

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

STREAM: South Fork Trask River Tributary A (N-319)
BASIN: Trask River
SURVEY TYPE: Post-Tx
DATE: June 27, 2006
SURVEY CREW: Gordon Rose, Ben Walczak
REPORT PREPARED BY: Paul Jacobsen
BASIN AREA: 2.5 km²
USGS MAPS: Blaine
ECOREGION: Coast Range Volcanic

GENERAL DESCRIPTION:

The South Fork Trask River Tributary A habitat survey extended 488 meters. The channel was alternately constrained by hillslopes and terraces in a broad valley floor. The average valley width index was 3.4 (range: 2.7-5.0). Land use for the reach was large (30-50 cm dbh) trees and timber harvest. The average unit gradient was 5.0 percent. Rapids (88%) dominated stream habitat. Gravel (48%) and cobble (47%) dominated stream substrate. Wood volume was very high at 82.2 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.

REACH 1 T02S-R08W-S35NE 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	3.4	VWI Range:	2.7 - 5

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	488	1,445	0
Secondary Channel	66	135	0
Off-Channel Units	12	15	0

Channel Dimensions (m)

<u>Wetted</u>	<u>Active</u>	<u>Floodprone</u> n = 5	<u>First Terrace</u> n = 5
Width: 2.6	Width: 5.0	7.2 (4.3 - 11.9)	9.0 (6.3 - 14.5)
Depth: 0.16	Height: 0.3	0.6 (0.6 - 0.8)	1.2 (0.9 - 1.5)

W:D ratio: 15.7 Entrenchment (ACW:FPW ratio): 1.5
Stream Flow Type: MF Habitat Units/100m (total channel length): 6.4
Average Unit Gradient: 5.0% Habitat Units/100m (primary channel length): 7.4
Water temperature (°C): 11.0 - 11.0

Riparian, Bank, and Wood Summary

	<u>Primary</u>	<u>Secondary</u>
Land Use:	LT	TH
Riparian Vegetation:	D30	S

Bank Condition and Shade

<u>Bank Status</u>	<u>Percent Reach Length</u>	<u>Shade (% of 180)</u>
Actively Eroding:	15%	Reach avg: 93%
Undercut Banks:	2%	Range: 89 - 94

Large Wood Debris

	<u>Total</u>	<u>Total / 100m primary channel</u>
All pieces (>=3m x 0.15m):	265	54.3
Volume (m ³):	401	82.2
Key pieces (>=12m x 0.60m):	13	2.7

OREGON DEPT OF FISH AND WILDLIFE SOUTH FORK TRASK TRIB A POST-TX (1-NC, 319)

HABITAT INVENTORY

Report Date: 3/5/2007

Survey Date:

6/27/2006

REACH 1		T02S-R08W-S35NE					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
POOL-ISOLATED	1	2	1.0	0.35	2	0	10	20	50	20	0	0
POOL-LATERAL SCOUR	3	22	4.4	0.42	92	0	3	13	65	18	0	0
POOL-PLUNGE	4	6	2.6	0.40	14	0	3	6	46	45	0	0
RAPID/BOULDERS	22	493	2.6	0.09	1,408	17	0	2	47	50	1	0
RIFFLE	2	40	1.9	0.10	74	0	0	3	50	48	0	0
STEP/LOG	4	3	1.7	0.07	4	0	0	0	40	60	0	0
Total:	36	565	2.6	0.16	1,594	17	Avg: 1	4	48	47	1	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	1	2	1.0	0.35	2	0.09%	0	0.0	
Scour Pools	7	28	3.4	0.41	106	6.65%	0	0.0	
Glides	0	0			0	0.00%	0	0.0	
Riffles	2	40	1.9	0.10	74	4.65%	0	0.0	
Rapids	22	493	2.6	0.09	1,408	88.33%	17	1.2	
Cascades	0	0			0	0.00%	0	0.0	
Step/Falls	4	3	1.7	0.07	4	0.27%	0	0.0	
Dry	0	0			0	0.00%	0	0.0	
Culverts	0	0			0	0.00%	0	0.0	

POOL SUMMARY			
	<u>Total</u>	<u>Total of all Channel Lengths # / Km</u>	<u>Primary Channel Length # / Km</u>
All Pools:	8	14.2	16.4
Pools >=1m deep:	0	0.0	0.0
Complex pools (LWD pieces>=3):	1	1.8	2.1
Pool frequency (channel widths/pool):	14.1		
Residual pool depth (avg):	0.34		

Survey Date 6/27/2006

RIPARIAN ZONE

Report Date: 3/5/2007

VEGETATION SUMMARY

REACH 1

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

Total hardwoods/1000	894
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	0.7	0.0	0.0	0.0	0.3	0.0
15-30cm	0.0	3.3	0.0	3.7	0.0	1.0	0.0	8.0
30-50cm	0.0	2.0	0.0	1.3	0.0	2.3	0.0	5.7
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	6.0	0.0	5.0	0.0	3.7	0.0	4.9

Canopy closure and ground cover

	Zone 1 0-10 meters		Zone 2 10 - 20 meters		Zone 3 20 - 30 meters	
	Conifer (%)		Conifer (%)		Conifer (%)	
	Canopy closure	84	85	83		
Shrub cover	25	16	11			
Grass/forb cover	75	84	89			

Predominant landform in each zone

	Zone 1 0-10 meters		Zone 2 10 - 20 meters		Zone 3 20 - 30 meters	
	Conifer (%)		Conifer (%)		Conifer (%)	
	Hillslope	17	50	83		
High terrace	83	33	17			
Low terrace	0	0	0			
Floodplain	0	0	0			
Wetland/meadow	0	0	0			
Stream channel	0	0	0			
Roadbed/Railroad	0	17	0			
Riprap	0	0	0			
Surface slope (%)	5	19	31			

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	894
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

Diameter class (cm)	Zones 1-3 <u>0-30 meters</u>	
	<u>Conifer</u>	<u>Hardwood</u>
3-15cm	0.0	1.0
15-30cm	0.0	8.0
30-50cm	0.0	5.7
50-90cm	0.0	0.0
>90cm	0.0	0.0

RIPARIAN ZONE VEGETATION

Reach 1 Reach 1

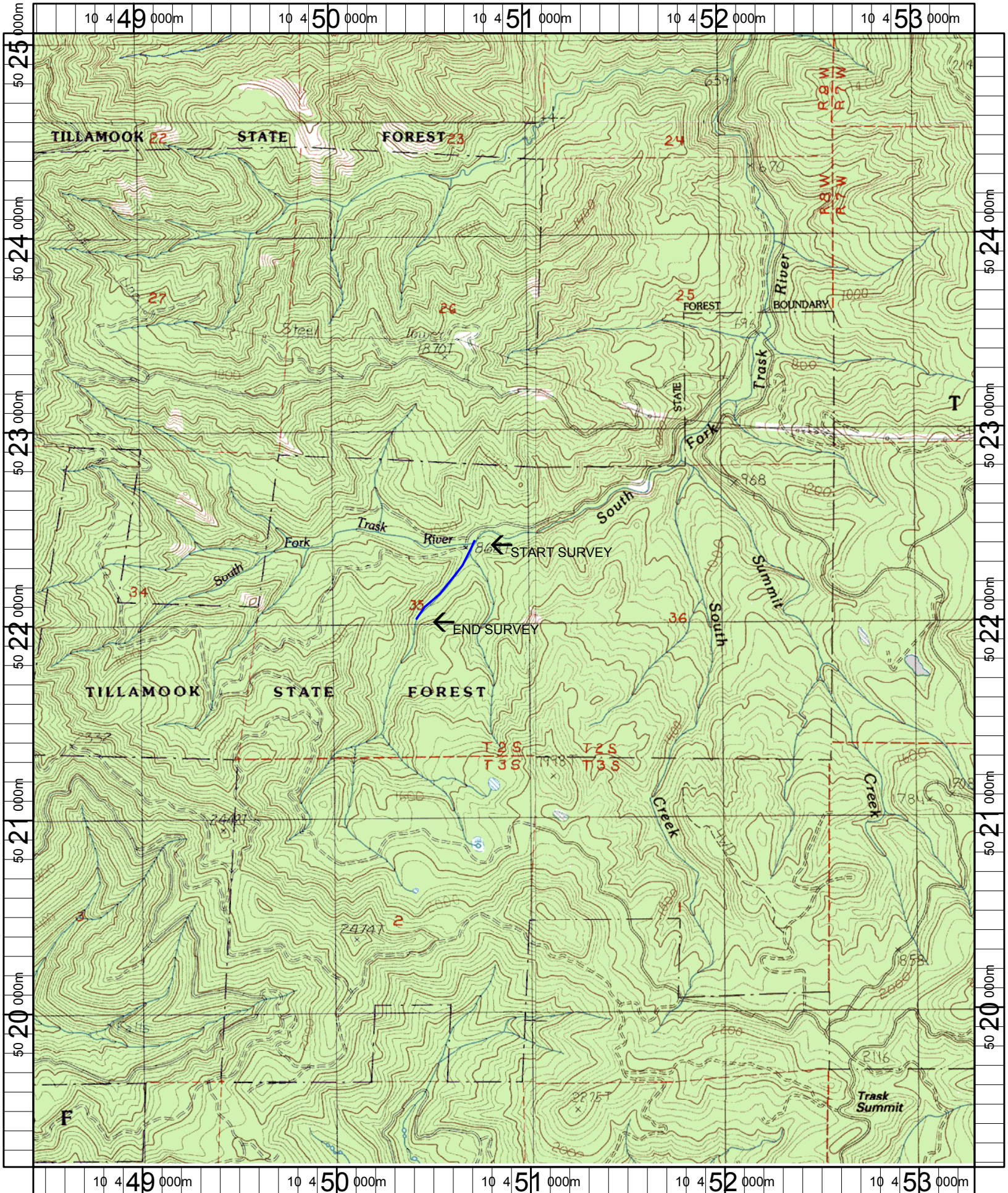
Unit	Side	Zone	Surface	Slope	Cover (percent)			Diameter class (cm)					Notes		
					Canopy	Shrub	Grass	3-15	15-30	30-50	50-90	>90			
13	RT	2	HT	0	85	40	60	Conifer							
								Hardwood		2					
13	RT	3	HS	20	85	20	80	Conifer							
								Hardwood			1				
13	RT	1	HT	0	80	70	30	Conifer							
								Hardwood	2	1					
13	LF	3	HS	50	85	10	90	Conifer							
								Hardwood	1	1					
13	LF	2	RB	5	85	20	80	Conifer							
								Hardwood		1					
13	LF	1	HS	30	85	50	50	Conifer							UTM 0450419-5022682-2D
								Hardwood		2					
17	RT	3	HT	0	70	10	90	Conifer							
								Hardwood		1	3				
17	LF	2	HS	30	85	10	90	Conifer							NO AMPHIBIANS ALL 3 ZONES
								Hardwood		3	1				
17	LF	3	HS	30	85	10	90	Conifer							
								Hardwood		1	1				
17	RT	1	HT	0	85	10	90	Conifer							NO AMPHIBIANS ALL 3 ZONES
								Hardwood		2					
17	RT	2	HT	0	85	10	90	Conifer							
								Hardwood		2	2				
17	LF	1	HT	0	85	10	90	Conifer							UTM 0450600-5022284-3D
								Hardwood		1	1				
23	RT	2	HS	30	85	10	90	Conifer							
								Hardwood		3					
23	LF	2	HS	50	85	5	95	Conifer							
								Hardwood			1				
23	RT	3	HS	35	85	10	90	Conifer							
								Hardwood			1				
23	LF	3	HS	50	85	5	95	Conifer							
								Hardwood			1				
23	LF	1	HT	0	85	5	95	Conifer							UTM 0450528-5022029-2D
								Hardwood		3	3				
23	RT	1	HT	0	85	5	95	Conifer							
								Hardwood		1	2				

Comment Summary

Restoration Monitoring Sites 2006

MONITORING AREA: 1-NC SITE ID: 319 SOUTH FORK TRASK TRIB A POST-T

UNIT#	TYPE	CHAN	DIST. (m)	COMMENTS	NOTE ESTIMATOR	NOTE NUMERATOR
1	RB	00	36.9	HS	VALLEY INFLUENCE	START AT CONFL. W/S FK
2	LP	00	42			T=11.0C AT 11:45
4	RB	01	75.8	TJ/		
7	RB	00	97.9	DJ		
8	PP	00	99.4	DJ		
9	SL	00	99.9	DJ	H=0.50M	
10	RB	00	132.1	DJ		
12	SL	00	135.6		H=0.50M	
13	RB	00	147.7			RIPARIAN #1
15	RB	00	190.9	HS		
16	RB	00	221.2	HS		
17	RB	00	250.7			RIPARIAN #2
18	RB	00	284.8	HS		
19	RI	00	306.3		PICTURE TAKEN	PHOTO
20	RB	00	328	HS, SS/		
23	RB	00	387.7			RIPARIAN #3
26	RB	01	454.7	SS/		
29	SL	02	487.7		H=0.50M	
34	SL	02	487.7		H=0.80M	
36	RB	02	487.7			END SURVEY



Name: BLAINE
 Date: 6/13/2005
 Scale: 1 inch equals 2000 feet

Location: 10 450883 E 5022118 N
 Caption: SOUTH FORK TRASK RIVER TRIBUTARY A RESTORATION
 SITE - TRASK BASIN