Report



Date May 31, 2019 File: 5650-20

To Forest Advisory Committee

From Shaun Mason, Municipal Forester Endorsed:

Subject 2018 Annual Report

Harvesting Summary

Total Area = 25.1ha

Total Volume = $11,562 \text{ m}^3$

Logging cost = $$382,632 = $33.1/ \text{ m}^3$

Gross Log sales = $$1,363,680 = $118/ \text{ m}^3$

Net Revenue = $$977,148 \text{ or } $85/\text{m}^3$

Log Sales Summary

Domestic sales = $4,895 \text{ m}^3 (42\%)$ Export sales = $6,667 \text{ m}^3 (58\%)$

Planting

Costs \$ 35,997 Budget \$ 59,000

In spring 2018, 37.7ha were planted with 34,310 seedling. The total cost for each tree planted was \$1.20/tree. Seedling costs were \$0.51/tree and planting costs were \$0.69/tree

Accomplishments:

Douglas-fir	29,540	86%
Western White Pine	2,770	8%
Western Red Cedar	2,000	6%

Tea-bag fertilizer application at time of planting = 27,970

Plantskydd (browse deterrent) was applied to the Douglas Fir seedlings prior to planting with a cost of $\sim 0.01/\text{tree}$.

The Municipality has planted 2,165,104 seedlings since the start of its silviculture program in 1982 and harvested 1517ha – all of which has been replanted.

Road Construction and Maintenance

Costs \$155,687 Budget \$235,000

- Constructed ~1.6km of new road to facilitate harvesting
- Culvert and ditch cleaning and road grading/repair on Mount Prevost
- Road right of way manual brushing on Mount Richards Mainline

Site Preparation

Costs \$0 Budget \$ 12,000

The 2018 Hazard Abatement program consisted of 25 piles that were burnt successfully on Mount Prevost November 15, 2018. There were no costs associated with the burning as it was completed by staff and FAC volunteer, Eric Jeklin.

Fire Protection

Costs \$ 129,544 Budget \$ 19,000

- Wildfire on Maple Mountain on August 8 that was 5.9ha in size. Total MNC cost was \$122,314 and the estimated BCWF cost of \$210,000.
- An additional 1,200' of fire hose was purchased to replenish supply.
- De-brief with Fire Chiefs, MNC staff and BCWS rep was conducted Nov 19, 2018.
- The Mount Prevost, Sicker and Grace Road gates were closed July 17 and re-opened Sept 10.

Integrated Resource Management

Costs \$ 0 Budget \$ 15,000

Integrated Resource Management: the term is used to describe the management of the Municipal Forest Reserve for other uses, including recreation, wildlife, viewscapes, and biodiversity.

Silviculture

				YTD	Budget
Plantation Brushing	Mechanical			\$ 21,146*	\$ 21,000
	Awarded	56.2	ha		
Plantation Brushing	Herbicide	0	ha	\$ 0	\$ 18,000
Invasive Species	Brushing	N/A**		\$ 0	\$ 15,000
White Pine Pruning		2,664	trees	\$ 5,978	\$ 20,000

*A portion of the planation brushing cost is a carry over from an awarded brushing tender from 2017 that was not completed.

** Forestry summer student and staff cut/pulled Scotch Broom along the Stoney Hill right-of-ways and pulled Tansy Ragwort along various rights-of-way throughout the MFR.

Tree Protection

Costs \$ 27,769 Budget \$ 34,000

- Removed 8,996 browse protectors (\$1.71/tree)
- Installed 3,385 browse protectors (\$1.75/tree)
- Purchased 5,000 stakes

Community Relations

- Annual high school scholarship and bursary winners chosen \$2,400 total awarded.
- Annual high school woodworking contest winners chosen \$950 in prizes awarded. Total of 10 students entered their magazine rack projects into contest.
- Annual firewood donations delivered. The 2018 recipients were Chemainus Rod and Gun Club and Maple Bay Rowing Club.
- Kaspa parking lot expansion completed.
- 52 firewood permits sold to the public

The Forestry Department took part in the following tours:

Woods Tour May 25 Various environmental groups – Mount

Prevost and Maple Mountain

Nursery Tour August 30 Arbutus Grove Nursery

Recommendation

That the 2018 Annual Report be received for information.

Attachment(s): 3

Appendix A

2018 Harvesting Summary

Block	Area (ha)	Vol m³/ha	Total Vol m³	Net Profit \$/m³	Net Revenue	Logging Cost \$/m³	Logging Costs	Gross Revenue	Gross Revenue Per m³
P-122B	n/a	n/a	68	\$123.66	\$8,409	\$42.21	\$2,870	11,279	\$166
Kaspa Parking Lot	0.3	370	111	\$45.28	\$5,026	\$50.31	\$5,584	10,610	\$96
R-303A	0.3	401	116	\$75.66	\$8,794	\$28.99	\$3,370	12,164	\$105
R-352A ROW	0.3	445	133	\$75.81	\$10,113	\$29.00	\$3,868	13,981	\$105
R-402 ROW	0.4	485	194	\$65.25	\$12,668	\$29.00	\$5,630	18,298	\$94
Richards/Maple DT Removal	n/a	n/a	334	\$51.30	\$17,118	\$45.34	\$15,130	32,248	\$97
P-800A	6.6	509	3,359	\$94.42	\$317,164	\$32.00	\$107,488	424,652	\$126
P-906B	10.2	426	4,343	\$79.80	\$346,566	\$32.00	\$138,976	485,542	\$112
P-119* (YTD)	5.5	419	2,302	\$90.28	\$207,852	\$33.00	\$75,975	283,827	\$123
P-836* (YTD)	1.5	401	601	\$86.27	\$51,847	\$32.00	\$19,232	71,079	\$118
M-403 Fire Salvage**					-\$4,508		\$4,508		
Total	25.1	461	11,562	\$85	\$981,049	\$33.09	\$382,631	\$1,363,680	\$118

Average Completed Cutblock Size =

8.4ha

^{*}Estimated area completed in 2018
**Falling started for M-403 Fire Salvage in 2018

Appendix B

1987 To 2017 Harvesting Summary

			Volume			Net Revenue
	Year	На	m³	Volume/Ha	Net Revenue	\$/m³
1	1987	63.4	13,159	208	\$204,772	\$15.56
2	1988	73.9	18,602	252	\$354,256	\$19.04
3	1989	43.2	14,798	343	\$272,913	\$18.44
4	1990	36.1	10,969	304	\$254,831	\$23.23
5	1991	32.2	12,740	396	\$271,217	\$21.29
6	1992	63.3	12,935	204	\$289,102	\$22.35
7	1993	55.2	14,907	270	\$542,821	\$36.42
8	1994	58.6	16,160	276	\$692,414	\$42.85
9	1995	78	21,556	276	\$1,205,329	\$55.92
10	1996	48.7	14,427	296	\$639,017	\$44.29
11	1997	32.3	13,371	414	\$625,437	\$46.78
12	1998	30.2	12,085	400	\$444,933	\$36.82
13	1999	41	16,428	401	\$564,867	\$34.38
14	2000	35.9	13,378	373	\$564,778	\$42.22
15	2001	39.34	15,538	395	\$660,924	\$42.54
16	2002	39.9	13,880	348	\$580,631	\$41.83
17	2003	49.2	15,841	322	\$661,089	\$41.73
18	2004	64.47	19,126	297	\$773,940	\$40.47
19	2005	54.6	16,018	293	\$672,876	\$42.01
20	2006	53.4	17,518	328	\$792,562	\$45.24
21	2007	65.6	21,153	322	\$804,375	\$38.03
22	2008	39.5	13,703	347	\$619,866	\$45.24
23	2009	46.5	14,296	307	\$439,936	\$30.77
24	2010	42.1	16,418	390	\$451,287	\$27.49
25	2011	45.5	17,775	391	\$664,170	\$37.37
26	2012	42.7	17,142	401	\$618,045	\$36.05
27	2013	60.4	24,355	403	\$1,110,159	\$45.58
28	2014	51.7	20,226	391	\$1,063,196	\$52.57
29	2015	46.7	22,271	477	\$1,003,533	\$45.06
30	2016	36.6	17,268	472	\$1,020,010	\$59.07
31	2017	21.8	10,585	486	\$832,043	\$78.61
32	2018	25.1	11,562	461	\$977,787	\$84.57
	Total	1517.11	510,190	336	\$20,673,117	\$40.52
	Average	47.4	15,943	336	\$646,035	\$40.52

EΩ	roetru	Progran	a Drafit
гο	resirv	Prooran	n Prom

		Annual Forestry Profit Split As Follows:					
	Annual	General	Reserve	Forest Legacy		Land	
Annual Profit	Profit \$/m³	Revenues	Fund	Fund	Scholarship Fund	Purchases	Acres
-\$24,825	-\$1.89	\$0	-\$24,825	\$0		\$0	
\$115,885			\$115,885	\$0		\$0	
\$38,486		\$0	\$38,486	\$0		\$0	
\$48,571	\$4.43	\$0	\$48,571	\$0		\$0	
-\$12,370		\$0	-\$12,370	\$0		\$0	
\$67,231	\$5.20	\$45,000	\$22,231	\$0		\$0	
\$272,276	\$18.27	\$240,000	\$32,276	\$0		\$0	
\$275,880	\$17.07	\$250,000	\$25,880	\$0		\$0	
\$755,771	\$37.24	\$489,230	\$33,313	\$92,308		\$140,920	35 acres
\$131,057	\$9.08	\$65,000	\$51,057	\$15,000		\$0	
\$24,815	\$1.86	\$24,815	\$0	\$0		\$0	
\$47,420	\$3.92	\$0	\$37,935	\$9,485		\$0	
\$97,579	\$6.04	\$29,274	\$48,789	\$19,516			26 acres*
\$33,745	\$2.52	\$9,865	\$17,057	\$6,823		\$0	
\$111,851	\$7.20	\$100,666	\$11,185	\$0		\$0	
\$95,375	\$6.87	\$28,612	\$47,688	\$19,075		\$0	
\$94,484	\$5.96	\$52,162	\$22,273	\$18,609	\$1,440	\$0	
\$121,932	\$6.38	\$29,183	\$68,880	\$19,455	\$4,414	\$0	
\$29,901	\$1.87	\$14,951	\$0	\$14,950	\$0	\$0	
\$30,343	\$1.73	\$15,171	\$0	\$15,172	\$0	\$0	
\$65,344	\$3.09	\$0	\$65,344	\$0	\$0	\$0	
-\$20,393	-\$1.29	\$0	-\$20,393	\$0	\$0	\$0	
-\$119,382	-\$6.24	\$0	-\$119,382	\$0	\$0	\$0	
-\$137,409	-\$8.37	\$0	-\$137,409	\$0	\$0	\$0	
-\$55,879	-\$3.14	\$0	-\$55,879	\$0	\$0	\$0	
\$9,602	\$0.56	\$0	\$9,602	\$0	\$0	\$0	
\$435,606	\$17.89	\$130,682	\$217,803	\$87,121	\$601	\$0	
\$409,430	\$20.24	\$122,829	\$204,715	\$81,886	\$715	\$0	
\$359,381	\$16.14	\$239,381	\$0	\$120,000	\$803	\$0	
\$412,195	\$23.87	\$206,098	\$123,659	\$82,438		\$0	
\$130,165	\$12.30	\$39,049	\$65,082	\$26,033			
\$261,077	\$22.58	\$78,323	\$130,539	\$52,215			
\$4,105,144	\$8.05	\$2,210,291	\$937,453	\$627,871	\$7,973	\$140,920	61 Ac
\$128,286	\$8.05	\$69,072	\$29,295	\$19,621	\$249	\$4,404	

Summary 1987 to 2018

336 M³/Ha

\$13,627 /Ha

Net Revenue from the MFR 1987 to 2018

\$4,105,144 \$8.05 \$/M³

Profit distribution for 2018

\$78,323 to Forest Reserve Fund \$130,539 to Forest Legacy Fund \$52,215 to General Revenues

\$261,077 Total Profit

2018 Average 461 M³ / Ha

Appendix C

Statement of Operation and Reserve Balances December 31, 2018

	<u>-</u>	2018 Budget		Year to Date 1 to Dec 31, 2018
Revenue	2		2	
Log Sales	20,000m ³	1,800,000	11,562m ³	1,363,680
Cost of Sales				
Logging		600,000		382,631
Scaling		1,000		, -
Contract Engineering		30,000		34,630
Road Construction		165,000		142,552
Road Maintenance		70,000		13,135
Road Deactivation		5,000		-
Site Preparation		12,000		48
Planting		59,000		35,997
Brushing and Weeding		21,000		21,146
Brushing and Herbicides		18,000		-
Pruning		20,000		5,978
Tree Protection		34,000		27,769
		,		•
	· -	1,035,000		663,886
Gross Margin	43%	765,000	51%	699,794
Other Revenue		11,300		13,366
Rentals (Cell Towers)	·-	85,500		86,763
Expenses		861,800		799,923
Administration		417,370		339,196
Fire Protection		19,000		129,544
Security		15,000		4,913
Watershed Analysis		2,000		-,515
Tours		1,000		846
Integrated Resource Mgmt		15,000		-
Community Wild Fire Protection		-		_
Forestry contractor		10,000		1,800
Juvenile Spacing		-		-
Recreation Roads Maintenance		10,000		5,497
Scholarships		2,400		2,400
Grants in Aid		8,300		3,378
Invasive Species Control		15,000		-
Vehicles		31,850		47,227
Fire Truck		4,000		4,043
	-	.,,,,,	•	.,0 .0
	-	550,920		538,844
Net Income	=	310,880		261,079
Reserve Fund End of year 2018		1,489,934		1,489,934
Interest		30,000		33,314
Forestry profits 50%	-	155,440		130,540
Total	=	1,675,374		1,653,788