



# United States Department of the Interior



FISH AND WILDLIFE SERVICE  
Dworshak Fisheries Complex  
P.O. Box 18  
Ahsahka, ID  
Phone: (208) 476-4591 FAX: (208) 476-3252

## MEMORANDUM

To: Fisheries Supervisor, Columbia Basin Ecoregion  
Region 1, Portland, OR

From: Complex Manager  
Dworshak Fisheries Complex

Subject: Dworshak Production Narrative, December, 2008

### SPRING CHINOOK SALMON (SCS)

#### **Brood Year 2007 (BY07)**

At the end of the month there were 1,027,687 BY07 SCS averaging 27 fish per pound (fpp) and 127 mm (5.0 inches) total length on station (Table 1). These fish are being held in A and B-Bank raceways (RW's). Mortality for the month averaged 0.12 percent.

Table 1. BY2007 SCS inventory summary (12/31/08).

Stock	Number	Wt (lb)	fpp	L in	L mm	Lgth/mm	Wt(lb) Gain/Mo
Dworshak	1,027,687	38,464	26.7	5.0	127	6	5,218

Water temperature averaged 45.0°F and flow averaged 500 gpm/RW.

On December 17, a formalin treatment was given to all BY07 SCS to control *Trichodina Sp.*

#### **Brood Year 2008**

At the end of the month there were 368,993 eyed eggs of Dworshak stock incubating at Dworshak National Fish Hatchery (DNFH). Chilled incubation water temperature for the month averaged 36.6°F and the SCS are currently targeted to go on feed in April, 2009. There were also 820,000 eyed eggs of Dworshak stock transferred to Kooskia National Fish Hatchery (KNFH) in October for incubation over the winter.

### COHO SALMON (COS)

#### **Brood Year 2007**

At the end of December there were 284,907 BY07 COS averaging 21 fpp being reared in C-bank RWs. Mortality for the month averaged 0.3 percent.

**Brood Year 2008**

Spawning of BY08 Coho ended on November 12 with a total of 461 females being spawned by that date. At the end of the month there were 1,113,663 eyed eggs incubating in C and D-bank incubators at Dworshak. The production goal for Coho at Dworshak is 280,000 presmolts.

**SUMMER STEELHEAD (SST)**

**Brood Year 2008**

Mortality for December remained low for the second month in row. All systems were run on single pass river water rather than switching to the reuse systems (heated water) as fish growth has been slightly higher than projected. Due to the high mortality throughout the summer and fall as a result of *Infectious Hematopoietic Necrosis Virus* (IHNV) and Cold Water Disease, the 2.1 million target release number for SST will not be met in the spring of 2009.

Table 2 illustrates the number of BY08 SST on station at the end of the month and the projected release numbers in the spring of 2009.

Table 2. BY08 SST on station and projected release size and numbers from 12/31/08.

End of Month Data					3 Yr Ave Lgth (mm) Month End DEC	Projected Release April 2009		
System	Number	Weight (lbs)	fpp	Lgth (mm)		Proj % Mortality until Release	Proj Release Number	Proj Release Size (mm)*
Syst I	704,602	62,901	11.2	161	157	4	676,418	196
Syst II	645,527	76,136	8.5	177	171	4	619,706	201
Syst III	474,879	75,865	6.3	196	185	4	455,884	220
<b>Total/ Ave</b>	<b>1,825,008</b>	<b>214,902</b>	<b>8.5</b>	<b>177</b>		<b>4.0</b>	<b>1,752,008</b>	<b>204</b>

\*Reuse on January-March System I.

**System I**

By the end of the month there were 704,602 SST in System I averaging 11 fpp and 161 mm (6.3 inches) total length (Table 3). Mortality for the month was 0.1 percent.

Table 3. BY2008 SST System I inventory numbers (12/31/08).

Rearing Unit	Number	Wt (lbs)	fpp	L in	L mm	Lgth/mm Gain/mo	Wt (lbs) Gain/mo
BPs	704,602	62,901	11.2	6.3	161	13	13,776

Water temperature averaged 45.0°F and flow averaged 550 gpm/BP.

On December 5, a formalin treatment was given to all SST in System I to control *Trichodina sp* and *Epistylis sp*.

## System II

By the end of the month there were 645,527 SST in System II averaging 8.5 fpp and 177 mm (7.0 inches) total length (Table 4). Mortality for the month was 0.3 percent.

Table 4. BY08 SST System II inventory numbers (12/31/08).

Rearing Unit	Number	Wt (lbs)	fpp	L in	L mm	Lgth/mm Gain/mo	Wt (lbs) Gain/mo
BPs	645,527	76,136	8.5	7.0	177	10	15,851

Water temperature averaged 45.0°F and flow averaged 500 gpm/BP.

On December 11, SST in four Burrow's Ponds (BP's) were consolidated because of the low numbers of fish in each pond due to the high mortality suffered during the summer. Transfer of SST included fish from pond 42 moved into pond 40 along with SST in pond 48 moved into pond 46.

On December 16, a formalin treatment was administered to SST in BPs 24, 32, 36, and 40 for control of *Ichthyophthirius multifiliis* (ICH) and *Chilodenella* sp.

## System III

By the end of the month there were 474,879 SST in System III averaging 6.3 fpp and 196 mm (7.7 inches) total length (Table 5). Mortality for the month was 0.6 percent.

Table 5. BY08 SST System III inventory numbers (12/31/08).

Rearing Unit	Number	Wt (lbs)	fpp	L in	L mm	Lgth/mm Gain/mo	Wt (lbs) Gain/mo
BPs	474,879	75,865	6.3	7.7	196	9	9,808

Water temperature averaged 45.0°F and flow averaged 506 gpm/BP.

On December 10, SST in several BP's were consolidated because of the low numbers of fish in each pond due to the high mortality suffered during the summer. Transfer of SST included fish moved from pond 59 into 61; ponds 65 and 67 into 63; ponds 69, 71, and 73 into 75; and pond 56 into 58.

There were no medical or chemical treatments given to these fish during the month.

## RAINBOW TROUT (RBT)

### *Brood Year 2008 done*

By the end of the month there were 12,180 BY08 RBT in System III averaging 3.1 (fpp) and 235 mm (9.3 inches) total length (Table 6). Mortality for the month was 2.0 percent.

Table 6. BY2008 RBT inventory numbers (12/31/08).

Rearing Unit	Number	Wt (lbs)	fpp	L in	L mm	Lgth gain/in
BP 60 (Diploid)	9,360	2,819	3.3	9.1	231	0.6
BP 62 (Triploid)	2,820	1,060	2.7	9.8	249	0.4
Total/Ave	12,180	3,879	3.1	9.3	235	

Water temperature averaged 45.0°F and water flow was 500 gpm/BP.

On December 19, a formalin treatment was given to the RBT in BP60 to control ICH. BP 60 also tested positive for IHNV.

These RBT will be for Open House 2009.

## SUMMARY

Table 7. Total Production—Fish on Station (12/31/08).

SP	BY	Location	Number	Wt (lbs)	FPP	L in	L mm
COS	07	C-Bank RWs	284,907	13,836	20.6	5.2	131
RBT	08	BP 60 & 62	12,180	3,879	3.1	9.3	235
SCS	07	A Bank RWs	1,027,687	38,464	26.7	5.0	127
SST	08	System I	704,602	62,901	11.2	6.3	161
SST	08	System II	645,527	76,136	8.5	7.0	177
SST	08	System III	474,879	75,865	6.3	7.7	196
<b>Total</b>			<b>3,149,782</b>	<b>271,081</b>			



Larry Peltz  
Complex Manager

Dworshak NFH  
Dworshak Production (2)  
Kooskia NFH  
Idaho FRO  
Idaho FHC  
LSRCP - Boise