



Vegetation Unit Summaries for **Columbia Slough Natural Area (CSNA)**

Report date: 9/1/2009 '*' = non-native invasive species
Visit data as of: 9/1/2009

Unit CSNA*001

Size: 1.14 Acres
NVCS Class: Herbaceous
NVCS Subclass: Perennial graminoid vegetation
NVCS Group: Temperate grassland with a sparse tree layer
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: unknown
Landform: Side-hill, Middle 3rd
Slope: Extremely Steep (over 30%)
Aspect: East

Visit date: 7/21/2003

Ecological Health: Poor.
% Tree canopy: 5%
% Non-Native Cover: not recorded

General Note:
Unit consisted of east facing embankment for 158th Ave.

Management Note:
Manage for restoration plantings survival.

Eco Note:
Embankment had been planted with several tree species, all seemed to be healthy.

Primary Management concerns: Invasives, Litter, Hardscape Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Agrostis sp. (bentgrass)	20% to 50%	Y			
Salix rigida var. macrogemma (rigid yellow willo)	10% to 20%	Y			
Festuca arundinacea (tall fescue)	10% to 20%				
Pinus ponderosa (ponderosa pine)	1% to 10%		0-5"		Y
Cytisus scoparius (Scot's broom)	1% to 10%				
Dactylis glomerata (orchard grass)	1% to 10%				
Rubus discolor (Himalayan blackberry)	1% to 10%				
Acer macrophyllum (bigleaf maple)	trace		0-5"		Y
Alnus rubra (red alder)	trace		0-5"		
Pseudotsuga menziesii (Douglas fir)	trace		0-5"		Y
Phalaris arundinacea (reed canarygrass)	trace				

Unit CSNA*002

Size: 1.64 Acres
NVCS Class: Woodland
NVCS Subclass: Deciduous woodland
NVCS Group: Cold-deciduous woodland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland
Landform: Side-hill, Lower 3rd

Slope: Gentle (5 to 10%)

Aspect: South

Visit date: 7/21/2003

Ecological Health: Poor.

% Tree canopy: 45%

% Non-Native Cover: not recorded

General Note:

A service road follows north edge of unit.

Eco Note:

Southside slough trail ends at west edge of unit.

Primary Management concerns: Invasives, Litter, Utility Infrastructure, Hardscape Infrastructure, Homeless Camp.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
<i>Populus balsamifera</i> ssp. <i>trichocarpa</i> (black cott	50% to 75%	Y	5-10"		
<i>Cornus sericea</i> ssp. <i>sericea</i> (red-osier dogwood)	10% to 20%	Y			
<i>Crataegus douglasii</i> (Douglas' black hawthorn)	1% to 10%				
<i>Rosa multiflora</i> (multiflora rose)	1% to 10%				
<i>Rubus discolor</i> (Himalayan blackberry)	1% to 10%				
<i>Crataegus monogyna</i> (European hawthorn)	trace				

Unit CSNA*004

Size: 3.36 Acres

NVCS Class: Shrubland

NVCS Subclass: Deciduous shrubland

NVCS Group: Cold-deciduous shrubland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Other

Slope: Flat (0 to 5%)

Aspect: South

Visit date: 7/21/2003

Ecological Health: Severely Degraded.

% Tree canopy: 0%

% Non-Native Cover: not recorded

General Note:

PHAR mono-culture with RUDI at sloughs edge.

Wetland indicators: Hydrophilic Vegetation, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
<i>Phalaris arundinacea</i> (reed canarygrass)	50% to 75%	Y			
<i>Salix lucida</i> ssp. <i>lasiandra</i> (Pacific willow)	20% to 50%	Y			
<i>Rubus discolor</i> (Himalayan blackberry)	10% to 20%				
<i>Dipsacus sylvestris</i> (teasel)	1% to 10%				
<i>Cirsium arvense</i> (Canadian Thistle)	trace				
<i>Sambucus racemosa</i> (red elderberry)	trace				
<i>Urtica dioica</i> (stinging nettle)	trace				

Unit CSNA*005

Size: 7.53 Acres

NVCS Class: Herbaceous

NVCS Subclass: Perennial graminoid vegetation

NVCS Group: Temperate grassland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: unknown

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: South

Notes:

Visit date: 7/21/2003

Ecological Health: Severely Degraded.

% Tree canopy: 0%

% Non-Native Cover: not recorded

General Note:

Management Note:

Unit is highly degraded--large refuse throughout with invasives dominant.

Eco Note:

Dry, flat lot that borders the area next to the slough. Raised bench of land above periodically flooded regions.

Primary Management concerns: Invasives, Soil Compaction, Litter, Large Refuse, Informal Trails.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
<i>Dipsacus sylvestris</i> (teasel)	50% to 75%	Y			
<i>Holcus lanatus</i> (velvet grass)	50% to 75%	Y			
<i>Agrostis</i> sp. (bentgrass)	10% to 20%				
<i>Cichorium intybus</i> (chicory)	10% to 20%				
<i>Matricaria discoidea</i> (pineapple weed)	10% to 20%				
<i>Plantago lanceolata</i> (English narrowleaf buckhorn)	10% to 20%				
<i>Rubus discolor</i> (Himalayan blackberry)	10% to 20%				
<i>Cirsium arvense</i> (Canadian Thistle)	1% to 10%				
<i>Cirsium vulgare</i> (bull thistle)	1% to 10%				
<i>Hypericum perforatum</i> (common St. John's wort)	1% to 10%				
<i>Rumex obtusifolius</i> (bitter dock)	1% to 10%				
<i>Senecio jacobaea</i> (tansy ragwort)	1% to 10%				
<i>Convolvulus arvensis</i> (morning glory)	trace				
<i>Cytisus scoparius</i> (Scot's broom)	trace				

Unit CSNA*006

Size: 10.91 Acres

NVCS Class: Woodland

NVCS Subclass: Deciduous woodland

NVCS Group: Cold-deciduous woodland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: East

Notes:

Visit date: 7/21/2003

Ecological Health: Severely Degraded.

% Tree canopy: 30%

% Non-Native Cover: not recorded

General Note:

Site is degraded by heavy dumping, invasives and litter.

Management Note:

Looks like folks are dumping yard debris into unit. Invasives dominate--restoration work needed.

Eco Note:

Unit is on edge of creek stemming from the slough.

Wetland indicators: Streams, Hydrophilic Vegetation, Flood Debris, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Soil Compaction, Litter, Large Refuse, Yard Debris, Homeless Camp, Informal Trails.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
<i>Alnus rubra</i> (red alder)	20% to 50%	Y	5-10"	Y	
<i>Dipsacus sylvestris</i> (teasel)	20% to 50%	Y			
<i>Holcus lanatus</i> (velvet grass)	20% to 50%	Y			
<i>Rubus discolor</i> (Himalayan blackberry)	20% to 50%	Y			
<i>Phalaris arundinacea</i> (reed canarygrass)	20% to 50%				
<i>Populus balsamifera</i> ssp. <i>trichocarpa</i> (black cott	10% to 20%		5-10"	Y	
<i>Cornus sericea</i> ssp. <i>sericea</i> (red-osier dogwood)	10% to 20%				
<i>Quercus garryana</i> (Oregon white oak)	1% to 10%		10-20"		
<i>Cichorium intybus</i> (chicory)	1% to 10%				
<i>Cirsium arvense</i> (Canadian Thistle)	1% to 10%				
<i>Crataegus douglasii</i> (Douglas' black hawthorn)	1% to 10%				
<i>Epilobium ciliatum</i> ssp. <i>watsonii</i> (fringed willow)	1% to 10%				
<i>Hypericum perforatum</i> (common St. John's wort)	1% to 10%				
<i>Lotus corniculatus</i> (birdsfoot trefoil)	1% to 10%				
<i>Salix lucida</i> ssp. <i>lasiandra</i> (Pacific willow)	1% to 10%				
<i>Solanum dulcamara</i> (bittersweet nightshade)	1% to 10%				
<i>Sorbus aucuparia</i> (European mountain ash)	trace		0-5"		
<i>Cirsium vulgare</i> (bull thistle)	trace				
<i>Cytisus scoparius</i> (Scot's broom)	trace				
<i>Geranium robertianum</i> (herb-Robert)	trace				
<i>Holodiscus discolor</i> (oceanspray)	trace				
<i>Juncus effusus</i> (common soft Pacific rush)	trace				
<i>Lapsana communis</i> (common nipplewort)	trace				
<i>Senecio jacobaea</i> (tansy ragwort)	trace				
<i>Veronica americana</i> (American brooklime)	trace				

Unit CSNA*007

Size: 10.14 Acres

NVCS Class: Woodland

NVCS Subclass: Deciduous woodland

NVCS Group: Cold-deciduous woodland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.865 North Pacific Deciduous Swamp

Landform: Side-hill, Lower 3rd

Slope: Gentle (5 to 10%)

Aspect: Northeast

Notes:

Visit date: 7/21/2003

Ecological Health: Poor.

% Tree canopy: 60%

% Non-Native Cover: not recorded

General Note:

Homeless camp near PGE lawn and entrance to park.

Management Note:

Appears that some RUDI has been sprayed with herbicides, but new growth is still plentiful.

Eco Note:

Unit has many springs/streams that converge into a pond like marshy area. Skunk cabbage is present along springs.

Wetland indicators: Streams, Springs, Hydrophilic Vegetation, Surface Water, Water Marks, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Litter, Large Refuse, Homeless Camp.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Populus balsamifera ssp. trichocarpa (black cott	20% to 50%	Y	10-20"	Y	
Alnus rubra (red alder)	20% to 50%	Y	5-10"	Y	
Rubus discolor (Himalayan blackberry)	20% to 50%	Y			
Urtica dioica (stinging nettle)	20% to 50%	Y			
Acer macrophyllum (bigleaf maple)	10% to 20%		5-10"		
Stachys cooleyae (Cooley's hedgenettle)	10% to 20%				
Robinia pseudo-acacia (black locust)	1% to 10%		5-10"		
Athyrium filix-femina (ladyfern)	1% to 10%				
Cirsium vulgare (bull thistle)	1% to 10%				
Corylus avellana (common filbert)	1% to 10%				
Lysichiton americanus (American yellow skunkcabb	1% to 10%				
Oemleria cerasiformis (Indian-plum)	1% to 10%				
Polystichum munitum (sword fern)	1% to 10%				
Rubus parviflorus (thimbleberry)	1% to 10%				
Salix scouleriana (Scouler's willow)	1% to 10%				
Solanum dulcamara (bittersweet nightshade)	1% to 10%				
Symphoricarpos albus (snowberry)	1% to 10%				
Tolmiea menziesii (piggy-back plant)	1% to 10%				
Prunus avium (sweet pie cherry)	trace		0-5"		
Thuja plicata (western red cedar)	trace		0-5"	Y	
Cirsium arvense (Canadian Thistle)	trace				
Crataegus douglasii (Douglas' black hawthorn)	trace				
Dipsacus sylvestris (teasel)	trace				
Galium aparine (cleavers)	trace				

Unit CSNA *008

Size: 2.39 Acres

NVCS Class: Shrubland

NVCS Subclass: Deciduous shrubland

NVCS Group: Cold-deciduous shrubland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Bench/Terrace

Slope: Flat (0 to 5%)

Aspect: Northeast

Notes:

Visit date: 7/21/2003

Ecological Health: Severely Degraded.

% Tree canopy: 20%

% Non-Native Cover: not recorded

General Note:

Extreme noise from neighboring industrial area. Unit borders railroad tracks.

Management Note:

Deal with regenerating RUDI and PHAR alongside access road.

Eco Note:

Majority of RUDI is dead from apparent spraying but is regenerating along edges and in patches in unit.

Primary Management concerns: Invasives, Large Refuse, Hardscape Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Rubus discolor (Himalayan blackberry)	over 75% Y				
Populus balsamifera ssp. trichocarpa (black cott	10% to 20%	Y	10-20"		
Alnus rubra (red alder)	1% to 10%		5-10"	Y	
Salix scouleriana (Scouler's willow)	1% to 10%				
Fraxinus latifolia (Oregon ash)	trace		5-10"	Y	

Crataegus monogyna (European hawthorn) trace
 Phalaris arundinacea (reed canarygrass) trace

Unit CSNA*009

Size: 5.33 Acres
NVCS Class: Woodland
NVCS Subclass: Deciduous woodland
NVCS Group: Cold-deciduous woodland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland
Landform: Side-hill, Lower 3rd
Slope: Flat (0 to 5%)
Aspect: South

Visit date: 7/16/2003

Ecological Health: Poor.
% Tree canopy: 50%
% Non-Native Cover: not recorded

Management Note:
 DISY is spreading rapidly.

Eco Note:
 Woodland is a planted ALRU population bordering a business park.

Wetland indicators: Hydrophilic Vegetation.

Primary Management concerns: Invasives, Litter, Large Refuse, Utility Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Alnus rubra (red alder)	20% to 50%	Y	0-5"		Y
Phalaris arundinacea (reed canarygrass)	20% to 50%	Y			
Dipsacus sylvestris (teasel)	10% to 20%				
Holcus lanatus (velvet grass)	10% to 20%				
Parentucellia viscosa (yellow parentucellia)	10% to 20%				
Populus balsamifera ssp. trichocarpa (black cott)	1% to 10%		0-5"		
Cirsium arvense (Canadian Thistle)	1% to 10%				
Cirsium vulgare (bull thistle)	1% to 10%				
Lotus corniculatus (birdsfoot trefoil)	1% to 10%				
Rosa nutkana (Nootka rose)	1% to 10%				
Salix lucida ssp. lasiandra (Pacific willow)	1% to 10%				
Salix sitchensis (Sitka willow)	1% to 10%				
Spiraea douglasii (Douglas' spiraea)	1% to 10%				
Abies grandis (grand fir)	trace		0-5"		Y
Fraxinus latifolia (Oregon ash)	trace		0-5"		Y
Pinus ponderosa (ponderosa pine)	trace		0-5"		Y
Thuja plicata (western red cedar)	trace		0-5"		Y
Tsuga heterophylla (western hemlock)	trace		0-5"		Y
Centaurium erythraea (European centaury)	trace				
Crataegus douglasii (Douglas' black hawthorn)	trace				Y
Juncus effusus (common soft Pacific rush)	trace				
Senecio jacobaea (tansy ragwort)	trace				

Unit CSNA*010

Size: 2.17 Acres
NVCS Class: Herbaceous
NVCS Subclass: Perennial graminoid vegetation
NVCS Group: Temperate grassland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: unknown
Landform: Side-hill, Lower 3rd
Slope: Steep (20 to 30%)

Aspect: East

Visit date: 7/16/2003

Ecological Health: Severely Degraded.

% Tree canopy: 0%

% Non-Native Cover: not recorded

General Note:

planes flying low overhead

Management Note:

grass is mostly reed-canary grass.

Eco Note:

Unit is a grassy side hill.

Primary Management concerns: Invasives, Utility Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Phalaris arundinacea (reed canarygrass)	over 75% Y				
Holcus lanatus (velvet grass)	20% to 50%				

Unit CSNA*011

Size: 2.69 Acres

NVCS Class: Herbaceous

NVCS Subclass: Perennial graminoid vegetation

NVCS Group: Temperate grassland with a sparse shrub layer

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES200.877 Temperate Pacific Freshwater Emergent Marsh

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: South

Visit date: 7/16/2003

Ecological Health: Poor.

% Tree canopy: 0%

% Non-Native Cover: not recorded

Eco Note:

Small water-way runs through this unit
reed-canary grass is out-competing the Juncus.

Wetland indicators: Springs, Hydrophilic Vegetation, Water Marks, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Juncus effusus (common soft Pacific rush)	20% to 50%	Y			
Phalaris arundinacea (reed canarygrass)	20% to 50%	Y			
Typha latifolia (broadleaf common cattail)	10% to 20%				
Dipsacus sylvestris (teasel)	1% to 10%				
Salix lucida ssp. lasiandra (Pacific willow)	1% to 10%				
Salix sitchensis (Sitka willow)	1% to 10%				
Scirpus tabernaemontani (great soft-stem bulrush)	1% to 10%				
Rubus discolor (Himalayan blackberry)	trace				
Senecio jacobaea (tansy ragwort)	trace				
Spiraea douglasii (Douglas' spiraea)	trace				

Unit CSNA*012

Size: 0.86 Acres

NVCS Class: Shrubland
NVCS Subclass: Deciduous shrubland
NVCS Group: Cold-deciduous shrubland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland
Landform: Broad flat > 600'
Slope: Flat (0 to 5%)
Aspect: South

Visit date: 7/16/2003

Ecological Health: Poor.

% Tree canopy: 0%

% Non-Native Cover: not recorded

General Note:

Canada geese, ducks, and a blue heron sighted in the slough.

Management Note:

DISY and PHAR are beginning to dominate local vegetation.

Eco Note:

Unit is the riparian zone along the Columbia River Slough (the bank area). Unit is bordered by business on one side and a busy road on the other.

Wetland indicators: Streams, Hydrophilic Vegetation, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Litter, Utility Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
<i>Dipsacus sylvestris</i> (teasel)	20% to 50%	Y			
<i>Epilobium ciliatum</i> ssp. <i>watsonii</i> (fringed willow)	20% to 50%	Y			
<i>Fraxinus latifolia</i> (Oregon ash)	1% to 10%		0-5"		Y
<i>Cirsium arvense</i> (Canadian Thistle)	1% to 10%				
<i>Eleocharis palustris</i> (common spikerush)	1% to 10%				
<i>Juncus effusus</i> (common soft Pacific rush)	1% to 10%				
<i>Phalaris arundinacea</i> (reed canarygrass)	1% to 10%				
<i>Physocarpus capitatus</i> (Pacific ninebark)	1% to 10%				Y
<i>Rubus discolor</i> (Himalayan blackberry)	1% to 10%				Y
<i>Sambucus racemosa</i> (red elderberry)	1% to 10%				Y
<i>Veronica americana</i> (American brooklime)	1% to 10%				
<i>Acer macrophyllum</i> (bigleaf maple)	trace		0-5"		Y
<i>Brassica rapa</i> (field mustard)	trace				
<i>Cornus sericea</i> ssp. <i>sericea</i> (red-osier dogwood)	trace				
<i>Iris pseudacorus</i> (yellow flag iris)	trace				
<i>Rosa nutkana</i> (Nootka rose)	trace				Y
<i>Spiraea douglasii</i> (Douglas' spiraea)	trace				

Unit CSNA*013

Size: 38.16 Acres

NVCS Class: Woodland

NVCS Subclass: Deciduous woodland

NVCS Group: Cold-deciduous woodland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: South

Notes:

Visit date: 6/16/2004

Ecological Health: Poor.

% Tree canopy: 55%

% Non-Native Cover: 35

General Note:

CATE*00 1 was located at the north end of the of the Catellus property. The slough makes up the south boundary.

Management Note:

Most of the invasives in this unit were either associated with the access road or the edges of the unit. RUDI2 has moved into the interior of the unit and needs to be dealt with. To improve this unit management plans should focus on removing RUDI2 and enhance the structure and features already in place such as the water, canopy, downed wood and wildlife.

Eco Note:

This unit is associated with a lot of water. There was a good understory of FRLA coming in. Structurally it has some good aspects that need to be retained and built on.

Wetland indicators: Streams, Hydrophilic Vegetation, Surface Water, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Litter, Utility Infrastructure, Hardscape Infrastructure.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Populus balsamifera ssp. trichocarpa (black cott	20% to 50%	Y	20-30"	Y	
Fraxinus latifolia (Oregon ash)	20% to 50%	Y	10-20"	Y	Y
Rubus discolor (Himalayan blackberry)	20% to 50%	Y			
Urtica dioica (stinging nettle)	20% to 50%	Y			
Symphoricarpos albus (snowberry)	10% to 20%	Y			
Galium aparine (cleavers)	10% to 20%				
Alnus rubra (red alder)	1% to 10%		10-20"		Y
Prunus avium (sweet pie cherry)	1% to 10%		5-10"	Y	
Cirsium arvense (Canadian Thistle)	1% to 10%				
Cornus sericea ssp. sericea (red-osier dogwood)	1% to 10%				
Geum macrophyllum (largeleaf avens)	1% to 10%				
Lapsana communis (common nipplewort)	1% to 10%				
Rubus ursinus (trailing blackberry)	1% to 10%				
Sambucus racemosa (red elderberry)	1% to 10%				
Conium maculatum (poison hemlock)	trace				
Crataegus douglasii (Douglas' black hawthorn)	trace				
Dipsacus sylvestris (teasel)	trace				
Geranium robertianum (herb-Robert)	trace				
Lotus corniculatus (birdsfoot trefoil)	trace				
Polypodium glycyrrhiza (licorice fern)	trace				
Ribes divaricatum (black gooseberry)	trace				
Rosa multiflora (multiflora rose)	trace				
Rumex obtusifolius (bitter dock)	trace				
Senecio jacobaea (tansy ragwort)	trace				
Tellima grandiflora (fringecup)	trace				

Unit CSNA*014

Size: 3.39 Acres

NVCS Class: Woodland

NVCS Subclass: Deciduous woodland

NVCS Group: Cold-deciduous woodland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Bench/Terrace

Slope: Flat (0 to 5%)

Aspect: North

Visit date: 6/17/2004

Ecological Health: Fair.

% Tree canopy: 35%

% Non-Native Cover: 15

General Note:

Several large Quercus garryana (46" DBH) are found on the southern bluff of this unit.

Management Note:

Blackberry has been sprayed and is largely killed. The understory in this unit shows evidence of much trampling in the form of broken blackberry canes. Several homeless camps are evident in the unit.

Wetland indicators: Streams, Hydrophilic Vegetation, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Trampling, Litter, Large Refuse, Homeless Camp.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Fraxinus latifolia (Oregon ash)	20% to 50%	Y	5-10"	Y	
Quercus garryana (Oregon white oak)	10% to 20%	Y	>30"		
Cornus sericea ssp. sericea (red-osier dogwood)	10% to 20%	Y			
Crataegus douglasii (Douglas' black hawthorn)	10% to 20%	Y			
Rubus discolor (Himalayan blackberry)	10% to 20%	Y			
Symphoricarpos albus (snowberry)	10% to 20%	Y			
Rhamnus purshiana (cascara)	1% to 10%				
Rosa gymnocarpa (dwarf wood rose)	1% to 10%				
Galium aparine (cleavers)	trace				
Gilia capitata (bluehead gilia)	trace				
Urtica dioica (stinging nettle)	trace				

Unit CSNA*015

Size: 14.84 Acres

NVCS Class: Herbaceous

NVCS Subclass: Perennial graminoid vegetation

NVCS Group: Temperate grassland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: unknown

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: South

Notes:

Visit date: 6/16/2004

Ecological Health: Severely Degraded.

% Tree canopy: 0%

% Non-Native Cover: 85

General Note:

This unit is located to the west of the slough.

Management Note:

Keep structure and remove non-natives.

Eco Note:

Heron, Osprey, hawks, black-tailed deer and other song birds were seen in this unit. This unit had several ponds and some shrubs in it.

Wetland indicators: Hydrophilic Vegetation, Surface Water, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Phalaris arundinacea (reed canarygrass)	over 75% Y				
Juncus effusus (common soft Pacific rush)	1% to 10%				
Rosa pisocarpa (cluster wild peafruit swamp Rose)	1% to 10%				
Rubus discolor (Himalayan blackberry)	1% to 10%				
Salix sitchensis (Sitka willow)	1% to 10%				
Dipsacus sylvestris (teasel)	trace				
Galium aparine (cleavers)	trace				

Iris pseudacorus (yellow flag iris)	trace
Leucanthemum vulgare (oxeye daisy)	trace
Urtica dioica (stinging nettle)	trace

Unit CSNA*016

Size: 30.85 Acres
NVCS Class: Woodland
NVCS Subclass: Deciduous woodland
NVCS Group: Cold-deciduous woodland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland
Landform: Bench/Terrace
Slope: Flat (0 to 5%)
Aspect: North

Visit date: 6/17/2004

Ecological Health: Severely Degraded.

% Tree canopy: 40%

% Non-Native Cover: 60

General Note:

Unit is located off of Sandy Blvd. north of the of the railroad tracks and south of the slough.

Management Note:

This unit is highly disturbed and effected by the railroad grade. Management plan should deal with these aspects and the removal of heavy invasives. There was moderate to heavy litter and human impacts also associated with this unit.

Eco Note:

This unit was not considered significant habitat and has little (positive?) structure.

Wetland indicators: Streams, Hydrophilic Vegetation, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives, Litter, Informal Trails.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Rubus discolor (Himalayan blackberry)	50% to 75%	Y			
Fraxinus latifolia (Oregon ash)	20% to 50%	Y	20-30"		
Populus balsamifera ssp. trichocarpa (black cott	20% to 50%	Y	20-30"		
Acer macrophyllum (bigleaf maple)	10% to 20%		10-20"		
Convolvulus arvensis (morning glory)	1% to 10%				
Phalaris arundinacea (reed canarygrass)	1% to 10%				
Quercus garryana (Oregon white oak)	trace		20-30"		
Pteridium aquilinum (bracken fern)	trace				
Salix sitchensis (Sitka willow)	trace				
Urtica dioica (stinging nettle)	trace				

Unit CSNA*017

Size: 14.25 Acres
NVCS Class: Shrubland
NVCS Subclass: Deciduous shrubland
NVCS Group: Cold-deciduous shrubland
NVCS SubGroup: Natural / Semi-natural
NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland
Landform: Broad flat > 600'
Slope: Flat (0 to 5%)
Aspect: South
Notes:

Visit date: 6/16/2004

Ecological Health: Fair.

% Tree canopy: 20%

% Non-Native Cover: 55

General Note:

This unit was north of the slough. It consisted of a large grassy (PHAR3) area with some native shrub cover.

Management Note:

Remove non-native grasses and replace with natives. Manage for the same habitat type though.

Eco Note:

This units structure should be maintained as a flood plain. Several species of wildlife we re using this unit.

Wetland indicators: Streams, Hydrophilic Vegetation, Surface Water, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Phalaris arundinacea (reed canarygrass)	50% to 75%	Y			
Salix lucida ssp. lasiandra (Pacific willow)	20% to 50%	Y			
Salix sitchensis (Sitka willow)	20% to 50%	Y			
Impatiens capensis (spotted orange touch-me-not)	1% to 10%				
Urtica dioica (stinging nettle)	1% to 10%				
Cornus sericea ssp. sericea (red-osier dogwood)	trace				

Unit CSNA*018

Size: 2.36 Acres

NVCS Class: Forest

NVCS Subclass: Deciduous forest

NVCS Group: Cold-deciduous forest

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Broad flat > 600'

Slope: Flat (0 to 5%)

Aspect: Southwest

Visit date: 6/17/2004

Ecological Health: Fair.

% Tree canopy: 80%

% Non-Native Cover: 5

General Note:

This unit was located in the south west corner of the Catellus property.

Management Note:

Continue restoration efforts and monitor for health.

Eco Note:

The plantings all looked healthy and there was little sign of new invasives. Structurally it was still developing that was part of the reason it received an Eco health rating of 3.

Wetland indicators: Streams, Hydrophilic Vegetation, Surface Water, Saturated Soils, Standing Flowing Water.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Alnus rubra (red alder)	50% to 75%	Y	5-10"		Y
Thuja plicata (western red cedar)	1% to 10%		0-5"		Y
Phalaris arundinacea (reed canarygrass)	1% to 10%				

Sambucus racemosa (red elderberry)	1% to 10%		Y
Pseudotsuga menziesii (Douglas fir)	trace	5-10"	Y
Abies grandis (grand fir)	trace	0-5"	Y
Acer macrophyllum (bigleaf maple)	trace	0-5"	Y
Amelanchier alnifolia (serviceberry)	trace		
Cornus sericea ssp. sericea (red-osier dogwood)	trace		Y
Salix sitchensis (Sitka willow)	trace		

Unit CSNA*019

Size: 7.95 Acres

NVCS Class: Woodland

NVCS Subclass: Deciduous woodland

NVCS Group: Cold-deciduous woodland

NVCS SubGroup: Natural / Semi-natural

NVCS Ecological System: CES204.869 North Pacific Lowland Riparian Forest and Shrubland

Landform: Broad flat > 600'

Slope: Gentle (5 to 10%)

Aspect: South

Visit date: 6/17/2004

Ecological Health: Good.

% Tree canopy: 45%

% Non-Native Cover: 5

General Note:

The north edge of this unit consists of a weed patch and to the north of that is a commercial lot that's been turned into an ATV recreation area. This creates a lot of disturbance. Unit boundaries exclude this area and start at tree line.

Management Note:

Remove weed patch to the north and shutdown human disturbance in lot associated with unit.

Eco Note:

This area has good canopy and shrub layer but is missing forb layer.

Wetland indicators: Hydrophilic Vegetation.

Primary Management concerns: Invasives.

Visit Species:

	COVER CLASS	DOMINANT	DBH	REGENERATING	PLANTED
Populus balsamifera ssp. trichocarpa (black cott	20% to 50%	Y	10-20"	Y	
Cornus sericea ssp. sericea (red-osier dogwood)	20% to 50%	Y			
Symphoricarpos albus (snowberry)	10% to 20%				
Crataegus douglasii (Douglas' black hawthorn)	1% to 10%				
Rubus discolor (Himalayan blackberry)	1% to 10%				
Rubus ursinus (trailing blackberry)	1% to 10%				

Unit CSNA*020

Size: 2.68 Acres

NVCS Class: Herbaceous

NVCS Subclass: Perennial graminoid vegetation

NVCS Group: Temperate grassland with a sparse tree layer

NVCS SubGroup: Cultural

NVCS Ecological System: unknown

Landform: unknown

Slope: unknown

Aspect: unknown

Notes: This unit consists of several ponds, an access road, a periodically mowed field, and contains several ALRU plantings. The ALRU planted along the ponds seem to be dead.

