PROJECT STATUS

Emergency Communication System Upgrade (ECSU)

C800 Project Leader: John Hartsock

WCCCA Project Leader: Ron Polluconi

Project Manager: Ken Seymour – WCCCA/C800 Contractor

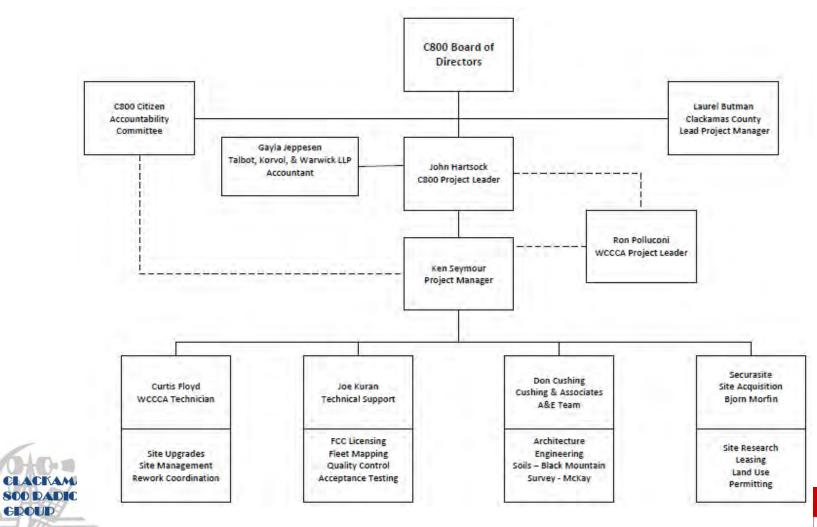
Date: January 11, 2017





C800 ECSU Project Team

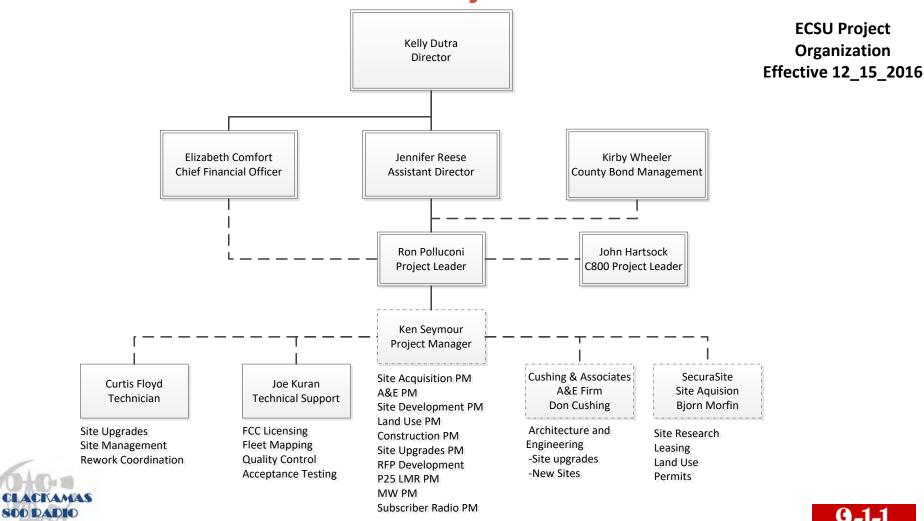
GROUD





WCCCA ECSU Project Team

GROUP





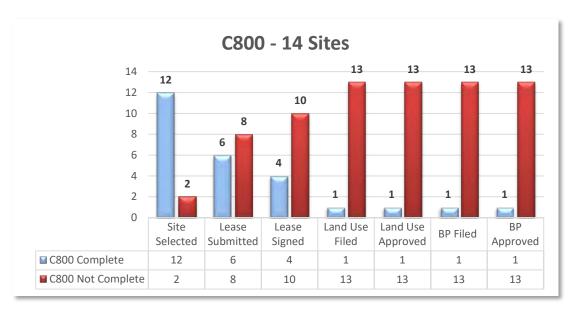
Project Status Summary

| | C800 | WCCCA | | | | |
|--|--|--|--|--|--|--|
| Design: | Project Manager on board in December A&E and Site Acquisition Teams are engaged in Land Acquisition, Land Use and Permitting (44% complete overall) | | | | | |
| Construction | Sawtell 95% complete (C800) Bidding Shelters and Towers, ITB published week of January 16, 2017 | | | | | |
| LMR (Land Mobile Radio) System Procurement | WCCCA Board approved purchasing rules change authorizing spending limits for the Director. 1/5/2017 Plan to publish RFQ the week of January 16, 2017 | | | | | |
| Existing Site Upgrades | Tower Mapping draft work completed on 7 of 11 sites | SOW and process flow began to provide vendors clear direction for both WCCCA & C800 | | | | |





Site Acquisition Status – C800

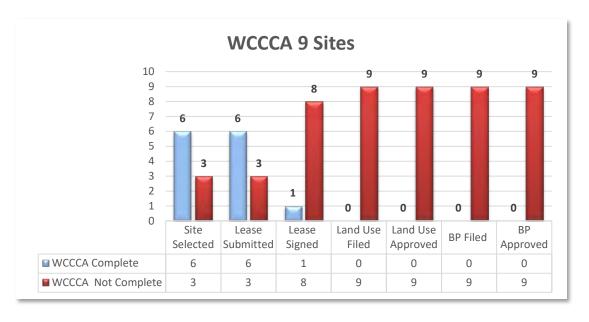


- Tracking 7 major milestones as noted above in chart
- 13 sites are in progress out of 14 Total
- 4 sites are USFS / 2 BLM awaiting agency direction
- 4 sites have leases signed 2 in negotiation. USFS and BLM pending environmentals in spring of 2017.
- Drone study completed on Wilsonville candidate to validate tree height and microwave paths
- Lease is close to being signed for Damascus site
- Skyland, Lake Oswego (L.O.) site on hold pending City of L.O. direction on Cooks Butte as an alternate site





Site Acquisition Status - WCCCA



- Tracking 7 major milestones as noted above in chart
- 9 sites are in progress
- Site walk completed on Tigard (Sunrise). January 10th
- Lease is close to being signed on Hayward site
- Hwy 26 Tunnel site negotiating lease terms with potential LL





Project Schedule



- New Site Design & Construction complete: August 2018
- Existing Sites Upgrade complete: June 2018
- System Operational Date: Late December 2018





C800 Radio System Upgrade Budget (1)

Project: Date Original: C800 Radio System Upgrade 10/1/2015 Date Updated: Dec 30,2016

Project Manager: Ken Seymour

| Item | Budget | Original Encumbrance | Additional Encumbrance / Change Order | Estimate to Complete | Percent Complete | Estimated Total | (Over) Under Budget | Expended |
|--|------------|-------------------------|--|-------------------------|---------------------|--------------------|------------------------|------------|
| Soft Cost | | | | | | | | |
| Site Acquisition Consulting - Quest | 60,000 | 30,000 | 40,000 | 0 | 95.81% | 70,000 | (10,000) | 67,069.81 |
| Site Acquisition Consulting / Permits - Securasite | 270,000 | 268,500 | | 1,500 | 41.48% | 270,000 | 0 | 111,999.02 |
| Site Planning - Cushing | 400,000 | 317,178 | | 80,000 | 56.64% | 397,178 | 2,822 | 224,943.26 |
| Geotechnical / Environmental Consulting - Black Mtn | 200,000 | 89,100 | | 100,000 | 34.69% | 189,100 | 10,900 | 65,600.00 |
| Survey - McKay | 75,000 | 50,160 | | 20,000 | 43.64% | 70,160 | 4,840 | 30,620.00 |
| USFS Land Use Fees | 10,000 | | | 10,000 | 0.00% | 10,000 | 0 | 0.00 |
| Land Use Fees | 25,000 | 268 | | 20,000 | 1.32% | 20,268 | 4,732 | 268.00 |
| Plan Check / Permit Cost | 60,000 | | | 60,000 | 4.62% | 60,000 | 0 | 2,769.56 |
| Printing | 2,500 | | - | 2,500 | 0.00% | 2,500 | 0 | 0.00 |
| Bid Advertising | 3,500 | | | 3,500 | 0.00% | 3,500 | 0 | 0.00 |
| Materials Testing & Inspection | 40,000 | | 1 | 40,000 | 2.81% | 40,000 | 0 | 1,123.75 |
| Project Management | 300,000 | 279,000 | 1 | 20,000 | 0.00% | 299,000 | 1,000 | 0,00 |
| Legal Fees | 30,000 | 12,000 | | 18,000 | 21.92% | 30,000 | . 0 | 6,575.00 |
| Licensing | 20,000 | | | 20,000 | 0.00% | 20,000 | 0 | 0.00 |
| Miscellaneous | 10,000 | 700 | | 9,000 | 24.74% | 9,700 | 300 | 2,400.00 |
| Sub-Total Soft Cost | 1,506,000 | 1,046,906 | 40,000 | 404,500 | 34.42% | 1,491,406 | 14,594 | 513,368 |
| Construction Cost | | | | | | | | |
| Site Construction | 9,200,000 | 320,339 | - 1 | 8,879,661 | 2.55% | 9,200,000 | 0 | 234,975.82 |
| Generator | 5,800,000 | | | 5,800,000 | 0.00% | 5,800,000 | 0 | 0.00 |
| 48VDC | 1,065,000 | | | 1,065,000 | 0.00% | 1,065,000 | 0 | 0.00 |
| Lake Oswego Antenna | 18,000 | 17,500 | 0 | 0 | 100.07% | 17,500 | 500 | 17,511.75 |
| Existing Sites | 100,000 | 6,400 | | 93,600 | 6.40% | 100,000 | 0 | 6,400.00 |
| Sub-Total Construction Cost | 16,183,000 | 344,239 | 0 | 15,838,261 | 1.60% | 16,182,500 | 500 | 258,887.57 |

C800 Radio System Upgrade Budget (2)

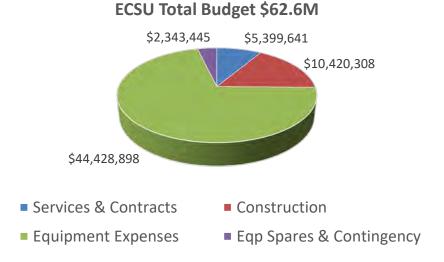
Project: C800 Radio System Upgrade
Date Original: 10/1/2015 Date Updated: Dec 30,2016

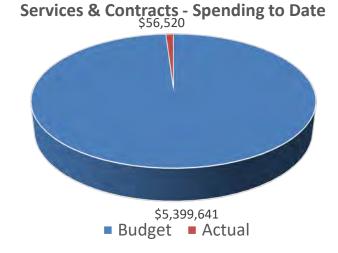
Project Manager: Ken Seymour

| Item | Budget | Original Encumbrance | Additional Encumbrance / Change Order | Estimate to Complete | Percent Complete | Estimated Total | (Over) Under Budget | Expended |
|--------------------------|------------|-------------------------|--|-------------------------|---------------------|--------------------|------------------------|--------------|
| Equipment Costs | | | | | | | | |
| Simulcast Equipment | 14,928,000 | | | 14,928,000 | 0.00% | 14,928,000 | 0 | 0.00 |
| Master Site Equipment | 3,534,000 | | | 3,534,000 | 0.00% | 3,534,000 | 0 | 0.00 |
| Console | 1,650,000 | | | 1,650,000 | 0.00% | 1,650,000 | 0 | 0.00 |
| Back up Dispatch | 426,000 | | | 426,000 | 0.00% | 426,000 | 0 | 0.00 |
| Spares | 1,200,000 | | | 1,200,000 | 0.00% | 1,200,000 | 0 | 0.00 |
| Paging | 373,000 | | | 373,000 | 0.00% | 373,000 | 0 | 0.00 |
| Subscriber Radios | 5,000,000 | 1,515,649 | | 3,484,351 | 39.39% | 5,000,000 | 0 | 1,969,352.00 |
| Unified Push to Talk | 188,000 | | | 188,000 | 0.00% | 188,000 | 0 | 0.00 |
| Asset Management | 119,000 | | | 119,000 | 0.00% | 119,000 | 0 | 0.00 |
| Post Warranty | 3,100,000 | | | 3,100,000 | 0.00% | 3,100,000 | 0 | 0.00 |
| System Refresh / Upgrade | 2,700,000 | | | 2,700,000 | 0.00% | 2,700,000 | 0 | 0.00 |
| Test Equipment | 100,000 | | | 100,000 | 0.00% | 100,000 | 0 | 0.00 |
| Microwave | 3,368,000 | 406,169 | | 2,961,831 | 11.59% | 3,368,000 | 0 | 390,406.05 |
| Security System | 1,364,000 | | | 1,364,000 | 0.08% | 1,364,000 | 0 | 1,079.96 |
| Subtotal Equipment Costs | 38,050,000 | 1,921,818 | 0 | 36,128,182 | 6.20% | 38,050,000 | 0 | 2,360,838 |
| Bond Cost | 300,000 | 290,372 | | 0 | 100.00% | 290,372 | 9,628 | 290,372 |
| | | | | | | | | |
| Subtotal Project Cost | 56,039,000 | 3,603,335 | 40,000 | 52,370,943 | 6.11% | 56,014,278 | 24,722 | 3,423,466 |
| Contingency | 2,961,661 | | | 2,961,661 | 0.00% | 2,961,661 | 0 | |
| Total Project Cost | 59,000,661 | 3,603,335 | 40,000 | 55,332,604 | 5.80% | 58,975,939 | 24,722 | 3,423,465.78 |

WCCCA Radio System Upgrade Budget

• Services & Contracts
category is the only one to
date with appreciable
Capital Outlay









Q1'17 Quarterly Outlook

| | | | C800 | WCCCA | | | |
|---|--|---|---|-------------------------------------|--|--|--|
| • | Release Invitation to Bid (ITB's) on the following projects: | • | Shelters (Advertise January 18) (Award March 8) | | | | |
| • | Release ITB's for construction on the following New Site Builds (NSB's) | • | Sandy, Canby, Wilsonville (Develop Bid Documents March 31) | | | | |
| • | Existing Site & Building Upgrades | • | Tower Mapping of Existing Sites (February) Site Audits continuing (February - March) | | | | |
| • | Land Use & Permits | | | Round Top AC power upgrades (March) | | | |





Appendix A New Site Build (NSB) List

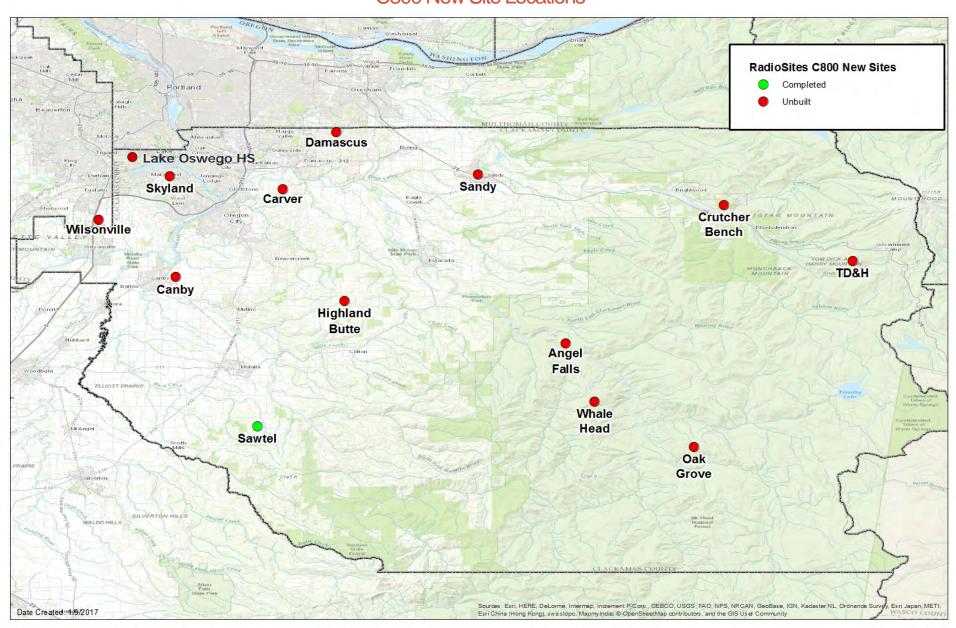
| Site Numbe ▼ | Turf ▼ | Type | Site Name ▼ | Nearest City | Jurisdiction * | Site Selected | Lease Submitte ▼ | Lease Signed |
|-----------------|---------|------|---------------------------|-----------------|-------------------|---------------|---------------------|--------------|
| C-1 | C800 | NSB | Carver (Gas Co) | Carver | | | | |
| C-2 | C800 | NSB | Skyland | Lake Oswego | | 1 | 1 | 1 |
| C-3 | C800 | NSB | Damascus | Damascus | | 1 | 1 | |
| C-4 | C800 | NSB | Wilsonville Tank | Wilsonville | | 1 | 1 | |
| C-9 | C800 | NSB | Sandy | Sandy | | 1 | 1 | 1 |
| C-12 | C800 | NSB | Crutcher Bench | Zig Zag | BLM | 1 | | |
| C-13 | C800 | NSB | Tom Dick and Harry | Government Camp | USFS | 1 | | |
| C-16 | C800 | NSB | Canby | Canby | | 1 | 1 | 1 |
| C-18 | C800 | NSB | Highland Butte | Cedar Reservoir | BLM | 1 | | |
| C-20 | C800 | NSB | Angel Falls | Angle Falls | USFS | 1 | | |
| C-21 | C800 | NSB | Oak Grove Butte | Frog Lake | USFS | 1 | | |
| C-22 | C800 | NSB | Whale Head | SE Clackamas | USFS | 1 | | |
| C-24 | C800 | NSB | Sawtel Fire Station | Molalla | | 1 | 1 | 1 |
| C-25 | C800 | NSB | Lake Oswego HS | Lake Oswego | | | | |
| W-5 | WCCCA | NSB | Sunrise Park (Roy Rogers) | Tigard | | | | |
| W-6 | WCCCA | NSB | Sherwood | Sherwood | | 1 | 1 | |
| W-7 | WCCCA | NSB | Springville (KPDX) | Portland | | 1 | | |
| W-12 | WCCCA | NSB | High Compromise | Forest Grove | | | | |
| W-14 | WCCCA | NSB | Hayward | Hayward | | 1 | 1 | |
| W-15 | WCCCA | NSB | Hwy 26 Tunnel | Elsie | | 1 | 1 | |
| W-16 | WCCCA | NSB | North Banks (Lodge Rd) | Banks | | 1 | 1 | |
| W-20 | WCCCA | NSB | South Saddle Mtn | Forest Grove | | | 1 | |
| W-21 | WCCCA | NSB | Cornelius Pass (KPDX) | Scappoose | | 1 | | |



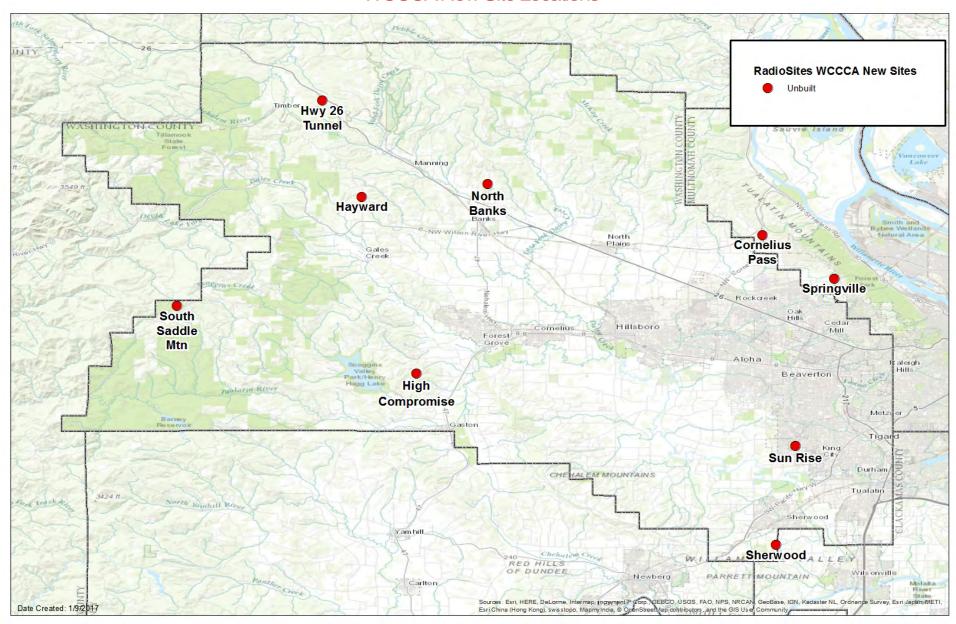
| C800 | WCCCA |
|------------|-----------|
| • 14 Sites | • 9 sites |



Appendix B C800 New Site Locations



Appendix C WCCCA New Site Locations



Appendix D

Existing Sites - Upgrade List

| Site | Turf | Туре | Site Name | Nearest City |
|-------|-------|----------|------------------|------------------|
| Numbe | Ţ | Ţ. | ▼ | |
| C-5 | C800 | Existing | Mount Scott | Happy Valley |
| C-6 | C800 | Existing | Mtn View | Oregon City |
| C-7 | C800 | Existing | Pete's | West Linn |
| C-8 | C800 | Existing | Polivka | Boring |
| C-10 | C800 | Existing | View Acres | Milwaukie |
| C-11 | C800 | Existing | Brightwood | Brightwood |
| C-14 | C800 | Existing | Lenhart | Sandy |
| C-15 | C800 | Existing | Timberline | Timberline Lodge |
| C-17 | C800 | Existing | Day Hill | Estacada |
| C-19 | C800 | Existing | Redland Road | Redland |
| C-23 | C800 | Existing | Goat Mountain | Colton |
| W-1 | WCCCA | Existing | Burntwood | Beaverton |
| W-2 | WCCCA | Existing | Canterbury | Tigard |
| W-3 | WCCCA | Existing | Cedar Hills | Beaverton |
| W-4 | WCCCA | Existing | Parrett Mountain | Sherwood |
| W-8 | WCCCA | Existing | Bald Peak | Laurel |
| W-9 | WCCCA | Existing | Chehalem | Newberg |
| W-10 | WCCCA | Existing | Court House | Hillsboro |
| W-11 | WCCCA | Existing | Gales Peak | Gales Creek |
| W-13 | WCCCA | Existing | Buxton | Buxton |
| W-17 | WCCCA | Existing | Pumpkin Ridge | North Plains |
| W-18 | WCCCA | Existing | Round Top | Timber |
| W-19 | WCCCA | Existing | Top Hill | Vernonia |



| C800 | WCCCA |
|------------|------------|
| • 11 Sites | • 12 sites |

