling chinook and coho include fry.

Western Brook

	Macrophthalmia			Ammocoetes			Ammocoetes		
End Date	# Smpld	% Mort	# Coll	# Smpld	% Mort	# Coll	# Smpld	% Mort	# Coll
6/3									
6/4									
6/5	0	0.0	0	0	0.0	0	0	0	0
6/6	0	0.0	0	0	0.0	0	0	0	0
6/7	0	0.0	0	0	0.0	0	0	0	0
6/8	1	0.0	20	0	0.0	0	0	0	0
6/9	0	0.0	0	0	0.0	0	0	0	0
Weekly	1	0.0	20	0	0.0	0	0	0	0
Season to date	249	0.0	3,153	107	0.0	575	0	0	0

SECTION 2. Smolt and Lamprey Condition Monitoring Summary

		Yearling		Subyearling		Unclipped		Clipped		Coho		Sockeye	
		Chinook		Chinook		Steelhead		Steelhead					
		This Week	Last Week	This Week	Last Week	This Week	Last Week	This Week	Last Week	This Week	Last Week	This Week	Last Week
SAMPLE #		14	123	519	509	4	21	2	22	26	81	3	20
DESCALING	3-19%	7.1%	5.7%	1.5%	2.2%	4.8%		4.5%		11.5%	6.2%	33.3%	
	>20%			0.4%						3.8%			5.0%
	Pred. Desc.	7.1%	1.6%	1.2%	0.8%	4.8%				7.7%	4.9%		
INJURY	BODY	7.1%	1.6%	0.2%	1.0%					3.8%			
	EYE												5.0%
	HEAD			0.2%				4.5%					
	OPERC.		0.8%	0.2%	0.4%			4.5%		3.8%	3.7%	33.3%	5.0%
	FIN	7.1%	3.3%	0.6%		9.5%		4.5%		3.8%	1.2%		
	POPEYE												
OTHER CONDITIONS	PINK FIN												
	Fin Discolor. FIN HEM.	3.3%		3.3%	3.5%					1.2%		5.0%	
DISEASE	Columnaris			0.4%		4.8%		4.5%					
	FUNGUS			0.2%		4.8%				1.2%			
	BKD	0.0%	1.6%		0.2%								
	PARASITES		0.8%	0.6%	0.2%	4.8%				1.2%			
	DEFORMITY				0.6%								
	EYE HEM.	7.1%		0.2%									
PREDATION	BIRD		0.8%	0.8%	0.2%	4.8%		9.1%			2.5%		
	FISH	7.1%	2.4%	1.0%	0.8%					11.5%	6.2%		
	LAMPREY				0.2%								
	OTHER												
end dates		6/9	6/2										

			INJURY					DISEASE and OTHER CONDITIONS					PREDATION	
MP- Macrophthalmia This Week Last Week	End Date	SAMPLE #	BODY	EYE	HEAD	FIN	POPEYE	FIN HEM	Columnaris	FUNGUS	DEFORMITY	EYE HEM.	BIRD	FISH
	6/9	1												
	6/2	18						5.6%					11.1%	
	AP - Ammocoetes		SAMPLE #											
This Week	6/9	0												
Last Week	6/2	1	100.0%		100.0%									

SECTION 3. Incidental Summary

	Bass Largemouth	Bass Smallmouth	Bluegill and Pumpkinseed	Bullhead	Carp	Catfish, Channel	Chiselmouth	Crappie species
This Week	0	4	0	0	0	0	0	0
Season to Date	0	12	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	0	0	0	1
Season to Date	0	0	0	0	2	0	0	67

	Redside Shiner	Sand Roller	Sculpin species	Stickleback 3 spine	Sucker species	Shad Adult	Shad Juvenile	Sturgeon White
This Week	0	0	0	0	0	0	0	0
Season to Date	0	0	10	4	2	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	2	0	0
Season to Date	0	0	0	21	2	182	0	1

SECTION 4. Facility Operations

Condition Monitoring at John Day Dam is scheduled to sample Monday through Friday until mid-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 Subyearling Fall Chinook. Collection, Index, and River flow estimates and averages are for the sample period only. Debris at the separator bars was very low for the week which coincided with lower river flows than the past several weeks. Debris consisted of sticks, tumbleweeds, pieces of terrestrial vegetation, and plastic.

SECTION 5. Research

A genetic fin clip sample was taken from one Pacific Lamprey macrophthalmia for the Columbia River Inter-Tribal Fish Commission during this report period.

SECTION 6. Pictures



Subyearling Fall Chinook smolt (*Oncorhynchus tshawytscha*), approximately 110 mm fork length, showing a slight fin hemorrhage to the left pelvic fin, sampled at the John Day Dam Smolt Facility on June 9, 2023.



Unclipped Subyearling Fall Chinook smolt (*Oncorhynchus tshawytscha*), approximately 130 mm fork length, showing descaling and predation scar on left side caused by a fish (probably a walleye based on the teeth marks), similar to one sampled at the John Day Dam Smolt Facility on June 9, 2023.



Same specimen as above showing descaling and predation scar on the right side of the fish.