



OREGON DEPARTMENT OF FISH AND WILDLIFE

ANNUAL REPORT LOOKINGGLASS HATCHERY

October 1, 2012 through September 30, 2013



LOOKINGGLASS FISH HATCHERY ANNUAL REPORT FY2013

INTRODUCTION

Location

Lookingglass Fish Hatchery is located on Lookingglass Creek 2.2 miles upstream from its confluence with the Grande Ronde River near the small community of Palmer Junction. The Grande Ronde flows another 85 miles before entering the Snake River at Heller Bar. The Imnaha satellite facility is located at river mile 46 on the Imnaha River, a tributary to the Snake River and is used as a smolt acclimation and release site in the spring and for adult trapping in the summer.

OBJECTIVES

Program Goals

Lookingglass Fish Hatchery is part of the Lower Snake River Compensation Program (LSRCP) and has been in operation since 1982. LSRCP's long term mitigation goal for the hatchery is to return 5,720 adult Chinook to the Grande Ronde sub-basin for fish losses occurring as a result of the construction and operation of the four Lower Snake River Dams. Short term goals are recovery, delisting, and utilizing captive broodstock technology and conventional supplementation to prevent the extinction of three wild Chinook populations; the Upper Grande Ronde River stock, Catherine Creek stock, and Lostine River stock. Also, reintroduction of spring/summer Chinook into Lookingglass Creek using Catherine Creek stock is a goal of the program. In the Imnaha River system, the program mitigation goal is to return 3,210 hatchery adults to the area above Ice Harbor Dam. In addition, program goals include restoring and maintaining the natural spawning population, reestablishing sport and tribal fisheries, and minimizing the impacts of the program on resident stocks of fish.

CHINOOK

Trapping and Adult Returns

The adult trap on Lookingglass Creek was put into operation on March 1, 2013 to trap adult steelhead returning in the spring. Wild steelhead are enumerated and then released upstream of the weir to spawn naturally and hatchery origin steelhead are removed. A total of 157 unmarked steelhead were trapped and released above the weir. Eighteen unmarked steelhead were re-captured and released above the weir and no kelts were released below the weir. Two hatchery steelhead were passed above the weir. One hatchery steelhead was trapped and euthanized.

The first spring Chinook (1) was trapped on May 12, 2013. A total of 1,013 Spring Chinook were trapped consisting of 957 Lookingglass Creek stock, and 56 Grande Ronde River stock. The Grande Ronde River stock fish were fish that swam into the Lookingglass trap and identified by their intact adipose fin and CWT mark. Grande Ronde River fish collected were 31 for Grande Ronde River brood stock and 25 were food bank kill/bury. Two hundred and thirty six fish were released above the weir in real time (160 adults and 63 unmarked jacks), plus 13 recaptures which consisted of 12 adults and one unmarked jack. Lookingglass stock was retained for brood stock

purposes (140), or distributed to food banks (319 jacks which included 82 re-captures). There were 171 jacks recycled into the fishery. There were 91 jacks that were killed/buried after fish were no longer suitable for human consumption. The trap was in continuous operation until September 11, 2013. There were no trap mortalities.

The weir at the Imnaha Satellite Facility was installed on July 5, 2013 but the trap was in operation from June 20, 2013 until September 13, 2013. A total of 1,201 fish were trapped consisting of 146 males, 121 females, 802 jacks and 132 re-capture jacks. There were 228 fish held for broodstock purposes consisting of 87 males, 98 females, and 43 jacks (3 were recapture jacks). Fish that were excess to broodstock needs were re-cycled through the fishery, distributed to charitable food banks, out-planted, released above the weir, or taken to Wallowa Fish Hatchery to recover CWT for M & E purposes. A total of 0 adults and 247 Jacks were re-cycled through the fishery; 0 adults and 95 jacks were distributed to food bank and one jack was out-planted into Big Sheep Creek a tributary to the Imnaha River. Also, there were 203 fish passed above the weir; 48 males, 20 females, and 135 unmarked jacks and 2 jacks were killed and placed below the weir for stream enrichment, and one adult ad female was killed due to tumors and was given to Pathology for testing. Hatchery fish transported to Wallowa Hatchery consisted of 400 Ad jacks. There were 7 jack trap mortalities.

Located on the Upper Grande Ronde River and Catherine Creek, weirs and traps are operated by the Confederated Tribes of the Umatilla Indian Reservation (CTUIR). A portion of returning adults trapped there are transported to Lookingglass and held for spawning. Lookingglass Hatchery received a total of 92 brood stock from the Upper Grande Ronde river facility consisting of 28 males, 55 females, and 09 jacks. In addition, there were 56 Grande Ronde fish that swam into the Lookingglass trap on Lookingglass Creek and 31 were kept for brood stock.

There were 98 brood stock received from the Catherine Creek weir and trap consisting of 37 males, 57 females, and 4 jacks.

Located on the Lostine River, a weir and trap are operated by the Nez Perce Tribe. A portion of returning adults trapped there are transported to Lookingglass Hatchery and held for spawning. There were 145 Lostine River broodstock consisting of 55 males and 80 females and 10 jacks brought to Lookingglass Hatchery.

Spawning and Egg Production

All conventional broodstock of the various stocks of fish were spawned at Lookingglass Hatchery and all fertilized eggs incubated at Lookingglass. All Lookingglass Creek, Grande Ronde and Imnaha stock females' eggs were incubated in Moist Air Incubation units. Catherine Creek and Lostine River stock females' eggs were incubated in traditional Heath style egg incubation stacks. Survival to the eyed egg stage was 87.9%. Fry from Catherine Creek, Grande Ronde River, Lostine River, and Imnaha will be reared at Lookingglass Hatchery. Lookingglass stock fry will be transferred to Irrigon Hatchery in the spring of 2014. The Lookingglass stock of fish will be reared at Irrigon until late September and then returned to Lookingglass for final rearing until release in the spring of 2015. Final rearing at Lookingglass will take place in the adult holding ponds which have been modified to hold fish at 20-30 fish per pound.

Egg production from 2013 spawning efforts, number of females' spawned, percent eye up, green and eyed egg numbers, and fecundities for the various stocks is as follows:

There were 87 Imnaha stock females spawned yielding 390,184 green eggs resulting in 359,106 eyed eggs for an eye up of 92.0%. Average fecundity was 4,485 per female.

A total of 69 Lostine females were spawned yielding 294,759 green eggs resulting in 263,330 eyed eggs for an eye up of 89.3 %. Average fecundity was 4,272 per female.

A total of 67 Lookingglass females were spawned yielding 249,742 green eggs resulting in eyed eggs 201,754, and culled one female at 4,617 eggs, for an eye up of 80.8% including the culled female. Average fecundity was 3,727 per female.

A total of 49 Catherine Creek females were spawned yielding 186,125 green eggs resulting in 1,155,649 eyed eggs for an eye up of 83.6.0%. Average fecundity was 3,798 per female.

A total of 66 Grande Ronde females were spawned yielding 251,184 green eggs resulting in 230,290 eyed eggs for an eye up of 91.7%. Average fecundity was 3,806 per female.

Total conventional egg take was 1,371,994 green eggs yielding 1,205,209 eyed eggs

Transported 303 Grande Ronde eyed eggs to Bonneville Hatchery Captive Brood/SNAP program...

Fish Health Services recommended culling eggs from three females. Only one was culled. The Grande Ronde River female was a total loss of eggs before culling, the Lookingglass female was culled, and it was decided that the Lostine River female would not be culled due to shortage of eggs...

Captive Broodstock Chinook Program/ SNAP Program

A separate annual report covers the details for operation of this program. There were no captive progeny reared at Lookingglass.

Miscellaneous

Fish marking by ad-clipping, Coded Wire Tag marking, or both was completed on the BY 2012 Imnaha, Lostine, Catherine Creek, and Upper Grande Ronde River stocks in August, 2013. A total of 125,409 fish (Grande Rondes), received a CWT only, 618,014 were CWT and ad-clipped and 261,604 were ad-clipped only. Lookingglass stock fish were marked at Irrigon Hatchery in 2013.

PIT-tagging was completed on the BY 2012 Imnaha, Lostine, Catherine Creek, Lookingglass, and Upper Grande Ronde River stocks in October, 2013. A total of 50,747 fish received PIT tags. By stock, the number of fish receiving PIT tags was: Catherine Creek-20,932, Grande Ronde-1,997, Imnaha-20,852, Lookingglass-2,988, and Lostine River-3,978.

CONSTRUCTION AND MAINTENANCE

MAINTENANCE PROJECTS ACCOMPLISHED BY ODFW PERSONNEL

- ISD installed internet at the Imnaha Acclimation and Adult Trapping site
- Repaired various snow removal equipment
- Continued a re-cycling program re-cycling computer paper, catalogs, plastic bottles, cardboard, aluminum, and tin cans
- Took several dump truck loads of surplus metal to re-cycling center
- Serviced UV water treatment system cleaning drum filter and replacing UV lamps and drum filter panels
- Worked with Union County Sheriff's Department and people who have been ordered by the court to perform community service work in various miscellaneous labor projects including pressure washing, cutting, splitting, and stacking firewood
- Affected repairs on the GE propane generator for the facility
- Sent in the ONAN generator for engine rebuild to replace the Kohler generator
- Repaired the hatchery power crowder.
- Serviced all motors, pumps, and vehicles around the facility
- Pulled stumps, trimmed brush, fertilized lawns, killed weeds, trimmed trees around facility
- Moved and re-installed ice machine at LGH
- Installed ice machine at Imnaha.
- Refurbished and hung facility information signs in front of facility
- Repaired wooden fall back weir at trap
- Annual Fuel Tank Inspection completed in April. New signage put on fuel tanks

MAINTENANCE PROJECTS ACCOMPLISHED BY CONTRACTORS

Alpine Alarm – Alarm systems in the three residences and hatchery building were changed to manual systems maintained by LGH personnel

Sheep Creek Chimney Sweeps-Inspection and residential chimney cleaning, dryer vents, and furnace ducts

Barnes Diesel Power – Perform annual DOT inspections on dump truck and fish Liberation truck.

Coffey Refrigeration - Performed maintenance service on water chiller units and Moist Air Incubator chiller units.

Delta Environmental – Domestic water quality analysis and DEQ environmental water sample analysis

Eastern Oregon Nursery-Conduct backflow tests on hatchery residences

Ladco Electric – General electrical maintenance throughout the facility, work on TW-2 well electronics.

Les Schwab-Miscellaneous tire and battery replacements

Partney/Mitrac Construction – Remove rock and gravel from Lookingglass Creek in front of water intake.

Marks Construction – Remove rock and gravel from the Imnaha River in front of the water intake and adult return channel.

Rahn Sanitary Service - Repaired septic tank alarm system for residence # 31001

R & C Fire Extinguisher – Annual maintenance and recharge fire extinguishers for LGH, IM, and Residences

Wallowa County Road Department-Plow snow to and within Imnaha Satellite Facility compound

Wheeler Communication – Repair handheld Motorola Radios, supply new batteries for radios, and serviced Imnaha radio telephone system

Zee Medical- First aid supplies

MAJOR EXPENSES

Travel and transportation	\$ 2,367.33
Repair & maintenance of buildings and grounds	\$ 4,592.00
Fish food	\$ 100,793.00
Repairs and maintenance to equipment	\$ 5,000.00
Program Related Supplies/Other Services	\$ 17,447.00
Communication services	\$ 15,378.23
Fuel and Utilities*	\$ 1,964.07
Training	\$ 247.00
Uniform items, PPE	\$ 2,298.43
Chemicals	\$ 13,329.00
Equipment Rental	\$ 1,524.00
Office Supplies	\$ 2,342.88
Total	\$ 167,282.94

*Utilities does not include an estimated \$80,000 paid directly by LSRCP

Adult Returns to Hatchery

Chinook

Lookingglass Creek Stock 81 BY13

Lookingglass Fish Hatchery	
Where trapped:	Lookingglass Creek Weir
Dates trapped:	May 12 – September 11, 2013
Number of adults trapped:	131 males, 158 females, 555 jacks
Date of peak returns:	June 11, 2013
Number of adults released to spawn naturally:	72 males, 102 females, 235 jacks
Number of adults to hatchery for broodstock:	59 males, 56 females, 5 jacks
Number given away:	0 males, 0 females, 315 jacks
Mortality of all adult returns	<i>at trap:</i> 0 males, 0 females
	<i>at hatchery:</i> 6 males, 3 females, 6 jacks

Chinook - Conventional Broodstock Program

Grande Ronde River Stock 80 BY13

Lookingglass Fish Hatchery	
Where trapped:	Lookingglass Creek Weir
Dates trapped:	May 29 – September 11, 2013
Number of adults trapped:	12 males, 19 females, 24 jacks
Date of peak trapping:	June 12, 2013
Number of adults released to spawn naturally:	0 males, 0 females, 2 jacks
Number of adults to hatchery for broodstock:	12 males, 19 females, 5 jacks
Number given away:	0 males, 0 females, 17 jacks
Mortality of all adults	<i>at trap:</i> 4 males, 8 females, 1 jack

Summer Steelhead

Lookingglass Creek Stock 81 BY12

Lookingglass Fish Hatchery	
Where trapped:	Lookingglass Creek Weir
Dates trapped:	March 1 – June 15, 2013
Number of adults trapped:	62 males, 99 females, 0 jacks
Date of peak returns:	May 9, 2012
Number of adults released to spawn naturally:	61 males, 99 females, 0 jacks
Number of adults to hatchery for broodstock:	0 males, 0 female, 0 jacks
Number given away	0 males, 0 female, 0 jacks
Mortality of all adult returns	<i>at trap:</i> 0 males, 0 females
	<i>at hatchery:</i> 1 male, 0 female, 0 jacks

Adults Trapped Off Hatchery and Transported to Hatchery

Chinook Imnaha Stock 29 BY13

Lookingglass Fish Hatchery	
Where trapped:	Imnaha Satellite Facility
Date weir installed:	June 17, 2013
Dates trapped:	June 20 – September 13, 2013
Number of adults trapped:	146 males, 121 females, 802 jacks
Date of peak trapping:	July 17, 2013
Number of adults released to spawn naturally:	
<i>Imnaha River</i>	59 males, 22 females, 385 jacks
<i>Big Sheep Creek</i>	0 males, 0 females, 104 jacks
Number of adults to hatchery for broodstock:	87 males, 98 females, 43 jacks
Number given away	0 males, 0 females, 179 jacks
Mortality of all adults	
<i>at trap:</i>	0 males, 0 females, 8 jacks
<i>at hatchery:</i>	32 males, 11 females, 1 jack

Chinook - Conventional Broodstock Program Grande Ronde River Stock 80 BY13

Lookingglass Fish Hatchery	
Where trapped:	Upper Grande Ronde Weir
Dates trapped:	May 29 – June 17, 2013
Number of adults trapped:	44 males, 83 females, 47 jacks
Date of peak trapping:	June 5, 2013
Number of adults released to spawn naturally:	16 males, 28 females, 6 jacks
Number of adults to hatchery for broodstock:	28 males, 55 females, 9 jacks
Number given away	0 males, 0 females, 17 jacks
Mortality of all adults	
<i>at trap:</i>	0 males, 0 females, 0 jacks
<i>at hatchery:</i>	4 males, 8 females, 1 jack

Adults Trapped Off Hatchery and Transported to Hatchery

Chinook - Conventional Broodstock Program Catherine Creek Stock 201 BY13

Lookingglass Fish Hatchery	
Where trapped:	Catherine Creek Weir
Dates trapped:	May 27 – July 24, 2013
Number of adults trapped:	246 males, 259 females, 294 jacks
Date of peak trapping:	June 5, 2013
Number of adults released to spawn naturally: <i>Catherine Creek</i>	200 males, 209 females, 96 jacks
Number of adults to hatchery for broodstock:	37 males, 57 females, 4 jacks
Mortality of all adults	<i>at trap:</i> 0 males, 0 females, 1 jacks
	<i>at hatchery:</i> 6 males, 8 females, 1 jack

Chinook - Conventional Broodstock Program Lostine River Stock 200 BY13

Lookingglass Fish Hatchery	
Where trapped:	Lostine River Weir
Dates trapped:	June 11 – September 17, 2013
Date of peak trapping:	July 19, 2013
Number of adults trapped:	120 males, 116 females, 566 jacks
Number of adults to hatchery for broodstock:	55 males, 80 females, 10 jacks
Number of adults released to spawn naturally:	63 males, 32 females, 144 jacks
Mortality of all adults	<i>at trap:</i> 0 males, 0 females, 0 jacks
	<i>at hatchery:</i> 14 males, 9 females, 0 jacks

SPAWNING RECORD**Chinook
Imnaha Stock 29 BY13**

Lookingglass Fish Hatchery

Date Spawned	Number of Eggs Taken	Females Spawned	Males Spawned
8/13/13	5,132	1	2
8/20/13	34,580	8	8
8/27/13	112,986	25	22 M, 12 J = 2 M
9/03/13	185,733	40	38 M, 12 J = 2 M
9/10/13	51,733	13	12

Imnaha stock Chinook eggs and milt were combined according to matrices, depending on available mature broodstock. Milt from hatchery jacks was pooled, 6 jacks equivalent to one male.

Total number of females spawned: 87
 Total number of males spawned: 55
 Total number of green eggs: 390,164
 Total number of eyed eggs: 359,106
 Number of eggs retained for rearing: 359,106
 Date of last spawning: 9/10/13

**Chinook
Lookingglass Stock 81 BY13**

Lookingglass Fish Hatchery

Date Spawned	Number of Eggs Taken	Females Spawned	Males Spawned
8/14/13	5,407	1	2
8/21/13	22,890	8	8
8/28/13	73,976	19	17 M, 1 J
9/04/13	112,911	30	28 M, 2 J
9/11/13	34,558	9	8 M, 1 J

Eggs and milt were combined by matrices, according to available mature broodstock.

Total number of females spawned: 67
 Total number of males spawned: 46
 Total number of green eggs: 249,742
 Total number of eyed eggs: 201,754
 Total number of eggs culled due to high BKD: 4,617
 Number of eggs retained for rearing: 197,137
 Date of last spawning: 9/11/13

Spawning Record

Chinook Upper Grande Ronde Stock 80 BY13

Lookingglass Fish Hatchery

Date Spawned	Number of Eggs Taken	Females Spawned	Males Spawned
8/22/13	12,477	3	2
8/29/13	131,433	33	26 M, 3 J
9/05/13	90,331	25	17, 7 J
9/11/13	16,973	5	5

Eggs and milt were combined by matrices, according to available mature broodstock.

Total number of females spawned:	66
Total number of males spawned:	37
Total number of green eggs:	251,214
Total number of eyed eggs:	230,290
Total number of eggs shipped:	277*
Number of eggs retained for rearing:	230,013
Date of last spawning:	9/11/13

**Eyed eggs shipped to Bonneville Hatchery for SNAP program*

Chinook Catherine Creek Stock 201 BY13

Lookingglass Fish Hatchery

Date Spawned	Number of Eggs Taken	Females Spawned	Males Spawned
8/15/13	15,126	4	4
8/22/13	36,061	10	10
8/29/13	90,631	25	24 M, 1 J
9/05/13	31,021	7	5 M, 1 J
9/11/13	13,556	3	2 M, 1 J

Egg and milt were combined by matrices, according to available mature broodstock.

Total number of females spawned:	49
Total number of males spawned:	34
Total number of green eggs:	186,395
Total number of eyed eggs:	155,649
Number of eggs retained for rearing:	155,649
Date of last spawning:	9/11/13

Spawning Record

Chinook Lostine Stock 200 BY13

Lookingglass Fish Hatchery

Date Spawned	Number of Eggs Taken	Females Spawned	Males Spawned
8/13/13	5,586	1	2
8/20/13	32,003	7	7
8/27/13	63,280	16	14 M, 2 J
9/03/13	151,008	36	34 M, 2 J
9/10/13	31,491	7	6
9/17/13	6,639	2	2

Lostine stock Chinook were spawned by matrices, depending on available mature broodstock.

Total number of females spawned:	69
Total number of males spawned:	51
Total number of green eggs:	290,007
Total number of eyed eggs:	263,379
Number of eggs retained for rearing:	263,379
Date of last spawning:	9/17/13

Rearing to Smolt Stage Only

Chinook Imnaha Stock 29 BY11

Number of smolts produced:	390,605
Weight of smolts produced (lbs.):	19,612
Percent mortality to stocking:	2.38%
Average number/pound of smolts produced:	19.92
Conversion rate:	0.98 at Lookingglass

223,716 smolts (11,235 pounds) were transferred from Lookingglass Fish Hatchery to Imnaha Satellite Facility 3/20-3/21/2013 for acclimation. Volitional release began on 3/30/2013 and the remaining fish were forced out on 4/05/13. 166,979 smolts (7,842 pounds) were direct released into the Imnaha River on 3/30/13.

Rearing to Smolt Stage Only

Chinook
Lookingglass Stock 81 BY11

Number of smolts produced:	273,097
Weight of smolts produced (lbs.):	10,440
Percent mortality to stocking:	2.59%
Average number/pound of smolts produced:	26.16
Conversion rate:	1.19 at Lookingglass

Smolts volitionally released directly into Lookingglass Creek beginning 3/14/13. Smolts remaining were forced out on 4/12/13.

Chinook
Upper Grande Ronde River Stock 80 BY11

Number of smolts produced:	290,572
Weight of smolts produced (lbs.):	12,514
Percent mortality to stocking:	1.87%
Average number/pound of smolts produced:	23.22
Conversion rate:	0.97 at Lookingglass

Smolts were transferred to Grande Ronde Acclimation Facility in two groups. The first group of 155,321 smolts (6,456 pounds) were transferred on 3/18/13 for volitional release beginning 3/20/13. The second group of 135,370 smolts (6,297 pounds) were transferred on 4/4/13 for release beginning 4/6/13. Grande Ronde Acclimation Facility is operated by the CTUIR. Facility operations are BPA funded. Fish feed is provided by the LSRCP.

Chinook
Catherine Creek Stock 201 BY11

Number of smolts produced:	134,519
Weight of smolts produced (lbs.):	6,032
Percent mortality to stocking:	2.27%
Average number/pound of smolts produced:	22.30
Conversion rate:	0.97 at Lookingglass

134,591 smolts (6,118 pounds) were transferred from Lookingglass Fish Hatchery to Catherine Creek Acclimation Facility on 3/19/13 for volitional release beginning 3/21/13. Catherine Creek Acclimation Facility is operated by the CTUIR. Facility operations are BPA funded. Fish feed is provided by the LSRCP.

Rearing to Smolt Stage Only

Chinook
Lostine River Stock 200 BY11

Number of smolts produced:	265,039
Weight of smolts produced (lbs.):	11,638
Percent mortality to stocking:	2.11%
Average number/pound of smolts produced:	22.77
Conversion rate:	1.04 at Lookingglass

Smolts were transferred from Lookingglass Hatchery to Lostine Acclimation Facility in two groups: 134,562 smolts (5,397 pounds) on 3/11/13 for release on 3/21/13, and 130,612 smolts (5,678 pounds) on 4/3/13 for release on 4/12/13. Lostine Acclimation Pond is operated by the Nez Perce Tribe. Facility operations are BPA funded. Fish feed is provided by the LSRCP.

Food Fed and Weight Gain

**Chinook
Imnaha Stock 29 BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	4,910
Conversion rate	0.83
Total weight gain (lbs.) - all sizes produced	5,915

**Chinook
Imnaha Stock 29 BY12**

Lookingglass Fish Hatchery	
Total pounds of food fed	11,561
Conversion rate	0.98
Total weight gain (lbs.) - all sizes produced	11,747

**Chinook
Lookingglass Stock 81 BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	3,049
Conversion rate	1.24
Total weight gain (lbs.) - all sizes produced	2,459

**Chinook
Lookingglass Stock 81 BY12**

Lookingglass Fish Hatchery	
Total pounds of food fed	6,504
Conversion rate	0.89
Total weight gain (lbs.) - all sizes produced	7,307

Food Fed and Weight Gain

**Chinook – Conventional Program
Upper Grande Ronde River Stock 80 BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	1,863
Conversion rate	1.09
Total weight gain (lbs.) - all sizes produced	1,713

**Chinook – Captive Broodstock Program (F₁'s)
Upper Grande Ronde River Stock 80F BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	1,976
Conversion rate	1.03
Total weight gain (lbs.) - all sizes produced	1,924

**Chinook – Conventional Program
Upper Grande Ronde River Stock 80 BY12**

Lookingglass Fish Hatchery	
Total pounds of food fed	7,762
Conversion rate	0.97
Total weight gain (lbs.) - all sizes produced	7,977

**Chinook - Conventional Broodstock Program
Catherine Creek Stock 201 BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	1,592
Conversion rate	0.89
Total weight gain (lbs.) - all sizes produced	1,795

Food Fed and Weight Gain

**Chinook - Conventional Broodstock Program
Catherine Creek Stock 201 BY12**

Lookingglass Fish Hatchery	
Total pounds of food fed	4,659
Conversion rate	0.99
Total weight gain (lbs.) - all sizes produced	4,684

**Chinook - Conventional Broodstock Program
Lostine River Stock 200 BY11**

Lookingglass Fish Hatchery	
Total pounds of food fed	3,604
Conversion rate	1.28
Total weight gain (lbs.) - all sizes produced	2,821

**Chinook - Conventional Broodstock Program
Lostine River Stock 200 BY12**

Lookingglass Fish Hatchery	
Total pounds of food fed	7,903
Conversion rate	1.01
Total weight gain (lbs.) - all sizes produced	7,851

**On Hand at Lookingglass Fish Hatchery
September 30, 2013**

Fish on Hand – BY12

Species	Stock	Number
Spring Chinook	Imnaha	348,057
Spring Chinook	Grande Ronde	242,160
Spring Chinook	Lookingglass	252,908
Spring Chinook	Lostine River	234,430
Spring Chinook	Catherine Creek	139,552

FY2013 Stocking

Total number of distribution trips:	24*
Number of fry stocked:	0
Weight of fry stocked:	0 lbs
Number of fingerlings stocked:	0
Weight of fingerlings stocked:	0 lbs
Number of smolts stocked:	1,219,313
Weight of smolts stocked:	54,203 lbs
Date, location, number and weight at each stocking:	See Attached

**17 distribution trips were made to acclimation facilities associated with Lookingglass Fish Hatchery, and 3 trips were made to transfer fish to Irrigon Hatchery*

Lookingglass Fish Hatchery and Associated Facility Stocking Records
October 1, 2012 through September 30, 2013

HATCHERY	SPECIES	STOCK	TYPE	DATE	FROM/TO	NO/LB	MORTS	NUMBER STOCKED	POUNDS STOCKED
CATH.CR. ACC	SPRING CHINOOK	201 11	LIBERATION	03-21-13	CATHERINE CR AT ACC PD - CTUIR	22.30	0	134,519	6,032
GRND RND ACC	SPRING CHINOOK	080F11	LIBERATION	03-20-13	GRANDE RONDE AT ACC PD -CTUIR	24.40	0	155,264	6,363
GRND RND ACC	SPRING CHINOOK	080 11	LIBERATION	04-06-13	GRANDE RONDE AT ACC PD -CTUIR	22.00	0	135,308	6,150
IMNAHA PD	SPRING CHINOOK	029 11	LIBERATION	03-30-13	IMNAHA R	19.00	0	167,720	8,827
IMNAHA PD	SPRING CHINOOK	029 11	LIBERATION	04-05-13	IMNAHA R	19.00	0	55,906	2,942
LOOKINGGLASS	SPRING CHINOOK	029 11	LIBERATION	03-30-13	IMNAHA R	21.70	0	27,994	1,290
LOOKINGGLASS	SPRING CHINOOK	029 11	LIBERATION	03-30-13	IMNAHA R	21.40	0	55,071	2,573
LOOKINGGLASS	SPRING CHINOOK	029 11	LIBERATION	03-30-13	IMNAHA R	20.80	0	55,918	2,688
LOOKINGGLASS	SPRING CHINOOK	029 11	LIBERATION	03-30-13	IMNAHA R	21.70	0	27,996	1,290
LOOKINGGLASS	SPRING CHINOOK	081 11	LIBERATION	03-14-13	LOOKINGGLASS CR	26.65	0	195,500	7,336
LOOKINGGLASS	SPRING CHINOOK	081 11	LIBERATION	04-12-13	LOOKINGGLASS CR	25.00	0	77,597	3,104
LOSTINE ACC	SPRING CHINOOK	200 11	LIBERATION	03-21-13	LOSTINE AT ACC POND - NPT	23.69	0	134,498	5,677
LOSTINE ACC	SPRING CHINOOK	200 11	LIBERATION	04-12-13	LOSTINE AT ACC POND - NPT	21.90	0	130,541	5,961
LOOKINGGLASS	SPRING CHINOOK	081 12	TRANSFER	04-29-13	IRRIGON HATCHERY	211.70	0	89,896	425
LOOKINGGLASS	SPRING CHINOOK	081 12	TRANSFER	04-30-13	IRRIGON HATCHERY	186.30	0	89,929	483
LOOKINGGLASS	SPRING CHINOOK	081 12	TRANSFER	05-01-13	IRRIGON HATCHERY	175.00	0	89,976	514
LOOKINGGLASS	SPRING CHINOOK	029 11	ACCLIMATE	03-20-13	IMNAHA PD	19.78	0	12,529	633
LOOKINGGLASS	SPRING CHINOOK	029 11	ACCLIMATE	03-20-13	IMNAHA PD	20.68	0	55,887	2,702
LOOKINGGLASS	SPRING CHINOOK	029 11	ACCLIMATE	03-20-13	IMNAHA PD	20.00	0	56,253	2,813
LOOKINGGLASS	SPRING CHINOOK	029 11	ACCLIMATE	03-20-13	IMNAHA PD	19.78	0	43,259	2,187
LOOKINGGLASS	SPRING CHINOOK	029 11	ACCLIMATE	03-21-13	IMNAHA PD	19.24	0	55,788	2,900
LOOKINGGLASS	SPRING CHINOOK	080F11	ACCLIMATE	03-18-13	GRND RND ACC	25.15	0	80,534	3,202
LOOKINGGLASS	SPRING CHINOOK	080F11	ACCLIMATE	03-18-13	GRND RND ACC	22.92	0	74,787	3,263
LOOKINGGLASS	SPRING CHINOOK	080 11	ACCLIMATE	04-04-13	GRND RND ACC	21.00	0	66,554	3,169
LOOKINGGLASS	SPRING CHINOOK	080 11	ACCLIMATE	04-04-13	GRND RND ACC	22.00	0	68,816	3,128
LOOKINGGLASS	SPRING CHINOOK	200 11	ACCLIMATE	03-11-13	LOSTINE ACC	24.93	0	66,471	2,666
LOOKINGGLASS	SPRING CHINOOK	200 11	ACCLIMATE	03-11-13	LOSTINE ACC	24.93	0	68,091	2,731
LOOKINGGLASS	SPRING CHINOOK	200 11	ACCLIMATE	04-03-13	LOSTINE ACC	22.80	0	63,865	2,801
LOOKINGGLASS	SPRING CHINOOK	200 11	ACCLIMATE	04-03-13	LOSTINE ACC	23.20	0	66,747	2,877

LOOKINGGLASS	SPRING CHINOOK	201 11	ACCLIMATE	03-19-13	CATH.CR. ACC	22.00	0	22,588	1,027
LOOKINGGLASS	SPRING CHINOOK	201 11	ACCLIMATE	03-19-13	CATH.CR. ACC	22.00	0	44,484	2,022
LOOKINGGLASS	SPRING CHINOOK	201 11	ACCLIMATE	03-19-13	CATH.CR. ACC	22.00	0	44,931	2,042
LOOKINGGLASS	SPRING CHINOOK	201 11	ACCLIMATE	03-19-13	CATH.CR. ACC	22.00	0	22,588	1,027