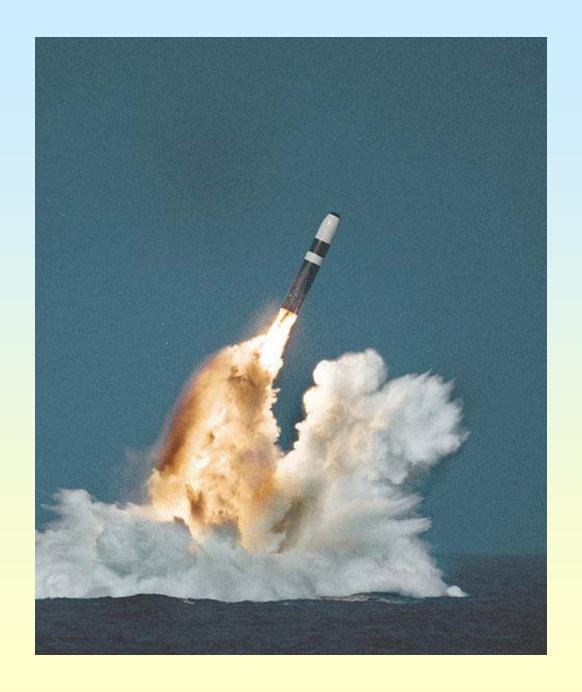
# Resistant white pine & Sitka spruce:

Missing Opportunities?



John N. King, Research Scientist, British Columbia Forest Service















# Kielder Forest, Northumberland



Continuous forest cover of nearly pure western white pine in northern Idaho, 1938 (USFS file photo).





P. sibirica, Teletskoe Lake, S. Goroshkevich



# Texada Island, Browse protection

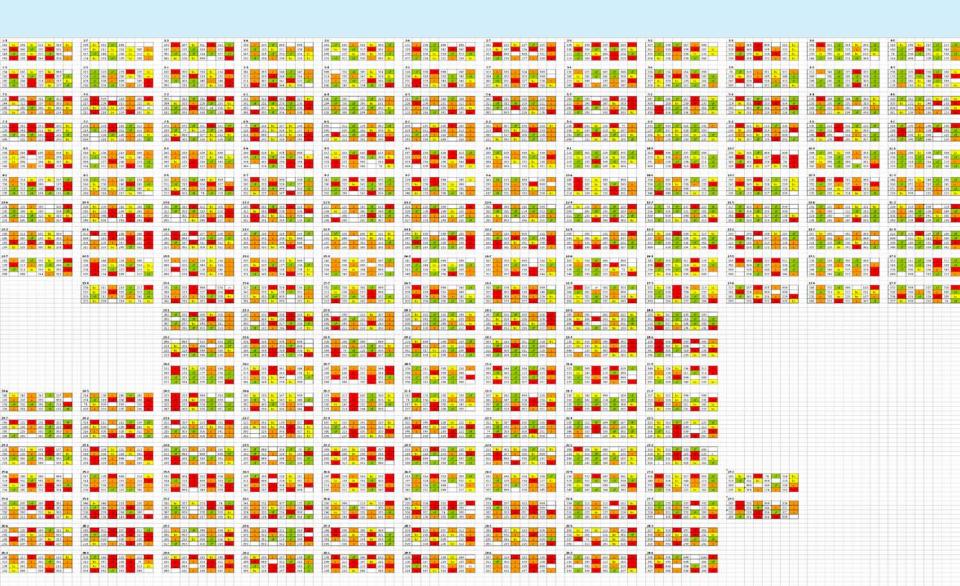


Woss, Block Trial Plantation

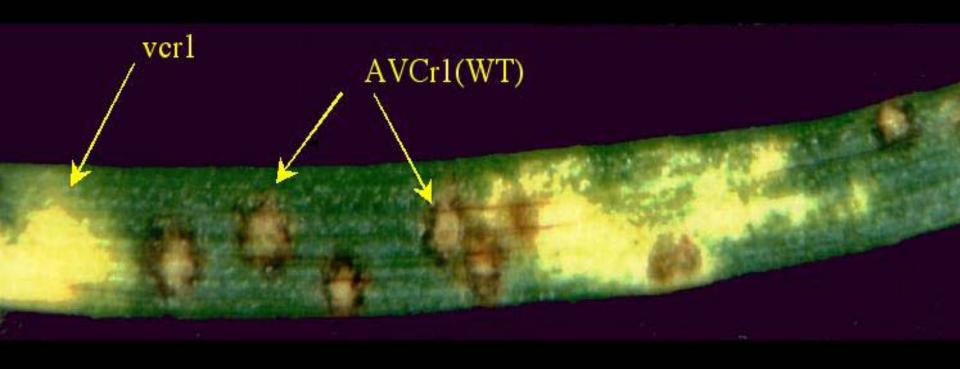




### Field resistance assessment in $F_1$ Trials



fa.m	TYPE	ORIGIN	_FREQ_	mclean	msur∨	sclean	ssurv	nobs
3	34 DDX	DIALLEL 80-4, ID# 9421723	29	90%	90%	26	26	29
3	800 DDX	DIALLEL 80-6, ID# 9421183	28		89%	24	25	28
3	803 DDX	DIALLEL 80-6, ID# 9421273	29	72%	90%	21	26	29
3	802 DDX	DIALLEL 80-6, ID# 9421251	28	71%	82%	20	23	28
3	801 DDX	DIALLEL 86-6, ID# 9421218	29	69%	72%	20	21	29
3	339 DDX	DIALLEL 80-3, ID# 9421735	25	68%	84%	17	21	25
3	313 DDX	DIALLEL 80-4, ID# 9421593	30	67%	87%	20	26	30
3	315 DDX	DIALLEL 80-2, ID# 9421595	28	61%	82%	17	23	28
3	342 DDX	DIALLEL 80-3, ID# 9421740	28	61%	82%	17	23	28
3	332 DDX	DIALLEL 80-4, ID# 9421721	30	60%	63%	18	19	30
3	807 DDX	DIALLEL 80-4, ID# 9421545	26	58%	65%	15	17	26
3	327 DDX	DIALLEL 80-2, ID# 9421624	28	57%	61%	16	17	28
1	06 Coast Parent	Parent tree 461 (coastal)	27	56%	74%	15	20	27
3	117 DDX	DIALLEL 80-2, ID# 9421597	27	56%	74%	15	20	27
3	33 DDX	DIALLEL 80-4, ID# 9421722	28	54%	54%	15	15	28
2	204 DF1	Parent trees 360X21079 Cross	25	52%	76%	13	19	25
	74		29	52%	79%	15	23	29
3	318 DDX	DIALLEL 80-2, ID# 9421608	29	52%	72%	15	21	29
3	331 DDX	DIALLEL 80-4, ID# 9421715	28	50%	50%	14	14	28
2	08 DF1	Parent trees 183X21095 Cross	27	48%	67%	13	18	27
3	808 DDX	DIALLEL 80-4, ID# 9421546	26	12%	38%	3	10	26
2	28 F1	Parent trees 126X137 Cross	27	11%	44%	3	12	27
	237 DF1	Parent trees 21142X145 Cross	28	11%	32%	3	9	28
2	213 F1	Parent trees 120X47 Cross	29	10%	24%	3	7	29
2	21 DF1	Parent trees 21145X640 Cross	29	10%	41%	3	12	29
3	38 DDX	DIALLEL 80-3, ID# 9421734	29	10%	31%	3	9	29
	344 DDX	DIALLEL 80-3, ID# 9421743	24		46%	2	11	24
	217 F1	Parent trees 239X640 Cross	25		40%	2	10	25
	31 F1	Parent trees 372X128 Cross	26		23%	1	6	26
	337 DDX	DIALLEL 80-3, ID# 9421733	26		31%	1	8	26
3	314 DDX	DIALLEL 80-4, ID# 9421594	28		36%	1	10	28
	239 Coast Parent	Parent tree 47 OP	29		31%	1	9	29
	236 DF1	Parent trees 21142X47 Cross	26		27%	0	7	26
3	805 DDX	DIALLEL 80-1, ID# 9421521	28	0%	29%	0	8	28



Dr Bohun Kinloch, jr, USDA Forest Service ret'd







# Sclereid cells strongly implicated in resistance







#### **Hemtic Lands**



## Difference in Land Tenure

❖Public land also – DNR – ODF

Requirements to provide revenue

# Experience with Swiss Needle Cast



# Dothistroma in Northwest



# **New Asian Markets**

White low figure wood

Metric dimensions

