

ODFW AQUATIC INVENTORY PROJECT
OREGON PLAN FOR SALMON & WATERSHEDS
STREAM RESTORATION HABITAT REPORT

STREAM: Bear Creek (MS-125)
BASIN: Coquille River
SURVEY TYPE: Post-Tx
DATE: July 30, 2003
SURVEY CREW: Lisa Biggs, Chelsey Girt
REPORT PREPARED BY: Paul Jacobsen
BASIN AREA: 62.6 km²
USGS MAPS: Bill Peak
ECOREGION: Coast Range Sitka Spruce

GENERAL DESCRIPTION:

The Bear Creek habitat survey extended 916 meters. The channel was constrained by terraces in a broad valley floor. The average valley width index was 20.0. Land use for the reach was agriculture and large (30-50 cm dbh) trees. The average unit gradient was 1.0 percent. Scour pools (79%) and riffles (15%) dominated stream habitat. Gravel (44%) and sand (43%) dominated stream substrate. Wood volume was high at 31.0 m³/100m.

COMMENTS:

There were no potential barriers to upstream fish migration in the surveyed length.

The crew noted several habitat structures during the survey.

OREGON DEPARTMENT OF FISH AND WILDLIFE

BEAR CREEK POST-TX (MS-125)

HABITAT INVENTORY

Report Date: 12/17/03

Survey Date:

7/30/03

REACH 1

T29S-R14W-S12SE

REACH 1

HABITAT DETAIL

Habitat Type	Number Units	Total Length (m)	Avg Width (m)	Avg Depth (m)	Total Area (m ²)	Large Boulders (#>0.5m)	Substrate Percent Wetted Area					
							S/O	Snd	Grvl	Cbl	Bldr	Bdrk
DRY UNIT	1	30	2.5	0.00	75	0	0	20	80	0	0	0
POOL-BACKWATER	3	26	2.7	0.63	72	0	27	63	10	0	0	0
POOL-ISOLATED	4	14	1.8	0.15	32	0	20	54	26	0	0	0
POOL-LATERAL SCOUR	26	548	4.9	0.77	2,656	0	14	58	27	0	0	1
POOL-STRAIGHT SCOUR	3	47	4.0	0.57	194	0	18	54	24	3	0	0
RAPID/BOULDERS	1	10	1.4	0.05	14	0	10	20	40	30	0	0
RIFFLE	16	279	1.8	0.08	555	0	11	28	61	0	0	0
STEP/COBBLE	10	33	0.7	0.04	24	0	4	17	79	0	0	0
Total:	64	986	3.1	0.41	3,622	0	Avg 12	43	44	1	0	0

HABITAT SUMMARY

Habitat Group	Number Units	Total Length (m)	Avg Width (m)	Avg Depth (m)	Wetted Area		Large Boulders	
					(m ²)	Percent	Number	(# / 100m ²)
Dammed & BW Pools	7	40	2.2	0.35	104	2.86%	0	0.0
Scour Pools	29	595	4.8	0.75	2,850	78.71%	0	0.0
Glides	0	0			0	0.00%	0	0.0
Riffles	16	279	1.8	0.08	555	15.32%	0	0.0
Rapids	1	10	1.4	0.05	14	0.38%	0	0.0
Cascades	0	0			0	0.00%	0	0.0
Step/Falls	10	33	0.7	0.04	24	0.67%	0	0.0
Dry	1	30	2.5	0.00	75	2.06%	0	0.0
Culverts	0	0			0	0.00%	0	0.0

POOL SUMMARY

	Total	# / Km
All Pools:	36	36.5
Pools >=1m deep:	5	5.1
Complex pools (LWD pieces>=3):	14	14.2
Pool frequency (channel widths/pool):	3.4	
Residual pool depth (avg):	0.67	

STREAM SUMMARY

BEAR CREEK POST-TX (MS-125)

Number Units	Total Length (m)	Avg Width (m)	Avg Depth (m)	Total Area (m ²)	Substrate						Large Boulders (#>0.5m)
					Percent Wetted Area						
					S/O	Snd	Grvl	Cbl	Bldr	Bdrk	
64	986	3.1	0.41	3,622	12	43	44	1	0	0	0

Habitat Group	Wetted Area	
	(m ²)	Percent
Dammed & BW Pools	104	2.86%
Scour Pools	2,850	78.71%
Glides	0	0.00%
Riffles	555	15.32%
Rapids	14	0.38%
Cascades	0	0.00%
Step/Falls	24	0.67%
Dry	75	2.06%
Culverts	0	0.00%

RIPARIAN ZONE VEGETATION SUMMARY

REACH 1 **REACH 1**

Summary of Riparian Zone (0-30m) 3 transects

Total hardwoods/1000	671
Total conifers/1000 ft	0
Total conifers >20" dbh/1000 ft	0
Total conifers >35" dbh/1000 ft	0

Average number of trees in a 5-meter wide band

Diameter class (cm)	Zone 1 0-10 meters		Zone 2 10 - 20 meters		Zone 3 20 - 30 meters		Zones 1-3 0-30 meters	
	Conifer	Hardwood	Conifer	Hardwood	Conifer	Hardwood	Conifer	Hardwood
3-15cm	0.0	1.7	0.0	1.3	0.0	3.7	0.0	6.7
15-30cm	0.0	0.3	0.0	1.7	0.0	0.0	0.0	2.0
30-50cm	0.0	2.0	0.0	0.3	0.0	0.0	0.0	2.3
50-90cm	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
>90cm	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total/100m2	0.0	4.0	0.0	3.3	0.0	3.7	0.0	3.7

Canopy closure and ground cover

	Zone 1 0-10 meters (%)	Zone 2 10 - 20 meters (%)	Zone 3 20 - 30 meters (%)
Canopy closure	37	36	33
Shrub cover	28	19	28
Grass/forb cover	71	69	67

Predominant landform in each zone

	Zone 1 0-10 meters (%)	Zone 2 10 - 20 meters (%)	Zone 3 20 - 30 meters (%)
Hillslope	0	17	50
High terrace	100	83	50
Low terrace	0	0	0
Floodplain	0	0	0
Wetland/meadow	0	0	0
Stream channel	0	0	0
Roadbed/Railroad	0	0	0
Riprap	0	0	0
Surface slope (%)	0	7	20

Summary of Riparian Zone (0-30m) for all reaches**3 transects****Summary of riparian zone (0-100 feet) extrapolated to 1,000 feet along stream**

Total hardwoods/1000	671
Total conifers/1000 ft	0
Total conifers >20" dbh/1000 ft	0
Total conifers >35" dbh/1000 ft	0

Average number of trees in a 5-m wide band

<u>Diameter class (cm)</u>	Zones 1-3	
	<u>0-30 meters</u>	
	<u>Conifer</u>	<u>Hardwood</u>
3-15cm	0.0	6.7
15-30cm	0.0	2.0
30-50cm	0.0	2.3
50-90cm	0.0	0.0
>90cm	0.0	0.0

RIPARIAN ZONE VEGETATION

Reach 1

Reach 1

Unit	Side	Zone	Surface	Slope	Cover (percent)				Diameter class (cm)					Notes	
					Canopy	Shrub	Grass		3-15	15-30	30-50	50-90	>90		
18	RT	3	HS	20	75	50	25	Conifer							ELDERBERRY
								Hardwood	3						
18	LF	2	HT	0	0	0	100	Conifer							NO TREES, PASTURE.
								Hardwood							
18	RT	1	HT	0	75	5	95	Conifer							ELDERBERRY, ALDER
								Hardwood	2	1	1				
18	RT	2	HT	0	75	25	65	Conifer							ELDERBERRY, VINE MAPLE
								Hardwood	3						
18	LF	3	HT	0	0	0	100	Conifer							NO TREES, PASTURE
								Hardwood							
18	LF	1	HT	0	25	10	90	Conifer							ALDER
								Hardwood				3			
34	LF	3	HT	0	0	0	100	Conifer							NO TREES, PASTURE
								Hardwood							
34	RT	1	HT	0	10	50	45	Conifer							NO TREES
								Hardwood							
34	LF	1	HT	0	15	5	95	Conifer							NO TREES, PASTURE
								Hardwood							
34	RT	2	HT	0	25	90	10	Conifer							VINE MAPLE
								Hardwood	1						
34	RT	3	HS	40	25	100	0	Conifer							ELDERBERRY
								Hardwood	3						
34	LF	2	HT	0	15	0	100	Conifer							NO TREES, PASTURE
								Hardwood							
49	RT	3	HT	0	20	15	85	Conifer							NO TREES
								Hardwood							
49	LF	1	HT	0	50	85	15	Conifer							ELDERBERRY, MYRTLE, ALDERS MYRTLE
								Hardwood	3		1				
49	LF	2	HS	40	95	0	40	Conifer							
								Hardwood		5	1				
49	LF	3	HS	60	75	5	90	Conifer							
								Hardwood	5						
49	RT	1	HT	0	45	15	85	Conifer							ALDER
								Hardwood				1			
49	RT	2	HT	0	5	0	100	Conifer							NO TREES, PASTURE
								Hardwood							

Comment Summary

Oregon Plan Monitoring Sites 2003

MONITORING AREA: **3-MS** SITE ID: **125** **BEAR CREEK POST-TX (MS-125)**

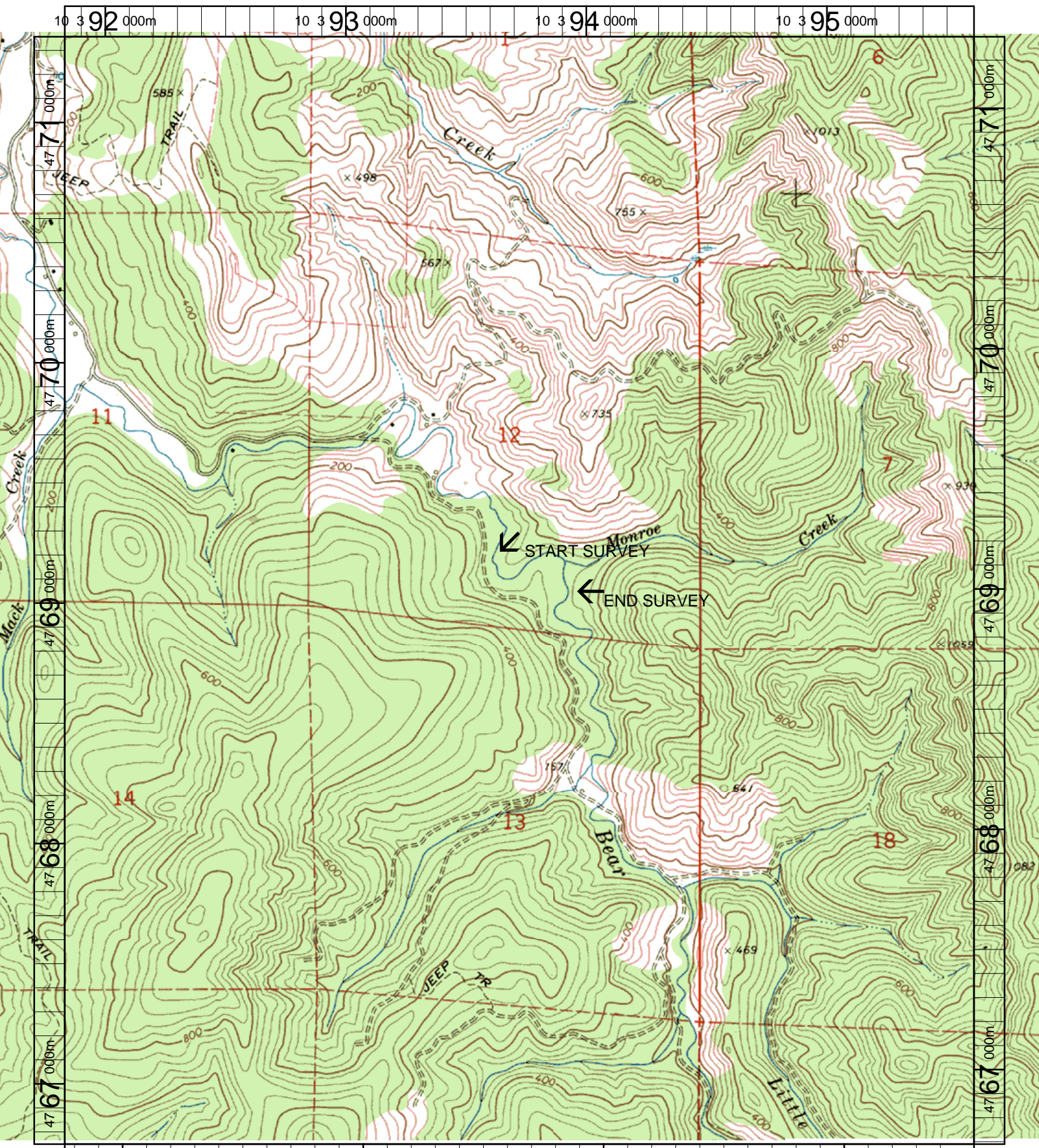
<u>UNIT#</u>	<u>TYPE</u>	<u>CHAN</u>	<u>DIST. (m)</u>	<u>COMMENTS</u>	<u>NOTE ESTIMATOR</u>	<u>NOTE NUMERATOR</u>
1	LP	00	13.1	FC, WL	COW PASTURE HT RIGHT	LP EXTENDS 5M BEFORE ST
2	RI	00	33.2			RED LEGGED FROG, SALMO
3	LP	00	52.8		COW FLOW STAGNANT	UNITS 3 & 4 SEPERATED BY
4	LP	00	67		HEAVY ALGAE GROWTH	
5	SC	00	70.6		HEAVY ALGAE GROWTH	
6	SP	00	77.8		HEAVY ALGAE GROWTH	HEAVY ALGAE GROWTH
7	LP	01	107		NARROW DEEP NECK SE	
8	BW	10	107		HEAVY ALGAE GROWTH	SALMONIDS
10	LP	00	125.9		NO ALGAE GROWTH	
11	SC	00	128.6		NO ALGAE GROWTH	
12	LP	00	161.2			COHO
14	LP	00	205.8		COW PASTURE LEFT	
15	RI	01	240			SCULPIN, COHO
16	BW	10	240	HS		UNCABLED; COHO
18	RI	00	278.8			RIP #1 PHOTO 101 L B 102 R
19	LP	00	292.9	HS		RED LEGGED FROG
21	LP	00	352.1	WL, HS	HEAVY ALGAE GROWTH	HEAVY ALGAE GROWTH, DE
22	RB	00	362		HEAVY ALGAE GROWTH	
27	LP	00	413.9	WL		CRAWDAD
31	SP	00	467.1		HEAVY ALGAE GROWTH	TEMP 22 DEG C 12:00, COHO
32	SC	00	470.4		18 DEG C	

Comment Summary

Oregon Plan Monitoring Sites 2003

MONITORING AREA: **3-MS** SITE ID: **125** **BEAR CREEK POST-TX (MS-125)**

<u>UNIT#</u>	<u>TYPE</u>	<u>CHAN</u>	<u>DIST. (m)</u>	<u>COMMENTS</u>	<u>NOTE ESTIMATOR</u>	<u>NOTE NUMERATOR</u>
33	LP	00	504.5		HEAVY ALGAE GROWTH	TEMP 18 DEG C 12:02, SCUL
34	RI	00	546.2	WL	HEAVY ALGAE GROWTH	HEAVY ALGAE GROWTH
35	LP	00	574.7	HS		UNCABLED, HEAVY CATTLE
37	LP	00	601.1	HS		UNCABLED, SALMONIDS
41	LP	00	652.8	DJ	HEAVY ALGAE GROWTH	CUTTHROAT "4
42	RI	00	658.9		HEAVY ALGAE GROWTH	
44	RI	01	714.5		OLD MYRTLE SHADES R	
46	LP	00	736.3			SALMONIDS
48	LP	00	746	WL		SALMONIDS, DEER, COW
49	RI	00	757.6			RIP 3 PHOTO 103= R BANK
50	LP	00	773.3	HS		UNCABLED, SALMONIDS
53	LP	01	813.3	HS		UNCABLED
54	BW	10	813.3			SCULPIN
55	SC	01	816.9	WL		RACCOON
56	IP	10	816.9			SALMONIDS
57	LP	00	833.5	HS		
59	LP	00	849.8	WL		RED LEGGED FROG
60	RI	01	871.6	RF TJ/		DRY
61	DU	11	871.6	HS		MONROE CR, SPAWN SURV
64	LP	00	915.9			SALMONIDS, SCULPIN, COW



Name: BILL PEAK
Date: 3/20/2003
Scale: 1 inch equals 1666 feet

Location: 10 393681 E 4769027 N
Caption: BEAR CREEK RESTORATION SITE- COQUILLE BASIN