



Ministry of
Agriculture

Agricultural Land Use Inventory (ALUI)

Juan de Fuca Electoral Area (JdF)

and

Otter Point Area of JdF

Capital Regional District

Surveyed 2009

Preliminary Report - June 2011

Agricultural Land Use Inventory

Brief Methodology

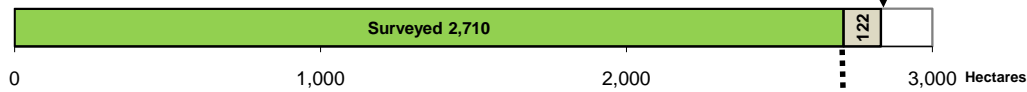
- 1 Parcels (or lots) surveyed: - those within the ALR, even partially. In some of the tables, the area of the whole parcel is used, even though only a piece is in the category being discussed - e.g., general land, ALR.
- 2 Within parcel boundaries, using aerial photos, irregularly-shaped polygons were drawn around areas consisting of the same type of components - e.g., crops, farm buildings, house, lawn, irrigation type, natural vegetation. Most of the field survey data was collected using the polygons.

Juan de Fuca Electoral Area

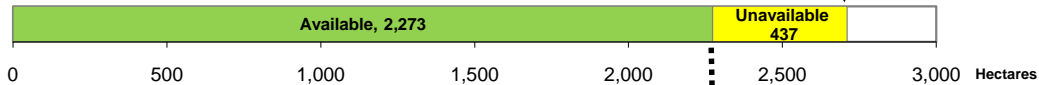
Agricultural Land Reserve (ALR)



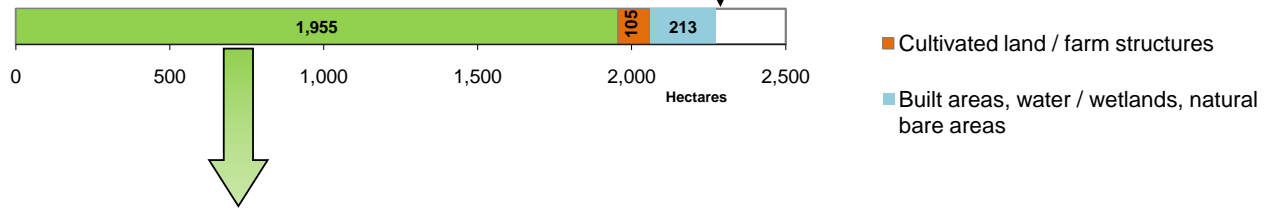
Surveyed ALR



ALR Availability for Agriculture



Land Cover on Available ALR Land



Land Cover	Physical Limitations				Total ALR (ha)
	None	Drainage	Slope	Soil	
Landscape vegetation	21.4	-	-	-	21.4
Natural vegetation	1,183.0	396.4	344.5	10.0	1,933.9
TOTAL	1,204	396	344	10	1,955

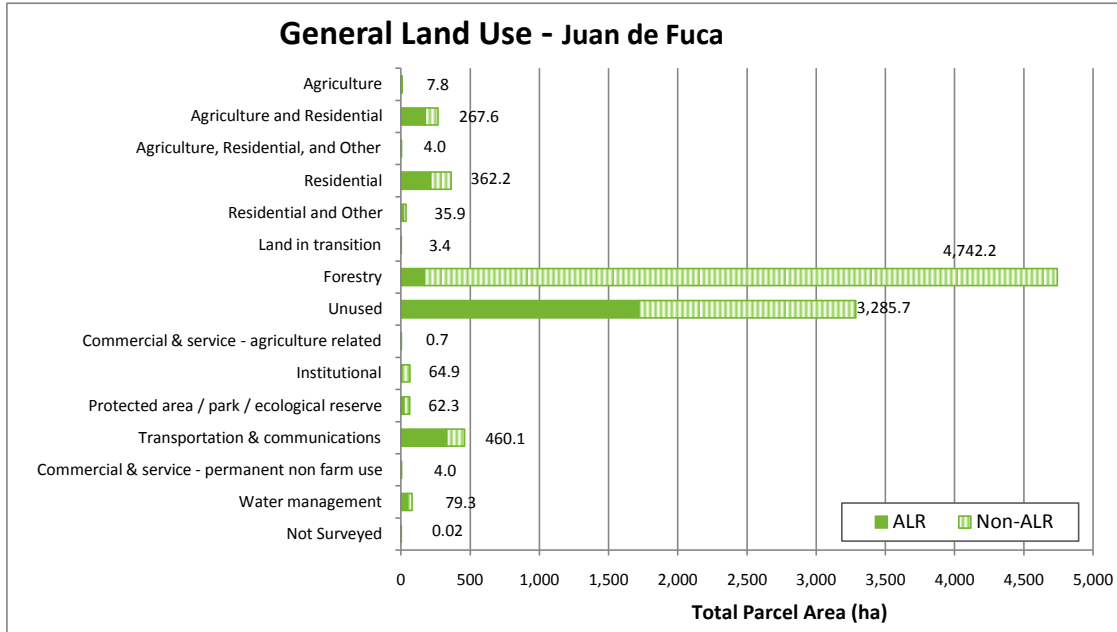
- 1 Juan de Fuca EA has 2,832 ha in the ALR (as calculated by GIS), of which this Agricultural Land Use Inventory (ALUI) classified parcels with an area of 2,710 ha as being within the ALR.
- 2 Of the land in the ALR, 2,273 ha is considered available for agriculture, but only 105 ha currently has cultivated land or farm structures.
- 3 Using the land covers (polygons), 1,955 ha in the ALR are landscaped areas or natural vegetation, 1,204 ha of which appear to have no physical limitations for farming.

Juan de Fuca

Parcel status with respect to agriculture for all parcels in the inventory area.

Agricultural Land Use	Number of parcels	Area of parcels (ha)	ALR (ha)	Non-ALR (ha)
Commercial Agriculture	30	267.8	173.2	94.7
Non-commercial Agriculture	3	11.5	11.0	< 1
Available	205	8,395.5	2,088.7	6,306.9
Unavailable	47	705.3	436.8	268.5
TOTAL SURVEYED	285	9,380	2,710	6,671

Juan de Fuca Electoral Area



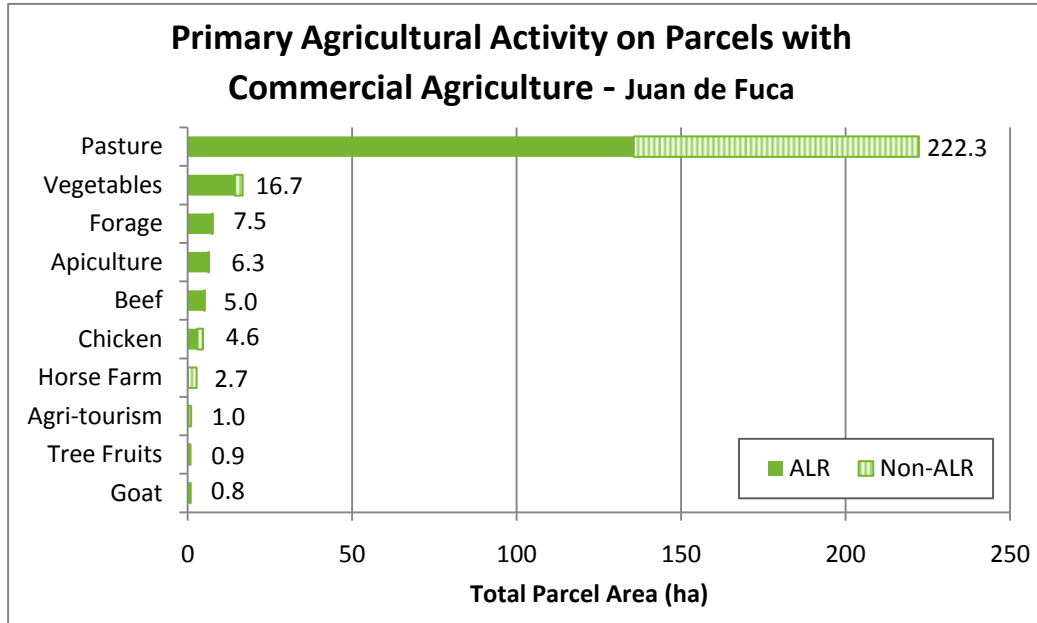
- 1 A significant number of the Juan de Fuca EA parcels are classified as 'temporary non-farm uses' (129 parcels).
- 2 Extensive areas (6,671 ha), mostly with farm class tax status, are outside of the ALR.
- 3 Most 'agricultural use' parcels have houses (30 of 33). Eighty-five (85) lots, which do not have agriculture, have 'residential use'.

CRD Juan de Fuca EA

General land use by parcel for all parcels in the Juan de Fuca inventory area

General Land Use		Inventory Area					
		Number of parcels	Area of parcels (ha)	Mean parcel size (ha)	Median parcel size (ha)	ALR (ha)	Non-ALR (ha)
Agricultural use	Agriculture	3	8	2.6	1.7	5	3
	Agriculture and Other	-	-	-	-	-	-
	Agriculture and Residential	29	268	9.2	4.0	175	93
	Agriculture, Residential, and Other	1	4	4.0	4.0	4	-
	SUBTOTAL	33	279			184	95
Residential use	Residential	72	362	5.0	2.6	215	147
	Residential and Other	13	36	2.8	2.7	18	18
	SUBTOTAL	85	398			233	165
Temporary non-farm use	Land in transition	1	3	3.4	3.4	3	< 1
	Forestry	11	4,742	431.1	30.2	167	4,575
	Unused	116	3,286	28.3	7.6	1,718	1,567
	Commercial & service - agriculture related	1	< 1	0.7	0.7	< 1	< 1
	SUBTOTAL	129	8,032			1,889	6,143
Permanent non-farm use	Institutional	1	65	64.9	64.9	6	59
	Golf course	-	-	-	-	-	-
	Protected area / park / ecological reserve	1	62	62.3	62.3	21	42
	Residential (<=0.4ha)	-	-	-	-	-	-
	Transportation & communications	27	460	17.0	1.0	331	130
	Commercial & service - permanent non farm use	1	4	4.0	4.0	1	3
	SUBTOTAL	38	671			404	267
SURVEYED PARCELS TOTAL		285	9,380			2,710	6,671
	Not Surveyed	1	< 1	< 1	< 1	< 1	< 1
INVENTORY AREA TOTAL		286	9,380			2,710	6,671

Juan de Fuca Electoral Area



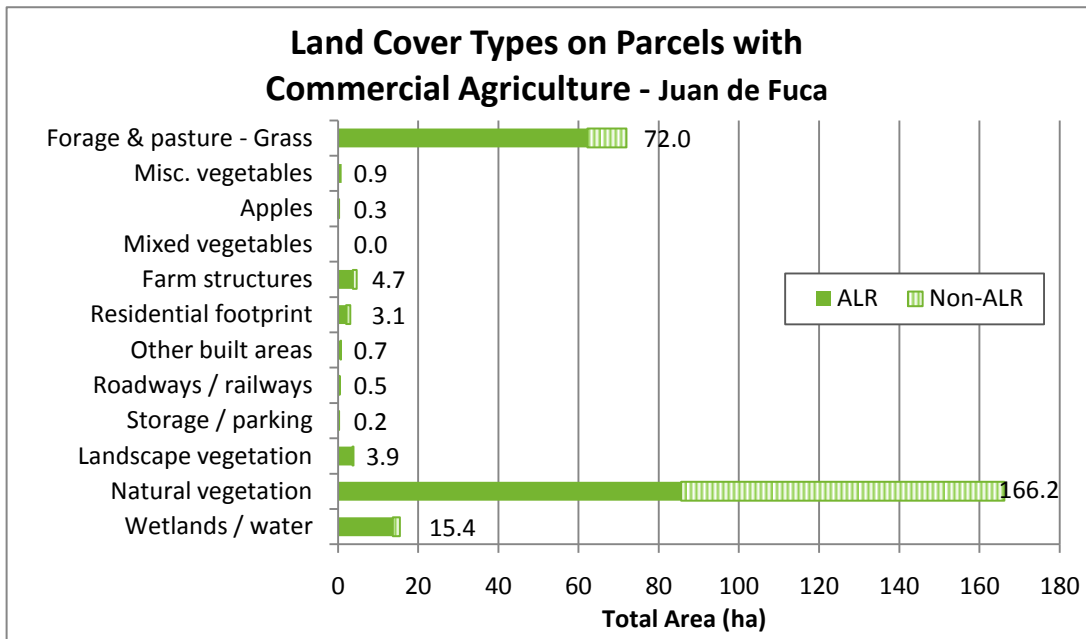
- 1 Of the 268 ha on parcels with commercial agriculture, 173 ha are within the ALR.
- 2 'Pasture' is the primary agricultural activity on 18 parcels with 136 ha within the ALR.

Juan de Fuca

Primary agricultural activity for surveyed parcels with commercial agriculture activities

Primary agricultural activity	Parcels with Commercial Agriculture Activities					
	Number of parcels	Parcel area (ha)	Mean parcel size (ha)	Median parcel size (ha)	ALR (ha)	Non-ALR (ha)
Pasture	18	222.3	12.3	4.0	136	87
Vegetables	2	16.7	8.3	8.3	14	2
Forage	1	7.5	7.5	7.5	7	< 1
Apiculture	1	6.3	6.3	6.3	6	< 1
Beef	1	5.0	5.0	5.0	5	< 1
Chicken	2	4.6	2.3	2.3	3	2
Horse Farm	2	2.7	1.4	1.4	< 1	3
Agri-tourism	1	1.0	1.0	1.0	< 1	< 1
Tree Fruits	1	0.9	0.9	0.9	< 1	< 1
Goat	1	0.8	0.8	0.8	< 1	< 1
TOTAL	30	268			173	95

Juan de Fuca Electoral Area



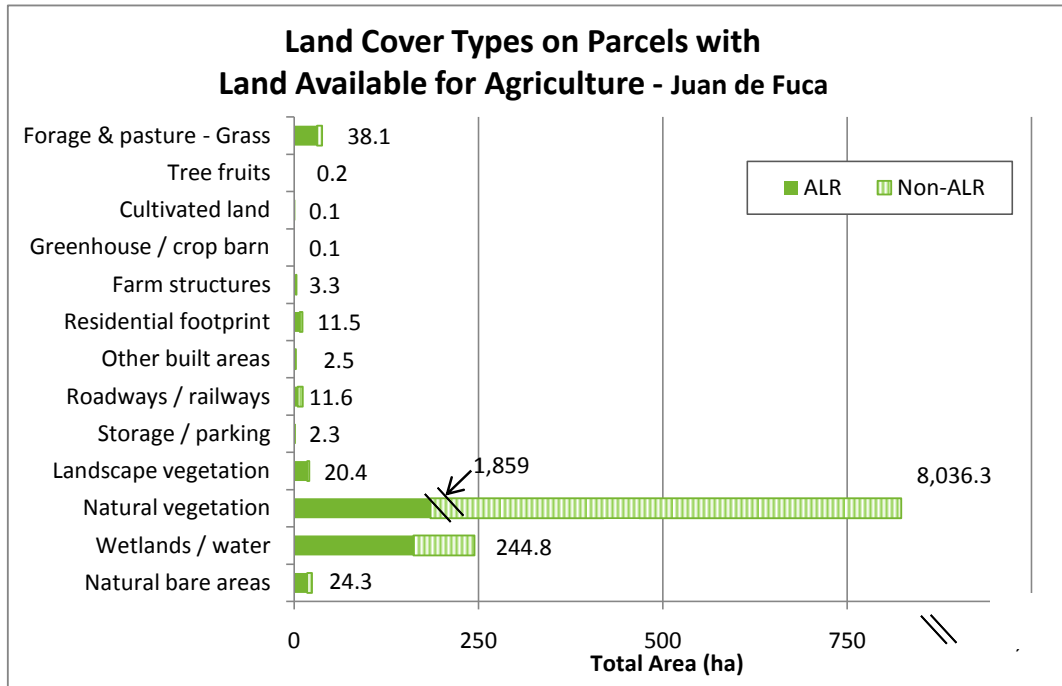
The land cover polygons divide a parcel into smaller areas. This chart and table show data for those smaller areas, instead of the whole parcel area used in other tables and charts.

Juan de Fuca

Land cover for surveyed parcels with commercial agriculture activities

Land Cover	Polygon Areas on Parcels with Commercial Agriculture Activities					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Forage & pasture - Grass	31	72.0	2.3	1.4	62.2	9.8
Misc. vegetables	1	0.9	0.9	0.9	0.9	-
Apples	2	0.3	0.1	0.1	< 0.1	0.2
Mixed vegetables	1	< 0.1	< 0.1	< 0.1	< 0.1	-
SUBTOTAL	35	73			63	10
Farm structures	22	4.7	0.2	0.2	3.7	1.0
SUBTOTAL	22	5			4	< 1
Residential footprint	18	3.1	0.2	0.1	2.0	1.0
Other built areas	6	0.7	0.1	0.1	0.7	< 0.1
SUBTOTAL	24	4			3	1
Roadways / railways	3	0.5	0.2	0.1	0.4	< 0.1
Storage / parking	2	0.2	0.1	0.1	0.2	< 0.1
SUBTOTAL	5	< 1			< 1	< 1
Landscape vegetation	6	3.9	0.6	0.3	3.6	0.2
Natural vegetation	44	166.2	3.8	1.1	85.6	80.6
SUBTOTAL	50	170			89	81
Wetlands / water	12	15.4	1.3	0.4	13.7	1.7
SUBTOTAL	12	15			14	2
Not surveyed	-	-	-	-	-	-
TOTAL	148	268			173	95

Juan de Fuca Electoral Area



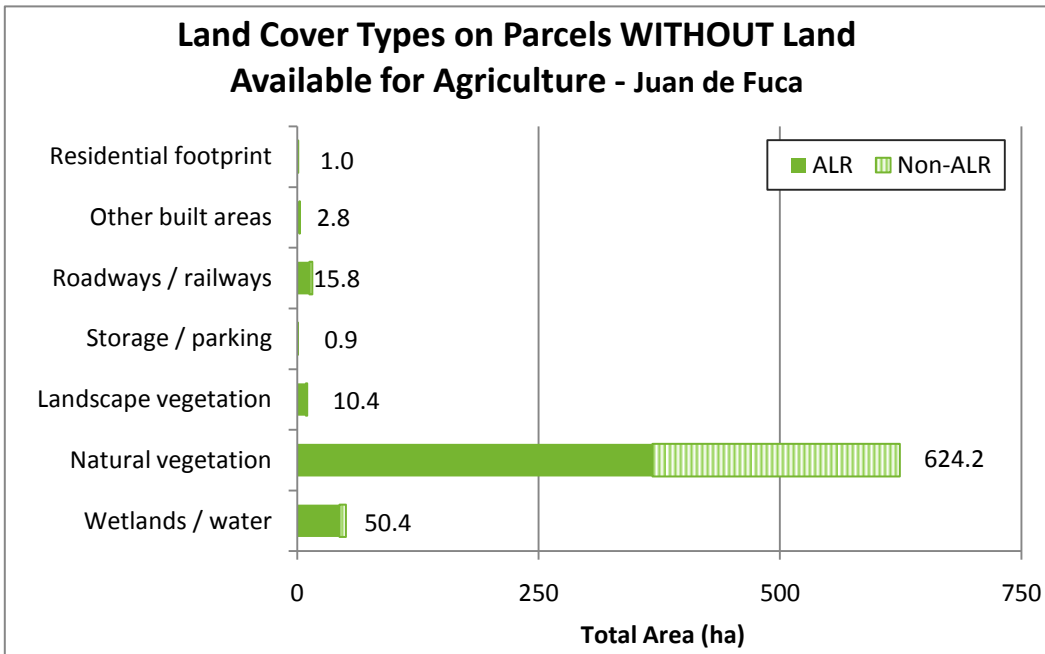
Of the 2,089 ha in land covers in the ALR, over 90% (1,859 ha) is in landscape or natural vegetation. These areas could be evaluated in more detail for possible development of agriculture.

Juan de Fuca

Land cover for surveyed parcels with land available for agriculture

Land Cover	Polygon Areas on Parcels Available for Agriculture					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Forage & pasture - Grass	25	38.1	1.5	0.8	31.1	6.9
Tree fruits	1	0.2	0.2	0.2	0.2	-
Cultivated land	1	0.1	0.1	0.1	0.1	< 0.1
Greenhouse / crop barn	1	0.1	0.1	0.1	0.1	-
SUBTOTAL	28	38			32	7
Farm structures	16	3.3	0.2	0.1	2.3	1.0
SUBTOTAL	16	3			2	1
Residential footprint	66	11.5	0.2	0.1	7.8	3.7
Other built areas	13	2.5	0.2	< 0.1	1.1	1.4
SUBTOTAL	79	14			9	5
Roadways / railways	11	11.6	1.1	1.0	4.7	6.9
Storage / parking	5	2.3	0.5	0.2	2.3	< 0.1
SUBTOTAL	16	14			7	7
Landscape vegetation	26	20.4	0.8	0.5	17.7	2.7
Natural vegetation	315	8,036.3	25.5	3.1	1,841.7	6,194.6
SUBTOTAL	341	8,057			1,859	6,197
Wetlands / water	72	244.8	3.4	1.6	161.9	82.9
Natural bare areas	3	24.3	8.1	7.4	17.6	6.7
SUBTOTAL	72	269			179	90
Not surveyed	-	-	-	-	-	-
TOTAL	552	8,396			2,089	6,307

Juan de Fuca Electoral Area



1. Some parcels are considered not to be available for agriculture, mostly because of conflicting land uses or perhaps sensitive habitat. Such parcels cover 705 ha, most of which has natural vegetation cover (624 ha).
2. An area of 437 ha, on parcels not available for agriculture, is in the ALR.

Juan de Fuca

Land cover for surveyed parcels without land available for agriculture

Land Cover	Polygon Areas on Parcels NOT Available for Agriculture					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Residential footprint	7	1.0	0.1	0.1	0.2	0.8
Other built areas	2	2.8	1.4	1.4	2.5	0.2
SUBTOTAL	9	4			3	1
Roadways / railways	18	15.8	0.9	0.6	12.7	3.1
Storage / parking	2	0.9	0.4	0.4	0.3	0.6
SUBTOTAL	20	17			13	4
Landscape vegetation	4	10.4	2.6	1.5	9.1	1.3
Natural vegetation	44	624.2	14.2	3.4	368.1	256.1
SUBTOTAL	48	635			377	257
Wetlands / water	21	50.4	2.4	1.1	43.8	6.6
SUBTOTAL	21	50			44	7
Not surveyed	-	-	-	-	-	-
TOTAL	98	705			437	269

Otter Point Area of Juan de Fuca Electoral Area, Capital Regional District

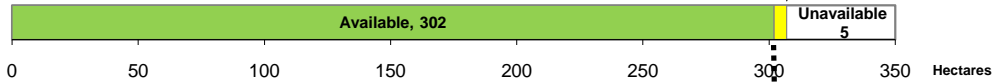
Agricultural Land Reserve (ALR)



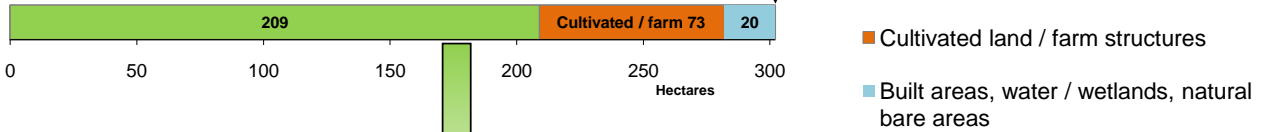
Surveyed ALR



ALR Availability for Agriculture



Land Cover on Available ALR Land

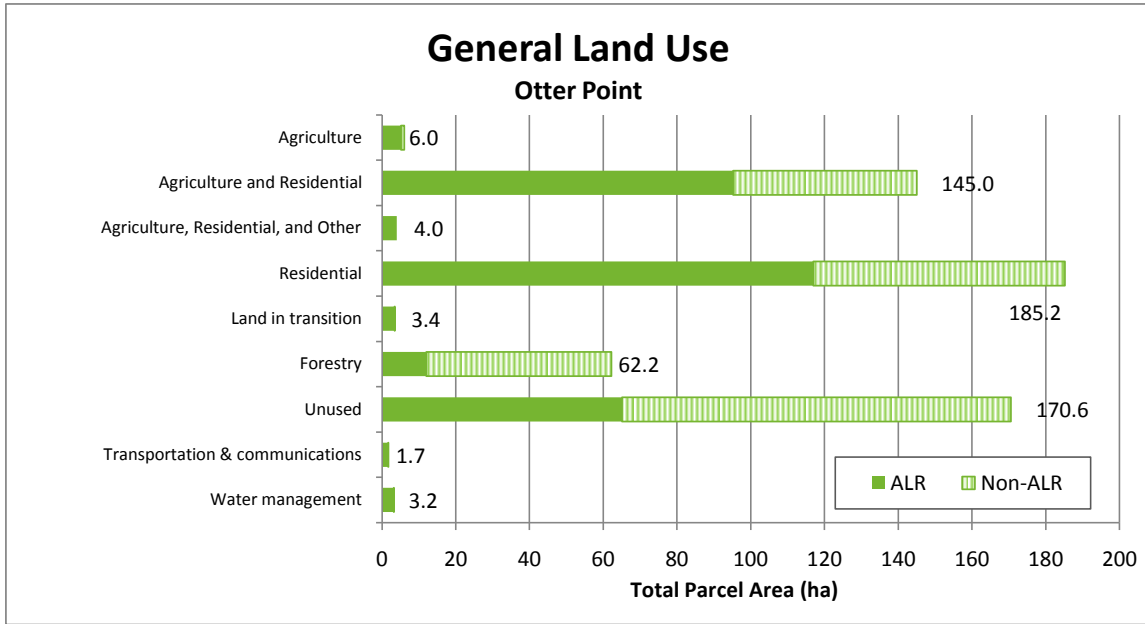


- Natural / landscape vegetation
- Cultivated land / farm structures
- Built areas, water / wetlands, natural bare areas

Land Cover	Physical Limitations				Total ALR (ha)
	None	Drainage	Slope	Soil	
Landscape vegetation	10.4				10.4
Natural vegetation	155.4	16.0	24.1	2.9	198.4
TOTAL	166	16	24	3	209

1. In Otter Point, of the 319 hectares in the ALR, 302 are available for agriculture. Only 73 ha are cultivated or used for farm structures.
2. Based on the land covers, 209 ha are potentially available for future farm development, and 166 ha have no apparent physical limitations.

Otter Point



- 1 The area of the ALR within Otter Point is 307 hectares (ha). Another 275 ha were not in the ALR.
- 2 Of the 79 parcels even partially in the ALR, only 18 parcels have agricultural land uses (23%). Thirty-nine (39) parcels have residential uses (49%), and 19 parcels have temporary non-farm uses (24%). Four per cent (4%) have permanent non-farm uses (3 parcels).

Otter Point

General land use by parcel for all parcels in the Otter Point inventory area

General Land Use		Inventory Area					
		Number of parcels	Area of parcels (ha)	Mean parcel size (ha)	Median parcel size (ha)	ALR (ha)	Non-ALR (ha)
Agricultural use	Agriculture	2	6	3	2	5	< 1
	Agriculture and Other	-	-	-	-	-	-
	Agriculture and Residential	15	145	10	4	95	50
	Agriculture, Residential, and Other	1	4	4	4	4	-
SUBTOTAL		18	155			104	51
Residential use	Residential	39	185	5	3	117	68
	Residential and Other	-	-	-	-	-	-
	SUBTOTAL	39	185			117	68
Temporary non-farm use	Land in transition	1	3	3	3	3	< 1
	Forestry	1	62	62	30	12	50
	Unused	17	171	10	8	65	105
	Commercial & service - agriculture related	-	-	-	-	-	-
	SUBTOTAL	19	236			81	156
Permanent non-farm use	Institutional	-	-	-	-	-	-
	Golf course	-	-	-	-	-	-
	Protected area / park / ecological reserve	-	-	-	-	-	-
	Residential (<=0.4ha)	-	-	-	-	-	-
	Transportation & communications	2	2	< 1	1	2	< 1
	Commercial & service - permanent non farm use	-	-	-	-	-	-
	Water management	1	3	3	3	3	< 1
SUBTOTAL	3	5			5	< 1	
SURVEYED PARCELS TOTAL		79	581			307	275
Not Surveyed		-	-	-	-	-	-
INVENTORY AREA TOTAL		79	581			307	275

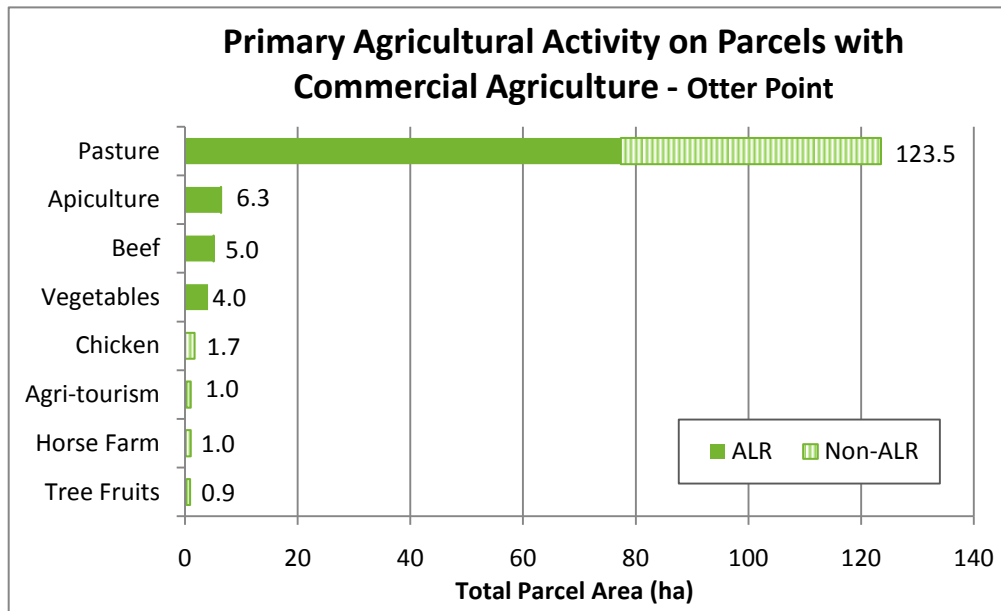
Otter Point

Parcel status with respect to agriculture for all parcels in the inventory area.

Agricultural Land Use	Number of parcels	Area of parcels (ha)	ALR (ha)	Non-ALR (ha)
Commercial Agriculture	15	143.6	93.4	50.1
Non-commercial Agriculture	3	11.5	11.0	< 1
Available	54	420.3	197.3	223.0
Unavailable	7	5.9	5.0	< 1
TOTAL SURVEYED	79	581	307	275

1. Fifteen parcels (93.4 ha in the ALR) had commercial agricultural activities [19%], while only 3 parcels had minor agricultural activities (non-commercial) [4%].
2. Fifty-four (54) parcels were available for agricultural use of which 197 ha are in the ALR. Another 223 ha lie outside the ALR and could be investigated further for agricultural use.

Otter Point



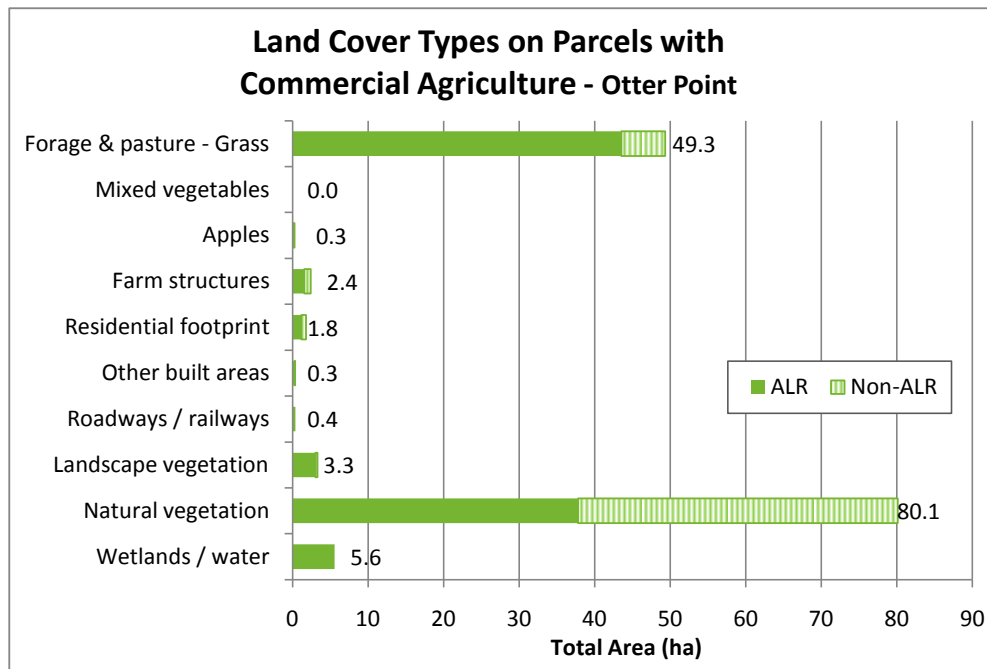
The 15 parcels with commercial agricultural use comprise 144 ha (93 ha of which is in the ALR). Eight (8) parcels have 'pasture' as the primary agricultural activity.

Otter Point

Primary agricultural activity for Otter Point surveyed parcels with commercial agriculture activities

Primary agricultural activity	Parcels with Commercial Agriculture Activities					
	Number of parcels	Parcel area (ha)	Mean parcel size (ha)	Median parcel size (ha)	ALR (ha)	Non-ALR (ha)
Pasture	8	123.5	15.4	4.0	77	46
Apiculture	1	6.3	6.3	6.3	6	< 1
Beef	1	5.0	5.0	5.0	5	< 1
Vegetables	1	4.0	4.0	8.3	4	< 1
Chicken	1	1.7	1.7	2.3	< 1	2
Agri-tourism	1	1.0	1.0	1.0	< 1	< 1
Horse Farm	1	1.0	1.0	1.4	< 1	< 1
Tree Fruits	1	0.9	0.9	0.9	< 1	< 1
TOTAL	15	144			93	50

Otter Point



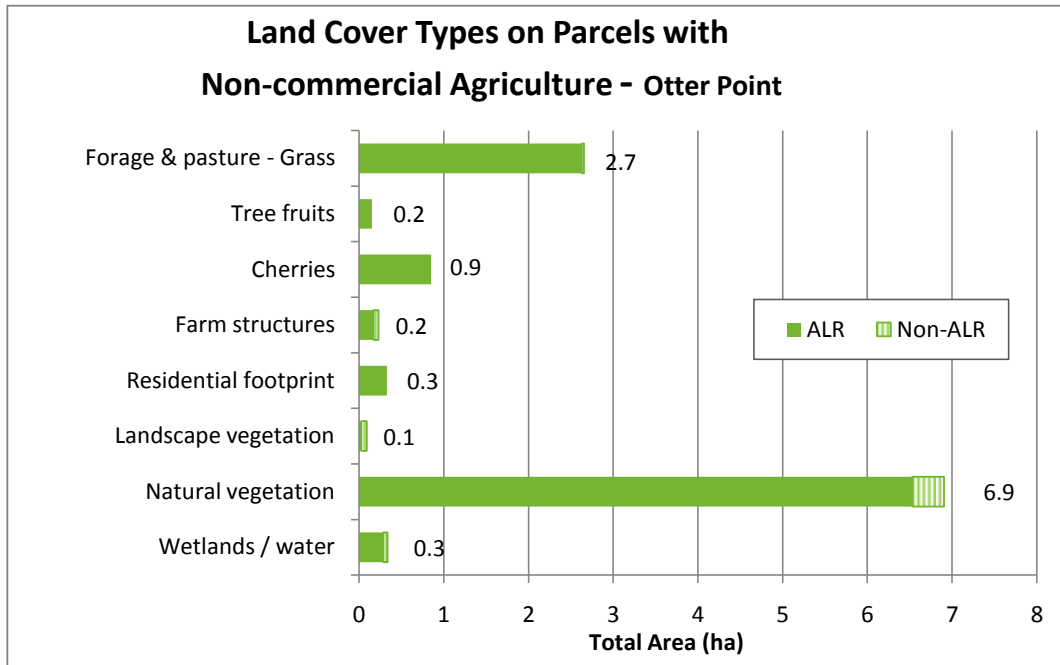
Forage and pasture grass cover 47% of the ALR land on parcels with commercial agricultural activities (43.5 ha). Another 41% of the ALR on parcels with commercial agriculture is covered by natural vegetation (37.8 ha).

Otter Point

Land cover for Otter Point surveyed parcels with commercial agriculture activities

Land Cover Type	Polygon Areas on Parcels with Commercial Agriculture Activities					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Forage & pasture - Grass	14	49.3	3.5	1.4	43.5	5.8
Apples	2	0.3	0.1	0.1	< 0.1	0.2
Mixed vegetables	1	< 0.1	< 0.1	< 0.1	< 0.1	-
SUBTOTAL	17	50			44	6
Farm structures	11	2.4	0.2	0.2	1.6	0.8
SUBTOTAL	11	2			2	< 1
Residential footprint	10	1.8	0.2	0.1	1.2	0.6
Other built areas	2	0.3	0.2	0.1	0.3	< 0.1
SUBTOTAL	12	2			1	< 1
Roadways / railways	2	0.4	0.2	0.1	0.4	-
SUBTOTAL	2	< 1			< 1	-
Landscape vegetation	4	3.3	0.8	0.3	3.1	0.2
Natural vegetation	22	80.1	3.6	1.1	37.8	42.3
SUBTOTAL	26	83			41	43
Wetlands / water	6	5.6	0.9	0.4	5.6	-
SUBTOTAL	6	6			6	-
Not surveyed	-	-	-	-	-	-
TOTAL	74	144			93	50

Otter Point



'Natural vegetation' is the main land cover on parcels with the non-commercial agricultural use (58%) [6.5 ha ALR and 0.4 ha non-ALR]. Another 31% is covered by grass pasture and fruits [3.7 ha].

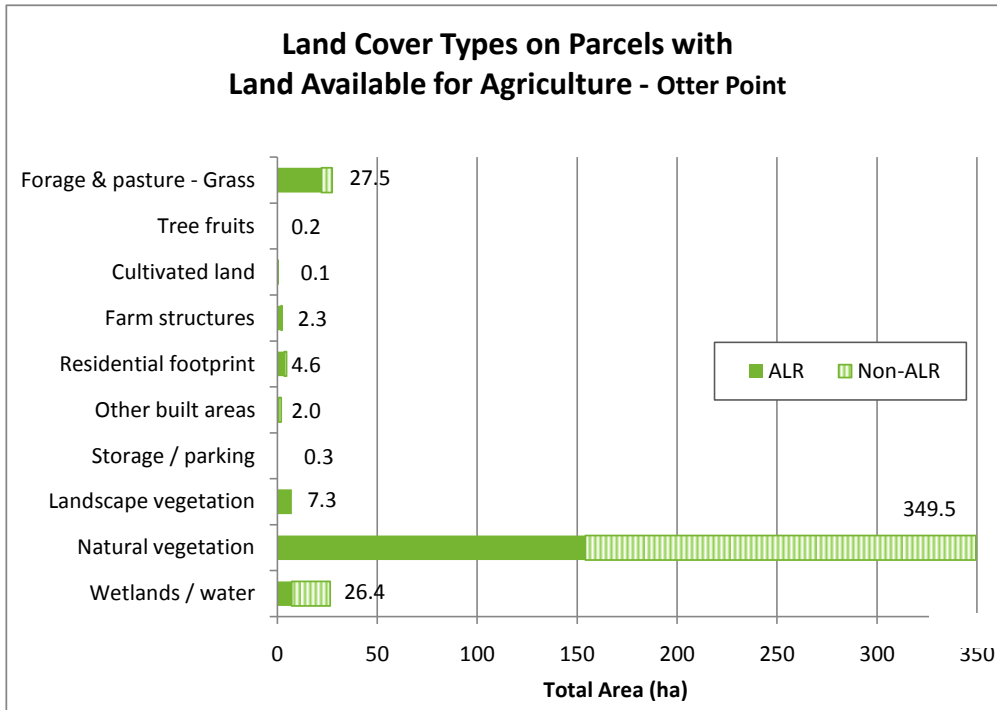
Otter Point

All 3 parcels with non-commercial agriculture (in Juan de Fuca EA) are in Otter Point; so, these data can be used for both Juan de Fuca EA and Otter Point.

Land cover for surveyed parcels with non-commercial agriculture activities

Land Cover Type	Polygon Areas on Parcels with Non-commercial Agriculture Activities					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Forage & pasture - Grass	4	2.7	0.7	0.4	2.6	< 0.1
Tree fruits	1	0.2	0.2	0.2	0.2	-
Cherries	1	0.9	0.9	0.9	0.9	< 0.1
SUBTOTAL	6.0	3.7			3.6	< 0.1
Farm structures	1.0	0.2	0.2	0.2	0.2	< 0.1
SUBTOTAL	1.0	0.2			0.2	< 0.1
Residential footprint	3.0	0.3	0.1	< 0.1	0.3	-
SUBTOTAL	3.0	0.3	0.1	< 0.1	0.3	-
Landscape vegetation	1.0	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Natural vegetation	3.0	6.9	2.3	1.9	6.5	0.4
SUBTOTAL	4.0	7.0			6.6	0.4
Wetlands / water	2.0	0.3	0.2	0.2	0.3	< 0.1
SUBTOTAL	2.0	0.3			0.3	< 0.1
TOTAL	16	12			11	< 1

Otter Point



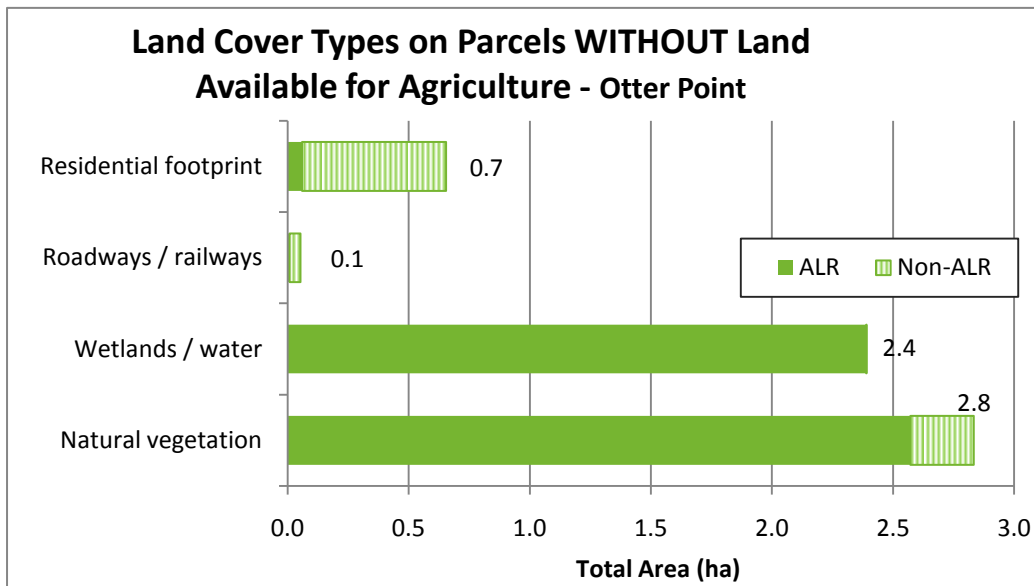
1. The parcels with land potentially available for agriculture are covered 83% by natural vegetation [349.5 ha, of which 154.1 ha are in the ALR]. .
2. More detailed land capability surveys would have to be conducted to determine if there were any further restrictions to development other than land clearing.

Otter Point

Land cover for Otter Point surveyed parcels with land available for agriculture

Land Cover Type	Polygon Areas on Parcels Available for Agriculture					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Forage & pasture - Grass	11	27.5	2.5	1.5	22.1	5.4
Tree fruits	1	0.2	0.2	0.2	0.2	-
Cultivated land	1	0.1	0.1	0.1	0.1	< 0.1
SUBTOTAL	13	28			22	5
Farm structures	10	2.3	0.2	0.2	1.9	0.4
SUBTOTAL	10	2			2	< 1
Residential footprint	28	4.6	0.2	0.1	3.5	1.1
Other built areas	7	2.0	0.3	0.2	0.6	1.4
SUBTOTAL	35	7			4	2
Storage / parking	2	0.3	0.1	0.1	0.3	< 0.1
SUBTOTAL	2	< 1			< 1	< 1
Landscape vegetation	8	7.3	0.9	0.5	7.3	< 0.1
Natural vegetation	66	349.5	5.3	2.5	154.1	195.4
SUBTOTAL	74	357			161	195
Wetlands / water	10	26.4	2.6	0.8	7.2	19.3
SUBTOTAL	10	26			7	19
Not surveyed	-	-	-	-	-	-
TOTAL	144	420			197	223

Otter Point



The area of parcels WITHOUT land available for agriculture only totals 6 hectares, 5 of which are in the ALR. The two main land covers for the 5 ha of ALR which are not available for agriculture are natural vegetation (2.6 ha) and wetlands/water (2.4 ha).

Otter Point

Land cover for Otter Point surveyed parcels without land available for agriculture

Land Cover Type	Polygon Areas on Parcels NOT Available for Agriculture					
	Number of areas	Area (ha)	Mean area size (ha)	Median area size (ha)	ALR (ha)	Non-ALR (ha)
Residential footprint	4	0.7	0.2	0.2	< 0.1	0.6
SUBTOTAL	4	< 1			< 1	< 1
Roadways / railways	1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
SUBTOTAL	1	< 1			< 1	< 1
Natural vegetation	5	2.8	0.6	0.2	2.6	0.3
SUBTOTAL	5	3			3	< 1
Wetlands / water	2	2.4	1.2	1.2	2.4	< 0.1
SUBTOTAL	2	2			2	< 1
Not surveyed	-	-	-	-	-	-
TOTAL	12	6			5	< 1