



"STEWARDSHIP IN FORESTRY"

Timber Sale Appraisal  
Groom Creek  
Sale TL-341-2023-W00957-01

District: Tillamook

Date: December 21, 2022

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**Cost Summary**

	Conifer	Hardwood	Total
Gross Timber Sale Value	\$872,519.22	\$20,160.56	\$892,679.78
		Project Work:	(\$32,470.00)
		Advertised Value:	\$860,209.78



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**Timber Description**

Location:

Stand Stocking: 20%

Specie Name	AvgDBH	Amortization (%)	Recovery (%)
Douglas - Fir	20	0	100
Alder (Red)	16	0	100

Volume by Grade	2S	3S & 4S 6"-11"	8" - 9"	10" - 11"	12"+	6" - 7"	Total
Douglas - Fir	1,275	924	0	0	0	0	2,199
Alder (Red)	0	0	28	40	9	21	98
<b>Total</b>	1,275	924	28	40	9	21	2,297

**Comments:** Additional Costs – Groom Creek  
 Pond Values Used: December 2022  
 Region: Astoria, Forest Grove, and Tillamook  
 Western red cedar and other cedars stumpage price = \$1,335/MBF - \$508.02/MBF = \$826.98/MBF  
 Western Hemlock and other conifer stumpage price = \$656/MBF – \$508.02/MBF = \$147.98/MBF  
 Pulp (Conifer and Hardwood) Price = \$2.50/Ton  
 FUEL COST ALLOWANCE = \$5.00/Gallon  
 HAULING COST ALLOWANCE (\$120.00/hr x 10 hr.= \$ 1,200.00) = \$1,200/DAY

Other costs with profit and risk added:  
 BRAND AND PAINT ALLOWANCE = \$2.00/ MBF  
 2,297 MBF x \$2.00/MBF = \$4,594

TOTAL Other Costs with profit and risk to be added = \$4,594

Other Costs with no Profit and Risk Added:  
 Slash piling and sorting (Cable Settings): \$5/ac x 30 ac. = \$150  
 Heliport Construction: \$500/unit x 1 unit = \$500  
 Non-project Rd. 1: 5+80 sta. \$175/sta. = \$1,015  
 Non-project Rd. 2 approach rock (70yrd jaw-run) = \$1,280  
 Non-project Rd. 2: 5+50 sta. \$175/sta. = \$963  
 Non-project Rd. 3: 3+30 sta. \$175/sta. = \$578  
 Move-in Machine Cleaning: \$1,000/machine x 3 machines x 1 season = \$3,000  
 Machine Track Cleaning prior to vacating sale: \$1,000/machine x 3 machines = \$3,000  
 Machine time to block/waterbar roads and skid trails: 20 hours x \$150/hr = \$3,000  
 Slash Treatment: 15 acres x \$250/acre = \$3,750

Ditch Cleaning and Bank Sluff Removal:  
 Mobilization: one time – dump truck w/ tilt bed & small excavator: \$900 x 1 = \$900  
 Small excavator (Cat 312 or equivalent): 10 hours @ \$135/ hour = \$1,350  
 Dump truck: 10 hours @ \$90/ hour = \$900

TOTAL Other Costs with no Profit and Risk added = \$20,386

ODF Road Maintenance  
 Spot Rocking: 20cy/MMBF/mile x 2.297 MMBF x \$7.75/cy x 4.25 miles /2,297 MBF = \$0.66/MBF  
 Interim Grading: \$1,150/mile x 4.25 miles x 1 times/ 2,297 MBF = \$2.13/MBF  
 Final Maintenance Grading: \$1,500/mile x 4.25 miles/ 2,297 MBF = \$2.78/MBF  
 Final Maintenance Compaction: \$1,000/mile x 2.5 miles/2,297 MBF = \$1.09/MBF  
 Total Road Maintenance: = \$6.66/MBF



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**Logging Conditions**

**Combination#: 1**                      Douglas - Fir                      40.00%  
   Alder (Red)                      40.00%

**Logging System:** Cable: Small Tower <=40                      **Process:** Harvester Head Delimbing  
**yarding distance:** Short (400 ft)                      **downhill yarding:** No  
**tree size:** Mature / Regen Cut (900 Bft/tree), 3-5 logs/MBF  
**loads / day:** 9                      **bd. ft / load:** 3500  
**cost / mbf:** \$236.25  
**machines:** Log Loader (A)  
Forwarder  
Harvester  
Tower Yarder (Small)

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**Combination#: 2**                      Douglas - Fir                      60.00%  
   Alder (Red)                      60.00%

**Logging System:** Shovel                      **Process:** Harvester Head Delimbing  
**yarding distance:** Medium (800 ft)                      **downhill yarding:** No  
**tree size:** Mature / Regen Cut (900 Bft/tree), 3-5 logs/MBF  
**loads / day:** 15                      **bd. ft / load:** 4600  
**cost / mbf:** \$77.45  
**machines:** Forwarder  
Harvester

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### Logging Costs

Operating Seasons: 1.00	Profit Risk: 10%
Project Costs: \$32,470.00	Other Costs (P/R): \$4,594.00
Slash Disposal: \$0.00	Other Costs: \$20,386.00

Miles of Road

Road Maintenance: \$6.66

Dirt	Rock (Contractor)	Rock (State)	Paved
0.0	0.0	0.0	0.0

Hauling Costs

Species	\$ / MBF	Trips/Day	MBF / Load
Douglas - Fir	\$0.00	2.0	2.0
Alder (Red)	\$0.00	2.0	2.0



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### Logging Costs Breakdown

Logging	Road Maint	Fire Protect	Hauling	Other P/R appl	Profit & Risk	Slash Disposal	Brand & Paint	Other	Total
<b>Douglas - Fir</b>									
\$140.97	\$6.66	\$1.91	\$300.00	\$2.00	\$45.15	\$0.00	\$2.00	\$8.88	\$507.57
<b>Alder (Red)</b>									
\$140.97	\$6.66	\$1.91	\$300.00	\$2.00	\$45.15	\$0.00	\$2.00	\$8.88	\$507.57

Specie	Amortization	Pond Value	Stumpage	Amortized
Douglas - Fir	\$0.00	\$904.35	\$396.78	\$0.00
Alder (Red)	\$0.00	\$713.29	\$205.72	\$0.00



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### Summary

#### Amortized

Specie	MBF	Value	Total
Douglas - Fir	0	\$0.00	\$0.00
Alder (Red)	0	\$0.00	\$0.00

#### Unamortized

Specie	MBF	Value	Total
Douglas - Fir	2,199	\$396.78	\$872,519.22
Alder (Red)	98	\$205.72	\$20,160.56

#### Gross Timber Sale Value

Recovery: \$892,679.78

Prepared By: Jonah Horn

Phone: 503-842-2545



"STEWARDSHIP IN FORESTRY"

## PROJECT SUMMARY SHEET

Sale: Groom Creek

### CONSTRUCTION

Point	A to B	5+32	stations =	\$4,354.80
Point	C to D	9+90	stations =	\$4,562.52
Point	E to F	7+15	stations =	\$4,371.92
Point	G to H	11+10	stations =	\$5,015.33
Point	K to L	4+40	stations =	\$2,428.17
<b>SUBTOTAL CONSTRUCTION</b>				<b>\$20,732.74</b>

### IMPROVEMENT

### RECONSTRUCTION

Point	A to B	2+33	stations =	\$1,666.18
Point	I to J	11+10	stations =	\$4,549.91
<b>SUBTOTAL RECONSTRUCTION</b>				<b>\$6,216.09</b>

### SPECIAL PROJECTS

Pit Development	6hrs excavator	1,320.00
Temporary Gate	Farmer Style	500.00
<b>SUBTOTAL SPECIAL PROJECTS</b>		<b>\$1,820.00</b>

**MOVE IN & MACHINE WASH** **\$3,701.17**

**GRAND TOTAL** **\$32,470.00**

## SUMMARY OF CONSTRUCTION COST

Sale:

**Groom Creek**

Road:

**A to B**

Construction -	5+32	stations	Improvement -	0+00	stations	Reconstruction -	2+33	stations
	0.10	miles		0.00	miles		0.04	miles

**CONSTRUCTION:** CLEARING, GRUBBING, SCATTERING, EXCAVATION, COMPACTION, LOADING, END-HAULING AND SPREADING/COMPACTING AT WASTE AREA -

Station	to	Station	Avg. Sideslope	Avg. Dist. To W.A. (mi.)	Outslope/Ditch	Cost per Station			
2+33		4+17	45%			\$373	=	\$686.32	
4+17		7+65	20%			\$193	=	\$671.64	
									<b>TOTAL</b>
									<b>\$1,357.96</b>

**RECONSTRUCTION:** CLEARING AND GRUBBING -

Side cast	0.007	acres @	\$955.00	per acre =	\$6.69	
Widening	0.005	acres @	\$955.00	per acre =	\$4.78	
Scattering	0.060	acres @	\$1,415.00	per acre =	\$84.90	
						<b>TOTAL CLEARING AND GRUBBING</b>
						<b>\$96.37</b>

**RECONSTRUCTION:** EXCAVATION -

Pullback	44	cy. @	\$2.20	per c.y.=	\$96.80	
Widening	20	cy. @	\$2.20	per c.y.=	\$44.00	
						<b>TOTAL EXCAVATION</b>
						<b>\$140.80</b>

**RECONSTRUCTION:** ENDHAUL -

Pullback	1+83	to	2+33	44	cy. @	\$1.27	per c.y.=	\$55.88	
Widening	1+83	to	2+33	20	cy. @	\$1.27	per c.y.=	\$25.40	
Spread & compact				64	cy. @	\$0.55	per c.y.=	\$35.20	
									<b>TOTAL ENDHAUL</b>
									<b>\$116.48</b>

**CULVERTS - MATERIALS & INSTALLATION**

<u>Culverts</u>	30	LF of 30"	\$1,500.00						<b>TOTAL CULVERTS</b>
									<b>\$1,500.00</b>

**ROCK**

0+00 to	1+00	70	cy. of	Pit-Run	@	\$16.29	per c.y.=	\$1,140.30	
Approach Widening	0+00	20	cy. of	Pit-Run	@	\$14.59	per c.y.=	\$291.80	
Culvert Crossing	4+20	20	cy. of	Pit-Run	@	\$14.93	per c.y.=	\$298.60	
									<b>TOTAL ROCK</b>
									<b>\$1,730.70</b>

**SPECIAL PROJECTS**

Construct Landing -	1.00	hours @	\$220.00	per hour	\$220.00	
Grade and shape road -	7.65	stations @	\$24.40	per station	\$186.66	
Roll subgrade w/ vibratory roller prior to rocking -	7.65	stations @	\$19.40	per station	\$148.41	
Remove large stumps -	1.00	lump sum @	\$110.00		\$110.00	
Remove culverts from state lands	1.00	@	\$252.70	total	\$252.70	
Grass seed and fertilize -	0.24	acres @	\$310.00	per acre	\$74.40	
Mulching -	0.100	acres @	\$865.00	per acre	\$86.50	
						<b>TOTAL SPECIAL PROJECTS</b>
						<b>\$1,078.67</b>

**GRAND TOTAL** **\$6,020.98**

## SUMMARY OF CONSTRUCTION COST

Sale:

## Groom Creek

Road:

**C to D**

Construction -	9+90	stations	Improvement -	0+00	stations	Reconstruction -	0+00	stations
	0.19	miles		0.00	miles		0.00	miles

**CONSTRUCTION:** CLEARING, GRUBBING, SCATTERING, EXCAVATION, COMPACTION, LOADING, END-HAULING AND SPREADING/COMPACTING AT WASTE AREA -

<u>Station</u>	<u>to</u>	<u>Station</u>	<u>Avg. Sideslope</u>	<u>Avg. Dist. To W.A. (mi.)</u>	<u>Outslope/Ditch</u>	<u>Cost per Station</u>			
0+00		1+40	25%			\$229	=		\$320.60
1+40		2+30	15%			\$148	=		\$133.20
2+30		3+85	40%			\$337	=		\$522.35
3+85		9+90	12%			\$125	=		\$756.25
								<b>TOTAL</b>	<b>\$1,732.40</b>

## ROCK

0+00 to	1+00	70	cy. of	Pit-Run	@	\$16.90 per c.y.=	\$1,183.00	
Approach Widening	0+00	20	cy. of	Pit-Run	@	\$15.20 per c.y.=	\$304.00	
							<b>TOTAL ROCK</b>	<b>\$1,487.00</b>

## SPECIAL PROJECTS

Construct Landing -	2.00	hours @	\$220.00	per hour	\$440.00
Grade and shape road -	9.90	stations @	\$24.40	per station	\$241.56
Roll subgrade w/ vibratory roller prior to rocking -	9.90	stations @	\$19.40	per station	\$192.06
Remove large stumps -	3.00	lump sum @	\$110.00		\$330.00
Grass seed and fertilize -	0.45	acres @	\$310.00	per acre	\$139.50
				<b>TOTAL SPECIAL PROJECTS</b>	<b>\$1,343.12</b>

**GRAND TOTAL**

**\$4,562.52**

## SUMMARY OF CONSTRUCTION COST

Sale:

## Groom Creek

Road:

E to F

Construction -	<u>7+15</u> 0.14	stations miles	Improvement -	<u>0+00</u> 0.00	stations miles	Reconstruction -	<u>0+00</u> 0.00	stations miles
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**CONSTRUCTION:** CLEARING, GRUBBING, SCATTERING, EXCAVATION, COMPACTION, LOADING, END-HAULING AND SPREADING/COMPACTING AT WASTE AREA -

[illegible]

## ROCK

0+00 to	1+00	70	cy. of	Pit-Run	@	\$17.15 per c.y.=	\$1,200.50	
Approach Widening	0+00	20	cy. of	Pit-Run	@	\$15.45 per c.y.=	\$309.00	
							<b>TOTAL ROCK</b>	<b>\$1,509.50</b>

## SPECIAL PROJECTS

Construct Landings -	4.00	hours @	\$220.00	per hour	\$880.00
Grade and shape road -	7.15	stations @	\$24.40	per station	\$174.46
Roll subgrade w/ vibratory roller prior to rocking -	7.15	stations @	\$19.40	per station	\$138.71
Remove large stumps -	3.00	lump sum @	\$110.00		\$330.00
Grass seed and fertilize -	0.33	acres @	\$310.00	per acre	\$102.30
				<b>TOTAL SPECIAL PROJECTS</b>	<b>\$1,625.47</b>

**GRAND TOTAL**

**\$4,371.92**

Sale:		<b>Groom Creek</b>	Road:	<b>G to H</b>				
<u>Construction -</u>	<u>11+10</u>	stations	<u>Improvement -</u>	<u>0+00</u>	stations	<u>Reconstruction -</u>	<u>0+00</u>	stations
	0.21	miles		0.00	miles		0.00	miles
<b>CONSTRUCTION:</b> CLEARING, GRUBBING, SCATTERING, EXCAVATION, COMPACTION, LOADING, END-HAULING AND SPREADING/COMPACTING AT WASTE AREA -								
	<u>Station</u>	<u>to</u>	<u>Station</u>	<u>Avg. Sideslope</u>	<u>Avg. Dist.</u>	<u>To W.A. (mi.)</u>	<u>Outslope/Ditch</u>	<u>Cost per Station</u>
	0+00		1+85	15%				\$148
	1+85		8+30	25%				\$229
	8+30		11+10	12%				\$125
								<u>\$350.00</u>
								<b>TOTAL</b>
								<b>\$2,100.85</b>
<b>ROCK</b>								
0+00 to			1+00	70	cy. of	Pit-Run	@	\$17.38 per c.y.=
Approach Widening			0+00	20	cy. of	Pit-Run	@	\$15.68 per c.y.=
								<u>\$313.60</u>
								<b>TOTAL ROCK</b>
								<b>\$1,530.20</b>
<b>SPECIAL PROJECTS</b>								
Construct truck turnout -				1.00	each @	\$80.00	per hour	\$80.00
Construct Landing -				1.00	hours @	\$220.00	per hour	\$220.00
Grade and shape road -				11.10	stations @	\$24.40	per station	\$270.84
Roll subgrade w/ vibratory roller prior to rocking -				11.10	stations @	\$19.40	per station	\$215.34
Remove large stumps -				4.00	lump sum @	\$110.00		\$440.00
Grass seed and fertilize -				0.51	acres @	\$310.00	per acre	\$158.10
							<b>TOTAL SPECIAL PROJECTS</b>	<b>\$1,384.28</b>
							<b>GRAND TOTAL</b>	<b>\$5,015.33</b>

## SUMMARY OF CONSTRUCTION COST

Sale:

**Groom Creek**

Road:

**I to J**

Construction -	0+00	stations	Improvement -	0+00	stations	Reconstruction -	11+10	stations
	0.00	miles		0.00	miles		0.21	miles

**RECONSTRUCTION:** CLEARING AND GRUBBING -

Widening	0.032	acres	@	\$955.00	per acre =	\$30.56	
Scattering	0.310	acres	@	\$1,415.00	per acre =	\$438.65	
<b>TOTAL CLEARING AND GRUBBING</b>							<b>\$469.21</b>

**RECONSTRUCTION:** EXCAVATION -

Widening	96	cy.	@	\$2.20	per c.y.=	\$211.20	
<b>TOTAL EXCAVATION</b>							<b>\$211.20</b>

**RECONSTRUCTION:** ENDHAUL -

Widening	0+00	to	5+75	83	cy.	@	\$1.27	per c.y.=	\$105.41	
Widening	6+70	to	9+25	13	cy.	@	\$1.27	per c.y.=	\$16.51	
Spread & compact				96	cy.	@	\$0.55	per c.y.=	\$52.80	
<b>TOTAL ENDHAUL</b>										<b>\$174.72</b>

**CULVERTS - MATERIALS & INSTALLATION**

<u>Culverts</u>	50	LF of 18"	\$1,262.50							
<u>Culvert Stakes &amp; Markers</u>	1	markers	\$9.00							
<b>TOTAL CULVERTS</b>										<b>\$1,271.50</b>

**ROCK**

0+00 to	1+00	70	cy. of	Pit-Run	@	\$18.27 per c.y.=	\$1,278.90	
Culvert Backfill	0+00	30	cy. of	Crushed	@	\$7.82 per c.y.=	\$234.60	
Energy Dissipator	0+00	5	cy. of	Riprap	@	\$17.16 per c.y.=	\$85.80	
<b>TOTAL ROCK</b>								<b>\$1,599.30</b>

**SPECIAL PROJECTS**

Construct lobby turnaround -	1.00	hours	@	\$220.00	per hour	\$220.00	
Grade and shape road -	11.10	stations	@	\$24.40	per station	\$270.84	
Roll subgrade w/ vibratory roller prior to rocking -	11.10	stations	@	\$19.40	per station	\$215.34	
Grass seed and fertilize -	0.38	acres	@	\$310.00	per acre	\$117.80	
<b>TOTAL SPECIAL PROJECTS</b>							<b>\$823.98</b>

**GRAND TOTAL**

**\$4,549.91**

SUMMARY OF CONSTRUCTION COST

Sale:			<b>Groom Creek</b>			Road:			<b>K to L</b>		
<u>Construction -</u>		4+40	stations	<u>Improvement -</u>		0+00	stations	<u>Reconstruction -</u>		0+00	stations
		0.08	miles			0.00	miles			0.00	miles

<b>CONSTRUCTION:</b> CLEARING, GRUBBING, SCATTERING, EXCAVATION, COMPACTION, LOADING, END-HAULING AND SPREADING/COMPACTING AT WASTE AREA -											
	Station	to	Station	Avg. Sideslope	Avg. Dist. To W.A. (mi.)	Outslope/Ditch	Cost per Station				
	0+00		1+35	5%			\$103	=		\$139.05	
	1+35		2+00	25%			\$229	=		\$148.85	
	2+00		2+85	50%			\$636	=		\$540.60	
	2+85		4+40	25%			\$229	=		\$354.95	
									<b>TOTAL</b>		<b>\$1,183.45</b>
<b>SPECIAL PROJECTS</b>											
	Construct Landing				3.00	hours @	\$220.00	per hour		\$660.00	
	Grade and shape road -				4.40	stations @	\$24.40	per station		\$107.36	
	Roll subgrade w/ vibratory roller prior to rocking -				4.40	stations @	\$19.40	per station		\$85.36	
	Remove large stumps -				3.00	lump sum @	\$110.00			\$330.00	
	Grass seed and fertilize -				0.20	acres @	\$310.00	per acre		\$62.00	
									<b>TOTAL SPECIAL PROJECTS</b>		<b>\$1,244.72</b>
									<b>GRAND TOTAL</b>		<b>\$2,428.17</b>

ROCK PIT DEVELOPMENT AND CRUSHING COST SUMMARY

Pit:	E. Fk. Trask Crushed Stockpile	Location:	Sec. 7, T2S, R7W, W.M.
Sale:	<b>Groom Creek</b>	Road:	30 c.y.
Swell:	1.40	Stockpile:	c.y.
Shrinkage	1.16	Total Truck Loads:	30 c.y.
Drill Pct.:	0%	In Place Total:	21 c.y.

Load Dump Truck:	\$1.20 /cu.yd.	x	30 cu.yds.	=	\$36.00
				Subtotal	\$36.00

Base Cost=	\$1.20	Per Cu.Yd.	<b>TOTAL PRODUCTION COSTS</b>	<b>\$36.00</b>
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Road Segment	Haul Cost \$/cu.yd.	Proc Cost \$/cu.yd.	Base Cost. \$/cu.yd.	Cost \$/cu.yd.	Number Cu. Yds	ROCK COST
I to J Culvert Backfill (Crushed)	5.12	1.50	1.20	7.82	30	\$234.60
				Total C.Y.	30	Sub Total
						\$234.60
						<b>TOTAL ROCKING COSTS</b>
						<b>\$234.60</b>

## ROCK PIT DEVELOPMENT AND CRUSHING COST SUMMARY

Pit:	East Fork Trask Pit	Location:	Sec. 18, T2S, R7W, W.M.
Sale:	<b>Groom Creek</b>	Road:	455 c.y.
Swell:	1.40	Stockpile:	c.y.
Shrinkage	1.16	Total Truck Loads:	455 c.y.
Drill Pct.:	0%	In Place Total:	325 c.y.

Rip Rock:	\$3.35 /cu.yd.	x	325 cu.yds.	=	\$1,088.75
Sort Rock:	\$1.20 /cu.yd.	x	455 cu.yds.	=	\$546.00
Load Dump Truck:	\$1.20 /cu.yd.	x	455 cu.yds.	=	\$546.00

Subtotal \$2,180.75

Move in Roller and Compactor	1	@	\$488.50	=	\$488.50
Move in Grader	1	@	\$579.86	=	\$579.86
Move in Excavator	1	@	\$687.14	=	\$687.14
Move in Trucks	2	@	\$197.24	=	\$394.48
Move in Water Truck	1	@	\$197.24	=	\$197.24
				Subtotal	<u>\$2,347.22</u>

				<b>TOTAL PRODUCTION COSTS</b>	<b>\$4,527.97</b>
Base Cost=	<u>\$9.95</u>	Per Cu.Yd.			

Road Segment	Haul Cost \$/cu.yd.	Proc Cost \$/cu.yd.	Base Cost. \$/cu.yd.	Cost \$/cu.yd.	Number Cu. Yds	ROCK COST
A to B 0 100 (Pit-Run)	3.14	3.20	9.95	16.29	70	\$1,140.30
A to B Approach Widening (Pit-Run)	3.14	1.50	9.95	14.59	20	\$291.80
A to B Culvert Crossing (Pit-Run)	3.28	1.70	9.95	14.93	20	\$298.60
C to D 0 100 (Pit-Run)	3.75	3.20	9.95	16.90	70	\$1,183.00
C to D Approach Widening (Pit-Run)	3.75	1.50	9.95	15.20	20	\$304.00
E to F 0 100 (Pit-Run)	4.00	3.20	9.95	17.15	70	\$1,200.50
E to F Approach Widening (Pit-Run)	4.00	1.50	9.95	15.45	20	\$309.00
G to H 0 100 (Pit-Run)	4.23	3.20	9.95	17.38	70	\$1,216.60
G to H Approach Widening (Pit-Run)	4.23	1.50	9.95	15.68	20	\$313.60
I to J 0 100 (Pit-Run)	5.12	3.20	9.95	18.27	70	\$1,278.90
I to J Energy Dissipator (Riprap)	5.51	1.70	9.95	17.16	5	\$85.80
				Total C.Y.	455	Sub Total \$7,622.10

**TOTAL ROCKING COSTS** **\$7,622.10**

## Move-In Calculations for Project Work not Involving Rocking/Pit Work

Sale: **Groom Creek**

LOWBOY HAUL (Round Trip)		
DIST. (mi)	ROADWAY	AVE SPEED (mph)
28.0	Pavement	30
7.6	Main Lines	7
0.4	Steep Grades	2

No.	EQUIPMENT DESCRIPTION	Move in Cost	Pilot Cars	Within Area Move (\$/mile)	Begin Mileage	End Mileage	Total Miles	Within Area Cost	Total Cost
1	Excavators (Large)	\$687.14	1	\$44.80	0.00	1.20	1.2	\$53.76	\$740.90
1	Tractor (D8)	\$743.14	2	\$15.10	0.00	1.20	1.2	\$18.12	\$761.26
1	Dump Truck (10 cy +)	\$199.01		\$2.85	0.00	0.00	0	\$0.00	\$199.01
1	Machine Wash	\$2,000.00		\$0.00	0.00	0.00	0	\$0.00	\$2,000.00
				TOTAL MOVE-IN COSTS:					\$3,701.17



## OREGON DEPARTMENT OF FORESTRY CRUISE REPORT

### Groom Creek

#### 1. Type of Sale

Regeneration harvest, Recovery

#### 2. Legal Description

Section(s) Section(s) 17, 18, 19, & 20 of T2S R7W .Tillamook County, W.M.

#### 3. Sale Acreage

Sale acreage was determined by GPS and orthophotographs along with GIS.

<u>ACRES</u>		
	<u>Gross</u>	<u>Net</u>
Unit 1 (Modified Clearcut)	114	75
Total	114	75

##### Gross Acres

Area within the Timber Sale Boundary signs

##### Net acres

*Used for calculating the advertised volume.*

Gross acres, less green tree retention, roads, Non-required thinning areas, and riparian areas classified as Special Stewardship in LMCS inside the sale boundary.

#### 4. Cruising Procedures

##### A. Cruise Method

Timber sale Unit 1 was cruised using variable plot sampling. The unit was cruised by ODF Staff in September 2022. All conifers 8" DBH and greater containing 20 board feet and all hardwoods 10" DBH and greater containing 30 board feet were recorded on all plots. Species, DBH (to nearest inch), merchantable bole length (to nearest foot), form factor, and defect were recorded for all measure trees. Merchantable heights were recorded to 6" and 7" outside bark for conifers and hardwoods, respectively.

##### B. Plot size

Unit	BAF	Spacing
1	40.00	300' x 300'

##### C. Grading System

All trees were graded according to Columbia River Log Scaling and Grading Rules. Log lengths favored 40' lengths.

#### 5. Computation Procedure

Plot data was entered into SuperAce for computation of basal area, advertised volume, volume summary, log stock table, and stand table for each species and type.

Net sale acreage was used for volume calculation.

	Cruise Statistics (Board Foot Volumes)			
Unit	Acres	Number of Plots	SE (%)	CV (%)
1	75	27	7.0	35.9
Project Total	75	27	7.0	35.9

#### 6. Hidden Defect and Breakage

A 2% reduction for conifers and a 4% reduction for hardwood volumes were applied for hidden defect and breakage.

#### 7. Timber Description

Units 1 is modified clearcuts. The Unit is Douglas-fir dominated stand, with a minor component (5%) of Red alder. The northern portion has about 52 acres that was thinned in the 1997 Scotch Bloom Thin.

The stand was burned in the 1951 North Fork Fire.

Sale Unit	Age	Species	DBH	Merchantable Bole Height (feet)	Merchantable top (inches inside bark)
1	61	Douglas-fir	19.8	92	5
1	61	Red alder	15.7	50	6

Above data derived from Statistics (type) report using SuperAce 2008, developed by Atterbury consultants, Inc.

#### 8. Cruiser /Dates

ODF Staff Cruised; September 2022.

#### 9. Revenue Distribution

BOF – 100%

Tax Code: 901 (100%)

Deed Numbers: 169

#### 10. Attachments

Volume Summary Table

Stand Table

Log Stock Table

Species, Sort, Grade Table

## Logging Plan

### **11. Stand and Log Stock Tables Species Key**

DF – Douglas-fir take

RA – red alder take

OC – Other Conifer

DL – Douglas-fir leave

T		TSPCSTGR		Species, Sort Grade - Board Foot Volumes (Type)												Page		1																							
				Project: GROOM												Date		12/21/2022																							
																Time		1:56:28PM																							
T2S R7W S18 T0100												T2S R7W S18 T0100																													
Twp		Rge		Sec		Tract		Type		Acres		Plots		Sample Trees		CuFt		BdFt																							
2S		7W		18		GROOM		0100		75.00		27		129		S		W																							
S So Gr T rt ad Spp				%	Bd. Ft. per Acre			Total	Percent Net Board Foot Volume								Average Log				Logs																				
									Log Scale Dia.				Log Length				Ln Dia Bd CF/																								
				Net	Def%	Gross	Net	Net MBF	4-5	6-11	12-16	17+	12-20	21-30	31-35	36-99	Ft	In	Ft	Lf	Per																				
				BdFt																																					
DF		CO		2		57		.1		17,336		17,317		1,299		57		43		2		1		1		96		39		15		362		2.11		47.9					
DF		CO		3		32				9,308		9,308		698		84		16		0		4		2		94		39		9		130		0.86		71.8					
DF		CO		4		11				3,292		3,292		247		43		57		15		37		10		38		27		6		36		0.36		91.9					
DF		Totals				94		.1		29,936		29,917		2,244		5		32		38		25		3		6		2		89		34		9		141		1.02		211.6	
RA		CO		4		11				159		159		12		100										100		40		9		120		0.83		1.3					
RA		H		4		11				140		140		11		100						100						25		8		60		0.58		2.3					
RA		H		2		8		4.2		124		119		9		100								100				40		13		230		2.30		.5					
RA		H		3		34				460		460		35		100				20		47				32		27		11		108		1.21		4.2					
RA		H		4		36		6.0		506		475		36		100				33		53		14				22		7		36		0.50		13.2					
RA		Totals				4		2.6		1,390		1,354		102		91		9		18		45		5		32		25		8		63		0.76		21.7					
DL		CO		2		95				523		523		39		29		71								100		40		17		477		2.74		1.1					
DL		CO		3		3				16		16		1		100						100						25		9		60		0.83		.3					
DL		CO		4		2				8		8		1		100				100								18		8		30		0.57		.3					
DL		Totals				2				548		548		41		4		28		68		2		3		96		34		14		333		2.31		1.6					
Type Totals								.2		31,874		31,819		2,386		4		34		37		25		3		7		3		87		33		9		135		1.01		234.9	

Stand Table Summary																
Project GROOM																
T2S R7W S18 T0100												T2S R7W S18 T0100				
Twp	Rge	Sec	Tract	Type	Acres	Plots	Sample Trees			Page:	1					
2S	7W	18	GROOM	0100	75.00	27	129			Date:	10/18/2021					
										Time:	8:06:21AM					
S Spc	T	Sample		FF	Av Ht	Trees/ Acre	BA/ Acre	Logs Acre	Average Log		Tons/ Acre	Net	Net	T o t a l s		
		DBH	Trees	16'	Tot				Net Cu.Ft.	Net Bd.Ft.		Cu.Ft. Acre	Bd.Ft. Acre		Tons	Cunits
DF		9	1	83	108	5.329	2.35	10.66	7.4	35.0	2.24	79	373	168	59	28
DF		12	1	83	112	2.997	2.35	5.99	13.6	50.0	2.32	81	300	174	61	22
DF		13	2	80	116	5.108	4.71	10.22	16.3	57.5	4.74	166	587	356	125	44
DF		14	3	83	115	6.606	7.06	13.21	20.3	83.3	7.65	268	1,101	574	201	83
DF		15	2	85	107	3.837	4.71	9.59	18.0	74.0	4.93	173	710	370	130	53
DF		16	4	84	114	6.744	9.42	20.23	17.3	70.0	9.97	350	1,416	748	262	106
DF		17	2	84	108	2.987	4.71	7.47	23.7	92.0	5.04	177	687	378	133	52
DF		18	6	83	117	7.993	14.12	19.98	27.8	106.0	15.82	555	2,118	1,186	416	159
DF		19	3	83	124	3.587	7.06	10.76	28.0	107.8	8.59	301	1,160	644	226	87
DF		20	2	82	105	2.158	4.71	5.40	32.9	116.0	5.06	178	626	380	133	47
DF		21	8	84	123	7.830	18.83	23.49	33.8	144.2	22.64	794	3,386	1,698	596	254
DF		22	4	83	132	3.567	9.42	10.70	39.2	162.5	11.95	419	1,739	896	314	130
DF		23	6	84	121	4.896	14.12	13.87	43.6	179.4	17.24	605	2,489	1,293	454	187
DF		24	4	82	127	2.997	9.42	8.99	44.3	183.3	11.36	399	1,649	852	299	124
DF		25	5	83	143	3.453	11.77	10.36	54.7	239.3	16.14	566	2,479	1,211	425	186
DF		26	5	83	137	3.192	11.77	9.58	56.7	244.7	15.46	543	2,343	1,160	407	176
DF		27	4	83	134	2.368	9.42	7.10	60.5	261.7	12.24	430	1,859	918	322	139
DF		28	1	82	136	.551	2.35	1.65	64.0	273.3	3.01	106	451	226	79	34
DF		29	1	78	119	.513	2.35	1.54	62.7	243.3	2.75	97	375	206	72	28
DF		30	2	80	134	.959	4.71	2.88	73.8	320.0	6.05	212	921	454	159	69
DF		32	2	80	130	.843	4.71	2.53	80.6	348.3	5.81	204	881	435	153	66
DF		33	2	84	132	.793	4.71	2.38	89.8	420.0	6.09	214	999	456	160	75
DF		34	1	77	144	.373	2.35	1.12	98.6	420.0	3.15	110	470	236	83	35
DF		35	1	77	120	.352	2.35	1.06	90.9	346.7	2.74	96	366	205	72	27
DF		39	1	77	119	.284	2.35	.85	100.0	506.7	2.43	85	431	182	64	32
DF		Totals	73	83	120	80.318	171.85	211.61	34.1	141.4	205.41	7,207	29,917	15,406	5,406	2,244
RA		13	1	73	68	1.768	1.63	3.54	8.7	30.0	.84	31	106	63	23	8
RA		14	2	79	71	3.049	3.26	6.10	13.3	40.0	2.22	81	244	167	61	18
RA		15	2	81	74	2.656	3.26	3.98	20.6	80.0	2.25	82	319	169	61	24
RA		16	2	78	66	2.334	3.26	3.50	19.1	73.3	1.84	67	257	138	50	19
RA		18	1	74	61	.922	1.63	1.84	21.6	65.0	1.10	40	120	82	30	9
RA		19	1	77	87	.828	1.63	1.66	33.1	105.0	1.50	55	174	113	41	13
RA		24	1	75	85	.519	1.63	1.04	53.9	130.0	1.54	56	135	115	42	10
RA		Totals	10	78	71	12.076	16.30	21.66	19.0	62.5	11.30	411	1,354	848	308	102
DL		31	1	78	125	.283	1.48	.85	72.1	276.7	1.68	61	235	126	46	18
DL		32	1	82	134	.265	1.48	.80	84.4	393.3	1.85	67	313	139	50	23
DL		Totals	2	80	129	.548	2.96	1.64	78.1	333.1	3.53	128	548	265	96	41
Totals			85	82	114	92.942	191.11	234.91	33.0	135.5	220.24	7747	31,819	16,518	5,810	2,386

TC	TLOGSTVB			Log Stock Table - MBF																	
				Project: GROOM																	
T2S R7W S18 T0100										T2S R7W S18 T0100											
Twp	Rge	Sec	Tract	Type		Acres	Plots	Sample Trees		Page	1										
2S	7W	18	GROOM	0100		75.00	27	129		Date	10/18/2022										
										Time	8:07:22AM										
Spp	S	So	Gr	Log	Gross	%	Net	%	Net Volume by Scaling Diameter in Inches												
									MBF	Def	MBF	Spc	2-3	4-5	6-7	8-9	10-11	12-13	14-15	16-19	20-23
DF	CO	2	16		10		10	.5							10						
DF	CO	2	20		14		14	.6										14			
DF	CO	2	30		13		13	.6						13							
DF	CO	2	34		19		19	.9								19					
DF	CO	2	40		1,243	.1	1,242	55.3						229	344	491	178				
DF	CO	3	19		2		2	.1				2									
DF	CO	3	22		3		3	.1				3									
DF	CO	3	27		2		2	.1				2									
DF	CO	3	28		17		17	.8				2	15								
DF	CO	3	29		4		4	.2				4									
DF	CO	3	32		6		6	.3				3	3								
DF	CO	3	33		3		3	.1					3								
DF	CO	3	35		3		3	.1				3									
DF	CO	3	36		10		10	.5						10							
DF	CO	3	40		649		649	28.9			58	150	341	100							
DF	CO	4	12		6		6	.3		5			1	1							
DF	CO	4	13		3		3	.1		2		1									
DF	CO	4	15		1		1	.1		1											
DF	CO	4	16		2		2	.1		2											
DF	CO	4	18		2		2	.1		2											
DF	CO	4	19		3		3	.1		1	1										
DF	CO	4	20		19		19	.9					19								
DF	CO	4	21		9		9	.4		3	1	5									
DF	CO	4	22		18		18	.8		10	2	6									
DF	CO	4	23		9		9	.4		8	2										
DF	CO	4	24		13		13	.6		6	2	5									
DF	CO	4	25		6		6	.3		4	2										
DF	CO	4	26		18		18	.8		11	2	6									
DF	CO	4	27		6		6	.2		4	2										
DF	CO	4	29		5		5	.2		2	3										
DF	CO	4	30		7		7	.3		7											
DF	CO	4	31		8		8	.4		6	2										
DF	CO	4	32		8		8	.4		2	6										
DF	CO	4	33		6		6	.3		6											
DF	CO	4	35		3		3	.1			3										
DF	CO	4	36		3		3	.1			3										
DF	CO	4	37		13		13	.6		13											
DF	CO	4	40		78		78	3.5		12	50	16									
DF	Totals				2,245		2,244	94.0		106	149	219	360	352	354	510	178	14			
RA	CO	4	40		12		12	11.8			12										
RA	H	4	24		8		8	7.8				8									
RA	H	4	25		3		3	2.6			3										
RA	H	2	40		9	4.2	9	8.8					9								
RA	H	3	16		7		7	6.9					7								
RA	H	3	27		9		9	8.6					9								
RA	H	3	30		8		8	7.5					8								
RA	H	3	40		11		11	11.0					11								
RA	H	4	15		1		1	1.4			1										
RA	H	4	16		4		4	3.9				4									

TC TLOGSTVB				Log Stock Table - MBF Project: GROOM																	
T2S R7W S18 T0100										T2S R7W S18 T0100											
Twp		Rge		Sec		Tract		Type		Acres		Plots		Sample Trees		Page		2			
2S		7W		18		GROOM		0100		75.00		27		129		Date		10/18/2022			
																Time		8:07:22AM			
S So Gr Log				Gross		% Net		%		Net Volume by Scaling Diameter in Inches											
Spp T rt de Len				MBF		Def MBF		Spc		2-3 4-5		6-7 8-9		10-11 12-13		14-15 16-19		20-23 24-29		30-39 40+	
RA H 4 20				8		15.1		6		6.3				2 5							
RA H 4 21				3				3		3.4				3							
RA H 4 22				7		15.4		6		6.2				6							
RA H 4 28				1				1		1.1				1							
RA H 4 30				8				8		7.9				8							
RA H 4 32				5				5		4.9				5							
RA Totals				104		2.6		102		4.3				22 29		42 9					
DL CO 2 40				39				39		95.5						4 7 13		15			
DL CO 3 25				1				1		2.9				1							
DL CO 4 18				1				1		1.5				1							
DL Totals				41				41		1.7				2		4 7 13		15			
Total All Species				2,391				2,386		100.0		106		171 249		403 365		361 523		193 14	



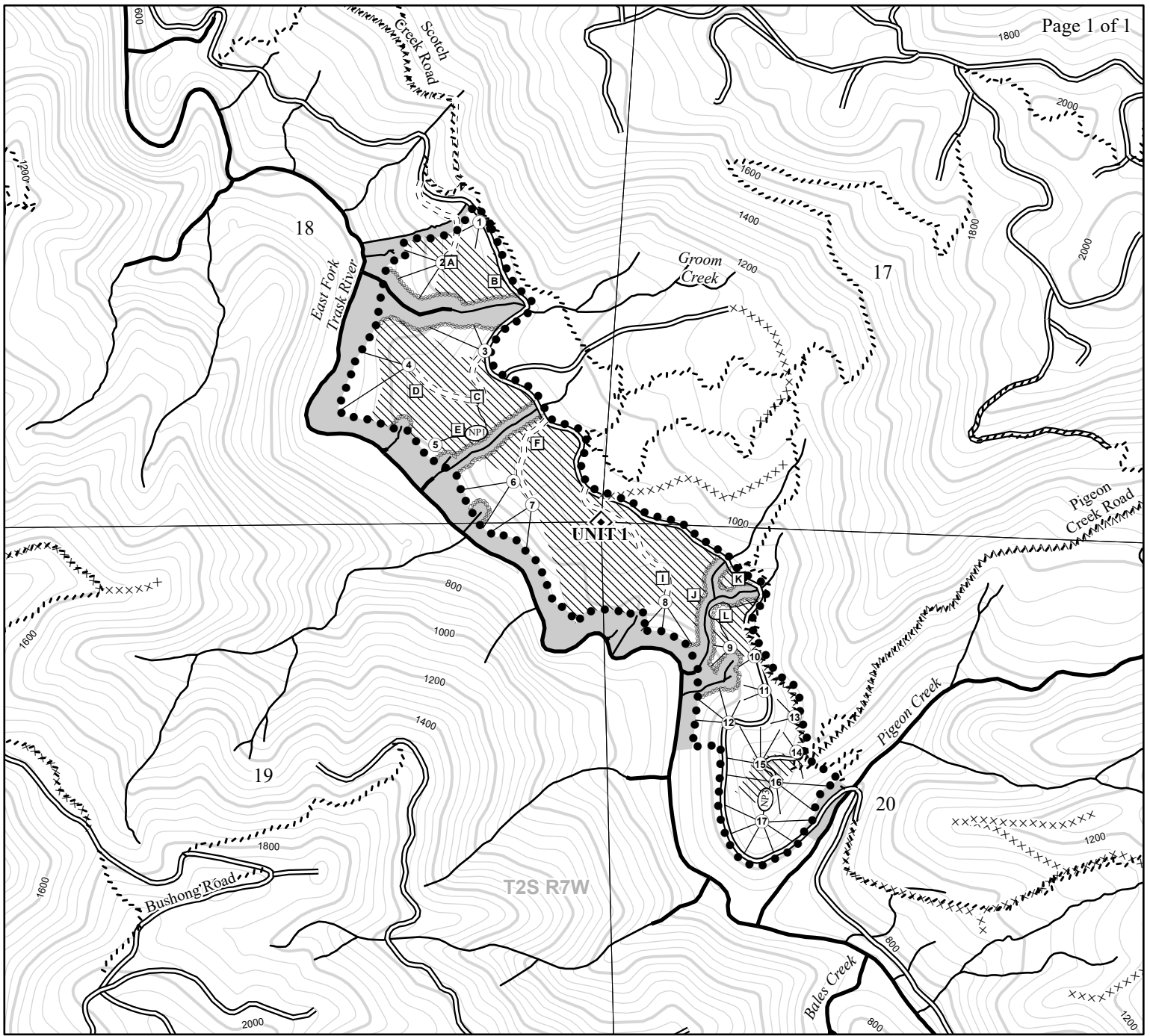
"STEWARDSHIP IN FORESTRY"

## Groom Creek

### Volume Summary

Unit 1-Modified Clearcut				
75 acres				
SPECIES	Cruised Net MBF/ Acre	Cruised Net MBF	Hidden D&B	Net Sale MBF
Douglas-fir	29.9	2244	2%	2199
red alder	1.4	102	4%	98
TOTAL	31.3	2346		2297

TOTAL SALE VOLUME 75 acres		
SPECIES	Cruised Net (MBF)	Net Sale (MBF)
Douglas-fir	2244	2199
Western hemlock	0	0
Sitka Spruce	0	0
Bigleaf Maple		
Red Alder	102	98
TOTAL	2346	2297



### Legend

- ◆ Corners
- Cable Landing
- Tractor Landing
- Cable Logging
- /// Ground Based
- Recreation Trail
- == Surfaced Road
- - Unsurfaced Road
- xxx Blocked Road
- v v v Abandoned Road
- Non-Project Construction
- Type-F Stream
- Type-N Stream
- Sections
- 200' Contour
- 40' Contour
- ~~~~~ Riparian Boundary
- Timber Sale Boundary

## LOGGING PLAN

FOR TIMBER SALE CONTRACT TL-341-2023-W00957-01  
GROOM CREEK  
PORTIONS OF SECTIONS 17, 18, 19, & 20, T2S, R7W, W.M.  
TILLAMOOK COUNTY, OREGON

Tillamook District GIS  
December, 2022

This product is for informational use and may not be  
suitable for legal, engineering, or surveying purposes.



NET ACRES

1:12,000  
1 inch = 1,000 feet



	GROUND	CABLE	TOTAL
UNIT 1	45	30	75
TOTAL	45	30	75