Timber Sale Appraisal
Fir Lo GNA
Sale Kl-341-2019-GF8017-01

District: Klamath/Lake **Date: April 26, 2019**

Cost Summary

	Conifer	Hardwood	Total
Gross Timber Sale Value	$381,576.70	$0.00	$381,576.70
		Project Work:	($45,696.48)
		Advertised Value:	$335,880.22

Timber Sale Appraisal
Fir Lo GNA
Sale Kl-341-2019-GF8017-01

District: Klamath/Lake **Date: April 26, 2019**

Timber Description

Location: Section(s) 7, 18, 19 or T35S R8E, Section(s) 12, 13 of T35S R7E, W.M., Klamath County, Oregon

Stand Stocking: 20%

Specie Name	AvgDBH	Amortization (%)	Recovery (%)
Douglas - Fir	20	0	95
White Fir	17	0	95
Ponderosa Pine	14	0	95
Lodgepole Pine	16	0	95

Volume by Grade	2S	3S & 4S 6"-11"	3S 12"+	6" - 11"	12"-15"	Camprun	Total
Douglas - Fir	250	90	45	0	0	0	385
White Fir	492	369	47	0	0	0	908
Ponderosa Pine	0	0	0	1,131	229	0	1,360
Lodgepole Pine	0	0	0	0	0	42	42
Total	742	459	92	1,131	229	42	2,695

Comments: Pond Values Used: Local Pond Values, February 2019.

Log Markets: Klamath Falls and Medford.

Other Costs (no Profit & Risk): None

Other Costs (with Profit & Risk to be added): None

ROAD MAINTENANCE
Move-in: $400.00
General Road Maintenance: 5.5 miles x $105.50 per mile x 2 bladings = $1,160.50
Total Road Maintenance: $1,560.50, $1.02 per Mbf

Logging Conditions

Combination#: 1

Douglas - Fir	60.00%
White Fir	80.00%
Ponderosa Pine	96.00%
Lodgepole Pine	100.00%

Logging System: Wheel Skidder **Process:** Feller Buncher

yarding distance: Medium (800 ft) **downhill yarding:** Yes

tree size: Small / Thinning 12in (130 Bft/tree), 12-17 logs/MBF

loads / day: 10 **bd. ft / load:** 3800

cost / mbf: $99.91

machines:
Log Loader (B)
Stroke Delimber (B)
Feller Buncher w/ Delimber
Tire Skidder

Combination#: 2

Douglas - Fir	40.00%
White Fir	20.00%
Ponderosa Pine	4.00%

Logging System: Track Skidder **Process:** Manual Falling/Delimbing

yarding distance: Medium (800 ft) **downhill yarding:** No

tree size: Small / Thinning 10in (90 Bft/tree), 18-20 logs/MBF

loads / day: 8 **bd. ft / load:** 4000

cost / mbf: $139.23

machines:
Log Loader (B)
Track Skidder

Timber Sale Appraisal
Fir Lo GNA
Sale Kl-341-2019-GF8017-01

District: Klamath/Lake **Date: April 26, 2019**

Logging Costs

Operating Seasons:	1.00	**Profit Risk:**	10%
Project Costs:	$45,696.48	**Other Costs (P/R):**	$0.00
Slash Disposal:	$0.00	**Other Costs:**	$0.00

Miles of Road

Road Maintenance: $1.02

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	4.2
White Fir	$0.00	3.0	4.2
Ponderosa Pine	$0.00	3.0	4.0
Lodgepole Pine	$0.00	3.0	3.8

Timber Sale Appraisal
Fir Lo GNA
Sale Kl-341-2019-GF8017-01

District: Klamath/Lake **Date: April 26, 2019**

Logging Costs Breakdown

Logging	Road Maint	Fire Protect	Hauling	Other P/R appl	Profit & Risk	Slash Disposal	Brand & Paint	Other	Total
Douglas - Fir									
$115.64	$1.07	$1.63	$118.76	$0.00	$23.71	$0.00	$2.00	$0.00	$262.81
White Fir									
$107.77	$1.07	$1.63	$79.17	$0.00	$18.96	$0.00	$2.00	$0.00	$210.60
Ponderosa Pine									
$101.48	$1.07	$1.63	$83.13	$0.00	$18.73	$0.00	$2.00	$0.00	$208.04
Lodgepole Pine									
$99.91	$1.07	$1.63	$87.50	$0.00	$19.01	$0.00	$2.00	$0.00	$211.12

Specie	Amortization	Pond Value	Stumpage	Amortized
Douglas - Fir	$0.00	$510.87	$248.06	$0.00
White Fir	$0.00	$394.68	$184.08	$0.00
Ponderosa Pine	$0.00	$290.89	$82.85	$0.00
Lodgepole Pine	$0.00	$360.00	$148.88	$0.00

Timber Sale Appraisal
Fir Lo GNA
Sale Kl-341-2019-GF8017-01

District: Klamath/Lake **Date: April 26, 2019**

Summary

Amortized

Specie	MBF	Value	Total
Douglas - Fir	0	$0.00	$0.00
White Fir	0	$0.00	$0.00
Ponderosa Pine	0	$0.00	$0.00
Lodgepole Pine	0	$0.00	$0.00

Unamortized

Specie	MBF	Value	Total
Douglas - Fir	385	$248.06	$95,503.10
White Fir	908	$184.08	$167,144.64
Ponderosa Pine	1,360	$82.85	$112,676.00
Lodgepole Pine	42	$148.88	$6,252.96

Gross Timber Sale Value

Recovery: $381,576.70

Prepared By: Chris Weekly **Phone:** 541-883-5681

Fir Lo Db !

KL-341-2019-GF8017-01

Other Costs

Road Maintenance		
Move-in cost (grader):		$400.00
Number of Miles to be Bladed:		5.5
Number of Bladings:		2
Total Miles:		11
Miles/Hour for Equipment:		0.5
Cost/Hour (grader with operator):	$	105.50
Total Grading Hours:		22
Grading Cost:	$	2,321.00
Total Cost:	**$**	**2,721.00**
Cost/Mbf:	$	1.02

Fir Lo Db !

KL-341-2019-GF8017-01

Project Costs

Project #1 Dust Abatement (Profit & Risk to be added in Appraisal)

PP	1333	Mbf	50%	Average Load	4.0	Mbf	No. of Loads	333
WF	906	Mbf	34%	Average Load	4.2	Mbf	No. of Loads	216
DF	385	Mbf	14%	Average Load	4.2	Mbf	No. of Loads	92
LP	43	Mbf	2%	Average Load	3.8	Mbf	No. of Loads	11
Total:	**2667**	**Mbf**					**Total Loads**	**652**

Assume:	4	Trucks/Day	54	Days of Dust Abatement
	3	Trips/Day	3	Hours/Day
	12	**Loads per Day**	$88.00	Cost/Hour
	54	**Hauling Days**	163	Total Hours
			$200.00	Move in for Water Truck
			$9.00	per 1000 gallons
			9,000	gallons per day
			$81.00	Daily Water Cost
			$18,943.47	Dust Abatement Cost
			$18,943.47	**Total Cost**
			$7.10	Cost/Mbf

Project #1 Summary

$18,943	Total Cost for Dust Abatement	$7.10	per Mbf
$18,943	**Total Cost**	**$7.10**	**per Mbf**

Fir Lo Db !

KL-341-2019-GF8017-01

Project Costs

Project #2 Road Improvement and Construction

Move in Cost Dozer: $400

Improvement

	Points	Distance(ft)	Feet/Hour	Hours	Cost/Hour	Cost
Open/Clear/Shape	A to B	5791	1000	5.791	$132.50	$767.31
Open/Clear/Shape	H to I	2904	1000	2.904	$132.50	$384.78
Open/Clear/Shape	G			0.5	$132.50	$66.25
					Total	$1,218.34

Construction

	Points	Distance(ft)	Feet/Hour	Hours	Cost/Hour	Cost
Construct Spur	C to D	1701	500	3.402	$132.50	$450.77
Construct Spur	E to F	1166	500	2.332	$132.50	$308.99
Construct Spur	L to O	635	500	1.27	$132.50	$168.28
Construct Spur	J to K	1073	500	2.146	$132.50	$284.35
					Total	$1,212.38

Project #2 Summary

Move In Costs	$400.00
Improvement Cost	$1,218.34
Construction Cost	$1,212.38
Project # 2 Total	**$2,830.71**
per Mbf	$1.06

Fir Lo Db !

KL-341-2019-GF8017-01

Project Costs

Project #3 Fell, Skid, and Pile Submerchantable Material

Total Sub-Sawlog Volume:	65 MBF
Fell and Skid/MBF:	$50.00
Sort/MBF:	$10.00
Total	**$3,900.00**
per MBF	$1.46

Landing Slash Piling

Number of Landings: 24

Shovel Time:	1 Hour per Landing	Cost per Hour:	$125.00	Total Cost	$3,000.00
Cat Time:	1 Hour per Landing	Cost per Hour:	$132.50	Total Cost	$3,180.00

Total	**$6,180.00**
per MBF	$2.32

Project #3 Summary

Fell, Skid, Pile Submerchantable Material	$3,900.00
Landing Slash Piling	$6,180.00
Total Cost	**$ 10,080.00**
per Mbf	$3.78

Fir Lo Db !
KL-341-2019-GF8017-01
Project Costs

Project #4 Road Closures and Waterbarring

Road Closures

3	Number of Closure Points - Point H, A, L
$132.50	Cost per Hour (Cat)
$397.50	**Total**
$0.10	per Mbf

Skid Trail Waterbarring

24	Number of Landings
2	Hours per Landing
$132.50	Cost per Hour (Cat)
$6,360.00	**Total**
$1.55	per Mbf

Project #4 Summary

Road Closure:	$397.50
Waterbarring:	$6,360.00
Total:	**$6,757.50**
per Mbf:	$2.53

Project #5 Fungicide Treatment

State to Provide Chemical Supplies	
Acres to be treated:	492
Cutting Days (assume 5 acres per day):	98.4
Hours per Day:	3
Cost per Hour:	$24.00
Total Cost:	**$7,084.80**
Cost per Mbf:	$2.66

Fir Lo Db !

KL-341-2019-GF8017-01

Project Costs

Cost Summary All Projects

Project No.1 - Dust Abatement	$18,943.47
Project No.2 - Road Improvement and Construction	$2,830.71
Project No.3 - Fell, Skid, and Pile Submerchantable Material	$10,080.00
Project No.4 - Road Closures and Waterbarring	$6,757.50
Project No. 5 - Fungicide Treatment	$7,084.80
Total Cost	**$45,696.48**
per Mbf	$17.13

Summary of Project Work

Fir-Lo

KL-341-2019-GF8017-01

Project No. 1:	Dust Abatement	**$18,943.47**
Project No. 2:	Road Improvement and Construction	**$2,830.71**
Project No. 3:	Fell Skid and Pile Submerchantable Material	**$10,080.00**
Project No. 4:	Road Closures and Waterbarring	**$6,757.50**
Project No. 5:	Fungicide Treatment	**$7,084.80**
	Total:	**$45,696.48**

Fir-Lo GNA

KL-341-2019-GF8017-01

Cruise Report

"STEWARDSHIP IN FORESTRY"

SALE NAME: Fir Lo

LEGAL DESCRIPTION:

Township 35S, Range 7E, Portions of Section 13 W.M., Klamath County, OR

BOUNDARY LINES:

Unit boundaries are posted with "Timber Sale Boundary" signs, marked with fluorescent orange paint and fluorescent orange flagging.

ACREAGE:

Gross Sale Acreage:	543 Acres
Exclusion Acreage	51 Acres
Net Sale Acreage:	492 Acres

Mapping was accomplished using a handheld Global Positioning System unit with the data run on the district Geographical Information System Program.

TREATMENT:

The Timber Sale is a purchaser select, partial cut harvest.

CRUISE METHOD:

Variable plot cruise with a ratio of a count plot for every measure plot. Fixed plot cruise for all sub-merchantable material (5.0" to 10.0") DBH for all Areas.

BASAL AREA FACTOR:

Area	BAF	Type Acreage
Area 1	13.61 BAF	379.6
Area 2	13.61 BAF	163.4

PLOT DESIGNATION:

Plot centers were established at every plot with blue flag wire stakes with the corresponding plot number. Blue flagging was attached to the nearest available tree branch.

SAMPLE SIZE CALCULATIONS:

AREA	CV%	DESIRED SE%	ACRES
Area 1	80%	13%	379.6
Area 2	80%	13%	163.4

$$\textbf{Number of Plots} = \frac{T^2C^2}{A^2}$$

C = Coefficient of Variation in Percent (Taken from inventory data)
T = Number of Standard Errors
A = Desired Sampling Error for a sale of this size and value

Area 1 $N = \frac{(1)^2(123)^2}{(13)^2} = 89$ plots

Measurements and Grading:

- Ratio of a count plot for every measure plot.
- DBH and Height were measured on all "in" trees for measure plots.
- Pulp volume and sawlog volume cruised.
- See attached species and grade tables for minimum requirements.
- All trees were graded using the segment system.
- Separate fixed plot cruise for all submerchantable material (5"to 10" DBH).

TREE HEIGHT:

All trees were measured to a fixed diameter outside bark. This height is usually taken as high up the bole as possible, where the cruiser can clearly see the bole, and the taper remains constant (usually 6 or 8 inches). The log segments are broken out and graded accordingly.

MINIMUM D.B.H:

10.0" DBH for sawlog volume. 5.0" DBH for submerchantable material.

DIAMETER STANDARDS:

1" diameter class

BTR:

Standard ratios were used. See attached species tables.

FORM FACTOR:

Form factor was measured or estimated at 16' for each tree. Each tree was assigned its own FF.

FORM POINT:

All trees were sighted at DBH.

VOLUME COMPUTATION:

All cruise data was input and run at the district on Atterbury's Super Ace program.

FINAL CRUISE RESULTS:

AREA	CV%	SE%	ACRES
Area 1	80	8.1	492

TIMBER DESCRIPTION

SAWLOG VOLUME:

This volume was obtained from the variable plot cruise. All material graded camprun. See grade table for minimum standards.

TOTAL SAWLOG VOLUME

SPECIES	Ave. DBH	Gross Vol/ Acre (bf)	Net Vol/ Acre (bf)	Net Sale Vol (mbf)
Ponderosa Pine	14.4	2,800	2,765	1,360
White Fir	16.5	1,849	1,846	908
Doug-Fir	19.2	783	783	385
Lodgepole Pine	16.2	89	87	42
	Total	5,521	5,481	2695

TOTAL NET SAWLOG VOLUME: 2,695 MBF

GREEN PULP VOLUME:

This volume was obtained from the fixed plot cruise (5.0" – 9.0" DBH).
All material was graded green pulp, see grade table for minimum standards.

TOTAL GREEN PULP VOLUME: ~ 65 MBF

TC PSTATS

PROJECT STATISTICS

PROJECT LBERT

DATE 12/20/2018

TWP	RGE	SC	TRACT	TYPE	ACRES	PLOTS	TREES	CuFt	BdFt
035	007	13	119	CUT2	492.00	63	241	1	E
035	007	13	334	CUT2					

	PLOTS	TREES	TREES PER PLOT	ESTIMATED TOTAL TREES	PERCENT SAMPLE TREES
TOTAL	63	241	3.8		
CRUISE	34	121	3.6	19,886	.6
DBH COUNT					
REFOREST					
COUNT	22	118	5.4		
BLANKS	7				
100 %					

STAND SUMMARY

	SAMPLE TREES	TREES /ACRE	AVG DBH	BOLE LEN	REL DEN	BASAL AREA	GROSS BF/AC	NET BF/AC	GROSS CF/AC	NET CF/AC
P PINE	79	27.8	14.4	43	8.3	31.5	2,800	2,765	657	657
WHITE F	33	9.6	16.5	49	3.5	14.3	1,849	1,846	405	405
DOUG-FIR	5	2.3	19.5	61	1.1	4.8	783	783	161	161
LP PINE	4	.7	16.2	47	0.2	1.0	89	87	24	24
TOTAL	*121*	*40.4*	*15.3*	*46*	*13.2*	*51.6*	*5,521*	*5,481*	*1,247*	*1,247*

CONFIDENCE LIMITS OF THE SAMPLE

68.1 TIMES OUT OF 100 THE VOLUME WILL BE WITHIN THE SAMPLE ERROR

CL 68.1	COEFF		**SAMPLE TREES - BF**			# OF TREES REQ.		INF. POP.
SD: 1.0	VAR.%	S.E.%	LOW	AVG	HIGH	5	10	15
P PINE	70.9	8.0	115	125	135			
WHITE F	76.5	13.3	224	259	293			
DOUG-FIR	20.3	10.1	308	342	376			
LP PINE	31.6	18.1	109	133	156			
TOTAL	*83.9*	*7.6*	*158*	*171*	*184*	*281*	*70*	*31*

CL 68.1	COEFF		**SAMPLE TREES - CF**			# OF TREES REQ.		INF. POP.
SD: 1.0	VAR.%	S.E.%	LOW	AVG	HIGH	5	10	15
P PINE	58.6	6.6	27	29	31			
WHITE F	63.4	11.0	48	54	60			
DOUG-FIR	14.4	7.2	65	70	75			
LP PINE	17.4	9.9	33	36	40			
TOTAL	*68.9*	*6.3*	*36*	*38*	*40*	*190*	*47*	*21*

CL 68.1	COEFF		**TREES/ACRE**			# OF PLOTS REQ.		INF. POP.
SD: 1.0	VAR.%	S.E.%	LOW	AVG	HIGH	5	10	15
P PINE	124.0	15.6	23	28	32			
WHITE F	192.0	24.2	7	10	12			
DOUG-FIR	329.2	41.4	1	2	3			
LP PINE	562.1	70.8	0	1	1			
TOTAL	*94.0*	*11.8*	*36*	*40*	*45*	*353*	*88*	*39*

CL 68.1	COEFF		**BASAL AREA/ACRE**			# OF PLOTS REQ.		INF. POP.
SD: 1.0	VAR.%	S.E.%	LOW	AVG	HIGH	5	10	15
P PINE	119.1	15.0	27	31	36			
WHITE F	181.5	22.8	11	14	18			
DOUG-FIR	329.0	41.4	3	5	7			
LP PINE	556.7	70.1	0	1	2			
TOTAL	*88.4*	*11.1*	*46*	*52*	*57*	*312*	*78*	*35*

CL 68.1	COEFF		**NET BF/ACRE**			# OF PLOTS REQ.		INF. POP.
SD: 1.0	VAR.%	S.E.%	LOW	AVG	HIGH	5	10	15
P PINE	122.5	15.4	2,338	2,765	3,191			
WHITE F	183.8	23.1	1,419	1,846	2,273			
DOUG-FIR	331.3	41.7	457	783	1,110			

TC PSTATS

PROJECT STATISTICS

PROJECT LBERT

DATE 12/20/2018

TWP	RGE	SC	TRACT	TYPE	ACRES	PLOTS	TREES	CuFt	BdFt
035	007	13	119	CUT2	492.00	63	241	1	E
035	007	13	334	CUT2					

CL 68.1 SD: 1.00

NET BF/ACRE

	COEFF VAR.	S.E.%	LOW	AVG	HIGH	# OF PLOTS REQ. 5	10	INF. POP. 15
LP PINE	556.7	70.1	26	87	148			
TOTAL	*95.3*	*12.0*	*4,823*	*5,481*	*6,138*	*363*	*91*	*40*

CL 68.1 SD: 1.0

NET CUFT FT/ACRE

	COEFF VAR.%	S.E.%	LOW	AVG	HIGH	# OF PLOTS REQ. 5	10	INF. POP. 15
P PINE	119.7	15.1	558	657	756			
WHITE F	183.8	23.1	311	405	499			
DOUG-FIR	330.2	41.6	94	161	228			
LP PINE	557.3	70.2	7	24	41			
TOTAL	*91.9*	*11.6*	*1,103*	*1,247*	*1,392*	*338*	*84*	*38*

TC PSPCSTGR

Species, Sort Grade - Board Foot Volumes (Project)

T035 R007 S13 TyCUT2 153.00
T035 R007 S13 TyCUT2 339.00

Project: **LBERT**
Acres **492.00**

Page **1**
Date **12/20/2018**
Time **7:41:20AM**

Spp	S T	So Gr rt ad	% Net BdFt	Bd. Ft. per Acre Def%	Gross	Net	Total Net MBF	Percent of Net Board Foot Volume: Log Scale Dia. 4-5	6-11	12-16	17+	Log Length 12-20	21-30	31-35	36-99	Average Log: Ln Ft	Dia In	Bd Ft	CF/ Lf	Logs Per /Acre
PP		CR CR	97	1.3	2,742	2,707	1,332		83	17		9	11	80		28	8	85	0.71	31.9
PP		CR GP	3		58	58	28	19	81			81	19			14	4	10	0.24	5.8
PP Totals			50	1.3	2,800	2,765	1,360	0	83	17		11	11	78		26	8	73	0.67	37.7
WF		CR CR	100	.2	1,849	1,846	908		41	50	10	3	9	88		30	10	145	1.05	12.8
WF Totals			34	.2	1,849	1,846	908		41	50	10	3	9	88		30	10	145	1.05	12.8
DF		CR CR	100		783	783	385		23	77		2	7	91		31	11	169	1.14	4.6
DF Totals			14		783	783	385		23	77		2	7	91		31	11	169	1.14	4.6
LP		CR CR	100	2.1	89	87	43		100			4		96		30	8	101	0.92	.9
LP Totals			2	2.1	89	87	43		100			4		96		30	8	101	0.92	.9
Totals				0.7	5,521	5,481	2,696	0	60	36	3	7	10	84		27	8	98	0.81	55.9

TC PSTNDSUM

Stand Table Summary

Page 1
Date: 12/20/2018

T035 R007 S13 TyCUT2 153.00
T035 R007 S13 TyCUT2 339.00

Project LBERT
Acres 492.00

Time: 7:42:18AM
Grown Year:

Spc	S T	DBH	Sample Trees	FF 16'	Tot Av Ht	Trees/ Acre	BA/ Acre	Logs Acre	Average Log Net Cu.Ft.	Average Log Net Bd.Ft.	Net Tons/ Acre	Net Cu.Ft. Acre	Net Bd.Ft. Acre	Totals Tons	Totals Cunits	Totals MBF
PP		9	2	81	31	1.998	.80	2.93	3.0	10.0	.30	9	29	147	44	14
PP		10	3	80	30	2.089	1.16	2.91	4.6	16.6	.43	13	48	213	66	24
PP		11	2	82	37	1.142	.73	1.74	5.9	16.3	.33	10	28	161	50	14
PP		12	6	82	44	2.762	2.20	2.76	10.2	31.7	.89	28	88	437	139	43
PP		13	5	82	75	2.258	2.03	2.74	15.3	59.9	1.31	42	164	644	206	81
PP		14	16	83	64	5.823	6.25	6.24	17.9	73.7	3.44	112	460	1,695	551	226
PP		15	9	83	66	2.989	3.62	3.33	21.7	86.2	2.20	72	287	1,084	355	141
PP		16	8	82	74	2.412	3.32	3.98	20.1	85.9	2.42	80	342	1,191	393	168
PP		17	12	82	76	2.977	4.72	4.97	22.9	97.5	3.42	114	485	1,683	561	239
PP		18	5	85	76	1.159	2.03	1.86	25.4	114.5	1.41	47	212	693	232	104
PP		19	5	85	77	1.082	2.09	1.94	26.8	118.5	1.54	52	229	757	255	113
PP		20	5	86	93	.965	2.09	1.93	33.6	171.7	1.91	65	331	941	319	163
PP		21	1	83	88	.188	.43	.38	33.0	160.0	.37	12	60	180	61	30
PP		Totals	79	83	61	27.846	31.47	37.71	17.4	73.3	19.97	657	2,765	9,826	3,232	1,360
WF		11	1	78	59	.852	.57	.85	16.0	50.0	.43	14	43	214	67	21
WF		12	2	81	35	1.014	.76	1.01	10.5	30.0	.34	11	30	165	52	15
WF		13	2	82	54	1.262	1.15	1.26	20.0	70.0	.79	25	88	387	124	43
WF		15	5	82	55	2.042	2.48	2.04	27.3	113.3	1.70	56	231	838	275	114
WF		16	4	79	62	.819	1.15	.82	35.2	144.8	.87	29	119	428	142	58
WF		17	2	81	69	.251	.38	.37	29.5	130.8	.33	11	49	163	54	24
WF		18	1	84	63	.317	.57	.63	28.0	115.0	.53	18	73	260	87	36
WF		19	6	85	76	1.152	2.29	2.21	34.5	168.2	2.26	76	371	1,110	375	183
WF		20	4	87	79	.872	1.91	1.74	38.2	185.8	1.96	67	324	967	328	159
WF		22	2	80	72	.422	1.15	.63	42.7	220.0	.79	27	139	388	133	69
WF		23	2	80	79	.260	.76	.52	49.1	215.1	.74	26	112	365	125	55
WF		24	1	83	99	.182	.57	.36	63.0	345.0	.67	23	126	328	113	62
WF		27	1	85	95	.145	.57	.29	82.0	485.0	.68	24	141	336	117	69
WF		Totals	33	82	62	9.589	14.32	12.75	31.8	144.7	12.09	405	1,846	5,950	1,992	908
DF		18	1	83	72	.521	.96	1.04	27.0	120.0	.84	28	125	412	138	62
DF		19	1	84	104	.469	.96	.94	38.0	190.0	1.05	36	178	518	175	88
DF		20	2	85	87	.918	1.92	1.84	36.3	182.5	1.97	67	335	968	327	165
DF		21	1	84	80	.404	.96	.81	38.5	180.0	.91	31	145	449	153	72
DF		Totals	5	84	86	2.311	4.81	4.62	34.9	169.5	4.77	161	783	2,348	794	385
LP		15	2	82	57	.382	.48	.57	22.1	76.5	.38	13	43	188	62	21
LP		17	1	81	59	.151	.24	.15	38.0	150.0	.17	6	23	85	28	11
LP		18	1	80	59	.139	.24	.14	41.0	150.0	.17	6	21	84	28	10
LP		Totals	4	81	58	.672	.96	.86	28.0	101.4	.72	24	87	356	118	43
Totals			121	82	63	40.419	51.55	55.94	22.3	98.0	37.56	1,247	5,481	18,480	6,136	2,696

TC PLOGSTVB

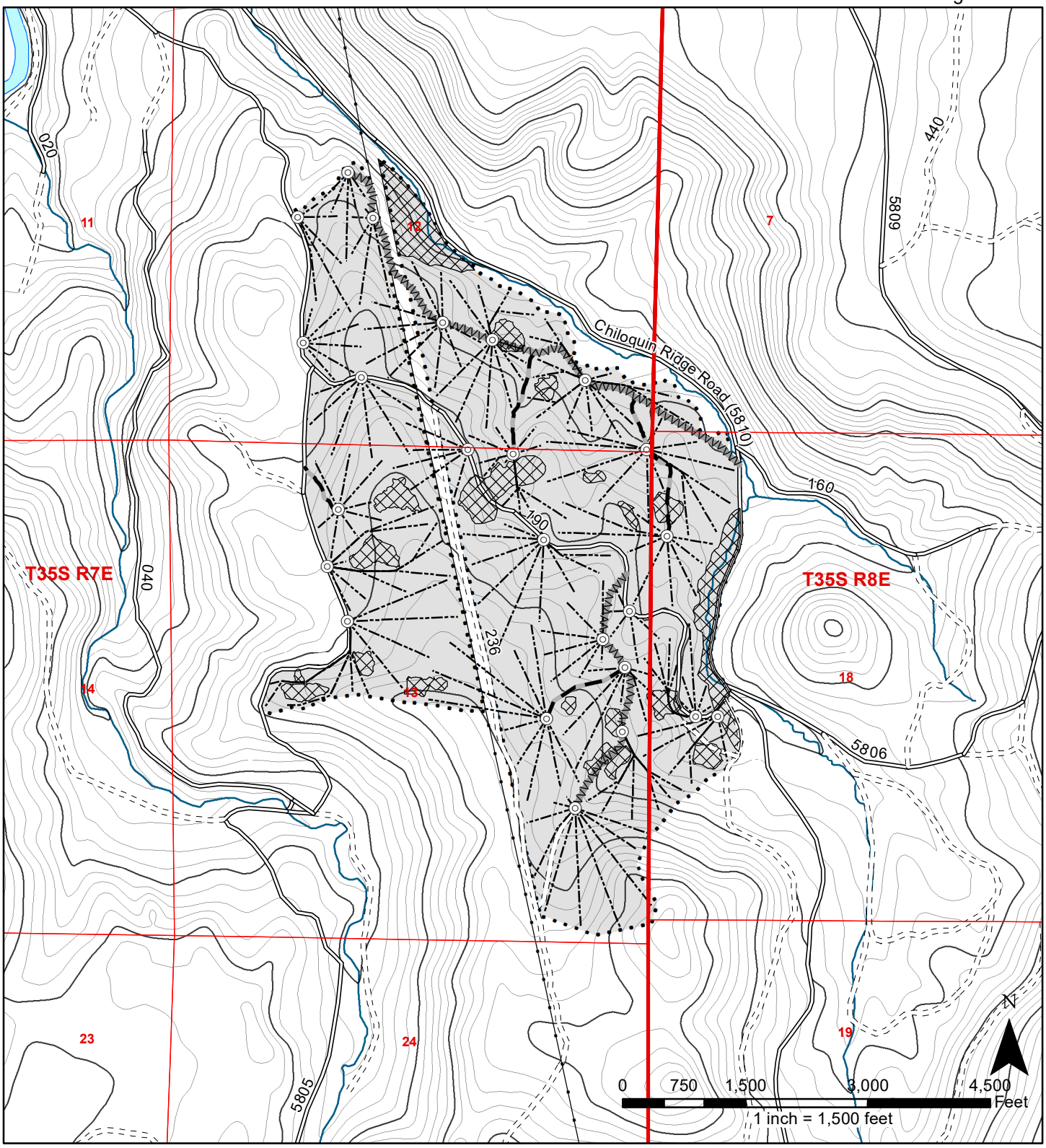
Log Stock Table - MBF

T035 R007 S13 TyCUT2 153.00
T035 R007 S13 TyCUT2 339.00

Project: LBERT
Acres 492.00

Date 12/20/2018
Time 7:40:34AM

Spp	ST	Sort	Grade	Log Len	Gross MBF	Def %	Net MBF	% Spc	Net Volume by Scaling Diameter in Inches 2-3	4-5	6-7	8-9	10-11	12-13	14-15	16-19	20-23	24-29	30-39	40+
PP		CR	CR	17	128	5.0	121	8.9			62	36	6	8	9					
PP		CR	CR	26	145		144	10.6			88	41		15						
PP		CR	CR	34	1,062		1,052	77.3			120	366	370	170	27					
PP		CR	CR	35	15		15	1.1				15								
PP		CR	GP	13	9		9	.7			9									
PP		CR	GP	14	14		14	1.0			14									
PP		CR	GP	21	5		5	.4	5											
PP		Totals			1,377	1.3	1,360	50.4	5		293	458	375	192	36					
WF		CR	CR	17	27		27	3.0			7	13	7							
WF		CR	CR	26	85		85	9.4			13	52	20							
WF		CR	CR	34	797		796	87.6			64	100	91	206	246	40	47			
WF		Totals			910		908	33.7			84	165	118	206	246	40	47			
DF		CR	CR	17	8		8	2.0				8								
DF		CR	CR	26	25		25	6.5			11	14								
DF		CR	CR	34	353		353	91.5				57		172	123					
DF		Totals			385		385	14.3			11	79		172	123					
LP		CR	CR	17	2		2	4.3			2									
LP		CR	CR	34	42	2.2	41	95.7			7		34							
LP		Totals			44	2.1	43	1.6			9		34							
Total		All Species			2,716		2,696	100.0	5		398	702	528	571	406	40	47			



LOGGING PLAN

Of Timber Sale Contract
KL-341-2019-GF8017-01
Fir Lo
Section(s) 7, 18, 19, T35S, R8E, Section(s) 12, 13, T35S, R7E,Willamette Meridian,
Klamath County, Oregon
543 gross acres
492 net acres

"STEWARDSHIP IN FORESTRY"

- **Fir Lo Timber Sale**
- Exclusions
- Project Points
- Electric Transmission Lines
- Road Construction
- Landings
- Paved Road
- All weather
- Dirt Road
- Road Improvement
- Skid Trails

Created: 01/29/2019, KLD GIS