

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

STREAM: Munson Creek Tributary B (N-344)
BASIN: Tillamook River
SURVEY TYPE: Pre-Tx
DATE: July 10, 2006
SURVEY CREW: Gordon Rose, Ben Walczak
REPORT PREPARED BY: Paul Jacobsen
BASIN AREA: 0.6 km²
USGS MAPS: Beaver
ECOREGION: Coast Range Coastal Uplands

GENERAL DESCRIPTION:

The Munson Creek Tributary B habitat survey extended 435 meters. The channel was alternately constrained by hillslopes and terraces in a broad valley floor. The average valley width index was 3.7 (range: 1.1-10.0). Land use for the reach was mature (50-90 cm dbh) trees. The average unit gradient was 5.0 percent. Rapids (86%) dominated stream habitat. Gravel (40%) and cobble (34%) dominated stream substrate. Wood volume was low at 19.9 m³/100m.

COMMENTS:

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

REACH 1

T02S-R09W-S27SW

REACH 1

Valley and Channel Summary

Valley Characteristics (Percent Reach Length)

<u>Narrow Valley Floor</u>		<u>Broad Valley Floor</u>	
Steep V-shape	0%	Constraining Terraces	100%
Moderate V-shape	0%	Multiple Terraces	0%
Open V-shape	0%	Wide Floodplain	0%
Valley Width Index	3.7	VWI Range:	1.1 - 10

Channel Morphology (Percent Reach Length)

<u>Constrained</u>		<u>Unconstrained</u>	
Hillslope	0%	Single Channel	0%
Bedrock	0%	Multiple Channel	0%
Terrace	0%	Braided Channel	0%
Alt. Terrace/Hill	100%		
Landuse	0%		

Channel Characteristics

<u>Type</u>	<u>Length (m)</u>	<u>Area (m2)</u>	<u>Dry Units</u>
Primary Channel	435	895	0
Secondary Channel	36	96	3
Off-Channel Units	0	0	0

Channel Dimensions (m)

<u>Wetted</u>	<u>Active</u>	<u>Floodprone</u> n = 5	<u>First Terrace</u> n = 3
Width: 2.1	Width: 4.7	6.2 (3.1 - 8.3)	7.0 (3.8 - 11.2)
Depth: 0.07	Height: 0.2	0.4 (0.4 - 0.5)	0.8 (0.8 - 0.9)

W:D ratio: 22.6

Stream Flow Type: MF

Average Unit Gradient: 5.0%

Water temperature (°C): -

Entrenchment (ACW:FPW ratio): 1.3

Habitat Units/100m (total channel length): 4.9

Habitat Units/100m (primary channel length): 5.3

Riparian, Bank, and Wood Summary

	<u>Primary</u>	<u>Secondary</u>
Land Use:	MT	
Riparian Vegetation:	S	

Bank Condition and Shade

<u>Bank Status</u>	<u>Percent Reach Length</u>	<u>Shade (% of 180)</u>
Actively Eroding:	30%	Reach avg: 83%
Undercut Banks:	13%	Range: 72 - 100

Large Wood Debris

	<u>Total</u>	<u>Total / 100m primary channel</u>
All pieces (>=3m x 0.15m):	48	11.0
Volume (m ³):	86	19.9
Key pieces (>=12m x 0.60m):	6	1.4

OREGON DEPT OF FISH AND WILDLIFE MUNSON CREEK TRIBUTARY B PRE-TX (1-NC, 344)

HABITAT INVENTORY

Report Date: 3/5/2007

Survey Date:

7/10/2006

REACH 1		T02S-R09W-S27SW					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
CASCADE/BOULDERS	1	8	2.3	0.05	19	2	5	10	40	35	10	0
CULVERT CROSSING	1	13	1.0	0.01	13	1	10	15	25	25	25	0
DRY CHANNEL	1	11	2.0	0.00	22	0	0	10	60	30	0	0
POOL-LATERAL SCOUR	1	4	2.0	0.40	8	1	10	20	35	25	10	0
PUDDLED UNIT	2	25	3.0	0.01	74	1	3	13	50	30	5	0
RAPID/BOULDERS	17	410	2.1	0.07	856	73	4	13	39	36	9	0
Total:	23	471	2.1	0.07	991	78	Avg: 4	13	40	34	9	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	0	0			0	0.00%	0	0.0	
Scour Pools	1	4	2.0	0.40	8	0.81%	1	12.5	
Glides	0	0			0	0.00%	0	0.0	
Riffles	0	0			0	0.00%	0	0.0	
Rapids	17	410	2.1	0.07	856	86.31%	73	8.5	
Cascades	1	8	2.3	0.05	19	1.88%	2	10.7	
Step/Falls	0	0			0	0.00%	0	0.0	
Dry	3	36	2.7	0.01	96	9.68%	1	1.0	
Culverts	1	13	1.0	0.01	13	1.31%	1	7.7	

POOL SUMMARY			
	<u>Total</u>	<u>Total of all Channel Lengths # / Km</u>	<u>Primary Channel Length # / Km</u>
All Pools:	1	2.1	2.3
Pools >=1m deep:	0	0.0	0.0
Complex pools (LWD pieces>=3):	0	0.0	0.0
Pool frequency (channel widths/pool):	99.3		
Residual pool depth (avg):	0.35		

Survey Date 7/10/2006
Report Date: 3/5/2007

**RIPARIAN ZONE
VEGETATION SUMMARY**

REACH 1

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

Total hardwoods/1000	122
Total conifers/1000 ft	142
Total conifers >20" dbh/1000 ft	41
Total conifers >35" dbh/1000 ft	20

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	0.0	0.0	0.0	0.0	0.0	0.0	0.0
15-30cm	0.0	0.0	0.0	0.0	0.7	0.7	0.7	0.7
30-50cm	0.0	0.3	0.7	0.7	0.3	0.3	1.0	1.3
50-90cm	0.0	0.0	0.3	0.0	0.0	0.0	0.3	0.0
>90cm	0.3	0.0	0.0	0.0	0.0	0.0	0.3	0.0
Total/100m2	0.3	0.3	1.0	0.7	1.0	1.0	0.8	0.7

Canopy closure and ground cover

	Zone 1 0-10 meters		Zone 2 10 - 20 meters		Zone 3 20 - 30 meters	
	(%)		(%)		(%)	
Canopy closure	48		57		70	
Shrub cover	97		93		90	
Grass/forb cover	5		5		8	

Predominant landform in each zone

	Zone 1 0-10 meters		Zone 2 10 - 20 meters		Zone 3 20 - 30 meters	
	(%)		(%)		(%)	
Hillslope	67		83		100	
High terrace	33		17		0	
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 (%)	14		28		32	

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	122
Total conifers/1000 ft	142
Total conifers >20" dbh/1000 ft	41
Total conifers >35" dbh/1000 ft	20

Average number of trees in a 5-m wide band

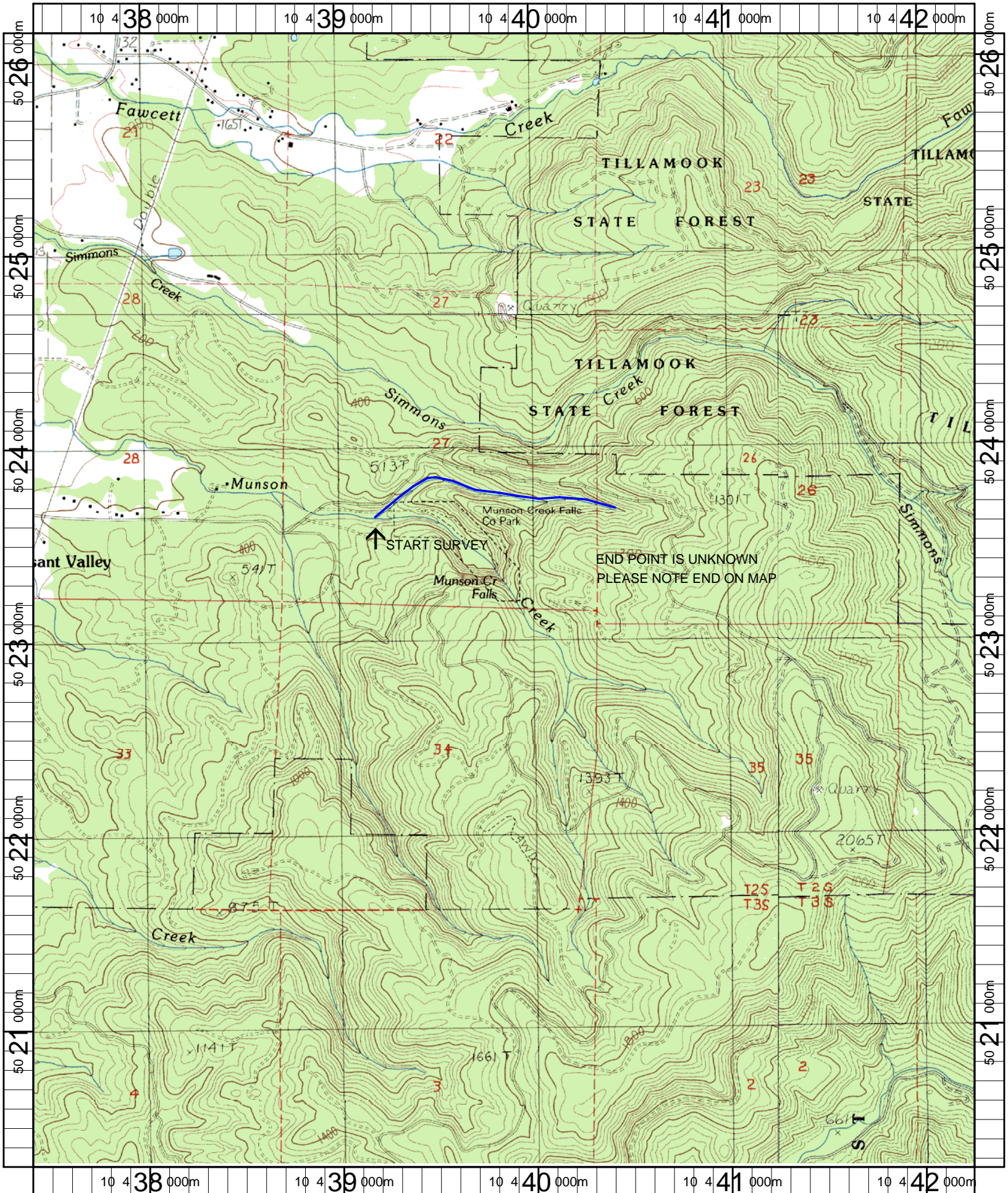
Diameter class (cm)	Zones 1-3	
	<u>0-30 meters</u>	
	<u>Conifer</u>	<u>Hardwood</u>
3-15cm	0.0	0.0
15-30cm	0.7	0.7
30-50cm	1.0	1.3
50-90cm	0.3	0.0
>90cm	0.3	0.0

Comment Summary

Restoration Monitoring Sites 2006

MONITORING AREA: 1-NC SITE ID: 344 MUNSON CREEK TRIBUTARY B PRE

<u>UNIT#</u>	<u>TYPE</u>	<u>CHAN</u>	<u>DIST. (m)</u>	<u>COMMENTS</u>	<u>NOTE ESTIMATOR</u>	<u>NOTE NUMERATOR</u>
3	CC	00	44	CC	(2) 0.90M ROUND STEEL CC	DOUBLE CULVERT
9	RB	00	123	SS/	RIPARIAN #1	
15	RB	01	259.9		RIPARIAN #2	
21	RB	00	384.9		RIPARIAN #3	
23	RB	00	434.9		END-LACK OF FLOW, POOL	



Name: BEAVER
 Date: 5/22/2006
 Scale: 1 inch equals 2000 feet

Location: 10 439849 E 5023204 N
 Caption: MUNSON CREEK TRIBUTARY B RESTORATION SITE -
 TILLAMOOK BASIN