

# Coastal Broadleaves (CB) CTAC budget meeting

***"COVID19 Conf Call" April 2, 2020***

Series 2 Red Alder, Dixon Rd, age 3

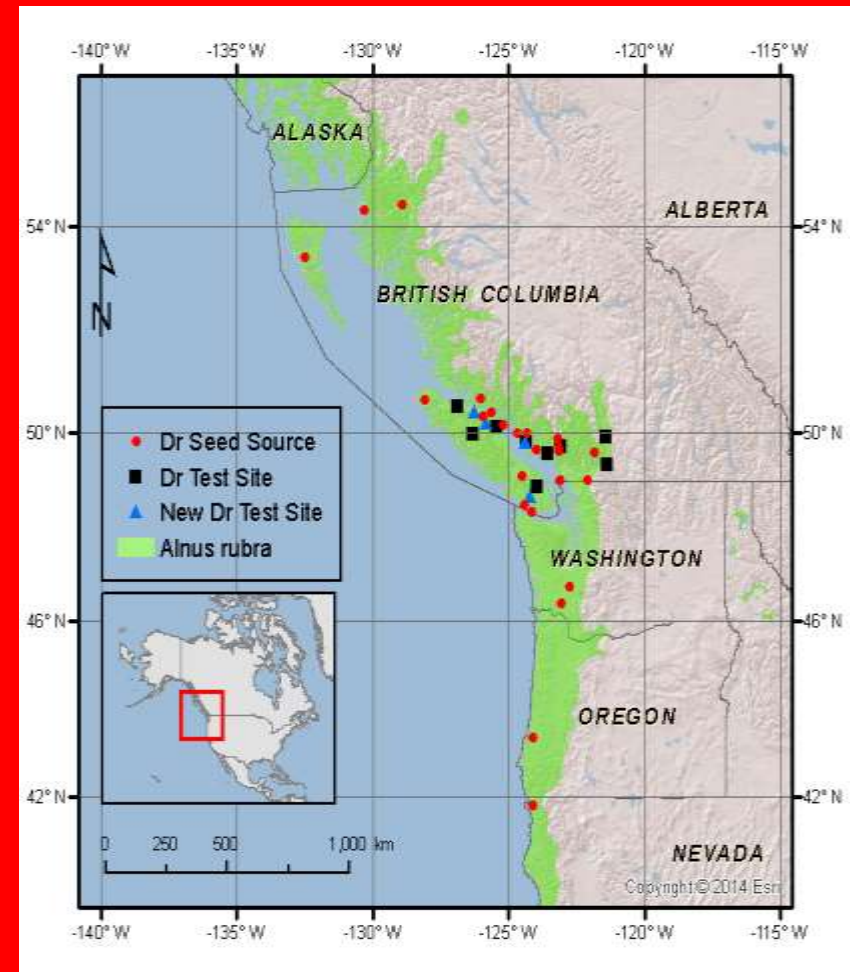


Powell River, Mb  
select tree, age 11



# Red Alder Phase III studies

- 210 OP families from 24 natural populations
- 32 CP families from clone bank
- 2 test series with a total of 13 sites, covering 6 BEC elevation range from 180-1200m
- A maximum of 105 trees per family tested
- Phase III, series 1 studies are for genecology information
- Phase III, series 2 to develop a new breeding population



- The 9 sites here are for series 1
- The 4 sites for series 2 (not shown) have elevation ranges from 180-350m

# Red Alder – prov trail (series I) and family trials (series II)

- Visited 2 Series I test sites;
  - Stoyoma (elev 1100m). Very high mortality. ‘Write off’ (now only 8 sites)
  - Wrey Ck (elev 1200m). Very good!
- All 8 sites will be measured for 6 year height this fall
- No work on Series II sites (4 sites where measure last year)



**Stoyoma Rd. near Hope**

## Overview of Stoyoma





- Tag 788 Stoyoma
- One of the 46% of the surviving trees at age 3; many more are dead now
- **No heritability for growth and survival at age 3**
- Most trees have been damaged by drought or cold

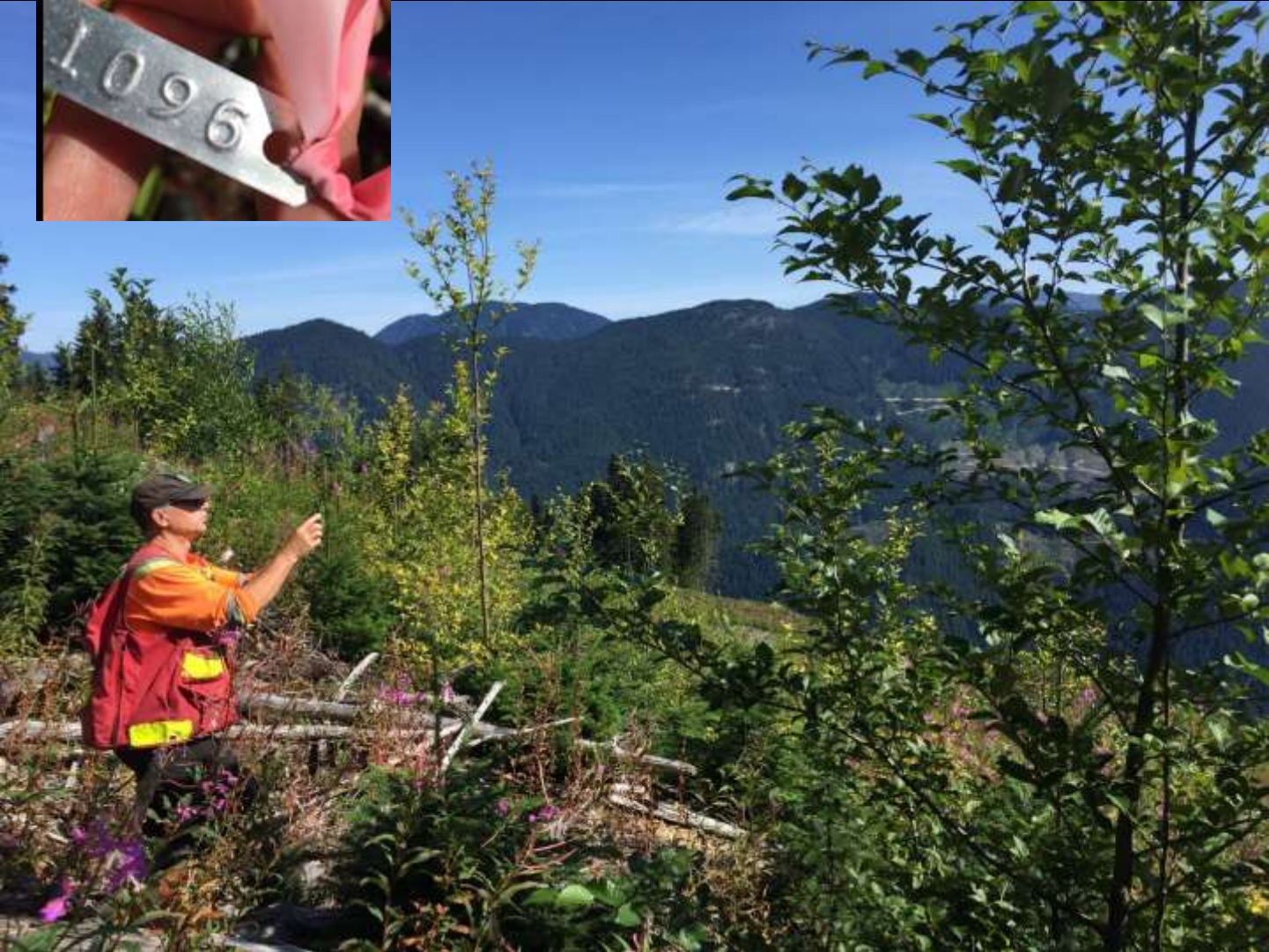


Two good trees;  
somewhere around  
the 2 tagged trees;  
problem is that  
they were growing  
on the spur road  
right in the middle  
of the test ☹️





- Wrey test site;
- about 66% survival but the trees looked good, if they survived the first year.
  - Quite a slope and most trees had snow press in the initial years.
  - At ~1200m, very good growth for the trees that made it through
  - **Good heritabilities for growth and survival on age 3 data**



Keith taking a picture of a good tree



# Red Alder

<b>2019-20 (this year)</b>	<b>\$</b>	<b>2020-21 (next)</b>	<b>\$</b>
- Maintenance	~5k*	- Measure 8 sites	30k
- Travel / materials	-2k	- Visit 4 sites (travel)	2k
- CLRS support	-10k	- CLRS support	4k
<b>Total</b>	<b>17k</b>	<b>Total</b>	<b>36k</b>

# Overall plan

- Waiting for 6 this year (fall measurements)
- Adjust CBST rules for red alder in 2022
- Make initial backwards/forward selections on the series 2 (~2022-23)
- Plan on clone bank establishment (5 year away) and a new seed orchard (2023)
- See what's eating the trees at Bowser (#409 clones)?
  - Selection for resistance to western budworm?

# Big leaf Maple

- Trees are 11 years old
- Brushing on 1 site this year (Skutz-heavy fern/blackberries brush)
- measured all 3 sites last fall for ht, dbh and form
- Full analysis this summer with Omnia Gamal!
- Goal is select ~80 -90 trees across all 3 sites
- We selected another 36 trees on Skutz this January
- For a total of 56 (the rest off Sayward test next year)
- Some problems with grafting 😞



**Grafting just done  
at CLRS last week!**

# Skutz Falls





# Skutz BV

sitename	tag	fam	prov	form	health	HT	DBH	HT.BV.%	DBH.BV.%	WVOL.BV.%	TVOL.BV.%
skutz	4719	293	21	1 dominant stem	no damage	640	45	<b>37</b>	<b>38</b>	<b>144</b>	<b>129</b>
skutz	242	293	21	1 dominant stem	no damage	970	101	36	45	139	123
skutz	35	86	9	1 dominant stem	no damage	940	75	36	24	82	74
skutz	4464	81	9	1 dominant stem	no damage	730	82	35	39	113	100
skutz	4529	293	21	1 dominant stem	no damage	660	68	34	44	141	126
skutz	3445	108	11	1 dominant stem	no damage	440	40	33	43	141	128
skutz	1467	293	21	1 dominant stem	no damage	400	35	33	37	130	117
skutz	4267	108	11	1 dominant stem	no damage	1160	163	33	65	155	136
skutz	2738	108	11	1 dominant stem	no damage	370	25	32	36	112	102
skutz	4184	293	21	1 dominant stem	no damage	620	48	32	36	120	108
skutz	3937	293	21	1 dominant stem	no damage	540	48	31	39	134	120
skutz	1897	293	21	1 dominant stem	no damage	560	51	31	35	115	104
skutz	2455	51	5	1 dominant stem	no damage	420	30	31	22	86	78
skutz	1733	86	9	1 dominant stem	no damage	560	65	31	32	102	91
skutz	1971	470	32	1 dominant stem	no damage	490	32	31	14	71	66
skutz	191	81	9	1 dominant stem	no damage	880	80	31	25	65	58
skutz	3483	86	9	1 dominant stem	no damage	350	20	31	23	87	80

# Big leaf Maple

2019-20 (last year)		2020-21	
- Station support	-10k	- Station support (grafting)	6K
- Travel	-3k	- Travel (scion collection)	3k
- Fence removal (if in time)	-7.5k	- Fence removal	10k*
- Measurements	-17.5k		
- Maintenance	-7.2		
<b>Total</b>	<b>45.2k</b>	<b>Total</b>	<b>20k</b>

\* Quote was 13.5k last year (might be possible)

# Overall plan

- Full spatial analysis allowed to increase h2 by ~0.1-0.2!
- Fence removal at Powell River will be required
- Grafting for the Powell River selections, didn't go too well (30% survival); might have to go there again
- Hoping for good success with grafting from the scions we got from Skutz Falls this Feb.
- Clone bank / seed orchard at Puckle Rd sometime soon! (*with gobs of maple sugar production down the road* 😊)



# Black Cottonwood

- Re-rooted 25 clones at Puckle Rd.
- CLRS support budgeted with Mb and Dr budget

